

**THE EXTENDED REALITY OF THE
META-IP-VERSE
IN THE MODERN FASHION INDUSTRY**

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A THESIS SUBMITTED TO
THE FACULTY OF GRADUATE STUDIES
IN PARTIAL FULFILMENT OF THE REQUIREMENTS FOR THE
DEGREE OF MASTER OF LAWS

GRADUATE PROGRAM IN LAW, OSGOODE HALL LAW SCHOOL
YORK UNIVERSITY
TORONTO, ONTARIO

April 2026

ii. Abstract

The metaverse presents the fashion industry with unprecedented commercial possibilities, yet its transnational, decentralized, and jurisdictionally indeterminate architecture demands measured and deliberate engagement from brands, consumers, and regulators alike. This thesis contends that a sustainable and equitable trajectory is contingent upon the principled alignment of intellectual property protections, regulatory frameworks, and consumer rights. Existing intellectual property doctrine proves structurally inadequate to govern digital goods, non-fungible tokens, and virtual assets within an environment defined by interoperability failures, traceability deficits, pseudonymous transactional infrastructure, and the foundational decentralization of blockchain-based platforms. The governance imperative extends well beyond the protection of incumbent commercial interests. Coherent metaversal intellectual property frameworks carry profound social, cultural, and institutional significance – safeguarding cultural communities from digital appropriation, redressing the informational asymmetries embedded in smart contract transactions, and cultivating the conditions under which independent digital creativity can flourish without systematic disadvantage. This thesis maintains that effective governance cannot merely analogize from conventional intellectual property frameworks to virtual environments, nor can it simply transpose the enforcement paradigms developed for the early internet onto a space that is architecturally, commercially, and experientially distinct. It must instead navigate the compounding doctrinal challenges of omniterritoriality, platform interoperability, pseudonymous traceability, and structural decentralization. The progressive blurring of physical and virtual extended realities will require genuine global multilateral partnership, coordinated intergovernmental engagement, and a willingness to treat the governance architecture of the metaverse as a problem of institutional design rather than doctrinal extrapolation. Most critically, the framework must be prospective rather than reactive, internationally coordinated rather than territorially fragmented, and constitutively embedded with values of equity, access, and transparency as foundational commitments from which the architecture of metaverse IP governance is built – and against which its legitimacy will ultimately be measured.

iii. Acknowledgements

I would like to extend a wholehearted thank you to my own personal ‘board of directors’. First, Dr. Carys Craig and Professor Ruth Buchanan, my supervisory committee, without whom this thesis would not be possible. Dr. Craig has demonstrated unconditional patience and support throughout this journey, and I am forever grateful for her grace and kindness. Included within this board are the integral members of my life: my personal mentors and beloved friends Tyrrell Schloss and Tina Taeput, my sisters Sanam Chopra and Iffat Razzaque who double as my guiding lights, and the rest of my loving family, for which I am blessed to now have two thanks to my lifeline, Balraj Suri. Thank you for always lifting me beyond the stars.

I love you *all* infinitely.

Twenty million, maybe more – nay, definitely more.

Keep beating your wings, Hummingbird. A thousand strong.

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Introduction

The metaverse has the potential to fundamentally alter the terms on which we interact with one another, how we perceive ourselves, and how we view the world around us and our positioning within an increasingly hybridized physical and digital world. In the context of the fashion industry, an industry whose commercial logic has always been inseparable from the construction of identity, aspiration, and social meaning, this reordering is both technological and constitutive. The integration of generative artificial intelligence, blockchain-based digital assets, and immersive virtual environments into the fabric of fashion commerce has the potential to leverage not only how consumers shop and how they experience the act of purchasing, but how designers conceive of their work, how brands construct and communicate their identity, and how the relationship between creator, product, and consumer is structured at its most fundamental level. Unconfined by the physical constraints that have historically bounded the industry, including geography, materiality, scarcity, the metaverse presents commercial possibilities that are, in the most literal sense, without precedent. For a consumer-driven industry whose value proposition has always rested on the careful management of desire, exclusivity, and brand meaning, the commercialization prospects are potentially transformative in scale and character. It is precisely that transformative potential, however, that calls into sharp relief the legal questions this thesis is concerned to address: as commercial activity migrates into virtual environments that are borderless, decentralized, and architecturally unlike anything existing law was designed to govern, the intellectual property frameworks on which the fashion industry depends to protect its most valuable assets are placed under pressures they were not built to withstand. This demands innovative methods of strategic intellectual property (IP) protection and monitoring to ensure that businesses are safeguarded retrospectively, prospectively, and proactively. Learning from the physical world, where we as people have co-existed as a species, we all have different ways of expressing our identity, be it through fashion, art, music, and more. What we are seeing however, is that we are no longer confined to the physical world for such expression. As we begin to exist in the digital world, we exist within two seamlessly analogous worlds. The metaverse as a tool of technology, and the evolution of how individuals express themselves within it, will inevitably be a meaningful part of the transformation of social relations and commerce.

While the metaverse is estimated to become a multi-trillion-dollar market within this decade alone, it stands to be a prominent topic in the fashion industry for brands looking to thrive in today's market's innovative digital transformation. McKinsey suggested that the metaverse economy, including virtual goods and digital transactions, has the potential to generate up to 5 trillion US\$ in value, while

Citi estimates a value of up to 13 trillion US\$ by 2030.¹ In terms of consumer engagement, metaverse users enthusiastically engage in business transactions, with 79% of active users making a digital purchase in 2022.² The historical technological infrastructure advancements seen between 2020 to 2025 laid the foundational framework for what is now coined as the ‘commercial adoption era’ of the transformation phase which will take place from 2026 to 2030. Cautious estimates note a virtual asset growth rate at a compound annual growth rate of 46.4% from 2025 to 2030 as the “global metaverse market size was estimated at USD 105.40 billion in 2024 and is projected to reach USD 936.57 billion by 2030.”³ According to analysis conducted by Fact View Research, a market research firm, the global fashion metaverse market in particular initially “valued at 7.1 billion in 2023, is expected to reach \$89.6 billion by 2032” demonstrating the vast scale of the fashion industry in this space.⁴ Although the use and sale of virtual fashion in the metaverse creates a number of opportunities for brand owners due to this magnitude, it also opens the door to a new kind of dispute concerning unauthorized virtual assets with a rise of misappropriation of trademarks and copyrights and the development of new strategies relating to IP commercialization within the digital fashion industry. While it is certain that the metaverse blurs the line between the physical and digital worlds, how does this transition promise to improve the consumer brand experience and what are the legal implications of commercializing intellectual property through branding experiences within the metaverse? In this context, the digital fashion industry can encompass the creations of “quantified representations and simulations of garments that are 3D files often containing the same material and shape data as real garments...Digital garments can be worn in [virtual] and augmented reality environments, games, online stores and museums, virtual fitting rooms and smart mirrors, providing ‘phygital’ experiences, merging physical and digital realms.”⁵ For brands designing within virtual realms, this space “enables unlimited creative experimentation, minimization of resources, participation of large communities in fashion production, an inclusive approach to bodies and identities and learning about garment construction as well as global accessibility of digitized archival fashion.”⁶

¹ Tarek Elmasry et al, “Value Creation in the Metaverse” (2022), online: *McKinsey & Company* <<https://www.mckinsey.com/capabilities/growth-marketing-and-sales/our-insights/value-creation-in-the-metaverse>>. See also, Kathleen Boyle, *Metaverse and Money: Decrypting the Future* (Citi GPS: Global Perspectives & Solutions, 2021).

² *Ibid.*

³ “Metaverse Market Size And Share, Industry Report, 2030”, online: <<https://www.grandviewresearch.com/industry-analysis/metaverse-market-report>>.

⁴ BOF Studio, “The Five Strategies Defining Fashion’s Future in the Metaverse”, (14 January 2025), online: The Business of Fashion <<https://www.businessoffashion.com/articles/technology/five-strategies-defining-fashion-industry-metaverse-future-through-nfts-ai/>>.

⁵ Luís Ricardo Santos, Gianni Montagna & Maria João Pereira Neto, “The Virtualization of the Fashion Product” in Giuseppe Di Bucchianico et al, eds, *Advances in Industrial Design* (Cham: Springer International Publishing, 2020) 820. See also, Natalia Särämäkari, “Digital 3D Fashion Designers: Cases of Atacac and The Fabricant” (2023) 27:1 Fashion Theory 85–114, online: <<https://www.tandfonline.com/doi/full/10.1080/1362704X.2021.1981657>>.

⁶ Super, Bureau, “Fashion Beyond Physicality”, (10 December 2019), online: *Medium* <<https://medium.com/@superbureau/fashion-beyond-physicality-486d71b05dae>>.

The overall fashion industry's revenue worldwide is expected to show an annual growth rate of 4.91% (CAGR 2026-2030) resulting in a projected market volume of US\$1.16 trillion by 2030⁷, the global digital fashion market size making up approximately \$101 billion in 2024, expecting to reach \$297 billion by 2032, growing at a compound annual growth rate of 96% - a proliferation of this industry that intellectual property law has played an enormous role in supporting.⁸ IP rights are of significant value to fashion companies, not just economically, but also in how they allow fashion designers to situate themselves in a cultural landscape that places great value on authenticity and brand identity. Trademark and copyright protection are significant instruments in the protection of not only branding but also fashion design.⁹ This implores the following questions: is this industry adequately protected across the globe? Do we see technological developments to be hindering the protection of fashion brands today and potentially in the future or are they facilitating progress in the industry? Do we see any technical solutions as answers to these challenges? And how does the law interact with such challenges and solutions to govern these issues in the context of a global platform?

Although we have tools in each jurisdiction to remedy typical issues of infringement, systemic limitations of cross-territoriality may prevent brands from reaching solutions while navigating similar infringement in the metaverse due to issues of traceability, ownership, and jurisdictional challenges. This thesis first presents a preliminary description of the nature of branding and commercialization of IP in the metaverse, then proceeds in the second chapter to outline the role of trademark, copyright, and industrial design in the modern fashion industry as is relevant to brand engagement within the metaverse. The second chapter highlights the fashion industry's reliance on protections to ensure brand longevity, and the subsequent potential for brands to leverage their IP in this emerging digital fashion market. It discusses the role of trademarks and copyright as well as content ownership in the metaverse. The third chapter aims to outline limitations in trademark, copyright, and industrial design, and to tie lessons learned from recent U.S. case law to understand where there may be room for expansion within Canadian legislation to protect brands within virtual spaces. This section focuses on common law frameworks of confusion liability and its limitations jurisdictionally, passing off, brand dilution and depreciation liability and its limitations, and copyright limitations and their intersection with Freedom of Expression legislation. I argue that in this evolving context, case law from the U.S. and legislation from the EU as best practices may be applied with strong persuasive authority for Canadian Courts and will require further legislation development to sufficiently address the metaversal and external reality nuances, as well as the legal implications that follow. The fourth chapter discusses the digital challenge of protecting rights in a transnational territorial system and the application of this in contrast with the

⁷ "Fashion - Worldwide | Statista Market Forecast", online: Statista <<https://www.statista.com/outlook/emo/fashion/worldwide>>.

⁸ BOF Studio, *supra* note 4.

⁹ For the purposes of this thesis, "trademark" will be used to refer to both trademarks for goods and for services.

international IP regimes that address these infringements in the metaverse. This chapter assesses the current state of platform governance and challenges that the nature of this digital space poses to set the stage for the current international protection regimes for digital assets. It then moves into the contemplation of establishing jurisdiction on a global platform and the applicable private international law interventions. We have yet to see how this expanding area of law unfolds multi-jurisdictionally – at present, we have recent case law from the United States that gives us glimpses of how governance in this regard may be applied.

Overall, this thesis identifies key gaps that may remain to be satisfied as intellectual property law adjusts to the ever-evolving landscape of extended reality and the metaverse in the context of the modern fashion industry. It is important to caution that discussions herein postulate certain hypotheticals regarding how Canadian courts may view legal claims that bare similarity to that of legal theories and case law assessed in other jurisdictions to provide take-away lessons and applications, and discussions will vary in terms of its meritoriousness. Issues will be discussed with keen awareness of the variation of territorial application, and of the case nuances that are distinguished by its own facts. As this area evolves, new facts will arise which bear similarity, but will also contain distinctive factual elements of their own based within the Canadian legal context.

We see that emerging technology reveals gaps in intellectual property protection globally, specifically regarding how “real” world IP rights extend to the virtual world. Fashion brands are beginning to create digital replicas of their physical goods for virtual fashion shows or for other uses within the metaverse linked to potential NFTs to be commercialized (i.e., virtual Gucci Town and digital live show on the Decentraland platform, entitled “Metaverse Fashion Week”). Whilst the use and sale of virtual fashion in the Metaverse creates a number of opportunities for brand owners, it also opens the door to a new kind of dispute concerning unauthorized virtual goods with a rise of misappropriation of intellectual property. As brands across all industries continue to navigate this new space of marketplaces and other digital platforms, rights holders must proactively create new and innovative methods of ensuring that their trademarks and copyrights are not used without permission or in association with a series of digital content that they have not authorized. The monitoring of unauthorized uses of trademarks and copyrights in a new, virtual space, presents similar challenges to those of physical goods, with an added layer of uncertainty specifically with respect to effective enforcement measures taken against the makers of the counterfeit virtual goods. Although virtual counterfeits can undoubtedly impact the metaverse, replicas of virtual assets created and sold through digital marketplaces and virtual counterfeits can also impact brands in the physical world. Brands from high-end luxury to athletic apparel segments have brought claims for trademark infringement and brand dilution against NFT creators that have released collections of NFT’s, which closely resemble their brand assets (i.e. their

trademarks or trade dress). Additionally, we see the same issues with regard to copyright infringements in this space.

The fashion industry profits tremendously through “repeatedly originating creative content,” yet its core creative outputs, namely clothing designs, often fall beyond the full scope of intellectual property protection. Coined by Kal Raustiala and Christopher Sprigman, the concept of IP’s “negative space” refers to “any ‘substantial area of creativity’ in which intellectual property laws do not penetrate or provide only very limited propertization.”¹⁰ Regardless, season after season, innovative designs continue to emerge and diffuse rapidly, even in the face of widespread copying – an observation captured by the so-called piracy paradox.¹¹ Contrary to the traditional assumption that copying disincentivizes creativity, the fashion industry demonstrates that imitation can, in certain contexts, stimulate innovation by accelerating trend cycles, increasing visibility, and reinforcing the value of original designs.¹² As Raustiala and Sprigman posit, copying may therefore function as a mechanism that sustains, rather than undermines, the cyclical nature of fashion innovation.¹³ This dynamic underscores a broader balancing function within intellectual property law, wherein courts and policymakers seek to safeguard creative expression while simultaneously preserving the conditions necessary for a competitive and evolving marketplace. However, the limitations of intellectual property protection in fashion, historically viewed as gaps, may also be understood as deliberate constraints that prevent over-propertization, that is, the extension of exclusive rights beyond what is necessary to incentivize creation.¹⁴ In this sense, the relative openness of the fashion industry has enabled iterative design, trend diffusion, and consumer participation to flourish.¹⁵ As fashion increasingly transitions into the metaverse, the question arises whether expanding protection to digital garments and virtual designs would enhance innovation or, conversely, disrupt this equilibrium by imposing excessive proprietary control over spaces that depend on remixing, interoperability, and rapid creative exchange.¹⁶ While recognizing these limitations on the relevance and effectiveness of IP controls within the fashion industry, this thesis takes as its premise the importance of a fashion industry that generally abides by the conventional norms of IP protection, albeit ideally within a largely self-regulating community-governed environment. It further contends that the metaverse has the potential to advance this ideology of a fair, well-functioning and innovative fashion industry.

¹⁰ Kal Raustiala & Christopher Sprigman, *The Knockoff Economy: How Imitation Sparks Innovation* (New York: Oxford University Press, 2012) at 3–5.

¹¹ *Ibid* at 18–20.

¹² *Ibid* at 48–55.

¹³ *Ibid* at 60–65.

¹⁴ Mark A. Lemley, “IP in a World Without Scarcity” (2015) 90:2 *NYU Law Review* 460 at 468–472.

¹⁵ Raustiala & Sprigman, *supra* note 10 at 97–102.

¹⁶ World Intellectual Property Organization, *Intellectual Property and the Metaverse: Challenges and Opportunities* (Geneva: WIPO, 2023) at 18–23.

i) *Meta-What?*

The metaverse, in all its glory, is understood as an entirely parallel virtual universe to our physical world that connects all virtual universes. Although there is a lack of consensus on the primary definition and the overall scope of the ‘metaverse’¹⁷, certain factors assist in conceptualizing what it encompasses. Within Web3, the metaverse is a decentralized ecosystem (not requiring control through a central authority) based on blockchain, and consists of interactive and immersive digital infrastructure “enabled by a range of technologies, including virtualization devices, such as virtual reality (VR) and augmented reality (AR), devices for avatar control and haptics, blockchain technology and NFTs, and infrastructure technologies, such as low latency networks and cloud computing.”¹⁸ XR, or Extended Reality, encompasses various immersive technologies such as virtual reality (VR), augmented reality (AR), and mixed reality (MR). It refers to the marrying of the physical and virtual world, creating an innovative environment where digital data is integrated into the real world. In the context of the metaverse, XR refers to the amalgamation of VR, AR and MR, and plays a critical role in metaversal experiences by enabling users to engage with the virtual world through XR overlays. These virtual worlds within the metaverse are supported by a diverse set of enabling mechanisms that facilitate the development, sharing, and consuming of digital data and assets, whether it is digital goods, services, or virtual experiences.¹⁹

In this regard, the metaverse can be conceptualized as a “three-dimensional virtual world where avatars [consumers] engage in political, economic, social, and cultural activities. The term is widely used in the sense of a virtual world based on daily life where both the real and the unreal coexist” through virtual and augmented reality which overlays a digital element on the physical world.²⁰ The metaverse in its current form can be defined as “simulated digital environments...each of [which] are spaces that rely on user interaction to mimic the world we live in today.”²¹ The metaverse in this regard provides an ecosystem that offers immersive interaction and socialization through simulated shared experiences. The digital environment has two main sources of information: one is real-world input which includes the information and creative knowledge from physical spaces which is then digitally displayed in a virtual context, and secondly, the output of virtual worlds, including information generated by digital assets, avatars and virtual services.²² The metaversal structure as Wang and others describe it, is a:

¹⁷ The ‘metaverse’ stems from Neal Stephenson’s dystopian science fiction novel *Snow Crash*, in which the main character lives both within a real-life physical reality and in an alternate digital reality.

¹⁸ Jörg Weking, and others, “Metaverse-enabled entrepreneurship” (2023) 19 *Journal of Business Venturing Insights*, online: <<https://linkinghub.elsevier.com/retrieve/pii/S2352673423000045>>.

¹⁹ *Ibid.*

²⁰ Sang-Min Park & Young-Gab Kim, “A Metaverse: Taxonomy, Components, Applications, and Open Challenges” (2022) 10 *IEEE Access* 4209–4251, online: <<https://ieeexplore.ieee.org/document/9667507/>>.

²¹ Trademark law, NFTs and the Metaverse, 22 WL 2336180.

²² *Ibid.*

self-sustaining, hyper spatiotemporal, and 3D immersive virtual shared space, created by the convergence of physically persistent virtual space and virtually enhanced physical reality...composed of user-controlled avatars, digital things, virtual environments, and other computer-generated elements, where humans (represented by avatars) can use their virtual identity through any smart device to communicate, collaborate, and socialize with each other.²³

Users may wear a VR headset and navigate a virtual platform, attend events, participate in conferences, or explore virtual branded worlds. Meanwhile, AR could be used to overlay digital information onto physical objects in the metaverse, enhancing the user's perception and engagement, seamlessly blending virtual and real-world elements through mixed reality (MR). MR combines elements of both VR and AR and enables users to interact with digital branded content while still maintaining cognizance of and interaction with the real physical world. For example, MR devices, such as Microsoft's HoloLens smart glasses or Apple's headset, Vision Pro, allow users to see and manipulate virtual objects that appear to exist in the real world. By leveraging XR technologies within the metaverse, users and consumers in the brand context can have a more immersive and interactive experiences, enabling them to engage with the digital universe and other users in an enhanced and more intuitive manner. XR is a fundamental component of the metaverse's vision, to enable bridging the gap between the physical and digital realms and creating a truly immersive virtual experience. When there is a marrying of these technologies that goes beyond XR, including machine learning, neuro-interfaces, and refined augmented reality, along with the leveraging of digital assets and branded non-fungible tokens (BNFTs), brands can create a frictionless experience to incentivize maintained consumer-brand participation. Embracing web3 and the digital transformation of business models within the fashion industry, the metaverse offers immersive digital environments. As Wassom and others assert, "the essential characteristic of AR is to liberate digital data and imagery from two-dimensional screens and allow that content to be perceived and interacted with as if it were just as volumetric and accessible as any physical object."²⁴ This is the idea of a frictionless experience, which consumer-brand experience heavily relies on through the leveraging of branding, and as result, intellectual property protections.

As precursors to the metaverse, we have seen 3D interactive gaming platforms such as Roblox, Second Life and Fortnite provided participants with the opportunity to utilize XR technology through headsets and avatars, but this was limited by the platform, device, and connectivity. However, the metaverse, as we understand it, is believed to have enormous potential for enabling immersive digital environments and augmented movement through "leveraging the rapid development of deep learning for improved visual and speech recognition accuracy, as well as multimodal models as an E2E (end-to-

²³ Yuntao Wang et al, "A Survey on Metaverse: Fundamentals, Security, and Privacy" (2022) 25:1 IEEE Commun Surv Tutorials 319–352, online: <<http://arxiv.org/abs/2203.02662>>.

²⁴ Brian Wassom, Amber Underhill & Andrew Rossow, eds, *Research Handbook on the Law of Virtual and Augmented Reality* (Edward Elgar Publishing, 2018).

end) solution to reduce processing time and complexity.”²⁵ With cryptocurrency as an economic bridge between the metaverse and the real world, this environment expands on immersive interaction with a multitude of social, economic as well as legal implications. Immersive technology (XR), physical insulations, and implementations that are mainly code-based to figure out solutions, create a new and innovative space for brands to engage with their users. As in the real-world, consumers associate specific brand symbols and visuals with forms of commercial products and services but in the context of the metaverse and parallel augmented reality experiences, companies recognize that the potential extends far beyond visuals. Brands are now engaged in haptic technology to further develop the feeling of touching virtual objects through interfaces where there is an enhanced visceral familiarity. This draws in consumer-brand experience, and therefore, there is likely to be an acceleration of interest in haptic and sensory trademarks.²⁶

How does this work? In the metaverse, blockchains play a facilitating role in storage, sharing, and data privacy in a way that is decentralized and interoperable while remaining secure. Blockchains can be defined as “peer-to-peer decentralized databases or ledgers in which data is stored in blocks, which are shared by all network users, monitored by everyone, and owned and controlled by no one.”²⁷ NFTs (non-fungible tokens) are developed through these blockchain based assets that are authenticated using these ‘ledgers’, or blockchains, which are then stored in digital wallets attributing ownership of an asset to a specific individual. NFTs are essentially virtual receipts on the blockchain and can be used for a multitude of purposes such as ticketing, art, or court document authentication; they will be the tool that represents digital assets moving forward as they can function as receipts for unique items of intellectual property.²⁸ Digital ledgers serve as a “public certificate of authenticity or proof of ownership, but do not restrict the sharing or copying of the underlying digital files.”²⁹ Each token represents rights to a unique digital asset including, for example, an avatar, wearable, skin or piece of digital art. NFT authenticity, access, uniqueness, and scarcity can be bought, sold and traded, usually in cryptocurrency, through marketplaces such as OpenSea or Rarible or through private (brand-specific) platforms. NFTs can be representative of “almost any real or intangible property, including artwork, music, videos, collectibles, trading cards, video game virtual items, or even real estate” and can be used

²⁵ Ruobing Yan, “A Sustainable Fashion Industry Business Model Revolution Based on the Metaverse: Practices and Reciprocal Processes” (2022) 4 HBEM 363–369, online: <<https://drpress.org/ojs/index.php/HBEM/article/view/3526>>.

²⁶ Wassom, *supra* note 18. See also, Baird, Steve, “Touch Trademarks and Tactile Brands with Mojo: Feeling the Strength of a Velvet, Turgid, Touch Mark?” (2009) Duets Blog, online: <<https://www.duetsblog.com/2009/07/articles/trademarks/touch-trademarks-and-tactile-brands-with-mojo-feeling-the-strength-of-a-velvet-turgidtouch-mark/>>.

²⁷ Kevin Giang Barrera & Denish Shah, “Marketing in the Metaverse: Conceptual understanding, framework, and research agenda” (2023) 155 Journal of Business Research 113420, online: <<https://linkinghub.elsevier.com/retrieve/pii/S0148296322008852>>, See also, Denish Shah, and Emily Shay, “How and why artificial intelligence, mixed reality and blockchain technologies will change marketing we know today” (2019) *Handbook of Advances in Marketing in an Era of Disruptions* 377-390.

²⁸ “The Legal Issues of the Metaverse and NFTs - The Good, The Bad, and The Ugly”, (26 July 2022), online: *The WS Society* <<https://www.wssociety.co.uk/features/2022/7/22/gbjg3k7v1vt5l6ckt28man5epe5tbf>>.

²⁹ BSuccessful, “What is a NFT?”, (3 March 2022), online: *Coinmonks* <<https://medium.com/coinmonks/what-is-a-nft-8ec8d282d260>>.

to “represent proof of ownership of physical objects,” such as a limited-edition physical goods such as designer handbags, or an experience or event such as concert performances or fashion runway shows.³⁰ NFTs can therefore be regarded as a form of investment collectable, with hopes of increasing in value over time, and can be traded easily on the blockchain. The lack of interchangeability (fungibility), however, distinguishes NFTs from blockchain cryptocurrencies, such as Bitcoin.³¹

Another area in which NFTs are facilitating the transcendence of the physical and digital world is through the linking of near-field communication (NFC) tags as authenticity codes to create a unique identity for individual physical items. The NFC can be stored through a smart contract as a NFT on the blockchain which creates a parallel, yet interlinked, digital product whereby the authenticity can be verified. The NFC technology enables digital devices to transfer data over shorter distances that authenticate physical-digital goods to ensure irreversible proof of ownership. These ‘phygital goods’ have the potential to optimize the collaboration and interconnected nature of the experience for fashion brands to then monetize their IP in the metaverse. A link between NFCs and NFTs creates optimal digital assets and phygital goods protection for creators’ original works against counterfeiting and IP infringement through blockchain mechanisms that support rights-management, efficient and sustainable monetization, interoperability, traced distribution, fractional ownership, and overall enhanced security. A core industry-specific use-case for this is the non-profit Aura Blockchain Consortium in a rare collaboration with LVMH, Prada Group, OTB Group, and Cartier as a part of Richemont, developed by ConsenSys and Microsoft.³² This consortium seeks to enable enhanced authentication post-purchase, tracking and tracing of physical products linked with a unique digital identity based on a non-fungible token which supports supply chain transparency, and further, the protection of digital assets within the luxury fashion industry.³³ This appears to be a tremendous advancement for intellectual property protection as NFTs and NFC combined have the potential to track infringement through the tokenization of creations and ideas on the blockchain – publicly displayed on an immutable digital ledger.

It is important to note that web 3.0 and the metaverse are not particularly interchangeable concepts. Although the metaverse can utilize web3 technology, it also extends beyond it. Web3 refers to the vision of a decentralized web that incorporates blockchain technology and aims to give users more control over their data, identity, and digital assets. It represents a shift towards a more transparent and user-centric Internet experience. Web3 is therefore associated with blockchain-based platforms, decentralized applications, and cryptocurrencies. On the other hand, the metaverse refers to a virtual

³⁰ *Ibid.*

³¹ BSUCCESSFUL, *supra* note 22.

³² Ambriel Pouncy, “Reimagining Luxus: How NFTs, NFC Chips, Phygital Goods and the Metaverse Are Driving the Future of Fashion”, (6 June 2023), online: <<https://www.linkedin.com/pulse/reimagining-luxus-how-nfts-nfc-chips-phygital-goods-metaverse-pouncy>>.

³³ *Ibid.*

reality space or a collective virtual shared space where users can interact with each other and digital objects in a three-dimensional immersive environment. It goes beyond the traditional two-dimensional web experience and aims to create a fully realized virtual world that can be accessed by multiple users simultaneously. The metaverse is often portrayed as a network of interconnected virtual worlds, gaming environments, social platforms, and virtual reality experiences. However, Web3 technologies such as blockchain and decentralized applications can play a role in building components of the metaverse - a broader concept that encompasses virtual reality, augmented reality, social interactions, and immersive experiences. NFTs are an integral element of Web3's user experience. Through NFTs and other digital tools within this space, brands can incentivize consumers by providing digital assets and loyalty benefits, and by creating a digitized community with limitless possibilities. A decentralized Web3 will allow for blockchain technology to verify transactions and third parties would no longer be necessary to manage transactions. In a blockchain context, hashing algorithms create unique digital footprints which allow miners to be assured that the content, or the "sequence of the blocks on the blockchain" has not been interfered with, as once information is added to the database, it cannot be modified – this is the essence of the 'immutable' nature of this technology.³⁴ However, there is an opportunity for variations based on 'public' versus 'private' blockchains to be programmable as 'permission-less' or 'permissioned' blockchains.³⁵ For example, cryptocurrencies such as bitcoin constitute public blockchains and are permission-less as members of the public can access and contribute to the database. Whereas a private blockchain can be used for companies and can be set up by the governance rules for users to be 'permissioned' to participate and authorized to access specific transactions.³⁶ In this way, 'Smart Contracts' are created by blockchain technology through code that automatically executes transactions to transfer funds and assets without manual human-intervention. These contracts do come with some challenges such as liability or wrongful execution caused by this level of automation which requires further regulation. A smart contract, one that facilitates this legal process, is "a program stored in the blockchain that begins to run automatically 'when preconditioned terms are met...[that] functions similarly to regular contract terms; the terms allow the transfers to have an agreement that automatically governs the sale.'"³⁷ Once the smart contract is formed and digital asset is transferred, the digital asset is then stored on the blockchain separately.

ii) *Branded Non-Fungible Tokens (BNFTs)*

³⁴ Javier García, *Fashion Law: Trends and New Challenges* (Paris, France: LexisNexis: UIA International Association of Lawyers, 2020).

³⁵ *Ibid.*

³⁶ *Ibid.*

³⁷ Grace Hodges, "How High Fashion Brands and NFTs Are Changing the Future of the Art Market and Trademark Prosecution" (2023) 33:1 DePaul Journal of Art, Technology & Intellectual Property Law, online: <<https://via.library.depaul.edu/jatip/vol33/iss1/3>>.

“A non-fungible token is a unique and non-interchangeable unit of data stored on a blockchain” and is a verifiable digital asset.³⁸ By using blockchain technology in combination with smart contracts, brands can create assets that are easily transferrable, give rights to the owner depending on the contract terms it is governed by, and removes the middle-man, which is why it is so revolutionary and potentially disruptive since it allows for transactions to be facilitated seamlessly and automatically while also being verified on the blockchain. Digital fashion in this digital environment is at the forefront of e-commerce in the metaverse with the addition of BNFTs. BNFTs are non-fungible tokens with brand elements such as logos, colour, avatar, or imaging of a brand. These BNFTs have a similar functionality to that of brand imaging on interactive social media and other visual brand communication through the utilization of visual designs to stimulate favourable attitudes and behaviours of consumers and to encourage a brands commercial value.³⁹ BNFTs incorporating accompanying brand elements into the designs promote brand equity through creating further opportunities for artistic expression, with the potential to stimulate greater consumer engagement. With respect to branding, BNFTs represent brand components,

sparkling higher perceived ownership of particular brands characteristics by consumers and building a highly engaged brand community through connecting customers. Whereas at the consumer level, consumer groups must have a level of financial literacy, awareness, and appreciation of the value of NFTs, with Gen-Z consumers, who are more familiar with the new technology, being a viable category.⁴⁰

Culturally as well, NFTs are important as they are social tokens ingrained in cultural community building. For example, the Bored Apes project partnering with Adidas represented digital progression which also translated to a social currency to be able to say you own a Bored Ape.⁴¹ An NFT holder may obtain access to exclusive communities, access to conferences and events, physical merchandise, and allowed for community and brand building simultaneously. Linked with smart contracts, it can give automatic royalties to the creator and the NFT holder and as each time there is a sale, the owner gets a percentage along with the potential for brand partnerships and collaborations.⁴²

With the worldwide NFT market projected to hit an approximate \$232 billion US dollars by 2030, the modern marketing landscape is dramatically reshaping with the development of such digital assets and collectibles of BNFTs.⁴³ This digital environment transformation is increasingly raising

³⁸ BSuccessful, *supra* note 22.

³⁹ Crystal T Lee, Tzu-Ya Ho & Hong-Hao Xie, “Building brand engagement in metaverse commerce: The role of branded non-fungible tokens (BNFTs)” (2023) 58 Electronic Commerce Research and Applications 101248, online: <<https://linkinghub.elsevier.com/retrieve/pii/S1567422323000133>>.

⁴⁰ Yan, *supra* note 25. See also, Anatoli Colicev, “How can non-fungible tokens bring value to brands” (2023) 40:1 International Journal of Research in Marketing 30–37, online: <<https://linkinghub.elsevier.com/retrieve/pii/S0167811622000532>>.

⁴¹ McDowell, Maghan, “Adidas reveals new NFT project with Bored Ape Yacht Club” (15 December 2021), online: *Vogue* <<https://www.vogue.com/article/adidas-reveals-new-nft-project-with-bored-ape-yacht-club>>.

⁴² Andrew Hayward, “Bored Ape Founders Propose NFT Royalties Model, Decry OpenSea’s Stance as ‘Not Great’”, (8 November 2022), online: *Decrypt* <<https://decrypt.co/113880/bored-ape-founders-nft-royalties-model-opensea>>.

⁴³ “NFT Statistics Revealed: Painting the Portrait of a Digital Revolution”, (19 September 2024), online: <<https://doit.software/blog/nft-statistics#screen55>>.

concerns about intellectual property issues including ownership and the scope of use by the IP owner, along with licensing models. Commercial projects may offer the NFT holder the opportunity for copyright ownership, commercial rights, and potentially physical rights to events, book, or conferences for example. The use and exploitation of such NFT-related rights, unique to the metaverse, and issues with previously licensed IP rights in this space, create legal challenges for the scope of rights under contract, along with technical challenges such as traceability and interoperability – challenges that will be discussed further within this thesis. The therefore seamless marrying of the virtual and real world proves to be problematic when brands face intellectual property protection challenges.

Beyond the economic imperatives of brand protection, the case for clearer and more coherent intellectual property governance in the metaverse is ultimately grounded in something broader: the metaverse's distinctive potential to be more inclusive, more accessible, and more democratically participatory than the traditional markets it supplements. Unlike physical retail and conventional commercial infrastructure, which remain constrained by geography, capital, and institutional gatekeeping, virtual platforms, operating through NFTs, digital wearables, virtual goods, and immersive graphical environments, offers creators, small businesses, independent designers, and entrepreneurs from across the global economic spectrum an unprecedented opportunity to participate in commerce, culture, and creative exchange on more equal footing.⁴⁴ A digital fashion designer in Nairobi, Jakarta, or Mumbai can mint and distribute an NFT collection on a decentralized marketplace with the same technical accessibility as a Paris maison, without the capital requirements of physical production, supply chains, or retail infrastructure.⁴⁵ This democratizing potential is, however, only realizable where consumers and brand owners are meaningfully protected from misrepresentation, confusion, and deceptive practices in virtual environments – conditions that depend, in turn, on a regulatory environment sufficiently robust to deter bad-faith actors deploying counterfeit virtual goods, unauthorized NFT collections, or deceptive graphical user interfaces, while remaining calibrated enough not to foreclose the very participation it is meant to enable. Effective IP governance in this space is therefore not primarily about maximizing protectionist enforcement in favour of incumbent brands, it is about establishing the foundational conditions of trust and clarity that allow all participants, whether luxury conglomerates launching branded virtual worlds or independent creators minting original digital works, to engage with reasonable confidence in the integrity of the virtual marketplace.

⁴⁴ Tarek Elmasry et al, "Value Creation in the Metaverse" (2022), online: McKinsey & Company <https://www.mckinsey.com/capabilities/growth-marketing-and-sales/our-insights/value-creation-in-the-metaverse>. See also, Sang-Min Park & Young-Gab Kim, "A Metaverse: Taxonomy, Components, Applications, and Open Challenges" (2022) 10 IEEE Access 4209 at 4215–4218, online: <https://ieeexplore.ieee.org/document/9667507/>.

⁴⁵ Aravin Prince Periyasamy & Saravanan Periyasami, "Rise of Digital Fashion and Metaverse: Influence on Sustainability" (2023) 1:1 DESD 16, online: <https://link.springer.com/10.1007/s44265-023-00016-z>

Disproportionate enforcement burdens risk falling most heavily on countries with limited legal infrastructure and technological capacity to regulate NFT marketplaces, digital asset exchanges, and metaverse platforms, potentially widening rather than narrowing the digital divide.⁴⁶ Nations that are less technologically advanced may find stringent international IP standards difficult to implement in the context of decentralized virtual environments, while more technologically sophisticated economies leverage their existing IP assets and enforcement infrastructure to consolidate further competitive advantage in global virtual trade.⁴⁷ Policymakers must therefore resist the tendency to transpose existing physical-goods enforcement paradigms wholesale into the virtual context, and instead pursue frameworks that are attentive to the specific characteristics of NFTs and digital assets. Their lack of a border, their pseudonymous transactional environment, and the structural decentralization of the platforms on which they circulate, as well as to asymmetries of capacity and access need to be assessed, ensuring that IP regulation does not inadvertently position itself as a barrier to entry for the independent creators, small businesses, and entrepreneurs in emerging economies whose meaningful participation is precisely what makes the metaverse's inclusive promise worth pursuing.

The metaverse also presents a meaningful opportunity to extend the benefits of IP protection to communities that have historically been excluded from, or actively exploited by, formal intellectual property systems. Indigenous peoples, artisans, and communities whose cultural heritage and traditional knowledge have long been appropriated by better-resourced commercial actors face a particularly acute risk of digital appropriation in virtual environments, where the reproduction and commercialization of culturally significant designs, motifs, and symbols as NFTs or virtual assets can occur instantaneously and at scale, entirely outside the reach of the communities from which they originate.⁴⁸ A virtual wearable or digital collectible incorporating a traditional textile pattern or ceremonial design can be minted, listed, and sold across multiple decentralized marketplaces before any enforcement mechanism, legal or technical, can meaningfully intervene. A well-constructed metaverse IP framework, attentive to the instruments developed at the international level through WIPO's work on traditional knowledge and geographical indications, could begin to redress these asymmetries and enable cultural communities to participate in and derive benefit from virtual commerce in their own creative expression, rather than finding their digital patrimony commercialized by others through NFT drops and virtual goods collections.⁴⁹ In this sense, the governance question is not merely a technical one about the scope of intellectual property protection as applied to digital assets; it is a question about who the metaverse is

⁴⁶ Helen Hwang & John Yoon, "Policy Issues in the Metaverse Era: Interoperability and Platform Growth" (2023) *Colum Bus L Rev* 45 at 60–62

⁴⁷ Anu Bradford, *The Brussels Effect: How the European Union Rules the World* (New York: Oxford University Press, 2020)

⁴⁸ Andy Ramos, "The Metaverse, NFTs and IP rights: to regulate or not to regulate?" (June 2022), online: WIPO Magazine https://www.wipo.int/wipo_magazine/en/2022/02/article_0002.html. See also, World Intellectual Property Organization, *Intellectual Property and the Metaverse: Challenges and Opportunities* (Geneva: WIPO, 2023) at 18–23

⁴⁹ World Intellectual Property Organization, *Intellectual Property and Blockchain: A WIPO White Paper* (Geneva: WIPO, 2022) at 9–13

ultimately for, and whether its architecture will replicate or begin to correct the exclusions embedded in the physical markets that preceded it.⁵⁰

Consumer empowerment represents a further and underappreciated dimension of the broader case for coherent IP governance in virtual environments. In a space where the provenance, authenticity, and ownership of NFTs and virtual assets are inherently difficult to verify without specialized technical knowledge, the informational asymmetry between sophisticated commercial actors and ordinary consumers is considerable and consequential.⁵¹ A consumer purchasing a virtual wearable, a digital collectible, or an NFT-linked asset in a metaverse environment may have no reliable means of ascertaining whether the asset is authorized by the brand it purports to represent, what intellectual property rights, if any, are transferred upon purchase, or whether the smart contract governing the transaction accurately reflects the ownership rights being conveyed. Strong but proportionate IP frameworks, combined with blockchain-based authentication mechanisms and digital product passports applied to virtual goods, have the potential to restore a degree of informational integrity to these transactions, empowering consumers to make genuinely informed choices rather than navigating a marketplace characterized by counterfeit NFTs, misleading virtual brand representations, and opaque digital ownership structures.⁵² This matters not only as a matter of consumer protection law in the narrow sense, but as a broader question of trust in virtual institutions and the long-term legitimacy of the metaverse as a meaningful commercial and cultural environment.

The environmental and sustainability dimensions of well-governed virtual markets also deserve consideration, particularly in the context of the fashion industry's engagement with digital goods and NFTs. Virtual wearables, digital-only collections, and NFT-based fashion assets eliminate the material resource consumption associated with physical sampling, production, and distribution, offering a meaningful contribution to more sustainable consumption models within an industry whose environmental footprint remains among the most significant of any consumer sector and simultaneously protect the IP Interests of creators along with accelerating the adoption of digital designs.⁵³ IP frameworks that underpin digital product passports for virtual goods, for instance, directly support the transparency and traceability objectives of initiatives such as the EU Strategy for Sustainable and Circular Textiles, even where the goods in question exist entirely in digital form, creating a productive

⁵⁰ Carys J Craig, *The Legal Implications of the Metaverse* (Jack & Mae Nathanson Centre on Transnational Human Rights, Crime and Security) (Osgoode Hall Law School, York University, 2023). See also, Ignas Kalpokas & Julija Kalpokienė, *Regulating the Metaverse: A Critical Assessment* (London: Routledge, 2023).

⁵¹ Stuart Levi, Mana Ghaemmaghami & Gabriel Mohr, "Skadden Discusses the Growing Complexity of Commercial Rights Issues In NFTs" (1 June 2022), online: CLS Blue Sky Blog <https://clsbluesky.law.columbia.edu/2022/06/01/skadden-discusses-the-growing-complexity-of-commercial-rights-issues-in-nfts/>

⁵² "How Luxury Brands are Embracing the Digital Product Passports?", online: FashionBI <https://www.fashionbi.com/insights/how-luxury-brands-are-embracing-the-digital-product-passports>.

⁵³ EC, "Questions and Answers on EU Strategy for Sustainable and Circular Textiles" (30 March 2022), online: European Commission Press Corner https://ec.europa.eu/commission/presscorner/detail/en/QANDA_22_2015.

convergence between intellectual property governance and environmental policy that regulators would do well to pursue deliberately.⁵⁴ The emergence of NFT-linked physical-digital hybrid goods, or "phygital" assets, further complicates this picture, as the IP governance of the digital component directly affects the sustainability credentials and consumer transparency of the broader product ecosystem.⁵⁵

Although the initial optimism surrounding the metaverse's commercial potential has varied in recent years, its prospective growth remains probable insofar as there are coherent and enforceable intellectual property governance structures developed to be better aligned with the challenges that this digital landscape presents. The metaverse requires a distinct regulatory environment in which virtual garments, accessories, skins, and branded avatars can function simultaneously as expressive works, commercial products, and identity-signalling mechanisms. The sustainability of this ecosystem and its growth trajectory, therefore, depends on the alignment of regulatory institutions with core intellectual property doctrines that govern creative expression and brand protection in digital contexts, as will be explored throughout this paper.

Chapter one will provide a holistic perspective on the nature of branding and commercialization of IP including the psychological nuances and the predictors of consumer behaviour that contribute to consumer brand experience, the purported exclusivity that drives the luxury fashion market, and the interaction of IP and technology in this space. To support these perspectives, chapter one provides a case study of a leading luxury brand, Gucci, and how the brand optimizes its commercialization in this space utilizing IP within its brand environments and digital asset offerings. The thesis will then develop this line of thought in chapter two by outlining the role of IPR within the metaverse, highlighting the industry's reliance on protections and opportunities for leveraging IP within this evolving marketplace and for IP ownership of brands as well as consumers including user-generated digital content, and examining brand marketing through unique experiences that present new challenges for fashion brands. In chapter three, it then identifies the limitations of intellectual property and the common law frameworks of IP doctrines that they are bounded by. It assessed the legislation from other jurisdictions to provide for best practices to be applied with persuasive authority for Canadian Courts to seek legislative development to fill misalignment with balancing objectives within this digital space. The fourth chapter identifies and addresses the relevant challenges in protecting rights of brands and users in a transnational territorial system, platform governance, and the application of the current international protection regimes in contrast with private international law interventions in addressing infringement.

⁵⁴ "EU's Digital Product Passport: Advancing transparency and sustainability", online: [data.europa.eu](https://data.europa.eu/en/news-events/news/eus-digital-product-passport-advancing-transparency-and-sustainability) <https://data.europa.eu/en/news-events/news/eus-digital-product-passport-advancing-transparency-and-sustainability>. See also, European Commission, *supra* note 53.

⁵⁵ Ambriel Pouncy, "Reimagining Luxury: How NFTs, NFC Chips, Phygital Goods and the Metaverse Are Driving the Future of Fashion" (6 June 2023), online: LinkedIn <https://www.linkedin.com/pulse/reimagining-luxus-how-nfts-nfc-chips-phygital-goods-metaverse-pouncy>

Finally, this thesis will highlight the structural limitations that the metaverse exposes in terms of existing enforcement and intermediary liability regimes. It identifies the increasing misalignment of current governance frameworks with immersive digital environments in which infringement may be continuous, performative, and embedded in user interaction. These regulatory gaps reflect a broader misalignment between emergent digital fashion practices and the legal institutions tasked with preserving incentive structures, market transparency, brand identity, protective IP mechanisms and consumer trust.

Chapter 1: Fashion Commercialization in the Metaverse

What role does an industry, traditionally based on heritage, craftsmanship, valuable natural resources, and tactility, have in a digitized space, and can it have relevance in the metaverse? While the metaverse removes the tangible aspect of articles - a primary element of the fashion industry that captivates its audience and participants - digital fashion, in contrast, offers a new fashion experience without the physical constraints of fabric, wearability or use, while potentially limiting the effects of fashion on environmental sustainability⁵⁶, physical labour, and financial capability. The fashion industry within the metaverse, while encompassing virtual and augmented reality overlaying digital elements on the physical world, represents a potentially impactful transformation of the consumer experience. It creates new marketplace opportunities for digital goods and clothing that exist well beyond an application or social media. As a potentially powerful tool for the fashion industry, the metaverse is believed to promise increased brand-engagement and brand visibility, new revenue streams, greater potential for creativity, greater environmental sustainability models⁵⁷, and increased perceived brand value and exclusivity.

Within the metaverse, users can create their own digital avatars, navigate virtual spaces, and engage in various activities such as gaming, socializing, shopping, and entertainment. It is a vast and dynamic digital ecosystem that is anticipated to continue growing rapidly in the upcoming years as this technology evolves and gains further popularity. Although the promise for further growth may be found to be true in the near future, the exponential potential, however, may need to be met with critical wariness as regulators and creators align on the collectively vision of the metaverse. Fashion brands are entering into this space to capitalize on the metaverse by commercializing their intellectual property. They achieve this by creating virtual adaptations of their products and enabling users to interact with them in immersive and innovative ways. An immersive experience by which brands are achieving traction is through developing digital replicas of their physical goods for virtual fashion shows or other uses within the metaverse, often linked to potential NFTs for commercialization, some of which can be uniquely tied to the owner's identity and cannot be resold. For instance, "Gucci Town" represents a virtual space on the Roblox platform, as well as digital live fashion shows hosted on the Decentraland platform, such as "Metaverse Fashion Week," are becoming more prevalent. Several other brands have

⁵⁶ It should be noted that environmental effects may manifest elsewhere, including but not limited to, the environmental implications of data centers, digital works, financial constraints on access to technology, mining digital assets, crypto mining, etc.

⁵⁷ Environmental sustainability with regards to the fashion industry is heavily supported by the EU Strategy for Sustainable and Circular Textiles (2022), which proposes actionable steps to support the industry in 'green and digital transitions' and examines sustainable 'technological solutions and innovative business models'. See, European Commission, "Questions and Answers on EU Strategy for Sustainable and Circular Textiles", (30 March 2022), online: *European Commission Press Corner* <https://ec.europa.eu/commission/presscorner/detail/en/QANDA_22_2015>

experimented with NFT collections, like *Adidas*' "Into the Metaverse" NFTs and *Prada*'s "Timecapsule" NFTs. Brands looking to succeed in this space will find that the most effective projects linked to similar immersive experiences offer users supplementary value through functions or utility, such as rewarding them with access to exclusivity with gated products or experiences.⁵⁸ Such immersive and exclusive experiences effectively strengthen affinity for the brand and cultivates demand.

Users can interact with this space within virtual stores where browsing and purchasing items can be done using cryptocurrency. This creates a new revenue stream for brands and offers a unique opportunity to engage with customers in novel ways. In this way, the metaverse presents fashion and apparel brands with a significant opportunity to develop entirely new virtual products and experiences, unrestricted by the limitations of physical reality while showcasing their products and potentially enhancing the creative economy. The fashion industry is leveraging NFT technology to do so particularly through parallel virtual and real-world consumer experiences termed 'phygital retail' – the merging of NFTs with tangible wearables through the merging of tokens with physical counterparts.⁵⁹ This also assists with the production process since it can be a valuable tool for enhancing production designs, decisions and testing different design elements. Mirroring these experiences are virtual stores and digital wearables, which enable brands to explore their creativity without limitations on design. In the metaverse, creators have the freedom to utilize materials that exist in the real world within their fashion designs. Additionally, they can experiment with novel materials, forms, or designs that may not be practical or feasible in the physical space. This newfound creative freedom allows brands to push the boundaries of traditional fashion and create truly unique and imaginative virtual products. This also provides consumers with the opportunity to virtually wear these digital garments as they engage within the metaverse and its platforms. An example of augmented reality technological innovation is a company called "Change of Paradigm," which revolutionizes traditional commerce mechanisms through immersive and interactive experiences solely based on 3D simulated content. This innovative approach blurs the lines between the digital and virtual space, allowing individuals to express themselves and explore identities digitally. Moreover, it facilitates interaction with new communities and networks of people, offering a unique and engaging experience for users. Users now have creative control and can actively participate in user-generated content, through extended reality overlays, such as image recognition and hyper-personalization, enhancing the user experience and enabling brands to tailor offerings to individual preferences, advancing brand loyalty. As a result, brands may be able to

⁵⁸ "The State of Fashion 2023: Resilience in the Face of Uncertainty", (30 November 2022), online: *The Business of Fashion* <<https://www.businessoffashion.com/reports/news-analysis/the-state-of-fashion-2023-industry-report-bof-mckinsey/>>.

⁵⁹ NEST, "NFTs in Fashion: Disrupting the Industry with Virtual Wearables and Metaverse Fashion", (8 May 2023), online: *Medium* <<https://nes-tech.medium.com/nfts-in-fashion-disrupting-the-industry-with-virtual-wearables-and-metaverse-fashion-66c7d0a0181e>>.

forge stronger connections with their consumers and deliver more meaningful and satisfying interactions in this dynamic digital landscape. This new age commercialization allows for users can actively participate in developing, sharing, and consuming digital data, while brands can safeguard and protect their valuable branding, however, not without its challenges in aligning IP protection mechanisms, regulation, and optimal consumer-brand interaction.

The digital fashion industry is experiencing a global shift, largely driven by digital XR overlays, which are redefining how fashion is perceived and consumed. Particularly in the luxury market, there remains a strong sense of longevity for branded goods, with their rich heritage and recognizable origins. However, there is also a prevailing disposable attitude towards trends, driven by the desire for instant gratification. The digitization of fashion collections enables cost-effective and sustainable consumer behavior, appealing to a new generation of consumers and fostering the growth of innovative digital fashion.⁶⁰ This cohort is more sustainably minded and self-expressive, amounting to a modern consumer culture that collectively understands that we need to be more conscious of how we consume, and therefore, digital-ready lines represent consumption in a sustainably creative way based on experience and expression.⁶¹ In this way, the entire ecosystem of fashion brands' digital commercialization culture is driven by these consumers. Considering these factors, it is evident that from a brand perspective, there is a general pattern of repeat consumerism that forms a part of the foundation of their motivation to participate in this space. The dynamic interplay between immersive digital experiences and traditional physical elements encourages consumers to be continuously engaged with a brand, leading to greater brand loyalty and a deeper connection with customers. If a customer purchases virtual clothing for their avatar for instance, brands are aware that they will buy add-ons, digital skins, or colourways which do not require much uptake from a brand's end but encourages consumers to keep engaging with the product and with the brand and continue purchasing, building stronger consumer-brand loyalty which presumably expands back into the world of physical goods.

1.1 Retail Psychology and Exclusivity

The COVID-19 pandemic caused a significant shift in the retail landscape, prompting brands to realize the limitations of physical retail and the importance of embracing digital disruptions. Consequently, consumers have changed their buying habits, with a notable shift in the demographic of luxury consumers, and the emergence of a younger and digitally native audience. Brands now face the challenge of adapting to this new consumer base and harnessing the opportunities presented by the metaverse for commercialization. A key element of this is the concept of digital skins, which form a

⁶⁰ Aravin Prince Periyasamy & Saravanan Periyasami, "Rise of Digital Fashion and Metaverse: Influence on Sustainability" (2023) 1:1 DESD 16, online: <<https://link.springer.com/10.1007/s44265-023-00016-z>>.

⁶¹ *Ibid.*

core part of the metaverse experience. Users often perceive their avatars' digital personas as an extension of themselves, representing an idealized version of themselves. As Kalpokas and Kalpokienė describe, “The metaverse contributes a clearly identifiable visual layer to the decentring of the human self in the form of the avatar as a marked extension and part-externalisation of the self within a technologically curated environment.”⁶² This concept of generative identity offers immense possibilities, as individuals can curate and modify their digital selves constantly through avatar digital skins. For brands, this presents an opportunity to capitalize on consumer brand loyalty with a direct from avatar-to-consumer model. As noted earlier, the global digital fashion market has an anticipated commercial potential upwards of \$297 billion by 2032 (CAGR of 96%), and specifically, the global digital wearables accounts for majority of the market at an expected \$265.4 billion as early as 2026.⁶³ We see this potential realized through the example of Fortnite’s revenues of apparel and digital skin sales which are more than the revenue of some fashion brands today, at an estimated 6 billion in revenue by the end of 2025.⁶⁴ By offering branded digital skins and digital goods, brands can align with the consumers' desired personas within the metaverse, thus creating new avenues for commercial success. The metaverse holds substantial commercial potential due to its high-profit margins, as digital products can be infinitely scalable. A single program or object can be duplicated multiple times, generating multiple streams of income and having a significant impact on a brand's revenue. Spatial computing plays a crucial role in enhancing how we interact with digital content, providing a more immersive and natural experience. This shift in interface and software has significant implications for consumer-centric retail strategies, as it complements or replaces traditional retail methods.

Recent examples illustrate how luxury fashion brands are embracing the metaverse's potential. Kering Group and LVMH brands, including Gucci and Dior, have launched virtual sneakers, while LVMH, Richemont Group's Cartier, and Prada are also exploring blockchain technology through the "Aura Blockchain Consortium" to create a unique Digital Product Passport (DPP) to address the growing counterfeit industry.⁶⁵ We see similar brand-consumer interaction in Balenciaga’s Fortnite skins and virtual goods sales. Additionally, Dolce & Gabbana Luxembourg S.À R.L. engaged in the sale of NFTs known as "The Doge Crown," which featured blue sapphires and diamonds and sold for nearly USD\$1.3 million., along with the brand’s partnership with UNDX adopting a meta-strategy through its introduction of the membership only DGFamilY NFT Boxes on OpenSea to gain access to exclusive launches of physical and digital events.⁶⁶ We also see successful examples through Dior’s

⁶² Ignas Kalpokas & Julija Kalpokienė, *Regulating the Metaverse: A Critical Assessment* (London: Routledge, 2023).

⁶³ BOF Studio, *supra* note 4.

⁶⁴ Maria Younus, “Fortnite Revenue Breakdown: Key Insights & Usage Statistics” (30 June 2025), online: *TekRevol* <<https://www.tekreval.com/blogs/fortnite-revenue-usage-statistics/>>.

⁶⁵ “What is the Digital Product Passport?”, (10 November 2023), online: Aura Blockchain Consortium <<https://auraconsortium.com/insight/the-digital-product-passport-a-new-era-of-luxury-unveiled>>.

⁶⁶ Ambriel Pouncy, “Reimagining Luxus: How NFTs, NFC Chips, Phygital Goods and the Metaverse Are Driving the Future of Fashion”, (6 June 2023), online: <<https://www.linkedin.com/pulse/reimagining-luxus-how-nfts-nfc-chips-phygital-goods-metaverse-pouncy>>.

digital twin B33 Sneakers, Louis Vuitton’s NFT-Linked Varsity Jacket, and Maison Mrgiela’s MetaTABI Digital Boots.⁶⁷ These examples demonstrate how brands are actively leveraging the metaverse and digital innovations to create unique and engaging consumer experiences while tapping into new revenue streams. Most recently, we have seen the success of Aura Blockchain and DPPs as Louis Vuitton provides LV Diamond Certificates, to promote responsible sourcing of diamonds and enhanced consumer services, as well as Bulgari integrating Aura’s DPPs on its Serpenti in Art collection which embeds NFC tags and Touch experience.⁶⁸ Similarly, Swiss luxury watchmaker, Breitling, utilized the leading web3 consumer engagement platform Arianee SAS to launch DPPs to provide consumers with insights into product authenticity, warranty, subscription to insurance, and repair services.⁶⁹



Figure 1: The Dolce & Gabbana NFTs: “The Doge Crown” and “The Glass Suit” NFT.⁷⁰

The fashion industry has long been known for its exclusivity, as evident in various aspects such as customer criteria, social networks, and specific purchase policies. Some iconic examples include the stringent requirements, social connections, and long waitlists for acquiring luxury items like Hermès Birkin and Chanel handbags, or the limited production of rare timepieces by Patek Philippe. In this industry, the allure of exclusivity extends beyond just luxury watches to highly exclusive, no-longer-in-production luxury timepieces. Owning such a watch not only represents a significant value but also a sense of achievement for the wearer. For instance, a Patek Philippe watch of this kind can evoke a

⁶⁷ BOF Studio, *supra* note 4.

⁶⁸ “How Luxury Brands are Embracing the Digital Product Passports?”, online: <<https://www.fashionbi.com/insights/how-luxury-brands-are-embracing-the-digital-product-passports>>.

⁶⁹ *Ibid.*

⁷⁰ “Dolce & Gabbana’s First NFT Collection Sells for \$5.7M”, online: <<https://www.coindesk.com/business/2021/09/30/dolce-gabbanas-first-nft-collection-sells-for-57-m>>. Note: The Dolce & Gabbana NFTs launched on luxury marketplace UNXD: “The Doge Crown” NFT valuing at 423.5 ETH, or approximately \$1.3 million, while “The Glass Suit” NFT brought in 351.384 ETH, over \$1 million. Each item was also sold with physical version and exclusive access to events.

unique feeling of pride and distinction, as it becomes a symbol of personal success and discerning taste. The scarcity and rarity of these no-longer-in-production luxury watches enhance their desirability, as they become coveted collector's items. Owning such a timepiece becomes a statement of individuality and sophistication, reflecting the wearer's appreciation for craftsmanship, heritage, and the finest details of horological artistry. For example, the Patek Philippe 5711 Tiffany Nautilus Dial – this piece is one of the most sought-after luxury watch due to its waitlist of almost ten years, receiving only two to three models per year before being discontinued, auctioning for up to USD \$6.5 million, 120 times more than its retail price of \$52,000.⁷¹ “The signature Tiffany & Co. mark on the Patek Philippe Nautilus Dial applauds one of the most noteworthy luxury brand partnerships dating back to the 1850s. This partnership resulted in a unique deal that took place between the founders Antoine Norbert de Patek and Charles Tiffany themselves. The discreet agreement was to offer select Patek watches in Tiffany & Co. boutiques, and these watches contain a unique stamp to differentiate them from other Patek Philippe watches.”⁷² It is important to note the difference between a rare timepiece and its digital analogue in the form of a digital artifact or traditional NFT, however. A collection of exclusive luxury fashion branded digital asset can be perceived synonymously with the collection of exclusive physical timepieces as a social currency to access exclusive communities and events by means of a unique one-of-a-kind NFT registered on the blockchain. The rarity of physical timepieces versus digital assets and the concept of scarcity or exclusivity pertaining to the future of the metaverse or Web3 is a contentious contemplation. Although the metrics vary, the concept of rarity as commonly understood, is defined by supply and demand as well as exclusivity. However, with a digital analogue, rarity is contributed to the derivative of the traditional art or timepiece it is mirroring, the observation of potential rarity, and the value of the collection, some of which may be based on cultural significance.⁷³

Nonetheless, brands now have the opportunity and market to create entirely digital innovative exclusive fashion lines and digital collectables. This opportunity presents a mechanism by which to target a new generation of consumers, those who are enthusiastic about the evolutionary creativity that this technology presents us with, along with the motivation to collect digital content and have exclusive access to virtual as well as real-world communities. The luxury fashion industry is an amalgamation of both exclusivity and passion, and fashion in the metaverse is no different. While affluent brands continue to value their tradition of exclusivity, they are now faced with the challenge to evolve and adapt to new technology moving forward along with ensure that consumers maintain brand loyalty as they create a space of their own within the metaverse.

⁷¹ DevIFLW, “Patek Philippe Nautilus Tiffany - Who Owns It?”, (11 November 2022), online: *IFL Watches* <<https://iflwatch.com/blogs/celebrities/patek-philippe-nautilus-tiffany-5711>>.

⁷² Danielle Gumina, “What Makes the Patek 5711 Tiffany Dial the Ultimate Status Symbol”, (19 August 2021), online: *Academy by FASHIONPHILE* <<https://blog.fashionphile.com/the-patek-5711-tiffany-dial/>>.

⁷³ Langston Thomas, “What’s the Difference Between Rare NFTs and Rare Traditional Art?”, (12 October 2022), online: *NFT Now* <<https://nftnow.com/art/nfts-get-rarer-rival-traditional-art/>>.

1.2 Consumer Brand Experience and the Commercialization of IP

Principles and effects of consumer-brand experience speak to the importance of intellectual property protection for fashion brands in this space as it can create a large impact on consumer behaviour and can significantly influence reputation and brand equity in both the real and virtual world. Brand experience can be defined as “subjective, internal consumer responses (sensations, feelings, and cognitions) as well as behavioral responses that are evoked by brand-related experiential attributes when consumers interact with brands [including service brands], shop for them, and consume them”.⁷⁴ Marketing research on virtual reality and augmented reality in this context has primarily centered around exploring how interactive media technology allows consumers to engage in brand immersion and telepresence. These experiences have been studied to understand their impact on consumer experience, “brand immersion and telepresence, and how these experiences impact consumer perceptions and behavioral intentions”.⁷⁵

As an eternal symbol of consumerism, the fashion industry, including fast fashion and luxury fashion brands, must work towards innovating processes and consumer-brand engagement, revitalizing its business models to translate the industry into a dematerialized, virtual reality, free of traditional economic and tangible dimensions. This transition comes with numerous benefits, including but not limited to, facilitating solutions for the ‘sustainability crisis’ “by revolutionizing the design, production, and communication stages of the supply chain, enabling circular economy business models, and minimizing environmental damage while satisfying customer needs.”⁷⁶ As Yan notes through studies by Larsson and Huynh, virtual fashion can significantly reduce a surplus of materials in the textile value chain, which therefore minimizes energy consumption and supports sustainable business models, and that “digital innovation of pull-demand-driven business models in blockchain-based supply chain models can transform the entire process of fashion product forecasting, production, presentation, and use.”⁷⁷ However, in contrast, the energy consumption required to effect blockchain transactions and the processing of virtual activities have real environmental consequences as well that must be taken into consideration. On a cultural and social level, researchers have found that consumer experience of virtual reality is deeply rooted in personal expression, the search for democratization, escapism, and reality

⁷⁴ Joško J Brakus, Bernd H Schmitt & Lia Zarantonello, “Brand Experience: What is It? How is it Measured? Does it Affect Loyalty?” (2009) 73:3 *Journal of Marketing* 52–68, online: <<http://journals.sagepub.com/doi/10.1509/jmkg.73.3.052>>.

⁷⁵ Juergen Kai-Uwe Brock & Ajay K Kohli, “The emerging world of digital exploration services” (2023) 155 *Journal of Business Research* 113434, online: <<https://linkinghub.elsevier.com/retrieve/pii/S0148296322008992>>.

⁷⁶ Yan, *supra* note 25.

⁷⁷ Yan, *Ibid*. See also, Larsson, Jonas Karl Johan, “Digital innovation for sustainable apparel systems: Experiences based on projects in textile value chain development” (2018) 22:4 *RJTA* 370–389, online: <<https://www.emerald.com/insight/content/doi/10.1108/RJTA-02-2018-0016/full/html>>, and Huynh, Phuc Hong, “Enabling circular business models in the fashion industry: the role of digital innovation” (2022) 71:3 *IJPPM* 870–895, online: <<https://www.emerald.com/insight/content/doi/10.1108/IJPPM-12-2020-0683/full/html>>.

anxiety, as well as how the fashion industry can fulfil daydreams and consumer desires in the digital world.⁷⁸ Supporting this is the expanding “consciousness and self-expression of consumers” especially from generation Z and as the metaverse assists the fashion industry in establishing new channels of presentation, production processes, and forms of commerce, economic stakeholders and community members benefit proportionately.⁷⁹

Consumer-brand engagement, in this context, refers to the level of engagement exhibited by consumers that adds value to a brand. This value can be directly contributed through purchase intentions and behaviors, as well as indirectly through non-purchase behaviors. Such contributions manifest through various cognitive, psychological, and emotion-centered interactions between consumers and brands.⁸⁰ Researchers have sought to understand how these interactions influence consumers' connections with brands and how they affect consumer behavior, both in terms of purchase decisions and other brand-related activities. Intellectual property protections in this regard operate to assist with providing information for these manifestations to take place. Trademarks, in particular, facilitate the gathering of information on the origin and quality of the brand and the goods/services associated with them, thereby creating the foundation of the conceptual relationship between the brand and the consumer's cognitive association with brand. Kahnemann takes this conceptualization one step further by suggesting that “not all decisions are conscious, rather, humans also heavily rely on a system that processes information with relatively little effort, in the background, in order to perform common activities...Accordingly, only where unusual patterns are detected are they alerted to the conscious mind.”⁸¹ This is applicable in the context of how average consumers on an almost sub-conscious level make automated purchasing decisions based on their associations with the brand itself, the quality, the reliability and is heavily based on brand loyalty built overtime which then becomes entrenched within their conscious mind.

1.3 Consumer Perception and Machine-level Discernment

Legal implications are heavily user-dependent as well – intuitively so. In the context of implications of how the average consumer within the metaverse perceives and behaves with their purchasing, as is relevant for brands engaging with consumers in the metaverse, it is important to understand what the ‘average consumer’ encompasses. Consumer behaviour from a legal perspective, as it has not been defined through statutory law, can be explored through the jurisprudence on point.

⁷⁸ Yan, *supra* note 25. See also, Soojin Oh & Ken Nah, “Analysis of Fashion Value and Emotion in Digital Environment Based on Analysis of Famous Korean Fashion YouTube Review Data” in Tareq Ahram & Redha Taiar, eds, *Human Interaction, Emerging Technologies and Future Systems V* (Cham: Springer International Publishing, 2022) 240.

⁷⁹ *Ibid.*

⁸⁰ *Ibid.*

⁸¹ Daniel Kahneman, “Of 2 Minds: How Fast and Slow Thinking Shape Perception and Choice [Excerpt]”, (2012), online: *Scientific American* <<https://www.scientificamerican.com/article/kahneman-excerpt-thinking-fast-and-slow/>>.

The Supreme Court of Canada decision in *Masterpiece Inc. v Alavida Lifestyles Inc.* [*Masterpiece*] exemplifies the judicial standard for determining consumer confusion under the *Trademarks Act*, applying the *Veuve Clicquot Ponsardin v. Boutiques Cliquot Ltée* test for confusion. As a matter of a consumer's initial impression, the "casual consumer somewhat in a hurry" who sees the trademark, at a time when that individual has "no more than an imperfect recollection" of the trademark or trade name and "does not pause to give the matter any detailed consideration or scrutiny, nor to examine closely the similarities and differences between the marks."⁸² Further, it must be found that this consumer would be likely to be confused; that is, that this consumer would be likely to think that [it] was the same source of [product or] services as the other company in question.⁸³

In *Masterpiece*, the decision presented four conditions with respect to the application of the test for confusion.⁸⁴ First, for registered marks the test is to be applied under the hypothetical that the marks are used within the same geographic area. Second, first use of a mark establishes priority of ownership and right, not the registration itself; an unregistered trademark can therefore be the focus of a registered application challenge. Third, the test must be examined from the perspective of the initial impression of a consumer making an impending purchase of the relevant wares or services; when encountering the trademark in the case of a more costly purchase, a consumer can have deemed to have taken steps to making an educated purchase decision. Lastly, expert testimony should be permitted only if it is likely that the relevant considerations are beyond the knowledge and experience of the judge. Further, in arriving at their determination, "Judges should consider the marks at issue, each as a whole, but having regard to the dominant or most striking or unique feature of the trade-mark, using their own common sense, to determine whether the casual consumer would be likely to be confused when first encountering the trade-mark."⁸⁵

For a broader understanding, consumer behaviour from a legal perspective can also be explored through the Court of Justice of European Union (CJEU)'s case law on trademarks to provide insight on average consumer behaviour and perceptions, defined in terms of the "territory, type of goods and services, and level of attentiveness associated with the relevant goods and services...based on a normally informed and reasonably attentive [consumer]."⁸⁶ The territorial element is with respect to where their registration is applied for, the territory of the relevant Member State or equivalent, or even a sub-region.⁸⁷ Alongside territoriality, consumer behaviour must be taken into account in assessment

⁸² *Veuve Clicquot Ponsardin v. Boutiques Cliquot Ltée*, 2006 SCC 23 at para 20. See also, *Masterpiece Inc. v. Alavida Lifestyles Inc.*, 2011 SCC 27.

⁸³ *Ibid.*

⁸⁴ *Masterpiece Inc. v. Alavida Lifestyles Inc.*, 2011 SCC 27.

⁸⁵ *Ibid.*

⁸⁶ Anke Moerland & Christie Kafrouni, "Online shopping with artificial intelligence: what role for trademarks?" in *Research handbook on intellectual property and artificial intelligence* (Cheltenham, UK; Northampton, MA, USA: Edward Elgar Publishing, 2022). See also, Annette Kur and Martin Senftleben, *European Trade Mark Law: A Commentary* (OUP 2017) 6.

⁸⁷ *Ibid.*

of a trademark's distinctiveness and of potential confusion. A significant portion of consumers should be considered to make up the average consumer and their behaviour.

For present purposes, an additional and increasingly salient layer of complexity arises in online and immersive digital environments where artificial intelligence-driven mechanisms actively curate, rank, and prompt product recommendations or purchasing suggestions for virtual goods, non-fungible tokens (NFTs), or other virtual tokens on the basis of prior purchasing behaviour, browsing history, or user engagement patterns. In such contexts, the traditional inquiry into the characteristics of the “average consumer” becomes significantly destabilised. Specifically, it may prove difficult to assess the extent to which an average consumer is capable of recognizing, processing, or attributing trade origin to product suggestions when the decision-making environment is materially shaped by opaque, algorithmic intermediaries rather than by direct brand encounters alone. This challenge is exacerbated by the fact that purchasing involvement and attentiveness to indicators of trade origin may be systematically skewed by the complexity, speed, and automation inherent in AI-mediated recommendation systems.⁸⁸ Unlike conventional retail or even standard e-commerce settings, AI-driven interfaces may attenuate conscious brand comparison by foregrounding predicted relevance, convenience, or personalized affinity rather than explicit source identification. At the same time, AI systems are capable of perceiving and distinguishing between origin signals, such as subtle variations in trademarks, trade dress, or metadata, with a degree of precision that exceeds the imperfect recollection, bounded rationality, and cognitive limitations of human consumers. The resulting asymmetry between machine-level discernment and human-level perception complicates the normative assumptions that support trademark law's reliance on consumer origin recognition.

Therefore, as Moerland and Kafrouni posit, “where consumers purchase with the help of AI tools, whether sophisticated or not, the AI tool significantly enhances the cognitive abilities of the online human consumer. [They] will have a larger amount of supposedly relevant and detailed information available when making purchasing choices.”⁸⁹ Trademarks will still maintain their role within the metaverse of conveying meaning upon consumption of virtual goods as the association with the experience and the quality of the brand which then prompt consumers to continue purchasing and engaging with that specific brand, which is where the relevance of consumer perception is maintained regardless of AI tools. The AI system functions as cognitive aiding, by filtering, prioritizing, and translating information deemed relevant to the purchasing decision. However, this enhancement does not displace the trademark's communicative function; rather, it reconfigures the pathway through which trademark meaning is conveyed and operationalized. Trademarks will still communicate the information that AI conveys, and brands will still maintain their marks' positive value for consumers

⁸⁸ *Ibid.*

⁸⁹ *Ibid.*

in their decision making. Within the metaverse, trademarks continue to operate as condensed carriers of origin and brand reputation-indicating, quality-signalling, meaning-creating functions, even where AI systems assist or partially substitute for human evaluation. The association between a mark and the perceived quality, consistency, or symbolic value of a virtual product or digital wearable, remains central to consumer engagement and repeat purchasing behaviour. While AI tools may aggregate and transmit trademark-related information with greater granularity – such as brand reputation, user reviews, or prior consumption patterns – it is the trademark itself that develops these data points to a coherent source narrative. In this sense, trademarks do not merely survive AI intermediation, they are instrumental to it and they underscore their sustained role as the semiotic and economic backbone of brand-driven markets.

However, a further complication arises from the increasing automation of consumer search and discovery functions, a dynamic explored in recent literature assessing Amazon’s trademark ecosystem.⁹⁰ Where recommendations, rankings, and navigational cues are predominantly algorithmic, the traditional search-cost rationale for trademarks,⁹¹ grounded in human recognition of marks as indicators of source, may be partially displaced. As the analysis of Amazon’s Brand Registry illustrates that sellers increasingly rely on “nonsense marks” or obscure identifiers that are intelligible primarily to algorithms rather than to human consumers, optimizing for platform visibility rather than for semantic meaning.⁹² In such environments, the cognitive work of recognising famous brands or associating marks with trade origin may become less central to consumer decision-making, as search and comparison are effectively outsourced to automated systems. This raises the possibility that, within the metaverse, the relevance of human recognition of trademarks, including famous marks, may be attenuated where algorithmic intermediaries dominate the consumer experience. In immersive virtual environments characterised by AI-driven discovery, mediated transactions, and persistent recommendation systems, trademark significance may shift from human perceptual processes to machine-centric relevance determinations, thereby challenging the continued adequacy of trademark law’s traditional reliance on the “average consumer” as its primary analytical construct.

Accordingly, while AI tools and automated discovery mechanisms may alter the mechanics of perception, attention, and choice, they do not render trademarks obsolete. Rather, they redistribute trademark functions across human and machine cognition. Trademarks continue to communicate the information that AI conveys, and brands retain their marks’ positive economic and symbolic value within consumer decision-making processes. Even where algorithmic mediation diminishes the

⁹⁰ Jeanne C Fromer & Mark P McKenna, “Amazon’s Quiet Overhaul of the Trademark System” (2025) 113 CLR, online: <<https://www.californialawreview.org/print/amazon-trademark>>.

⁹¹ The ‘search-cost’ theory rationale maintains that the inherent value of a trademark is in its ability to decrease search costs by empowering consumers to utilize marks as a means for retrieving for product information,

⁹² Fromer & McKenna, *supra* note 90.

immediacy of conscious brand recognition, trademarks remain integral to structuring market interactions, shaping experiential expectations, and sustaining the trust relationships upon which digital and virtual commerce ultimately depends.

Further, from a semiotic perspective on trademark law, Barton Beebe's assessment offers a valuable conceptual lens for understanding how trademarks operate beyond the traditional economic model that supports search-cost reduction. Beebe argues that trademarks are not simply tools that help consumers find goods with lower search costs, but are signs embedded in a larger system of cultural and communicative meaning, which encompass both source distinctiveness (the degree to which a signifier uniquely signifies its source) and differential distinctiveness (the degree to which a signifier differentiates itself from other marks in the semiotic field).⁹³ Under this view, the modern trademark increasingly functions as a "floating signifier" – a sign whose referential connection to a specific product or source is less stable and more tied to systemic relations of meaning and value than to any direct link with physical goods.⁹⁴

The trademark system can be articulated as a language tool for social distinctiveness and of commodity culture – one of class and consumption. As Barton Beebe notes, "Underlying the semiotic logic of the trademark system and of trademark law is a more profound logic, what Baudrillard has termed the 'social logic of differentiation'...this logic meets 'an objective social demand for signs and differences,' for 'the distinguishing processes of class or caste which are fundamental to the social structure and are given free rein in 'democratic' society.'"⁹⁵ Further, Beebe explains, the system of trademarks is "ultimately both an agent and an object of 'classification struggle', an agent in its own struggle to establish itself as the preeminent system of classification, and an object in the struggle by producers and consumers within the trademark system to bend its classificatory scheme to their own economic or cultural ends."⁹⁶ This is a part of the conceptual makeup of the foundation of trademark psychology. Jacob Jacoby provides further insight to the above contemplations with relevance to cognitive science and psychology of the consumer, as emphasized in the core doctrines of trademark laws, which rely on the underpinning concepts such as confusion, deception, and dilution, with relation to "acquired distinctiveness, secondary meaning, fame and genericism."⁹⁷ These elements refer to the cognitive psychology of the consumer that attach to the thoughts and ideas that are represented by the trademark. Jacoby's underlying proposition is that it is necessary to understand the development in

⁹³ Barton Beebe, "The Semiotic Analysis of Trademark Law" (2004) 51:3 UCLA Law Review 703, online: <<https://www.uclalawreview.org/the-semiotic-analysis-of-trademark-law/>>.

⁹⁴ *Ibid.*

⁹⁵ Beebe, *supra* note 93. See also, Jean Baudrillard, *The Consumer Society: Myths and Structures*, reprinted ed, Theory, Culture & Society (Los Angeles, California: SAGE, 2012).

⁹⁶ *Ibid.*

⁹⁷ Jacob Jacoby, *The Psychological Foundations of Trademark Law: Secondary Meaning, Acquired Distinctiveness, Genericism, Fame, Confusion and Dilution* (Rochester, NY, 2000).

these psychological states in order to litigate intellectual property claims on a more substantial footing.⁹⁸ Particularly in the area of dilution law (or its Canadian equivalent, depreciation of goodwill), which spans beyond confusion to provide protection mechanisms for the reputation of well-known marks against blurring, tarnishment, or the taking of unfair advantage, the courts have recognized that trademark ownership expands beyond brand consciousness, operating deeper within the mind of the consumer.⁹⁹ This is the importance for which cognitive science and the psychology of the consumer is relevant for the purposes of understanding consumer activities in the metaverse, and by extension, how regulatory frameworks operate in conjunction.

Empirical studies on metaverse brand experience suggest that brands design virtual environments to “facilitate consumer learning and virtual ownership and align virtual merchandise and store ambiance with the real world to unify the brand image in both worlds.”¹⁰⁰ A study incorporating multidimensional experiential value, assessed the mediating role of brand image and virtual purchases. As suggested, three dimensions are evident in representing user-brand relationship benefits in a branded virtual world: utilitarian (consumer knowledge), hedonic (emotional), and symbolic value (psychological value forming one’s self-identity).¹⁰¹ The semiotic value of branded virtual goods and NFTs was found to be directly correlated with brand perception and consumer-brand engagement (CBE), while utilitarian value played an indirect role through positive brand image and consumption intentionality. As users become increasingly familiar with a brand through sustained interaction in virtual environments, consumer perception is correspondingly shaped in ways that may encourage virtual consumption for one’s avatar or “virtual self,” with potential spillover effects inducing CBE in the offline marketplace.¹⁰² Within this framework, the third dimension, commonly described as utilitarian value, is realized where a branded virtual world functions as an informational and pedagogical space, providing users with structured knowledge about the brand and its products. Such environments may facilitate learning about a brand’s heritage, aesthetic evolution, and current offerings, as exemplified by immersive spaces such as Roblox’s *Gucci Town* and *Gucci Vault*, which foreground archival narratives and craftsmanship, or Louis Vuitton’s *The Game*, which embeds brand history within interactive storytelling.¹⁰³ Empirical research underscores the importance of positive user experiences within these branded virtual worlds, demonstrating that immersive and engaging environments can foster higher levels of exploration, participatory behaviour, and affective

⁹⁸ *Ibid.*

⁹⁹ Rebecca Tushnet, “Gone in Sixty Milliseconds: Trademark Law and Cognitive Science” (2008) Georgetown Law Faculty Publications and Other Works, online: <<https://scholarship.law.georgetown.edu/facpub/792>>.

¹⁰⁰ Apiradee Wongkitrungrueng & Lokweetpun Suprawan, “Metaverse Meets Branding: Examining Consumer Responses to Immersive Brand Experiences” (2023) *International Journal of Human–Computer Interaction* 1–20, online: <<https://www.tandfonline.com/doi/full/10.1080/10447318.2023.2175162>>.

¹⁰¹ *Ibid.*

¹⁰² *Ibid.*

¹⁰³ *Ibid.*

engagement, thereby contributing to positive brand perceptions, heightened purchase intention, and increased brand loyalty.¹⁰⁴

Beyond experiential engagement, the possession of branded virtual goods and NFTs introduces an additional layer of significance by cultivating a sense of ownership that integrates such goods into the consumer's self-concept. This phenomenon presents a strategic opportunity for protected fashion brands to extend and reinforce their trademark value within the metaverse and across convergent digital and physical markets. Where branded virtual experiences enhance users' self-identity or expressive capacity and facilitate psychological and emotional connections through participation, interaction, trading, and possession, the result is the generation of positive brand equity with downstream effects on purchase intention.¹⁰⁵ Notwithstanding these findings, the existing literature remains limited in its ability to precisely quantify the extent to which such virtual engagements translate into measurable revenue outcomes for brands or to determine whether increases in virtual brand equity convert seamlessly into sustained commercial value in the offline world. Consequently, further empirical and doctrinal inquiry is required to assess the sustainability and economic significance, such as the impact on revenue, of these effects seamlessly across hybrid consumption ecosystems.

Notably, by the same token, the possibility of positive spillover effects from metaverse engagement into the offline marketplace necessarily invites consideration of the converse dynamic. If branded virtual experiences are capable of enhancing brand equity, purchase intention, and consumer loyalty in the physical world, it follows that adverse events, degraded experiences, or reputational harms arising within the metaverse may likewise generate negative externalities that extend beyond the virtual domain. Instances of low-quality virtual goods, consumer confusion arising from unauthorized or infringing uses of marks, exclusionary or exploitative platform practices, or misalignment between a brand's virtual representation and its established identity may erode trust and dilute brand meaning, with repercussions for real-world consumer perception. Moreover, where virtual goods and NFTs are incorporated into consumers' self-concept, negative experiences may be felt not merely as transactional dissatisfactions but as identity-relevant adverse effects and intensifying their potential impact on brand valuation. Nevertheless, as with positive spillovers, the conditions under which such negative effects materialize, their magnitude, and their persistence across virtual and physical markets remain empirically uncertain since there is a lack of research in this respect. This asymmetry highlights the need for further research to delineate the thresholds at which virtual brand effects translates into tangible real-world consequences, and to reassess the adequacy of existing trademark and consumer protection frameworks in addressing reputational risk within increasingly hybrid consumption environments.

¹⁰⁴ *Ibid.* See also, Bhuminan Piyathananan, et al "A Hierarchical Model of Virtual Experience and Its Influences on the Perceived Value and Loyalty of Customers" (2015) 19:2 International Journal of Electronic Commerce, 126–158.

¹⁰⁵ *Ibid.*

While privacy laws are a concern for data collection in this regard, user identification and privacy safeguards will be critical for users interacting and transacting within this ecosystem. Therefore, brands need to be ethical and transparent in their data collection procedures. Brands can position themselves within these experiences and identify users' actions and emotions in real-time to use within their branding strategies and marketing components. They can leverage existing intellectual property and find additional revenue streams to further establish their brand equity. Brands can create an entire branded environment where users can engage in a virtual experience marked with a brand's imagery, trademarked logos, product placement, and avatars dressed in the brand's apparel. This can lead to the purchase of virtual and physical goods and the creation of brand-consumer relationships by merging both digital and real-life experiences. As Barrera and Shah suggest, more stimulating and realistic experiences within this space have “positive effects on users’ engagement and subsequently on users’ enjoyment, satisfaction, and purchase intentions.”¹⁰⁶ Further, they note that these positive effects of experience in perceived social and economic value result in attitudinal loyalty for purchasing intention in both the virtual and real world. In this respect, brands can monetize these spaces through research on consumer behavioural patterns and positive effects on user engagement. Brands can track metrics such as sales, customer retention rates, and customer lifetime value to measure the positive effects and impact of their metaverse marketing strategies on revenue. Additionally, through the systematic use of market research methodologies, including focus groups, surveys, and data-driven analytical techniques, brands may generate empirically grounded insights into consumer behaviour, expectations, and preference within virtual environments. Such insights can inform the strategic development and metaverse-specific developments of branding, marketing, and experiential design initiatives, enabling refinement of how intellectual property applicable to branded spaces and virtual goods are deployed in response to evolving patterns of user engagement. In this respect, empirical research functions not merely as a descriptive tool but as a mechanism for aligning brand strategy with the cognitive, affective, and behavioural dynamics that characterize consumer interaction in immersive digital marketplaces.

1.4 Brand Engagement, Consumer Identity and Commercialization

Through empowering communities to create and to translate their creation into self-expression within metaverse platforms, brands can leverage these experiences to gain insights into future monetization potential. This can be achieved not only with direct revenue generation, but also by building the lifetime cycle of a customer. Successful consumer-brand engagement requires a brand to be driven by human creativity, intuition, foresight, and understanding how to take advantage of new technologies. Authentic implementation of these strategies will ultimately leverage consumer emotion,

¹⁰⁶ *Ibid.* See also, Barrera and Shah, *supra* note 27.

which lies at the core of marketing and commercialization. Digital environments also offer new mediums for brands to provide a platform for consumer self-expression and identity which can be commercialized through their branding strategy using user-avatar relationship or direct-to-avatar business models, analogous to the direct-to-consumer business model in the physical world. Direct-to-avatar (D2A) refers to “selling virtual products directly to avatars or digital identities bypassing any supply chain management like logistics of shipping physical goods to a consumers door.”¹⁰⁷ As brands develop novel ways to engage and interact with consumers, behavioural responses in terms of purchase intention and brand loyalty offer significant economic implications.

Brands can develop more sophisticated commercialization strategies by creating limited edition BNFTs in limited quantities to heighten the perception of scarcity. By limiting availability, these exclusive collections can be established as high-value items, allowing for a higher price tag to be applied. Secondly, to create an enhancement of consumer perceived financial value, brands can partner with other highly valued brands through direct or indirect licensing partnerships.¹⁰⁸ We see how this is incorporated in the cases below through Nike’s collaboration with RTFKT creators. In contrast with the physical space, the digital traceability of transactions enables brands to gain a portion of future resales and recurring revenue for secondary NFT sales. Collaborations with high-value partners and their intellectual property ultimately increase brand equity, increasing the likelihood of consumers paying higher prices for BNFTs. Thirdly, brands can offer consumers enhanced prestigious brand experiences through emotional, psychological, and cognitive engagements related to status and exclusivity, reinforced by consistent brand communication. For example, a “luxury-focused NFT platform released a drop named “Alpha” and sold 3,000 NFTs designed to function as “exclusive club access keys” for future drops from premium brand partners”¹⁰⁹ Fourthly, brands can design personalized, novel experiences that increase the originality and uniqueness of the brand, which can lead to the potential construction of customized physical goods. A study conducted by Lee and others have shown that these elements lead to a favorable brand attitude, enhanced brand commitment, purchase intention, and active engagement toward BNFTs, using them as tools to build long-term consumer relationships and expand revenue within the metaverse economy. However, the study had limitations, including the inability to quantify the direct revenue generated for brands.

JP Morgan estimated that by 2030, metaverse engagements and NFTs could constitute 10% of the luxury goods market, which is of importance from an economic perspective as this equates to an

¹⁰⁷ Cathy Hackl, “Is Direct To Avatar The Next Direct To Consumer?”, online: *Forbes* <<https://www.forbes.com/sites/cathyhackl/2020/08/09/is-direct-to-avatar-the-next-direct-to-consumer/>>.

¹⁰⁸ Lee et al, *supra* note 39.

¹⁰⁹ *Ibid.*

equivalent of approximately €50bn in revenue.¹¹⁰ Beyond the resulting revenue, luxury brands can utilize the metaverse as a mechanism to maintain brand exclusivity, uniqueness, and desirability through leveraging the immersive and interactive features of the metaverse and through the creation of distinctive and personalised engagements for consumers. These experiences allow brands to collect analytical data to personalize user experiences and virtual environments based on individual consumer preferences, creating a continued sense of exclusivity, uniqueness, and desirability.¹¹¹ The luxury sector draws on distinct attributes including: “authenticity, aesthetic expression, exclusivity, high quality, hedonism, prestigious image, premium price, and a deep resonance with consumers and consequently growing brand equity.”¹¹² Brands may deploy NFTs not merely as mechanisms for verifying ownership, but also as gateways to exclusive forms of access, participation, and benefit, with the NFT functioning as both a verified digital asset and a credential conferring contextual privileges within branded ecosystems.

The strategic importance of digital experiences for luxury brands through augmented reality and NFTs in the metaverse is therefore founded on consumers immersing themselves in virtually enhanced experiences which provide a feeling of luxury and prestige in a more cerebral manner, surrounded by a brand’s identifiable intellectual property. As user identity and self-concepts can be reflected in their “possession” of virtual products and NFTs, these interactions connect real and virtual selves, with the potential to create a genuine sense of ownership and an overall sense of perceived prestige. This has led many luxury brands to position themselves within the metaverse, offering virtual products that users may not be able to easily attain in the physical world due to high costs. These virtual experiences allow consumers to engage with these luxury brands in a way that was previously unattainable, creating an alternative sense of accessibility and perceived experience elevation. As avatars can now join branding events, purchase virtual luxury goods, and walk through an entirely luxury branded ecosystem, interacting with these luxury brands can make users feel more connected to the brand, as they would if they were purchasing physical luxury goods from the brand in the real world. These interactions, and the brand proximity that they create, can stimulate user attachment through “ownership-promoting mental imagery [that] can increase a buyer’s perceived ownership and valuation. Psychological ownership, the mental state in which consumers consider the object of ownership (e.g., a product or brand) to be theirs, motivates willingness to pay and consumer engagement.”¹¹³ By luxury brands increasing reach in this manner, the likelihood of consumers purchasing the real product also

¹¹⁰ Jessica Gregson, “Fashion and luxury meets the ‘Metaverse’: IP considerations”, (14 March 2023), online: *Passle* <<https://viewpoints.stevens-bolton.com/post/102iae7/fashion-and-luxury-meets-the-metaverse-ip-considerations>>.

¹¹¹ Isaac Cheah & Anwar Sadat Shimul, “Marketing in the metaverse: Moving forward – What’s next?” (2023) 33:1 *Journal of Global Scholars of Marketing Science* 1–10, online: <<https://doi.org/10.1080/21639159.2022.2163908>>.

¹¹² Ana Javornik et al “Strategic approaches to augmented reality deployment by luxury brands” (2021) 136 *Journal of Business Research* 284–292, online: <<https://linkinghub.elsevier.com/retrieve/pii/S0148296321005312>>.

¹¹³ Wongkitrungrueng & Suprawan, *supra* note 100. See also, Kumar, Jitender & Jogendra Kumar Nayak, “Brand engagement without brand ownership: a case of non-brand owner community members” (2019) 28:2 *JPBM* 216–230, online: <<https://www.emerald.com/insight/content/doi/10.1108/JPBM-04-2018-1840/full/html>>.

increases due to this attachment and perceived ownership. In this context, luxury labels function as meaningful signifiers, and personalization opportunities built on a user's self-conception and brand ownership perception in an immersive and interactive way.

It will also be significant, from a Canadian trademark policy perspective, to reassess consumer behaviour constructs such as ownership, attachment, and virtual scarcity in light of the expanding role of branded virtual goods and NFTs. Complex questions such as the perceived potential for scarcity of digital assets, consumer motivations for purchasing NFTs, new property and ownership issues surrounding virtual assets, and attachment to these possessions, may differ significantly from established consumer behaviour theories grounded in real-life situations.¹¹⁴ These divergences have implications for how Canadian trademark law conceptualizes consumer perception, confusion, and goodwill in non-traditional commercial contexts, particularly given the Trademark Act's dual objectives of protecting source distinctiveness while safeguarding the public interest in fair competition and market clarity. Meanwhile, the brand owner motivations are clear. Brand engagement in these virtual environments is believed to provide promising commercialization incentives, beginning with the high margins associated with the creation of digital items that can be replicated and distributed at minimal marginal cost, as well as the capacity to test new designs, concepts, or branded experiences in virtual form prior to physical production. Such practices may reduce the risk of overproduction of tangible goods, improve supply-chain efficiency, and enable data-driven decision-making for in-person marketing events, apparel, or product lines. From an operational standpoint, virtual production and collaboration can enhance productivity through global coordination and reduced overhead costs. Further commercialisation benefits arise through the development of novel revenue streams, including ongoing royalty arrangements, revenue-sharing mechanisms, and smart-contract-enabled resale fees associated with NFTs and other transferable virtual assets.¹¹⁵ However, within the Canadian framework, these commercial incentives must be balanced against broader public-interest considerations that underpin trademark law, including preventing consumer deception, avoiding undue market foreclosure, and preserving space for legitimate competition and expressive use. As trademarks extend into virtual environments characterized by novel forms of ownership and scarcity, policymakers and courts may be required to redefine doctrinal tools to ensure that expanded brand control over virtual assets does not unduly encroach upon consumer autonomy or distort market signals – the objective should be to align these innovative commercial opportunities with its foundational commitment to consumer protection and the public interest.

¹¹⁴ Barrera and Shah, *supra* note 27.

¹¹⁵ Bernard Marr, "Gucci Enters The Metaverse", online: *Forbes* <<https://www.forbes.com/sites/bernardmarr/2022/11/30/gucci-enters-the-metaverse/>>.

1.5 Gucci - Study of Commercialization

Gucci Town on the Roblox metaverse platform serves as an exemplary case in this regard, as an illustration of how fashion brands may strategically leverage immersive virtual environments as part of a broader commercialization and brand-governance strategy. For brands, it is crucial to aim for a seamless experience for consumers, much like the successful example set by Gucci, which integrates physical and digital domains into a coherent and continuous consumer journey. In this context, brand engagement must remain cohesive across all points of interaction – including virtual worlds, digital storefronts, social media platforms, and parallel physical or hybrid parallel events – so that the brand’s identity, values, and messaging are consistently reinforced irrespective of medium. This form of cross-environmental consistency enhances consumer trust, deepens engagement, and contributes to the accumulation of brand equity both within the metaverse and in the offline marketplace. This cohesive approach ensures that consumers have a unified and immersive brand experience, enhancing brand loyalty and engagement in the metaverse and beyond the digital environment. Achieving such seamlessness requires more than aesthetic uniformity; it demands the careful orchestration of communication strategies, visual signifiers, and interactive design elements that collectively convey a stable and recognizable brand identity. Immersive and personalised experiences, such as virtual product demonstrations, experiential storytelling, and opportunities for social interaction, enable consumers to engage with the brand in meaningful and participatory ways, thereby strengthening affective and symbolic connections.

These experiences, however, are intrinsically dependent on the effective protection and management of intellectual property rights. Intellectual property assets function as the legal and semiotic infrastructure that underpins brand coherence, facilitates consumer recognition, and safeguards reputational value across virtual and physical environments, consistently aligning the brand’s values and messaging, as demonstrated by *Gucci Town*. Within this commercialization strategy, the protection of creativity and reputation through intellectual property law is not merely defensive but constitutive of value creation. By securing control over branded virtual spaces, digital goods, and associated experiential elements, fashion brands can mitigate risks of dilution, misappropriation, and consumer confusion while simultaneously fostering innovation and competitive differentiation. The success of *Gucci Town* thus underscores the extent to which sustained brand recognition, consumer loyalty, and competitive advantage in the metaverse depend upon the strategic integration of immersive design, consistent brand expression, and robust intellectual property governance.

This platform is a unique digital environment where customers can engage with the brand, explore different virtual spaces, create unique digital artwork, and participate in interactive experiences.

It is commercialized through a system of earning virtual and physical rewards that are exclusive to the metaverse by completing gamified quests, earning gems that are used to reverse unreleased Gucci physical handbags, and purchase branded virtual items in the ‘Gucci Vault’ and boutique. Players can also purchase virtual Gucci items using Robux, the Roblox universe’s currency which is sold for USD, making it a significantly viable revenue source for Gucci. A key example of the magnitude of the revenue potential is represented in a digital Gucci ‘Dionysus’ handbag that had sold for over \$4,000 USD higher than the price of the physical bag that was virtually replicated.¹¹⁶ These events and strategic partnerships provide Gucci with valuable insights into its long-term strategic positioning within virtual environments, enabling a more systematic and evidence-based approach to brand development. By leveraging the experience and creative expertise of platform developers and user communities, Gucci is able to cultivate sustained relevance and longevity as a brand in immersive digital spaces. Collaboration with Roblox developers, in particular, facilitates the commercialization of Gucci’s branding through novel and immersive modes of consumer engagement, while simultaneously enabling user-generated content and social interaction. Through this participatory model, innovation capacity is expanded and the underlying innovation infrastructure, encompassing Gucci’s virtual trademarks and other intellectual property assets, is further developed, operationalized, and embedded within the metaverse ecosystem.

Gucci Town as a digital marketplace protects its virtual goods, virtual assets, digital media and fashion shows, as well as its crypto collectibles and other digital certificates through a series of registered trademarks. As of June 2022, Gucci America, Inc. has registered the following trademarks: Class 9, 35, 36, 41, and 42 (refer to the tables below) relating to digital goods and transactions.¹¹⁷ These registered specifications aim to protect Gucci’s NFTs, virtual goods and services linked to the metaverse platform, and extended digital assets which are multi-jurisdictionally protected. To protect their affluent influence in the physical and virtual world, Gucci’s intellectual property portfolio ranges from the trademarked Gucci logo and numerous “GG” marks, to illustrations, standard character marks, and design patterns of the stylized letters “GG” – and the infamous illustration mark consisting of a stripe containing three distinct bands of colour, a red band in the middle of two green bands.¹¹⁸ Gucci has been notably proactive in safeguarding its brand presence within the metaverse, including through the registration of multiple trademarks covering virtual goods and environments, as well as by pursuing enforcement actions against unauthorized uses of its branding by third parties.

¹¹⁶ “Would you pay US\$4,000 for a virtual Gucci bag? This Roblox user did”, (7 June 2021), online: *South China Morning Post* <<https://www.scmp.com/magazines/style/news-trends/article/3136325/digital-gucci-bag-sold-us4000-gaming-platform-roblox>>.

¹¹⁷ “Gucci Trademarks - Gerben Intellectual Property”, (4 May 2020), online: <<https://www.gerbenlaw.com/trademarks/apparel/gucci/>>.

¹¹⁸ *Ibid.*

PROTECTION OF IP RIGHTS IN THE METAVERSE

MAIN IP RIGHTS	GOODS & SERVICES	COUNTRIES	CLASS	DESCRIPTION OF MARK
• Example of Main trademarks: 	• Protect NFTs and virtual goods and services linked to these projects in the following classes with detailed specifications: 1. Class 9; 2. Class 35; 3. Class 41; 4. Class 42;	• Italy; • European Union; • United States of America; • China; • Other countries of interest through specific national/international filings	9	Downloadable virtual goods
			35	Online retail store services featuring virtual goods
			36	Financial transactions via blockchain
			41	Providing online non-downloadable virtual goods
			42	Authentication, issuance, and validation of digital certificates

Figure 2: Description of a collection of Gucci trademarks and its classifications.¹¹⁹

Gucci has commercialized its intellectual property in the metaverse primarily through licensing and branded collaborations across virtual platforms. One of its earliest initiatives preceded the launch of Gucci Town and involved licensing one of its core registered trademarks, the interlocking G logo, was licensed for a collaboration with developer Wildlife on a Tennis Clash. Virtual tennis rackets were created that featured the interlocking G logo and other Gucci branding. Framed as a distinct expression of exclusivity and sport luxury, the initiative featured the “Gucci Open”, a virtual tennis tournament collaboration that allowed players to discover exclusive sporting wear outfits designed by Gucci.¹²⁰ Players were subsequently able to purchase this apparel line to match their Tennis Clash avatar through Gucci’s main e-commerce platform. The fashion brand also expanded its metaverse strategy through Gucci Vault Land, a new dedicated metaverse hub on The Sandbox, as well as several NFTs developed in collaboration with Superplastic to showcase the ‘SUPERGUCCI’ NFT collection, and its 10KTF Gucci Frail NFT collection crafted by digital artisan Wagmi-san.¹²¹ Gucci has followed these projects with its collaboration with Yuga Labs’ Otherside (based on the Ethereum network) and 10KFT collection, a multi-year agreement to explore the intersectionality between fashion and entertainment in its commercialization within the metaverse.¹²² As of December 2022, Gucci’s success in the metaverse, measured by the revenue generated from NFTs alone, amounted to nearly 11.6 million USD.¹²³

Collaborations between established brands and virtual-native studios increasingly facilitate bi-directional innovation between digital environments and physical products. A prominent example is the evolution of Nike’s engagement with the Web3 ecosystem through its acquisition and subsequent development of RTFKT, the digital fashion and virtual sneaker studio. RTFKT’s Cryptokicks iRL was

¹¹⁹ *Ibid.*

¹²⁰ “Gucci Announces Gaming Collaboration With ‘Tennis Clash’”, (27 May 2020), online: *Hypebeast* <<https://hypebeast.com/2020/5/gucci-tennis-clash-collaboration-announcement-info>>.

¹²¹ Nicholas Kitonyi, “Gucci Joins Yuga Labs’ Otherside Metaverse in New Multi-Year Deal”, (27 March 2023), online: *NFTgators* <<https://www.nftgators.com/gucci-joins-yuga-labs-otherside-metaverse-in-new-multi-year-deal/>>.

¹²² *Ibid.*

¹²³ Angela Gonzalez-Rodriguez, “Leading fashion brands earn over 245 million dollars in NFTs sales”, (27 December 2022), online: *Fashion United* <<https://fashionunited.com/news/business/leading-fashion-brands-earn-over-245-million-dollars-in-nfts-sales/2022122651415>>.

positioned as a hybrid product that integrated advanced sensory technology, including accelerometers, auto-lacing, lighting, haptic feedback, walk detection and embedded AI, designed to enable wearers to experience digitally informed capabilities in physical footwear, illustrating a novel convergence of gameplay mechanics and physical product functionality.¹²⁴ As RTFKT co-founder Steven Vasilev described, the product functioned as “a smart watch in a sneaker,” intended to “merge worlds” by translating digitally native affordances into embodied consumer experiences.¹²⁵ This initiative represented a significant departure from traditional licensing models and marked an ambitious attempt to extend brand identity and trademarked assets across interoperable digital–physical domains at the intersection of sport, fashion, and immersive computation, one that allows for brand engagement on a more visceral level. The acquisition of RTFKT was followed by Nike’s launch of .Swoosh, a platform for Nike to connect with users and consumers as they purchase Nike-branded virtual products in the form of NFTs. It is intended to serve as a home for Nike-branded virtual products, enable co-creation with consumers, and facilitate Web3 onboarding, such as digital wallet creation through partnerships with third-party providers (i.e. BitGo), while offering potential royalty pathways for co-creators of virtual goods.¹²⁶ Nike leveraged this platform to educate users about virtual asset ownership and to establish a direct channel between branded virtual products and its broader consumer base. As of 2023, Nike’s total NFT revenue reached \$186 million, as per the crypto analytics platform Dune.¹²⁷ Similarly, Nike’s Airphoria experience within Fortnite, developed using Unreal Editor for Fortnite (UEFN), demonstrated how immersive environments can function as extensions of brand storytelling and consumer engagement.¹²⁸ Centered on Nike’s Air Max heritage, Airphoria surrounded users with Nike iconography and registered marks while integrating gameplay, avatar customization, and access to limited-edition virtual goods, some of which were coordinated with physical product releases. Subsequent iterations, including Airphoria 2.0, reinforced Nike’s commitment to multifaceted engagement within established gaming ecosystems rather than fully proprietary metaverse infrastructures.

The Dunk Genesis Cryptokicks was the first of Nike’s NFT journey which capitalized on RTFKT’s signature aesthetics and technology.¹²⁹ These digital sneakers used RTFKT’s “Skin Vial”

¹²⁴ Langston Thomas, “Nike x RTFKT Just Unveiled What Their Cryptokicks Smart Footwear Line Will Look Like”, (1 December 2022), online: *nft now* <<https://nftnow.com/news/nike-x-rtfkt-just-unveiled-their-cryptokicks-smart-footwear-line/>>.

¹²⁵ *Ibid*

¹²⁶ “Nike Is Launching Its First Big Web3 Project”, (14 November 2022), online: *The Business of Fashion* <<https://www.businessoffashion.com/articles/technology/nike-is-launching-its-first-big-web3-project/>>.

¹²⁷ Andrew Cohen, “Nike Swoosh NFTs to Appear in Future EA Sports Video Games”, (2 June 2023), online: *Front Office Sports* <<https://frontofficesports.com/nike-nfts-to-appear-in-ea-sports-video-games/>>.

¹²⁸ “Nike and Fortnite Level Up Their Partnership”, (20 June 2023), online: *The Business of Fashion* <<https://www.businessoffashion.com/articles/technology/nike-and-fortnite-level-up-their-partnership/>>.

¹²⁹ “Nike Dunk Genesis CRYPTOKICKS” in April 2022, and as of June 2022, the collection has generated 5.8K ETH in volume (~\$11M USD) see Right Metric Co “How Nikes First NFT Collection Generated Over 11m...” (June 2022), online: <<https://rightmetric.co/insight-library/how-nikes-first-nft-collection-generated-over-11m-usd-in-transactions-in-just-over-a-month/>>.

digital skins, one of their leading technological assets, are used to customize the sneakers. These skins can now be used within Nike's virtual environment, *Nikeland*, on the Roblox platform. Nikeland features a collection of shoes, apparel and accessories which users can use to personalize their avatars, maintaining approximately 35 million visitors as of March 2025.¹³⁰ Nikeland and its acquisition of RTFKT can be deemed to be a part of Nike's demand creation strategy which is a foundational element of the brand's business model. Nike harmonizes "product development and demand creation to build a footwear empire that generated over \$46 billion in revenue in 2022, and yet this was based on a demand creation strategy, in which Nike spent over \$3.8 billion in deals with athletes and demand creation to generate demand."¹³¹ Revenue through the use of brand creation in the form of their Nikeland presence on Roblox and the revenue streams from selling NFTs and its licensing rights are all ways in which Nike has topped lists in terms of NFT revenue generation with \$185.32m USD as of August 2022.¹³² One of the primary reasons for Nike's revenue success in this area is its acquisition of the RTFKT, which previously had a track record of commercial success with the CloneX collection, accounting for more than 40% of Nike's royalties. Nike Cryptokicks' exclusive 20,000 pairs of virtual sneakers sell for everything between 5,000 dollars and 130,000 dollars, with some designed and developed alongside artist Takashi Murakami as the most coveted pairs.¹³³ Including NFT-generated revenue from CloneX sales and royalties, pre-acquisition of RTFKT, amount to 91.2 million USD in royalties and 93.1 million in revenue, totalling 184.3m in NFT sales as of October 2022.¹³⁴ By contrast, Nike's divestment of RTFKT in late 2025 signalled a recalibration of its Web3 ambitions. The sale of the subsidiary followed broader market contraction in NFTs and reflected a strategic shift away from vertically integrated blockchain ventures toward more controlled, brand-safe digital environments. Nike's evolving virtual-world strategy illustrates a transition from experimental, asset-centric models of digital ownership toward platform-based experiential branding, where trademarks, trade dress, and narrative control remain firmly anchored within corporate governance structures.

NFT-related revenues are primarily derived from two streams: initial sales, which largely accrue to the issuing brand or creator, and royalties from secondary market transactions, representing a percentage of subsequent resales. The statutory right to re-sale royalties (commonly referred to as *droit de suite*) have been recognized in many jurisdictions across the globe within the WIPO for international

¹³⁰ Waqar Nadeem, Abdul Rehman Ashraf, & Shadma Shahid, "What drives metaverse retail environments (non)usage? A behavioral reasoning theory perspective" (2025) 212 *Technological Forecasting and Social Change* 123945, online: <<https://www.sciencedirect.com/science/article/pii/S0040162524007431>>. See also, Charlie Parker, "Millions visit Nikeland as brands fashion a future in the metaverse", *Sunday Times* (23 July 2023), online: <<https://www.thetimes.co.uk/article/millions-visit-nikeland-as-brands-fashion-a-future-in-the-metaverse-sb2lgrghx>>.

¹³¹ "Nike leads other brands in revenues from NFTs", (23 August 2022), online: *Ledger Insights - blockchain for enterprise* <<https://www.ledgerinsights.com/nike-brands-revenues-nfts/>>.

¹³² *Ibid.*

¹³³ Angela Gonzalez-Rodriguez, "Leading fashion brands earn over 245 million dollars in NFTs sales", (27 December 2022), online: *Fashion United* <<https://fashionunited.com/news/business/leading-fashion-brands-earn-over-245-million-dollars-in-nfts-sales/2022122651415>>.

¹³⁴ *Ibid.*

harmonization efforts, reflecting a longstanding policy commitment to supporting creators' intellectual property rights.¹³⁵ Considering evolving global and virtual marketplaces, there has been a growing call to extend this further. The emergence of NFTs, with regard to the applicability of re-sale royalties, has further pushed this boundary by enabling artists and creators to program resale royalties directly into the token at the point of minting, thereby securing ongoing remuneration without reliance on traditional intermediaries, such as galleries, auction houses, or collecting societies. This technological capability has been widely embraced by digital artists and creator communities, many of whom have publicly advocated for stronger and more consistent resale royalty enforcement across both physical and digital markets. These calls have been echoed by international policy organizations, including WIPO, as well as by regional legislative bodies, most notably within the European Union, which have framed resale royalties as an integral component of creator remuneration and cultural sustainability in evolving digital economies.¹³⁶ Notwithstanding these normative arguments, the enforceability of NFT resale royalties remains largely contingent on marketplace governance rather than statutory mandate. The enforceability of such royalties remains marketplace-dependent, as illustrated by OpenSea's attempted circumvention through a "zero royalties" policy, which was later abandoned for the minimal amount of 0.5% to match competitor pressure for low rates for NFT collections.¹³⁷ This underscores the fragility of royalty enforcement in the absence of clear legal obligations. As a result, NFT royalties currently function less as legally guaranteed rights and more as contractual or platform-mediated arrangements, the effectiveness of which varies across ecosystems and trading venues. By design, NFT resale and transfer transactions are immutably recorded on blockchain ledgers, altering the analytical framework through which first-sale doctrines, or their functional equivalents, are assessed. Concerns surrounding unauthorized copying are comparatively diminished in this context, as the exclusivity and provenance of NFTs as authenticated tokens confer value distinct from mere digital replicas or derivative works. As a result, the onset of NFTs has materially altered the copyright landscape, insofar as unauthorized copies cannot substitute for ownership of the original, authenticated NFT. This shift challenges established assumptions in copyright law regarding substitution, exclusivity, and market harm, and suggests that NFTs may require distinct doctrinal treatment that accounts for their tokenized nature rather than their purely expressive content.

Viewed collectively, the rise of NFT resale royalties reflects both continuity and disruption within intellectual property law. While the underlying rationale mirrors that of traditional *droit de suite*

¹³⁵ "Artist's Resale Right", online: *Copyright* <<https://www.wipo.int/en/web/copyright/activities/resale-right>>.

¹³⁶ Note: EU Resale Rights Directive (2001/84/EC) harmonized resale royalties across Member States, ensuring that visual artists receive a royalty on subsequent resales through auction houses and galleries. See also, "The artist's resale right: a fair deal for visual artists", online: <<https://www.wipo.int/en/web/wipo-magazine/article-details/?assetRef=39997&title=the-artists-resale-right-a-fair-deal-for-visual-artists>>.

¹³⁷ 'Zero Royalties' policies on NFT marketplaces pose existential threat to Web3 and creators", (11 November 2022), online: *nou nft* <<https://nouncraft.com/2022/11/11/zero-royalties-policies-on-nft-marketplaces-pose-existential-threat-to-web3-and-creators/>>.

regimes, specifically, to ensure fair and proportionate remuneration for creators and value accrued over time, the mechanisms of enforcement, governance, and market participation differ significantly. As Lee observes, “Resale royalties serve the [U.S.] Copyright Clause’s objective to promote progress, which the Supreme Court has interpreted in an economic sense: ‘Sacrificial days devoted to... creative activities deserve rewards commensurate with the services rendered.’”¹³⁸ Resale royalties serve the constitutional objective of promoting progress by rewarding creative labour in proportion to its contribution, an economic interpretation that remains salient as creative markets migrate into virtual and tokenized environments. In this respect, NFTs have not displaced resale royalty principles but have instead reframed their operation, exposing both the possibilities and limitations of relying on technological design and private ordering to achieve long-standing policy goals within intellectual property law.

Although Canada has recently signalled renewed political support for the introduction of an artist’s resale right, most notably through the 2025 Economic Statement and earlier parliamentary committee recommendations, no such right has yet been enacted, and its precise scope, legal basis, and constitutional stance remain unresolved.¹³⁹ To date, government engagement has been limited to exploratory consultations, including an unreleased 2023 public survey conducted by Canadian Heritage and Innovation, Science and Industry, leaving the initiative in a state of legislative and doctrinal inconclusiveness.¹⁴⁰ Canada’s tentative movement toward artist’s resale rights exposes a fundamental tension between incentive-based justifications for copyright, market-based rationales for trademark protection, and the constitutional allocation of legislative authority over property. Although ARR is often rhetorically situated within copyright discourse as a mechanism to correct perceived distributive inequities in secondary art markets, it sits in contrast with Canada’s copyright framework, which has historically resisted perpetual or quasi-proprietary control over copies once lawfully alienated. This is reflected in the Supreme Court of Canada’s rejection of downstream market control in *Théberge v. Galerie d’Art du Petit Champlain Inc.* and the limited scope of moral rights under the Copyright Act.¹⁴¹

The Standing Committee on Industry and Technology (INDU)’s recognition of potential constitutional conflict underscores this doctrinal instability. If ARR is properly characterized as a proprietary interest attached to a tangible object, it risks falling outside Parliament’s copyright power and into provincial jurisdiction over property and civil rights. This unresolved classification problem

¹³⁸ Edward Lee, “Decentralized Collaboration Through Private Ordering” (2023) 73 American University Law Review, online: <<https://papers.ssrn.com/abstract=4487444>>.

¹³⁹ Dan Ruimy, Chair, *Statutory Review of the Copyright Act*, Report of the Standing Committee on Industry, Science and Technology, by Dan Ruimy, Chair, Report of the Standing Committee on Industry, Science and Technology (House of Commons (INDU), Canada, June 2019).

¹⁴⁰ “Government of Canada launches survey on resale rights for artists” (9 November 2023), online: *Government of Canada* <<https://www.canada.ca/en/canadian-heritage/news/2023/11/government-of-canada-launches-survey-on-resale-rights-for-artists.html>>.

¹⁴¹ *Théberge v. Galerie d’Art du Petit Champlain Inc.* 2002 SCC 34.

becomes even more important in the context of NFTs and virtual goods, which lack physical representation and derive value primarily from informational scarcity, signalling, and brand association rather than from exclusive control over copies. In this respect, NFTs align more closely with the logic of trademark and unfair competition, where consumer perception, source-identification, and market signalling are central, in comparison to traditional copyright incentives. These traditional incentives are tied to reproduction and dissemination, as reflected in Canadian trademark jurisprudence emphasizing consumer confusion and marketplace order rather than creator remuneration.¹⁴² Canadian trademark law, however, offers no analogue to resale royalties and is not structurally suited to redistribute downstream market value to creators. As a result, NFT resale royalties in Canada remain entirely dependent on private ordering through smart contracts and platform governance, mirroring the United States position in the absence of any statutory ARR. The government's current reluctance to extend ARR discourse to digital assets reflects not only legislative caution, but a deeper theoretical deadlock. The integration of ARR into Canadian IP law would require reconciling copyright's utilitarian limits, the direction of trademark's consumer-protection, and constitutional constraints on property regulation, which is an undertaking that becomes exponentially more complex when applied to intangible, blockchain-developed forms of cultural production. The ability of NFT consumers and creators to monetize their digital assets largely depends on their scope and allocation of intellectual property and access to commercial rights governing digital assets and NFT transactions. These commercialization opportunities may be subject to certain limitations, as noted above, including restrictions on including prohibitions on the creation of derivative works or replicas, limitations on commercial exploitation, and ongoing royalty obligations in favour of the original creator..¹⁴³ At the same time, however, the licensing market in this space proves to have the potential to be tremendously lucrative, and according to industry observers and, Licensing International, in particular, "[the metaverse] could represent as much as a 40 percent increase in volume in licensing in the near future. The combination of a virtually unlimited number of customers combined with the ability to use NFTs as identifiers or hang tags could see almost unlimited growth in sales for brand owners."¹⁴⁴ Industry observers have characterized the metaverse as a potentially transformative licensing frontier, with NFTs functioning as digital identifiers that facilitate scalable brand-based monetization across virtual environments. This places digital assets as a hybrid legal construct operating at the convergence of copyright, trademark, and contract. In practice, the economic value of NFTs is shaped less by statutory intellectual property entitlements than by privately ordered licensing frameworks that determine how, where, and by whom digital assets may be exploited. Resale royalties and other mechanisms of downstream value capture in virtual markets therefore emerge

¹⁴² See *Kirkbi AG v. Ritvik Holdings Inc.*, 2005 SCC 65, and *Mattel, Inc. v. 3894207 Canada Inc.*, 2006 SCC 22.

¹⁴³ "Commercializing NFTs – generating value from digital assets and intellectual property rights", (1 March 2022), online: *Smart & Biggar* <<https://www.smartbiggar.ca/insights/publication/commercializing-nfts-generating-value-from-digital-assets-and-intellectual-property-rights>>.

¹⁴⁴ Julia Bishop et al, "NFTs, Brands, and the Metaverse", (16 February 2022), online: *International Trademark Association* <<https://www.inta.org/perspectives/nfts-brands-and-the-metaverse/>>.

not from public law guarantees, but from the strategic design of licence terms, platform governance rules, and smart-contract code. This shift reflects a broader reorientation of value production in digital cultural markets, in which control over circulation, brand signalling, and interoperability across virtual environments is achieved through contractual architecture rather than through the exclusive rights traditionally conferred by copyright or trademark law.

1.6 NFT Ownership

A common misconception is that ownership of an NFT token confers an unrestricted right to utilize, transform, or commercialize the tokenized item however the owner sees fit. However, ownership of an NFT is legally distinct from ownership of the underlying copyright or trademark, in a similar way that physical ownership of an object does not grant the right to transform, reproduce, or commercialize the protected work embodied in that object. This separation of ownership and control over intellectual property rights may be challenging as brands may want to license their IP for use in the virtual environments, but brands must remain attentive to ensure that they retain control over how their IP is used and that they have structured enforcement mechanisms and licenses in place to maintain meaningful control over their rights if their IP is misused. Further, if a brand licenses its IP for use in a virtual environment, brands may wish to ensure contextual and use-based limitations to prevent tarnishment, reputational harm, brand dilution, or association with undesirable content. This includes protecting IP against infringement, counterfeiting, and other unauthorized exploitations, and further, issues relating to the interoperability of digital assets as they circulate across platforms and virtual worlds in the metaverse. As explored in Chapter 3, brands must also assess how licensed IP will interact with other digital assets and technological infrastructures within the metaverse in order to achieve optimal compatibility without undermining brand integrity.

The complexities of NFTs unlike other digital assets may prove to be more problematic as ownership of an NFT does not confer ownership rights of the underlying asset that the NFT represents unless expressly stipulated in an agreement or smart contract. For example, owning an NFT that represents or is associated with a piece of digital artwork does not afford any proprietary or exclusive rights in the underlying work. Rather, blockchain technology, with the facilitation of smart contracts for NFTs, confers upon the NFT holder limited or exclusive rights to retain, transfer, exclude, and to use the NFT within compatible digital environments. These token-based rights are legally and conceptually distinct from copyright interests in the associated content, which remain governed by national copyright regimes. Where the underlying asset constitutes a copyrighted work, the NFT holder will generally lack the right to reproduce, distribute, adapt, publicly communicate, or commercially exploit that work absent an express licence from the copyright owner. Moreover, one of the key benefits of NFTs is that whilst they represent unique digital assets, they provide a way to verify the authenticity and ownership of those assets. Although NFTs are frequently marketed as mechanisms for establishing

provenance, authenticity, and digital scarcity, this function is contingent upon the legitimacy of the minting process and the accuracy of the information embedded in the token. In practice, significant disputes have arisen where NFTs have been created without authorization from the original creator or copyright holder, or where the claimed uniqueness of the underlying asset is undermined by the existence of identical or substantially similar copies circulating online. If the NFT specifically identifies, incorporates, or is linked to copyrighted works, a clearly articulated content license would be required to delineate what exclusive rights the buyer has with respect to the use of the copyrighted work, including the right to publicly display the work and terms of derivative use, specifically if it is artwork or registered imagery, or rights relevant to commercialization. This is particularly salient in the context of digital artworks, registered imagery, and branded content, where ambiguity surrounding the allocation of rights risks not only legal infringement but also market confusion and reputational harm.

As Carys Craig has persuasively argued, copyright does not operate as a unitary property right inherently attached to an artefact, but instead functions as a statutory, relational entitlement that regulates communicative acts, such as reproduction, dissemination, and public performance, within a broader cultural system.¹⁴⁵ On this account, the transfer of an object, whether physical or digital, does not in itself effect a transfer of copyright, which remains a distinct, statutory entitlement – tethered to the author–user–public relationship structured by law. This relational conception maps directly onto NFTs since while the token may circulate as an object of exchange, ownership of the token does not entail ownership of copyright unless such rights are expressly licensed. This distinction, therefore, clarifies why NFT transactions cannot, by themselves, reconstitute copyright control over underlying works, notwithstanding technological claims of exclusivity or authenticity. More broadly, it exposes a structural tension between blockchain-enabled systems that seek to impose object-like control through code and contract, and copyright law’s deliberate resistance to perpetual downstream control in order to preserve cultural circulation, user rights, and public interest values. In this sense, NFTs do not displace copyright’s relational architecture, but rather test its limits that underscore the continued relevance of statutory boundaries in mediating ownership, control, and creativity in digital cultural markets.

1.7 Licensing Agreements

Some projects have adopted the ‘NFT License’, which outlines the limited rights to utilize, reproduce, or display the designs or art within the NFT for the purpose of commercialization. Simply, within this license, the creator of the NFT retains ownership of the underlying art, including intellectual property rights. However, a pertinent case of an alternative approach was demonstrated by the creators

¹⁴⁵ Carys J Craig, “Introduction - Copyright, Communication & Culture: Towards a Relational Theory of Copyright Law” (2011) Comparative Research in Law & Political Economy, online: <<https://digitalcommons.osgoode.yorku.ca/clpe/61>>.

behind the Bored Ape Yacht Club collection, Yuga Labs, offering unlimited commercial rights to NFT purchasers with ownership of the NFT, formalized by a ‘Smart Contract’.¹⁴⁶ Smart Contracts are self-executing computer programs that enforce the terms of the NFT. However, this mode of an agreement is not a perfect solution as there has been cases where vulnerabilities in smart contracts have led to issues with respect to ownership where an NFT was lost or stolen due to a contractual error. As illustrated in the Yuga Labs approach, where ownership of the underlying Bored Ape (the art) is held completely, purchasers obtain an unlimited and worldwide license to create derivative works based on the underlying art with no limit on the revenue that a purchaser can generate. However, the terms and conditions are followed with limitations:

Yuga Labs LLC grants you a worldwide, royalty-free license to use, copy, and display the purchased Art, along with any extensions that you choose to create or use, solely for the following purposes: (i) for your own personal, non-commercial use; (ii) as part of a marketplace that permits the purchase and sale of your Bored Ape / NFT, provided that the marketplace cryptographically verifies each Bored Ape owner’s rights to display the Art for their Bored Ape to ensure that only the actual owner can display the Art; or (iii) as part of a third party website or application that permits the inclusion, involvement, or participation of your Bored Ape, provided that the website/application cryptographically verifies each Bored Ape owner’s rights to display the Art for their Bored Ape to ensure that only the actual owner can display the Art, and provided that the Art is no longer visible once the owner of the Bored Ape leaves the website/application.¹⁴⁷

Licensing is a more common approach for an IP rights owner to authorize use of the IP rights in the underlying asset to the purchaser of the NFT which would also need to be set out in the smart contract or agreement between seller and purchaser.

We see a similar agreement through the licensing of a brand’s IP when they develop virtual environments on platforms such as Roblox or Decentraland. A study by Lee through the Illinois Institute of Technology found that “a majority of the Top 25 NFT projects by sales volume have adopted some form of commercial license for their NFT owners” which fosters decentralized collaboration with buyers of NFTs with a commercial license as potential co-creators.¹⁴⁸ As we see through prior examples, the potential of expanding a brand’s recognition through a token’s IP rights and licensing that right is significant, therefore, monitoring and enforcement is fundamental in the protection of assets, brand equity and intellectual property. Further importance stems from the transformation of this digital technology having the potential to promote the development of science and arts through its incentivization of innovation within the fashion industry in the 21st century.¹⁴⁹

¹⁴⁶ “BAYC Terms and Conditions”, online: *Bored Ape Yacht Club (BAYC)* <<https://boredapeyachtclub.com/#/terms>>.

¹⁴⁷ *Ibid.*

¹⁴⁸ Edward Lee & Nelson Rosario, *Comments of Edward Lee and Nelson Rosario to the Non-Fungible Study by the United States Copyright Office and the United States Patent and Trademark Office (USPTO)* (Rochester, NY, 2023). See also, Lee, *supra* note 138.

¹⁴⁹ In reference to Article I, Section 8, Clause 8 of the U.S. Constitution.

As illustrated, specific limitations on licensing rights may also arise, governing how the NFT can be used, shared, or distributed by consumers or other entities. These restrictions aim to protect the brand's IP and maintain the integrity and exclusivity of the NFT, while still allowing for commercial opportunities and revenue stream potential for both the brand and the creators. With this significant level of increased engagement, users are inevitably surrounded by a brand's copyright, trademark, and industrial design. These protections play a critical role in safeguarding the interests of brands, creators, and consumers in the context of the fashion industry. In theory, the interplay of these IP rights in this virtual environment should attempt to ensure that brands and creators have the necessary legal protection to commercialize their virtual goods, while also respecting the rights of others. Consumers, on the other hand, can be confident that the NFTs and virtual products they purchase are genuine and authorized, mitigating concerns related to counterfeit or unauthorized content. In theory, with the effective utilization and enforcement of these rights, the metaverse can offer a space where creativity and innovation can flourish, benefiting all stakeholders involved.

Copyright is a balance between incentivizing creation on one hand and ensuring public access to the fruits of that creation on the other and both are fundamental parts of the system. The problem in the metaversal context is that this balance is under significant pressure and the pressure is coming predominantly from one direction. Large brands, platform operators, and NFT developers have every commercial incentive to push IP protection as far as it will go in virtual environments: broader trademark rights, stronger copyright claims, smart contract terms that override statutory consumer protections, and licensing structures that extract maximum value from every interaction with a digital asset. Collectively, however, they represent that IP balance are in favour of rights holders and away from the public interest dimensions that justify the system in the first place. This chapter and the assessment of the potential commercialization value serves as a starting point for understanding the economic pressure for effective governance. Effective IP governance in this space is therefore not merely about maximizing protectionist enforcement in favour of brands, rather, it is about establishing the foundational conditions of trust and clarity that allow all participants, whether luxury conglomerates launching branded virtual worlds or independent creators minting original digital works, to engage with reasonable confidence in the integrity of the virtual marketplace. Governance must be anchored in the public interest foundations that justify IP law in the first place, ensuring that enforcement mechanisms are proportionate, that exceptions and limitations are preserved across jurisdictions, that consumer rights are not contractually displaced by smart contract architecture, and that the creative freedom of independent users and smaller participants is treated as a value to be protected rather than a risk to be managed. Coherent intellectual property governance protects consumers as well as brands, and a framework calibrated exclusively to brand interests, without adequate consumer protection provisions, is incomplete both normatively and practically.

Nevertheless, assuming a perfect balance of interests has been an issue since the dawn of the Internet (and, indeed, long before that). Creators, IP owners, NFT owners, platforms and technology developers may each have separate and diverging interests in this new commercial environment, not to mention the public at large. While everyone typically agrees that rights and interests should be carefully balanced, there is less agreement on what constitutes a fair balance. In the following section, with a focus on the interests of designers, fashion brands and their consumers, we will explore the reality of the digital shift and the role that intellectual property protection can play in achieving the appropriate balance. Moreover, the increasing reliance on private governance mechanisms, such as platform terms of service, smart contracts, and embedded royalty structures, raises normative questions about the appropriate position of regulatory authority in digital markets. These mechanisms may recalibrate traditional intellectual property balances by privileging certain stakeholders' interests over others, often without the procedural safeguards or public accountability that accompany statutory regimes. As a result, the pursuit of balance in NFT and metaverse ecosystems cannot be understood solely as a doctrinal exercise, but must also be assessed as a question of institutional design, power asymmetry, and legitimacy within digitally mediated cultural and commercial spaces, which will be explored further. Ultimately, these dynamics suggest that intellectual property law, while an essential component of the regulatory framework governing NFTs and virtual goods, is unlikely on its own to resolve the structural tensions produced by digital markets, necessitating complementary interventions through contract, competition, consumer protection, and platform governance to achieve a more durable and legitimate balance of interests.

Chapter 2: The Role of IP in the Modern Fashion Industry: From Physical to Digital Reality

Each visual or expressive element within the metaverse may constitute a distinct copyright work, including avatars, virtual environments, and the digital objects with which users interact. These works are frequently layered upon, or derivative of, pre-existing copyright works and other forms of intellectual property. By way of illustration, a fashion brand's artistically rendered logo or NFT-based artwork may attract copyright protection, while the brand identifiers embedded within those assets may simultaneously be protected under trademark law, and the aesthetic features of virtual garments or accessories may fall within the scope of industrial design or, in limited circumstances, patent protection. Taken together, these overlapping regimes underscore the composite and cumulative nature of intellectual property rights in virtual spaces, where a single digital asset may engage multiple, co-existing legal protections. As users engage with branded clothing, branded digital art, virtual retail stores, and marketing events within the metaverse, they may begin to encounter layers of intellectual property ownership and exclusivity rights, assignments and licenses, and terms of service of fair use that may lead to inevitable infringement.¹⁵⁰ The tangle of complex, jurisdiction-specific laws, and their application in the metaverse, are indistinct and absent of comprehensive legislation specific to the metaverse.

Whilst the use and sale of virtual fashion in the metaverse creates several opportunities for brand owners, it also opens the door for new potential disputes concerning unauthorized virtual goods and risks new kinds of misappropriation of intellectual property rights (IPR). Monitoring and preventing unauthorized uses of IP in immersive digital environments presents challenges analogous to those associated with physical goods, yet these difficulties are compounded by jurisdictional complexity, platform governance structures, and evolving enforcement mechanisms. The metaverse has opened novel avenues for IP infringement that are particularly difficult to regulate in a rapidly changing technological landscape. At the same time, recent jurisprudence has clarified that not all uses of intellectual property in expressive or digital contexts warrant heightened protection on free expression grounds. As the Supreme Court of the United States affirmed in *Jack Daniel's Properties, Inc v VIP Products LLC*, where a trademark is used as a source identifier rather than merely as part of an expressive work, traditional trademark analysis, such as likelihood of confusion, applies, even if the use incorporates expressive or creative elements.¹⁵¹ This clarification has important implications for virtual fashion and branded digital assets, which are often marketed, sold, and consumed as goods within

¹⁵⁰ See Carys J Craig, *The Legal Implications of the Metaverse* (Jack & Mae Nathanson Centre on Transnational Human Rights, Crime and Security) (Osgoode Hall Law School, York University, 2023).

¹⁵¹ *Jack Daniel's Properties Inc v VIP Products LLC*, 143 U.S. 1578 (2023). See also, Ronald Mann, "Jack Daniel's wins big in challenge to spoofing 'Bad Spaniels' dog toy" (9 June 2023), online: *SCOTUSblog* <<https://www.scotusblog.com/2023/06/jack-daniels-wins-big-in-challenge-to-spoofing-bad-spaniels-dog-toy/>>.

virtual marketplaces and may therefore function as trademarks in commerce. Accordingly, concerns about imposing a “chilling effect” on artistic freedom, while still relevant, no longer provide a categorical shield against trademark enforcement in virtual environments.¹⁵² The fluid and participatory nature of the metaverse which is characterized by an influx of user-generated content, interoperable assets, and platform-mediated transactions, nonetheless, complicates the delineation of lawful and infringing conduct. Fashion brands may therefore encounter persistent challenges in protecting their copyrighted works, trademarks, and industrial designs, particularly where digital assets blur the line between expressive use and commercial branding. This chapter assesses how IP disputes in the metaverse are shaped by this recalibrated balance between brand protection and creative freedom, and examines the role, scope, and protections of trademark, copyright, and industrial design in virtual environments through a nuanced lens that accounts for both ownership claims and market-signaling functions.

Intellectual property law governs ownership rights of non-tangible elements of property, the *corpus mysticum* (intangible asset), and can be used to protect creativity, and innovation through trademarks, copyright, and industrial design rights. Fashion design can fit into each category in some capacity through artistic and industrial elements of the fashion industry. Design protection in this regard can often become challenging. Pouillard and Kuldova suggest that,

Interconnected fields of fashion and design [are] at the meeting point between art and industry, design and utility, economic interest and creativity, where, in practice, they become increasingly difficult to tell apart as each feeds on the other in order to increase its imaginary value—both attempting to capitalize on the imaginary association with fine arts and its residual aura of quality, importance and value.¹⁵³

The challenge in this regard is that intellectual property protection remains fundamentally territorial, and therefore the scope of protection that is afforded is largely based on how much regard the jurisdiction’s legal system has for fashion designs, as a matter of economic, cultural, political, and social policy. Within the scope of this thesis, it may be particularly instructive to assess the role of intellectual property from a North American and European perspective. The European legal system, where many luxury fashion power houses are headquartered, designs are treated analogously to works of fine art with stronger legal protections and designs are considered eligible for copyright protection, for example, covering both aesthetic as well as function utilitarian elements of the design.¹⁵⁴ Recent jurisprudence of

¹⁵² One of the most common arguments within the US jurisdiction is the Rogers Test: Courts are to construe the Lanham Act to apply to artistic works only where the public interest in avoiding consumer confusion outweighs the public interest in free expression. An artistic work's use of a trademark that otherwise would violate the Lanham Act is not actionable unless the use of the mark has no artistic relevance to the underlying work whatsoever, or, if it has some artistic relevance, unless it explicitly misleads as to the source or the content of the work (relevant in the ‘MetaBirkin’ case). See, *E.S.S. Entm’t 2000, Inc. v. Rock Star Videos, Inc.*, 547 F.3d 1095 (9th Cir. 2008).

¹⁵³ Veronique Pouillard & Tereza Kuldova, “Interrogating Intellectual Property Rights in Post-War Fashion and Design” 30:4 *Journal of Design History* 343–55.

¹⁵⁴ Susanna Monseau, *Protecting Creativity in Fashion Design: US Laws, EU Design Rights, and Other Dimensions of Protection* (London: Routledge, 2023).

the Court of Justice of the European Union has clarified that copyright protection is available to designs that constitute the author's own intellectual creation, including works incorporating functional or utilitarian elements, provided that those elements are not solely dictated by technical considerations. In *Cofemel – Sociedade de Vestuário SA v G-Star Raw CV*,¹⁵⁵ the Court rejected heightened aesthetic thresholds for applied art and confirmed that originality, rather than artistic merit, is the decisive criterion. Similarly, in *Brompton Bicycle Ltd v Chedech/Get2Get*, the Court held that functional designs may qualify for copyright where the form reflects free and creative choices, while excluding protection for features exclusively dictated by technical function.¹⁵⁶ This approach has been further reflected in domestic applications, such as *Response Clothing Ltd v Edinburgh Woollen Mill Ltd*, in which a three-dimensional fabric design was protected as a work of artistic craftsmanship.¹⁵⁷ Overall, these developments underscore the EU's expansive conception of copyright protection for fashion and design, standing in contrast to more fragmented and limited approaches in North American jurisdictions, and highlighting the jurisdictional variability that complicates the protection of fashion designs in both physical and digital environments.

The historical importance of fashion should be noted, particularly in jurisdictions such as France, where the industry has been recognized as a national cultural and economic asset supported by the government to play a central role in the building of strong protection for fashion design in France.¹⁵⁸ Whereas under U.S. law, fashion design, until recently, had been considered a form of applied art concerning creating useful objects, categorizing creativity and design as separate functions of an object. Accordingly, while an embellishment or ornamentation on clothing would be protected under U.S. copyright law, the article of clothing itself is generally excluded.¹⁵⁹ This distinction illustrates the divergence in conceptualizing creativity and utility across jurisdictions and underscores the broader point that protection of fashion design is highly contingent on local legal traditions and policy priorities. We will assess this further within this chapter to highlight certain distinctions and varying perspectives. There is also the differentiation between moral and the proprietary economic rights that come into play jurisdictionally. French copyright law provides both economic as well as moral rights to the creator of a copyright work. These differences are further compounded by the interplay between moral and proprietary economic rights. French copyright law, for example, affords creators both economic (*'droits patrimoniaux'*) and moral rights (*'droits moraux'*): economic rights generally allow the creator to control reproduction and commercial exploitation of the work, but may terminate after the first sale.¹⁶⁰

¹⁵⁵ *Cofemel – Sociedade de Vestuário SA v G-Star Raw CV* (2019), Case C-683/17, ECLI:EU:C:2019:721, [2019] 3 CMLR 1025 (CJEU).

¹⁵⁶ *SI and Brompton Bicycle Ltd v Chedech/Get2Get* (2020) Case C-833/18, [2020] ECR I-0000 (CJEU).

¹⁵⁷ *Response Clothing Ltd v The Edinburgh Woollen Mill Ltd* [2020] EWHC 148 (IPEC).

¹⁵⁸ Pouillard, *supra* note 153.

¹⁵⁹ *Ibid.* See also, *Brandir International, Inc., v. Cascade Pacific Lumber Co.*, 834 F.2d 1142 (2d Cir 1987).

¹⁶⁰ Note: Articles L122-1 et seq., *Code de la propriété intellectuelle*, provide that authors hold exclusive economic rights to reproduce, distribute, and communicate their works to the public, which are transferable by contract and generally endure for the life of the author plus 70 years.

Moral rights, by contrast, persist indefinitely, allowing creators to insist on attribution and to prevent modifications that would compromise the integrity of the work.¹⁶¹ Moral rights remain attached to the author personally and are “perpetual, inalienable and imprescriptible”, surviving beyond the transfer of economic rights.¹⁶² The combination of territoriality and the ongoing exercise of moral rights presents practical challenges for fashion brands, particularly in identifying where an infringement has occurred in a globalized or digital marketplace, and tracing the origin of infringing activity across borders. These comparative distinctions will be explored further in this chapter to highlight how divergent legal frameworks influence the protection, enforcement, and commercialization of fashion designs in both physical and virtual contexts. Moral rights require creators to be recognized as the creators of their work even after sale. Although economic rights typically end after the first sale, moral rights continue to allow a creator to prevent or restrict modifications to their work even after sale.¹⁶³ These differences will inevitably create challenges based on identification of where the infringement took place, that is, if there is traceability.

There is modest amount of legal precedent with respect to the metaverse and the protection that is afforded to a brand who has an extensive intellectual property portfolio for their tangible assets. Intellectual property rights are focused on protecting intangible aspects of creative work, distinct signs or an intricately technical innovation through governing the ownership of such non-tangible elements of property. IPR protect the *corpus mysticum* (the intangible asset) rather than the *corpus mechanicum* (the physical manifestation of the asset). Within the digital realm, users and creators will need to be consistently mindful of the rights of inventors, innovators, designers, and owners of distinctive signs of intellectual property as they should be in the real world. Following this logic, a rights holder will be entitled to protect their legal rights and proceed with litigation if unauthorized use is found within this space. With regard to NFTs as digital files in which creative works (digital artwork or video) are embedded, if copyright provides exclusive rights over original works of authorship (*corpus mysticum*) and this is distinct from the ownership of any digital object in which the works are embedded (*corpus mechanicum*), then anyone who uses, for example, a sound recording or a clip from a video game in an NFT will need prior authorization from the copyright holder of such work.¹⁶⁴ In this regard, NFTs in theory have the tremendous potential to trace IP more effectively than traditional approaches since NFTs tokenize and register ideas and ownership at its most primary level. Due to the decentralized nature of blockchain technology, NFT content is publicly available on a “distributed, immutable digital

¹⁶¹ Note: Articles L121-1 et seq. of the *Code de la propriété intellectuelle* create moral rights that are perpetual and inalienable, while economic rights are time-limited and transferable to others under contract; these distinctions are reflected in commentary on French authors’ rights.

¹⁶² SACD, “Authors’ rights and their work” (28 March 2017), online: <<https://www.sacd.fr/en/authors-rights-and-their-work>>.

¹⁶³ *Ibid.*

¹⁶⁴ Andy Ramos, “The metaverse, NFTs and IP rights: to regulate or not to regulate?”, (June 2022), online: *WIPO Magazine* <https://www.wipo.int/wipo_magazine/en/2022/02/article_0002.html>.

ledger.”¹⁶⁵ However, there are still challenges of ownership relating to traceability that are yet to be resolved. Brands must be strategic and consider the marks that they use or plan to use in the metaverse, on a related platform and/or on a digital marketplace generally, while being cognizant of potential infringement through their monitoring strategies. Infringing virtual content can damage a brand’s reputation and impact consumers beyond the digital world, which mean it is of the utmost importance for brands operating within this space and using these digital tools to create robust policing and monitoring strategies after obtaining the appropriate registrations.

Another core piece of understanding IPR in a metaverse built on Web3 are the inherent elements of permanence, functionality, and interoperability. Interoperability and functionality of digital elements across platforms are vastly different from how intellectual property is utilized in the physical world. They are not fixed in form and may be altered when moved from one platform to another with the variability of coding on each platform. This may pose a challenge to brand owners as “brand ownership is premised on the owner controlling how, when, and where their brands appear.”¹⁶⁶ As Web3 opens the door to a decentralized ecosystem, brands and users can own, commercialize, and utilize their data but may not be able to control where they appear. Decentralized ecosystems are created through blockchain technology that offers a public and universal platform, through value portability of digital assets, and formalization through smart contracts that facilitate self-executing applications.¹⁶⁷ Although brands may embrace this as a mechanism for further consumer reach and to leverage their existing and new IP assets, challenges arise when user participation in the form of user-generated virtual goods and piracy create vulnerabilities for a brand’s reputation, for infringement, and liability.

We will see further complexities through the roles that intellectual property, including trademarks, copyright, industrial design/design patents play in the metaverse due to the technological advancements of extended reality (XR). The balancing act between applying legal regulatory regimes and creating the opportunity for adequate protection for brands, while also protecting user rights in this space and creating the space for continued technological innovation is a continuous one. It is a delicate and ongoing negotiation between competing priorities. Brands seek to secure and expand their IPR to maintain brand identity, exclusivity and commercial advantage without regulations stifling innovation and limiting protections, while overly lackadaisical rules may lead to market abuses or piracy risks. Conversely, governments and international bodies impose rules to ensure fair competition, consumer protection, and market stability. However, these regulations evolve, and often tighten in response to technological advancements – and such is likely to be the case in metaverse.

¹⁶⁵ News, Zenger, “Metaverse And NFTs Provide Improved Intellectual Property Protections For Brands”, online: *Forbes* <<https://www.forbes.com/sites/zengernews/2022/11/10/metaverse-and-nfts-provide-improved-intellectual-property-protections-for-brands/>>.

¹⁶⁶ Catherine Mateu et al, *White Paper: Trademark in the Metaverse* (International Trademark Association (INTA), 2023).

¹⁶⁷ Elmasry et al, *supra* note 1 at 26.

2.1 The Role of Trademarks in the Metaverse

In the context of the fashion industry, trademark law specifically grants an exclusive right to brands to use the registered trademark and confer protection to a distinguishable sign in relation to the goods and services. The primary objective of a trademark legal framework is to grant rights for the protection of a brand's core identity through the protection of logos, names, combination of words (or slogans), symbols, three-dimensional features, including the shape and packaging of physical goods, non-visible signs such as a sound, melody, haptic sensation, or even fragrances¹⁶⁸, colours, and other distinguishable features of a brand.¹⁶⁹ Design can be deemed to be a trademark if the design or colour alone, for example, has acquired secondary meaning that identifies the brand.¹⁷⁰ Section 2 of Canada's *Trademarks Act* defines trademarks as "(a) a sign or combination of signs that is used or proposed to be used by a person for the purpose of distinguishing or so as to distinguish their goods or services from those of others, or (b) a certification mark."¹⁷¹ Section 2 further defines a sign as "a word, a personal name, a design, a letter, a numeral, a colour, a figurative element, a three-dimensional shape, a hologram, a moving image, a mode of packaging goods, a sound, a scent, a taste, a texture and the positioning of a sign."¹⁷² In contrast, certification mark within the *Act* is defined as "a sign or combination of signs [used for the purposes of distinguishing goods or services]...that are of a defined standard from those that are not of that defined standard, with respect to (a) the character or quality of the goods or services, (b) the working conditions under which the goods are produced or the services performed, (c) the class of persons by whom the goods are produced or the services performed, or (d) the area within which the goods are produced or the services performed."¹⁷³ The relevance of certification marks in this context is that it allows brands or creators in fashion and virtual goods to signal authenticity, quality, or compliance to consumers without asserting full trademark ownership over every use of the mark. This is important in contexts like NFTs or virtual fashion, where multiple parties may produce or trade items under a shared standard, and where distinguishing source (trademark) from certification (standard/quality) clarifies enforcement rights and protects brand integrity.

The Supreme Court of Canada notes that trademarks play a key role in a market economy. In the *Mattel* case, the SCC notes that, "unlike the patent owner or the copyright owner, the owner of a

¹⁶⁸ The EU *Sieckmann* criteria contains stringent conditions that make it difficult to secure registrations for both scents and flavours due to the fact that there would be a lack of clarity and precision in its representation, see *Sieckmann v. Deutsches Patent- und Markenamt*, 2002 E.C.R. I-11737.

¹⁶⁹ "Trademarks", online: WIPO <<https://www.wipo.int/trademarks/en/index.html>>.

¹⁷⁰ *Qualitex v Jacobson Products*, 514 U.S. 159 (1995).

¹⁷¹ *Trademarks Act* R.S.C., 1985, c. T-13, s. 2.

¹⁷² *Ibid.*

¹⁷³ *Ibid.*

trade-mark is not required to provide the public with some novel benefit in exchange for the monopoly...”¹⁷⁴

The trade-mark owner, by contrast, may simply have used a common name as its “mark” to differentiate its wares from those of its competitors. Its claim to monopoly rests not on conferring a benefit on the public in the sense of patents or copyrights but on serving an important public interest in assuring consumers that they are buying from the source from whom they think they are buying and receiving the quality which they associate with that particular trade-mark. Trade-marks thus operate as a kind of shortcut to get consumers to where they want to go, and in that way perform a key function in a market economy. Trade-mark law rests on principles of fair dealing. It is sometimes said to hold the balance between free competition and fair competition. Fairness, of course, requires consideration of the interest of the public and other merchants and the benefits of open competition as well as the interest of the trade-mark owner in protecting its investment in the mark. Care must be taken not to create a zone of exclusivity and protection that overshoots the purpose of trade-mark law.¹⁷⁵

In the case of *Christian Louboutin v. Yves Saint Laurent*, the Court clarified this trademark doctrine relying on *Qualitex v. Jacobson Products* to establish that Louboutin’s single colour on a fashion item, specifically, its recognizable red outsole mark in contrast with the remainder of the shoe, would constitute a trademark.¹⁷⁶ Trademark law in the European Union, completely harmonized through the Trade Mark Directive Article 3, states that trademarks may consist of:

any signs, in particular words, including personal names, or designs, letters, numerals, colours, the shape of goods or of the packaging of goods, or sounds, provided that such signs are capable of: (a) distinguishing the goods or services of one undertaking from those of other undertakings; and (b) being represented on the register in a manner which enables the competent authorities and the public to determine the clear and precise subject matter of the protection afforded to its proprietor.¹⁷⁷

The justification for trademarks in societal public interest is, as Moerland and Kafrouni note, “in the creation of a transparent market that provides the conditions for undistorted competition.”¹⁷⁸ Where distinctive source indications are exclusively linked with goods or services coming from a specific commercial source, only then is the market considered sufficiently transparent. When consumers are able to distinguish one trademarked good from another, the ‘origin function’ is maintained, enabling purchasing decisions to be made effectively based on origin and quality.¹⁷⁹ These rights may be exercised exclusively by the owner or licensed to a third party, provided that such licensees are subject to ongoing quality control and consistency requirements imposed by the rights holder. This licensing structure affords legal certainty as to the authorized use of the mark for enforcement and litigation purposes, while simultaneously reinforcing the rights holder’s market positioning and preserving control over the character, quality, and goodwill associated with the goods or services. This is the case

¹⁷⁴ *Mattel, Inc. v. 3894207 Canada Inc.*, 2006 SCC 22 [Mattel].

¹⁷⁵ *Ibid.*

¹⁷⁶ *Christian Louboutin S.A. v. Yves Saint Laurent Am. Holding, Inc.*, 696 F.3d 206 d Cir. 2012).

¹⁷⁷ Trademark protection in the Member States of the EU coexist with protection through the European Union Trade Mark protection and is valid through the Union as per Council Regulation (EC) No 207/2009 of 26 February 2009 on the Community trade mark (OJ L 78, 24.3.2009, p. 1).

¹⁷⁸ Moerland and Kafrouni, *supra* note 86.

¹⁷⁹ *Ibid.* See also, Case C-102/77 *Hoffmann-La Roche & Co. AG v Centrafarm Vertriebsgesellschaft Pharmazeutischer Erzeugnisse mbH*. [1978] ECR 01139 at para 7.

in the Canada, although with similar equivalent limitations on licensing elsewhere.¹⁸⁰ Once registered domestically, the mark has nationwide exclusivity, and it gives constructive notice to others of the registered right, affording the owner remedies in cases of infringement (unauthorized use of the same mark in association with the same goods or services), misappropriation through confusing use of the mark, or depreciation of the value of the goodwill associated with a well-known mark.¹⁸¹

Trademark infringement is defined as the “unauthorized use of a trademark or service mark in connection with goods and services in a manner that is likely to cause confusion, deception, or a mistake about the source of the mark”, according to the United States Patent and Trademark Office.¹⁸² Trademark law operates to counter unauthorized third-party use of marks by means of causing a reasonable consumer to believe that the owner of the trademark was either the source of the goods/services, that they endorsed or sponsored the goods/services in question, or use that may dilute or disparage the trademark.¹⁸³ According to the United States Patent and Trademark Office (USPTO), trademark infringement is defined as “the unauthorized use of a trademark or service mark in connection with goods and services in a manner that is likely to cause confusion, deception, or a mistake about the source of the mark.”¹⁸⁴ Similarly, a registered EU trademark confers extensive exclusive rights. Article 9(2) of the *European Union Trade Mark Regulations* (EUTMR) provides that a proprietor of an EU mark shall be entitled to prevent third party infringement where:

- a) there is double identity as regards the sign and the EU [trademark] and as regards the goods or services;
- b) the sign and the EU [trademark] are identical or similar and the sign is used in relation to goods or services which are identical or similar if there is a likelihood of confusion, which includes the likelihood of association;
- c) the sign and the EU [trademark] are identical or similar irrespective of the goods or services, where the latter has a reputation in the Union and where the use of that sign without due cause takes unfair advantage of, or is detrimental to, the distinctive character or the repute of the EU [trademark].¹⁸⁵

We will explore some examples of case law relevant to the assessment of trademarks by national offices of Member States within the EU in Chapter 3; however it is important to note that Courts and other regulatory bodies determine not only whether a mark can be registered, but also how “strong” a mark is, which in turn affects the scope of its protection. “As applied to trademarks, the term ‘strength’ can indicate both its “conceptual distinctiveness” and the “actual degree of association consumers perceive

¹⁸⁰ *Trademarks Act* R.S.C., 1985, c. T-13, s. 50.

¹⁸¹ *Trademarks Act* R.S.C., 1985, c. T-13, s. 19, 20, 22. See also, Brian Wassom, Amber Underhill & Andrew Rossow, eds, “Trademark law and the right of publicity in augmented reality” in *Research Handbook on the Law of Virtual and Augmented Reality* (Edward Elgar Publishing, 2018) 192.

¹⁸² 15 U.S.C. § 1114

¹⁸³ Sophie Goossens et al, “Protecting Intellectual Property in the Metaverse” 33:9 Intellectual Property & Technology Law Journal, online: <<https://ezproxy.library.yorku.ca/login?url=https://www.proquest.com/scholarly-journals/protecting-intellectual-property-metaverse/docview/2626963488/se-2>>.

¹⁸⁴ “About Trademark Infringement”, online: *USPTO* <<https://www.uspto.gov/page/about-trademark-infringement>>.

¹⁸⁵ *Regulation (EU) 2017/1001 of the European Parliament and of the Council of 14 June 2017 on the European Union trade mark (codification)*, OJ L 154, 16.6.2017, p. 1–99.

between a mark and the product it signifies”.¹⁸⁶ At the threshold stage, trademark registrability turns principally on distinctiveness. A mark must possess inherent distinctiveness – meaning it is capable of distinguishing the applicant’s goods or services from those of others and functioning as an indicator of source in the marketplace. Therefore, distinctiveness performs a foundational role in trademark law, which is structured to prevent consumer confusion and to safeguard goodwill against unfair competition. From the consumer’s perspective, distinctive signs operate not merely as identifiers of origin, but as shorthand indicators of consistency, reliability, and, in many cases, perceived quality, thereby facilitating efficient market transactions. Section 2 of the Canadian *Trademarks Act* states that a distinctive mark “describes a trademark that actually distinguishes the goods or services in association with which it is used by its owner from the goods or services of others or that is adapted so to distinguish them.”¹⁸⁷ Canadian applications are reviewed from a descriptiveness and distinctiveness perspective, as well as to determine the possibility of confusion with other marks. Distinctiveness is assessed not only by reference to the inherent qualities of the mark, but also through the lens of the average consumer; if – and for so long as – the mark is associated, in the minds of relevant consumers, with the trademark owner as source of the products and services outlined in the registration, then it can be deemed satisfactorily distinctive.¹⁸⁸ This inquiry is both objective and contextual, grounded in marketplace perception rather than the subjective intent of the rights holder. In Canadian law, distinctiveness is therefore dynamic. It may be inherent, as in the case of arbitrary marks, or acquired through use, where descriptive or otherwise non-distinctive signs come to denote a single source through sustained commercial exposure. The continued validity of a trademark therefore depends on its ongoing ability to function as a source identifier in the marketplace. If a mark no longer distinguishes the goods or services of one trader from those of others, it may become susceptible to expungement or invalidation for loss of distinctiveness or its source-indicating function.

At the same time, trademark protection is circumscribed by the functionality doctrine, which prevents the monopolization of features that are primarily developed by technical considerations, thereby preserving the proper boundary between trademark and patent law. It is important to note as well, that in the Canadian context, what is sometimes described in other jurisdictions as “trade dress” protection is more accurately reflected in the concept of a distinguishing guise, which is defined as the shaping of goods or their containers, or a mode of wrapping or packaging, that has acquired distinctiveness. This form of protection traditionally presupposes a three-dimensional, physical configuration associated with goods in commerce, raising conceptual and doctrinal questions as to its applicability in purely virtual environments where goods may lack tangible form. By contrast, U.S. trade dress doctrine under the *Lanham Act*, which protects the total image and overall appearance of a

¹⁸⁶ Wassom et al, *supra* note 181.

¹⁸⁷ *Trademarks Act*, R.S., 1985, c. T-13, s. 12(14), c. 20, s. 318(E).

¹⁸⁸ *Trademarks Act*, R.S., 1985, c. T-13, ss. 12(3), 18(1)(b), 45.

product provided it is distinctive and non-functional, is more readily adaptable to digital goods, including virtual garments, avatar skins, and immersive storefront environments. Importantly, in either jurisdiction, trademark law does not protect extended reality “works” or digital objects per se; rather, it protects the goodwill symbolized by distinctive signs that indicate trade source. Whether operating in physical marketplaces or extended reality platforms, the legal focus remains on whether a sign functions as a source of origin indication in commerce, not on safeguarding the creative or aesthetic content of the underlying digital asset.

The conventional role of trademark rights in protecting virtual elements within the metaverse may potentially encompass various visual forms, including the graphic appearance of virtual goods, avatars and their names, as well as digitally created colors or patterns that mirror the recognizable marks of brands in the real world – so long as these are identified with a particular commercial source. In accordance with section 12 and 16 of the *Trademarks Act*, such visual forms could constitute distinctive trademarks.¹⁸⁹ A trademark, in this context, can serve multiple purposes. For instance, it can be used on a virtual good itself, virtually to promote a physical good, or as an indicator of the source of a digital good or service, adding value to a digital asset that grants access to branded events and memberships. Additionally, trademarks can also function as virtual entities with simultaneous operations in both the virtual and physical worlds. The individual user participating in the digital and real-world can engage in indulging in a branded item or experience in both spaces concurrently, and potentially in a consecutive fashion where one purchase leads to another experience or obtaining an item in either a digital or physical space – so long as the source or is the same (or licensed by same) in the online and offline world. Extended reality technologies have enabled brands to extend their commercial presence within the metaverse, reaching an expanding industry and increasingly sophisticated consumer base. However, this technological advancement simultaneously presents challenges with respect to the intensification of doctrinal and enforcement challenges for rights holders. As an example, virtual goods, avatars, NFTs, and other virtual simulated experiences in the metaverse can closely mirror the real world, but now involve user-generated simulations that may incorporate third-party trademarks and lead to a loss of control over the goodwill associated with marks, confusion in the minds of consumers, or brand dilution. Cybersquatting is also a prominent issue, which occurs when the trademarks protected on physical goods are put into use in the metaverse or virtual reality, but the registrant finds that the brand is being used by a third party and registered in classes that are related to virtual goods. Issues arise where the same trademarks registered on virtual and physical goods now co-exists in the virtual reality but have different ownership, and in different jurisdictions potentially, which causes severe damage to the initial brand owner – difficult then arises in relying on registered marks. Another related

¹⁸⁹ *Trademarks Act*, R.S., 1985, c. T-13, s. 12, s. 16.

challenge is when NFT collections are reproduced and published by third parties. Confusion analysis in such scenarios becomes particularly critical in order to support infringement claims.

Brand owners of registered trademarks are afforded protection against infringement of their mark. This can occur where their mark is used in association with the same goods or services; with respect to consumer confusion in cases where there is confusing similarity between the marks; in certain cases where there is brand dilution by ‘blurring’ (which causes a detriment to distinctiveness) and ‘dilution by tarnishment’ which causes a ‘detriment to repute’, regardless of consumer confusion.¹⁹⁰ In Europe and Canada, protection can also be afforded against uses of the mark that cause an unfair advantage to another (free-riding or parasitic behaviour) irrespective of dilution or confusion.¹⁹¹ These protections and their limitations will be explored further in the next chapter.

Trademark infringement and dilution, and misappropriation, have long applied to physical products within the “real world”, of course, but how these doctrines adapt to the evolving metaverse remains unsettled. Users increasingly sell and purchase virtual goods and NFTs bearing third-party trademarks, and while well-established brands may be able to extend existing rights to such uses, particularly where goods are similar and there is a likelihood of confusion, as in *Hermès v Rothschild*, it is less clear how emerging forms of virtual expression will be treated in the long term. Some commentators have proposed broadening traditional trade dress or “look and feel” protections to encompass “goodwill-generating computer-based works,” but these suggestions remain largely theoretical and lack firm grounding in existing case law or legislation. The current position is that courts and trademark offices will continue to apply traditional source-identification and likelihood-of-confusion standards to virtual goods without formally creating new categories of protection.¹⁹² Trademark law adapts to technological change by focusing on whether use in extended reality constitutes bona fide use in commerce and whether consumers are likely to be confused about source or sponsorship, but the normative case for metaverse-specific doctrines has not yet been substantiated by authoritative judicial precedent, and cross-jurisdictional practice shows a variety of strategic trademark filings, territorial limitations, and ongoing uncertainty about the boundaries of protection in virtual environments.¹⁹³

The international classification of goods and services is performed in accordance with the Nice Classification of Goods and Services, based on the Nice Agreement (established in 1957, amended in

¹⁹⁰ For an in depth discussion of these potential causes of action in the Metaverse, see César Ramírez-Montes, “EU Trademarks in the Metaverse” 63:3 The Law Review of the Franklin Pierce Center for IP 670–672.

¹⁹¹ *Ibid.*

¹⁹² Jack Russo, “Trade dress in virtual worlds” in *Research Handbook on the Law of Virtual and Augmented Reality* (Edward Elgar Publishing, 2018).

¹⁹³ Note: Trademark protections in the metaverse remain tied to traditional use-in-commerce concepts and classifications (e.g., Class 9 for virtual goods) with unresolved questions about territorial scope and analogous application to virtual goods, as explored within this paper, and there is no settled metaverse-specific expansion of trade dress or “look and feel” doctrines.

1979), which ascertains classifications for the purposes of trademark registrations and service marks.¹⁹⁴ The countries party to the Nice Agreement constitute a Special Union within the framework of the Paris Union for the Protection of Industrial Property. They have adopted and applied the Nice Classification for the purposes of the registration of marks and each of the countries party to the Nice Agreement are obliged to apply the Nice Classification in connection with the registration of marks either as the principal classification or as a subsidiary classification. In the context of virtual goods and services, the registered marks, according to WIPO, should be filed under “downloadable virtual goods, namely, virtual clothing” and downloadable digital files authenticated by non-fungible tokens” (class 9¹⁹⁵), retail store services featuring virtual goods (class 35¹⁹⁶), entertainment services (class 41), online non-downloadable virtual goods and NFTs (class 42¹⁹⁷), and/or financial services, including digital tokens (class 36¹⁹⁸).¹⁹⁹ Class 9, for example, encompasses “downloadable virtual goods such as clothing, footwear, bags, computer and phone cases, clutches, purses, eyewear, jewellery, watches, perfumes, etc., for use in online virtual environments”.²⁰⁰ It also includes downloadable multimedia files containing artwork, text, audio, and video relating to fashion, among other products and services. The expanded 12th Edition of the Nice Classification will incorporate these terms to ensure greater clarity, especially regarding NFTs in a digital marketplace. The European Union Intellectual Property Office adds certainty to their definition of NFTs with their update on the new edition of the Nice Classification stating that, “NFTs are treated as unique digital certificates registered in a blockchain, which authenticate digital items but are distinct from those digital items.”²⁰¹ For the Office, the term *non fungible tokens* on its own is unacceptable. The type of digital item authenticated by the NFT must be “specified and aligned with the principles of classification.”²⁰²

¹⁹⁴ “Nice Classification”, online: *WIPO* <<https://www.wipo.int/classifications/nice/nclpub/en/fr/>>.

¹⁹⁵ Example, U.S. Reg. No. 6,731,817: Downloadable multimedia file containing artwork relating to hand-drawn non-generative works authenticated by non-fungible tokens (NFTs); downloadable software for generating non-fungible tokens used with blockchain technology, namely, digital media with blockchain technology for representing a collectible item; downloadable software for generating crypto-collectibles and non-fungible tokens.

¹⁹⁶ A US filing of Class 35 can use language to outline the classification as, marketplaces and exchanges for virtual goods, including NFT exchanges (e.g., the popular platform OpenSea); auction services. Example, U.S. Reg. No. 5,797,815: Providing an online marketplace for buyers and sellers of crypto collectibles; providing an online marketplace for buyers and sellers of blockchain-based non-fungible assets; operating online marketplaces featuring crypto collectibles and blockchain-based non-fungible assets.

¹⁹⁷ Class 42 can also include third-party software providers and back-end blockchain coding services. Example, U.S. Reg. No. 6,007,102: providing user authentication services using blockchain-based software technology for cryptocurrency transactions.

¹⁹⁸ WIPO, *supra* note 169. A US filing of Class 36 can use language to outline the classification as, financial exchange services related to virtual goods; cryptocurrencies; tokenization and fractionation of physical world assets (e.g., real estate or valuable art pieces). Example, U.S. Reg. No. 6,726,315: cryptocurrency exchange services; cryptocurrency exchange services featuring blockchain; cryptocurrency trading services; currency exchange services; financial exchange of virtual currency; financial brokerage services for cryptocurrency trading.

¹⁹⁹ *Ibid.* See also, Park, Kathryn, “Trademarks in the Metaverse”, (March 2022), online: *WIPO Magazine* <https://www.wipo.int/wipo_magazine/en/2022/01/article_0006.html>.

²⁰⁰ WIPO, *supra* note 169.

²⁰¹ “Virtual goods, non-fungible tokens and the metaverse”, (23 June 2022), online: *EUIPO* <https://euipo.europa.eu/ohimportal/en/news-newsflash/-/asset_publisher/JLOyNNwVxGDF/content/pt-virtual-goods-non-fungible-tokens-and-the-metaverse>.

²⁰² *Ibid.*

The metaverse can be regarded as inclusive of both downloadable goods and virtual goods, outlined within the European Union Intellectual Property Office (EUIPO) Trade Mark Guidelines. However, the terms lack sufficient clarity, and they require further specification about the item to which it relates regardless of the class under which it is filed. As noted by EUIPO, “acceptable examples would be *downloadable goods, namely, downloadable multimedia files* in Class 9 or *retail of virtual clothing* in Class 35” or “*downloadable digital art, authenticated by an NFT*” under Class 9; NFTs are assessed as unique digital certificates that record interest in relation to an item (i.e. purported ownership of a digital collectible) relating to “something other than themselves.”²⁰³ Under the new additions, services relating to virtual or downloadable goods or those included within the metaverse as a virtual environment, will be classified with respect to established principles of classification, nature of the service, and will still consider the impact within the real world.²⁰⁴ An illustration of this would be best described concerning transport services in Class 39. While it involves moving goods or individuals to and from physical locations, in the context of a virtual environment, for an emulating transport service moving an avatar from one virtual location to another, the purpose is purely entertainment and would be classified as such – filed under Class 41 (virtual experiences - virtual transport services for gaming purposes).²⁰⁵

However, there are varying jurisdictional divergence on how trademark authorities approach the Nice Classifications in this context. For example, in the United States, the USPTO has taken the position that it is insufficient to file for “non-fungible tokens” alone within Class 9 and instead identifies different formulations that are acceptable that specifically refer to downloadable files that are “authenticated by non-fungible tokens” to demonstrate a coherent scope of goods as understood under existing classification norms.²⁰⁶ In contrast, the Canadian Intellectual Property Office (CIPO) has accepted broader formulations in Class 9, such as “computer software, namely non-fungible tokens for facilitating commercial transactions,” reflecting a more expansive view of digital goods as classifiable under established categories. It is also important to note here that the USPTO has stated that it will not accept identifications that attempt to claim virtual goods in the class of their real-work or physical counterparts.²⁰⁷ It must be registered separately as a virtual good under Class 9, for example, with further clarification. This is still a debated strategy and time will tell if evolved strategies come into play for challenges of overcrowded applications or frustrated clearance searches that may require further uniformity strategies, at minimum. Although WIPO has taken steps to attempt to address the

²⁰³ “EUIPO Guidelines”, online: EUIPO <<https://guidelines.euipo.europa.eu/2058843/2065747/trade-mark-guidelines/6-25-downloadable-goods-and-virtual-goods>>.

²⁰⁴ *Ibid.*

²⁰⁵ *Ibid.* Example, U.S. Reg. No. 6,364,707; providing online augmented reality games; entertainment services, namely, providing online video games; entertainment services, namely, providing online virtual reality environments in which users can interact for recreational and business purposes.

²⁰⁶ INTA, *Trademark in the Metaverse: A Report from INTA* (INTA Emerging Issues Committee, 2023).

²⁰⁷ *Ibid.*

implications of the metaverse, there is still lingering uncertainty for brand owners relying on registrations in jurisdictions where courts do not necessarily review evidence of use.²⁰⁸ This situation is particularly salient in jurisdictions that do not require substantive evidence of use at the examination stage; trademark rights may be granted on a “first to file” basis with minimal scrutiny, such as in countries such as India or China, yet later be vulnerable to cancellation for non-use if the mark is not actually used in connection with the listed goods or services (physical or virtual).²⁰⁹ For further demonstration, the EU Intellectual Property Office (EUIPO) does require evidence of use for opposition or invalidity proceedings, but proof of use is generally not required at the time of registration.²¹⁰ In contrast, jurisdictions such as the United States require proof of “use in commerce” (actual or intended) within set timeframes for registration, and some courts have begun to assess whether virtual goods satisfy this requirement – a threshold that is consistently evolving.

A key question emerges here – will these new additions to the Nice Classifications encompass the complexities that extended reality has to offer, including novel visceral adaptations, blurring the lines between the physical and digital world even further? With the rise of augmented reality enhancing a visceral element to retail in the virtual space, simulations and haptics may need adequate protection just as any other distinctive indicator of source is protected. The International Trademark Association (INTA) adopted the resolution that supported “the recognition and registration of ‘touch’ marks”; however, in practice, “it is very difficult to separate the way something feels from the function that texture performs—and to come up with a texture that is truly “distinctive” of one product as opposed to other brands within the same category of products. That is where haptic AR technologies come in.”²¹¹ A distinctive ‘touch’²¹² through coating of the surface of an item with a synthetic layer by AR technology capable of tricking the mind into thinking it is a different texture would potentially break the relationship between an item’s feel and functionality. Therefore, under trademark law, there should be no conceptual barriers for creators seeking protection for those textures as a source indicator, opening new doors for the role of trademarks in this space.

It is important to distinguish that the key difference between augmented reality and traditional mediums of digital expression is that augmented reality content may inherently be connected to physical spaces and physical items in the real world. Unlike traditional online expression, augmented reality overlays digital content onto identifiable physical spaces and tangible objects, thereby collapsing the

²⁰⁸ Catherine Mateu et al, *supra* note 166.

²⁰⁹ See, Fred Rocafort, “Registering a Trademark in India: What International Businesses Need to Know” (25 August 2025), online: *Harris Sliwoski LLP* <<https://harris-sliwoski.com/blog/registering-a-trademark-in-india-what-international-businesses-need-to-know/>>. See also, “Navigating Trademark “Use” in China: Your Essential Guide” (4 June 2025), online: *Harris Sliwoski LLP* <<https://harris-sliwoski.com/chinalawblog/navigating-trademark-use-in-china-your-essential-guide/>>.

²¹⁰ “Trademark Guidelines - 1.1 Function of proof of use”, online: *European Union Intellectual Property Office Guidelines* <<https://guidelines.euipo.europa.eu/2302857/1984213/trade-mark-guidelines/1-1-function-of-proof-of-use>>.

²¹¹ Wassom et al, *supra* note 167.

²¹² These marks have also been referred to as “touch”, “texture”, “tactile” and “haptic” marks which is consistent with the technological definition of what the process entails and produces.

conceptual boundary between the virtual and the real. As Wassom and others assert, this difference of spatial integration introduces layered liability risks when replicating a trademark in AR, as that connection may possibly confuse consumers into drawing connections between the trademark and the physical location or item that it is digitally associated with.²¹³ When a trademark is digitally superimposed onto a real-world location or object, consumer may reasonably infer an affiliation, endorsement, or sponsorship by the trademark owner. The legal concern is not merely abstract reproduction, but contextual association. For example, this may occur if, in a virtual space, users see a mark displayed on virtual walls associated with the trademark owner, or digitally affixed through an augmented reality interface onto an existing real-world product.²¹⁴ For example, a mark displayed on virtual walls within a mapped physical storefront, or digitally affixed through an AR interface onto an existing real-world product, may create the impression of authorized commercial integration. In these scenarios, the mark is no longer fictional, artistic, or insulated in nature, protected by fair use or creative expression; rather, it risks functioning as a source-indicating commercial sign associated with real world items or locations where the trademark owner has not given consent or license for such association.²¹⁵ This may trigger an infringement case against the designer or platform operators responsible for the augmented reality or metaverse environment due to the potential likelihood of confusion. Therefore, the use of trademarks within AR environments tied to the metaverse may create unique and complex layers of legal issues – ones that have yet to be imagined, particularly where digital overlays appropriate real-world commercial goodwill.

Visual commerce in this regard “requires the tokenization and virtualization of products and services that exist in the real world, which makes NFTs an indispensable element of the metaverse.”²¹⁶ Yet the more closely a virtual object replicates its physical counterpart, the more it implicates trademark and related goodwill interests. At the same time, such digital representations may incorporate expressive or artistic elements, especially in environments such as video games, where fashion brands frequently collaborate or are simulated within immersive platforms such as metaversal interventions. The conceptual challenge lies in delineating when a virtual rendering constitutes protected artistic expression and when it operates as a commercial sign capable of generating consumer confusion. A primary example is the case of *AM General v. Activision Blizzard*. In this case, AM General LLC, manufacturer of the Humvee military vehicles, sued Activision Blizzard (publisher of the video game franchise Call of Duty) alleging trademark infringement for the reproduction of the truck’s design and trademark in Activision’s Call of Duty video game. The court found Activision Blizzard on summary judgment under the First Amendment, articulating that (1) “Defendants uses of Humvees in ‘Call of

²¹³ Wassom et al, *supra* note 167.

²¹⁴ *Ibid.*

²¹⁵ *Ibid.*

²¹⁶ Dóra Petrányi, Katalin Horváth & Márton Domokos, “Legal issues in the metaverse / Part 2 - Trademarks and copyright, NFTs and civil law principles in the metaverse”, (19 July 2022), online: *Lexology* <<https://www.lexology.com/library/detail.aspx?g=f72f2ced-454c-4cff-8c9e-a7cb872abc44>>.

Duty’ games have artistic relevance,” and that (2) “featuring actual vehicles used by military operations around the world in video games about simulated modern warfare surely evokes a sense of realism and lifelikeness.”²¹⁷ In the *A.M. General v Activision* case, the Court applied a test that allows for use of a trademark as long as the trademark was not mistakenly identified. It was found that the use of Humvee was integral to the video game as essential to the artistic experience and did not violate the Lanham Act. The use therefore met the ‘Rogers Test’, a test to determine whether the reproduction of a trademark in an artistic context necessitates prior authorization (a relevant concept which will be examined further in chapter three of this thesis).

Jack Daniel’s Properties, Inc. v. VIP Products LLC. refines, but does not eliminate the analytical framework within which *AM General v. Activision* was decided. In *Jack Daniel’s*, the Court clarified that the Rogers test does not apply where the accused use of a mark functions “as a mark”, that is, where the defendant uses the designation to identify the source of its own goods.²¹⁸ Where the challenged use is source-identifying, ordinary likelihood-of-confusion principles govern. This clarification would likely leave the Humvee scenario intact. Activision’s depiction of Humvees served a referential and artistic function within a realistic military simulation and did not operate as a brand identifier for Activision’s own goods. The vehicles enhanced expressive realism, but they did not signal that the video game originated from, or was sponsored by, AM General. However, the theoretical boundary becomes blurred in metaverse environments where digital objects are independently monetized. If a platform were to sell downloadable digital vehicles branded as “Humvees,” or tokenize virtual military trucks bearing the Humvee mark as standalone virtual goods, such use could plausibly be characterized as trademark use in commerce rather than purely artistic reference. In that context, the mark may function to designate the source, authenticity, or sponsorship of the digital product itself, thereby displacing Rogers and triggering conventional infringement analysis. Similarly, the use of real-world marks in virtual storefronts, avatar skins, or interoperable digital merchandise offered for purchase may fall outside expressive protection if the mark operates as a commercial source indicator. Thus, while *Jack Daniel’s* narrows the automatic invocation of Rogers, it does not completely foreclose expressive defenses in immersive media; rather, it sharpens the inquiry into whether the mark is used artistically to convey realism or narratively relevant context, or instead used as a source-identifying device in the marketplace for virtual goods.

The expansion of branded activity into immersive digital environments has intensified scrutiny of how trademark rights apply within the metaverse, particularly where protection relies on unregistered or common law marks. Unlike registered trademarks, which benefit from statutory presumptions of validity and clearer territorial scope, enforcement of unregistered marks requires the claimant to

²¹⁷ *AM Gen. LLC v Activision Blizzard, Inc.*, 450 F. Supp. 3d 467 (S.D.N.Y. 2020).

²¹⁸ *Jack Daniel’s Properties, Inc. v. VIP Products LLC*, *supra* note 151.

establish reputation, goodwill, and consumer confusion within a relevant jurisdiction, which is an evidentiary burden that becomes considerably more complex in decentralized virtual environments.²¹⁹ Platforms operating across global networks complicate the demonstration of goodwill in a specific market, the identification of consumer confusion among users interacting through avatars, and the proof of reputational harm attributable to conduct occurring on borderless digital infrastructures. These challenges are compounded by the fact that trademark registrations covering physical goods do not automatically extend to virtual goods or services, requiring brands to proactively secure protection across multiple classifications. For example, virtual goods are commonly registered under Class 9 of the Nice Classification, encompassing “...digital tokens and non-fungible tokens (NFTs); downloadable digital collectibles; downloadable interactive characters, avatars and skins; downloadable virtual goods; downloadable digital art,...clothing,...all displayed and used online and in virtual environments.”²²⁰ By contrast, equivalent physical goods require separate registration, such as Class 18 for leather handbags, while the operation of a virtual marketplace may fall within Class 35 and immersive fashion-related entertainment services within Class 41, including: “Arranging and conducting exhibitions in the field of fashion for entertainment purposes; entertainment services in the nature of social club services in the field of fashion; presentation of live performances in the field of fashion; entertainment services, namely, providing online, non-downloadable virtual art, photographs, images, animation, videos, clothing, outerwear, headwear, footwear, handbags, wallets, luggage, cosmetics, perfumery, and jewellery for use in virtual environments.”²²¹ At the same time, the growing reliance on blockchain technologies introduces an additional layer of complexity. While blockchain infrastructure enables brands to commercialize digital assets, including NFTs and tokenized goods, and to automate transactions through smart contracts, it also exposes brand owners to heightened vulnerabilities.²²² The public and immutable nature of blockchain records, combined with the rapid proliferation of tokenized assets and decentralized marketplaces, increases the risk of unauthorized uses of trademarks and other intellectual property. Consequently, as brands adopt blockchain technologies to manage digital assets and create new forms of consumer engagement, the need to secure robust trademark protection across both physical and virtual markets becomes increasingly paramount.

Considerations of traditional infringement claims come into question in this environment just as much as, if not more than, in the real world particularly with respect to a likelihood of confusion analysis. This is where ‘cybersquatting’ may occur, as described earlier, where the trademark protected on physical goods are put into use in a virtual reality, but it is found that the brand is already being used

²¹⁹ *Kirkbi AG v Ritvik Holdings Inc*, 2005 SCC 65 at paras 66–67.

²²⁰ World Intellectual Property Organization, *Nice Classification of Goods and Services for the Purposes of the Registration of Marks*, 12th ed (Geneva: WIPO, 2024), Class 9 explanatory notes. See also International Trademark Association, *NFTs and Trademarks: Brand Protection in the Metaverse* (2022).

²²¹ World Intellectual Property Organization, *Nice Classification* (Classes 18, 35, and 41). See also, *supra* note 206.

²²² World Intellectual Property Organization, *Intellectual Property and Blockchain: A WIPO White Paper* (Geneva: WIPO, 2022) at 9–13.

by a third party registered in classes related to virtual goods with different ownership and possibly in different jurisdictions. Additionally, the above argument assesses whether consumers are likely to incorrectly assume that the tangible goods are affiliated with, for example, NFT collections being created and published by others. Even if consumers conduct their due diligence and determine that the brand owner is not the creator of the NFTs or related digital content, it may still be possible that some may assume a licensing or partnership exists between both parties. If this is the case, not only can this produce confusion, thereby harming consumers who may assume they are buying digital assets from the traditional, real-world source with which they are familiar, but it may also harm the brand owner by diverting trade in virtual assets, potentially lessening goodwill, and leading to brand dilution for a brand originating in the physical world.²²³ Brand dilution is therefore another reason for intellectual property protection to intervene within this space. Generally, the principles founding anti-dilution assert that brands should be protected against the tarnishing or blurring of a widely recognizable trademark due to unauthorized use which as result, weakens the value or quality of the mark. Under the U.S. *Federal Trademark Anti-Dilution Act* for example, dilution may be applicable even when a reasonable consumer is not confused as to the source of the goods or services, similar to a copyright claim. Chapter three will raise more specific inquiries concerning dilution and depreciation liability, as well as consumer confusion, passing off and equitable relief, which will be evaluated based on their implications on a case-by-case basis. However, it is important to note from the offset that protection against dilution is a significant part of the role that trademark law plays in this space, as the negative effects of commercial impairment to brand value can be catastrophic if the blurring or tarnishing of the mark is substantial enough.

2.2 The Role of Copyright in the Metaverse

Although many paradigm-shifting technologies have come to fruition since the inception of copyright in the eighteenth century, the fashion industry's expansion into the metaverse represents a particularly significant development in the evolution of consumer-brand interaction. Immersive virtual environments have enabled fashion houses to introduce new forms of digital expression, virtual goods, and interactive brand experiences. However, by consequence, these developments generate novel intellectual property considerations, particularly in relation to the application of copyright doctrines. While there are policy nuances and procedural differences across jurisdictions, the intellectual property frameworks of Canada, the United States, and Europe generally share common objectives: protecting creative expression, fostering innovation within competitive markets, maintaining the integrity of commercial identifiers, and the prevention of consumer deception. How these objectives are

²²³ "Non-Fungible Tokens, Record-Breaking Applications & the Counterfeit Implications of the Metaverse: Part 1", online: <<https://ipic.ca/english/blog/non-fungible-tokens-record-breaking-applications-the-counterfeit-implications-of-the-metaverse-part-1-2022-06-03>>.

operationalised, however, varies in ways that carry meaningful consequences for fashion brands navigating an increasingly borderless digital environment. The emergence of metaverse-based commerce and digital fashion therefore raises not only questions about the adequacy of existing legal doctrines, but also about how these shared objectives can be effectively realized in technologically mediated environments that transcend traditional territorial boundaries.

A foundational objective of a copyright legal framework is to grant rights to owners of original works. In section 3(1) of Canada’s *Copyright Act*, copyright is defined as the “sole right to produce or reproduce the work or any substantial part thereof in any material form whatever, to perform the work or any substantial part thereof in public or, if the work is unpublished, to publish the work or any substantial part thereof.”²²⁴ The Supreme Court of Canada has described copyright’s purpose as “a balance between promoting the public interest in the encouragement and dissemination of works of the arts and intellect and obtaining a just reward for the creator.”²²⁵ Further, the Supreme Court recently expanded this explanation, stating: “[J]ust rewards for copyright creators provide necessary incentives, ensuring that there is a steady flow of creative works injected into the public sphere [...] A proper balance ensures that creators’ rights are recognized, but authorial control is not privileged over the public interest.”²²⁶

Similarly, the U.S. Supreme Court holds firm to their understanding that, “the primary objective of copyright is not to reward the labour of authors, but ‘[t]o promote the Progress of Science and useful Arts’.”²²⁷ In *Google LLC v Oracle*, the Supreme Court purported that “creative ‘progress’ [was] the basic constitutional objective of copyright itself.”²²⁸ The Supreme Court solidified this framework much earlier in its 1975 decision in *Twentieth Century Music Corp. v. Aiken*: “The immediate effect of our copyright law is to secure a fair return for an ‘author’s’ creative labor. But the ultimate aim is, by this incentive, to stimulate artistic creativity for the general public good.”²²⁹ A comparable articulation of copyright’s underlying purpose can be observed within the European legal framework. Under European Union law, copyright protection is grounded in the recognition that authors are entitled to an appropriate reward for the use of their works while simultaneously facilitating the dissemination of cultural and intellectual production within the internal market. Although the European Union does not codify a single comprehensive copyright statute, directives adopted by the European Parliament and Council, together with the jurisprudence of the Court of Justice of the European Union, establish the foundation of protection. In particular, copyright is maintained in “works” that constitute the author’s own

²²⁴ *Copyright Act* RSC 1985 c C-42 (“CRA”).

²²⁵ *Théberge v Galerie d’Art du Petit Champlain Inc.* [2002] SCR 34 at para 11–12, 30.

²²⁶ *York University v Canadian Copyright Licensing Agency (Access Copyright)*, 2021 SCC 32 at para 93–4.

²²⁷ *Feist Publications Inc. v Rural Telephone Service Co. Inc.*, 499 US 340 (1991) at 349–50, quoting US Constitution art. I, § 8, cl 8 [*Feist Publications*].

²²⁸ *Google LLC v Oracle America, Inc.*, 593 US 25 (2021).

²²⁹ *Twentieth Century Music Corp. v. Aiken*, 422 US 151, 156 (1975).

intellectual creation, a standard repeatedly affirmed by the Court of Justice as the central criterion for originality within EU law.

Copyright protection for works created or circulated within the metaverse does not arise from a distinct legal regime; rather, it derives from the same foundational principles that govern copyright across traditional and digital contexts. Authors are granted exclusive rights to reproduce their work, create derivative works, and distribute it within the digital space. These economic rights can also be assigned or licensed to a third party to permit the use of their work subject to whatever conditions the owner chooses to impose. Central among these principles is the requirement of originality, which functions as a threshold condition for protection across major jurisdictions, albeit with nuanced doctrinal formulations. In Canada, the Supreme Court in *CCH Canadian Ltd v Law Society of Upper Canada* held that a work is original where it results from the exercise of “skill and judgment,” meaning intellectual effort that is not purely “mechanical” or “trivial”, rejecting both the “sweat of the brow” test (rewarding mere effort) and the heightened “creativity” requirement.²³⁰ United States jurisprudence follows a closely related standard, requiring that a work contain a modicum of creativity, a formulation famously articulated in *Feist Publications Inc v Rural Telephone Service Co.* Article I, Section 8 of the U.S. Constitution, as highlighted in the *Feist Publication* case, interpreted the concept of “authorship” as implying that copyright subsists only in independently created works possessing at least minimal creative expression.²³¹ The Court in this case outlined that the assessment of original expression is typically determined by, firstly, if the work has been created independently and not simply been copied from another source.²³² Second, even if created independently, the next question asked is, “does the work have more than a *de minimis* level of creativity, that is, is the work more than ‘garden variety,’ not ‘so mechanical or routine as to require no creativity whatsoever,’ not to ‘devoid of even the slightest trace of creativity,’ and not one ‘in which the creative spark is utterly lacking or so trivial as to be virtually nonexistent’?”²³³

Within the European Union, the Court of Justice has similarly developed the concept of originality through the requirement that a work reflect the author’s own intellectual creation, a standard that has become the unifying principle of EU copyright law. In decisions such as *Infopaq International A/S v Danske Dagblades Forening*, the Court clarified that copyright protects elements of a work that reflect the author’s creative choices and intellectual effort, provided that those elements embody the

²³⁰ *CH Canadian Ltd. v. Law Society of Upper Canada*, 2004 SCC 13, 1 S.C.R. 339.

²³¹ *Feist Publications*, *supra* note 227.

²³² *Ibid.*

²³³ *Ibid.* The authors recognize these principles with respect to software interfaces, however, they have been noted for their applicability to virtual assets within computer programs or metaverse platforms as is relevant within the scope of copyrightability within the metaverse. It is also important to note that industry standards within this evolving space may prove to develop common elements over time which may sometimes be considered unprotected under the copyright *scènes a faire* doctrine.

author's own intellectual creation.²³⁴ This principle was further elaborated on in *Painer v Standard VerlagsGmbH*, where the Court emphasized that originality arises where an author is able to express creative freedom through personal choices in the production of the work.²³⁵ At the same time, European copyright law seeks to preserve a balance between authorial rights and broader public interests, including access to information, cultural participation, and the functioning of the digital single market. Therefore, EU copyright directives and related jurisprudence recognize a range of limitations and exceptions designed to maintain this equilibrium while ensuring that creators receive appropriate remuneration for the exploitation of their works. In this respect, the European approach, much like those of Canada and the United States, reflects a shared normative objective: to incentivize creative production while enabling the circulation of knowledge and culture within an increasingly interconnected digital environment.

The metaverse has arguably transformed the scope of creativity in its application to the fashion industry, with the 'modicum' of creativity requirement may be more likely to be met due to the substantial innovations in digital art and fashion at we see developed in this space, offering authors copyrightable expression. The rationale behind the U.S. *Feist Publications* ruling showed that the *Copyright Act* (U.S.) could in fact substantially support the holdings of the court and may therefore be flexible in its application of standards in making determinations of originality or infringing reproduction, such as digital misappropriation of a digital asset, in the context of brands active within the metaverse.²³⁶ Although modest, this threshold allows courts to recognize copyright in a wide range of creative expressions, including digital works that reflect even minimal artistic judgment. In practice, this standard enables courts to apply established doctrines of originality and infringing reproduction to emerging technological contexts without requiring new statutory frameworks. As a result, copyright law is capable of accommodating disputes involving digital artifacts and creative assets circulating within virtual environments, including those developed and commercialized by fashion brands. Brands may in this scenario have their copyrighted works used without their permission in the metaverse, causing damage to the brand due to the misrepresentation.

In the fashion context, this doctrinal framework becomes particularly pertinent when considering how branded creative works may circulate within virtual platforms. One might imagine a scenario in which an actor operating within a metaverse environment reproduces a copyrightable fashion design, logo, or digital garment originally created by a brand without securing authorization from the relevant rights holder. Such conduct could occur, for example, where a user uploads or distributes a virtual version of a branded product design for use by avatars within a virtual marketplace

²³⁴ *Infopaq International A/S v Danske Dagblades Forening*, Case C-5/08, [2009] ECR I-6569 [*Infopaq International*]

²³⁵ *Painer v Standard VerlagsGmbH*, Case C-145/10, [2011] ECR I-12533.

²³⁶ *Ibid.*

or gaming platform. Even where the reproduction occurs entirely within a digital ecosystem, the unauthorized use of a protected work may still constitute infringing reproduction if a substantial part of the original expression has been copied. In this sense, the migration of fashion assets into the metaverse does not fundamentally alter the underlying principles of copyright law, but rather extends their application to new forms of digital misappropriation that may affect both the economic interests and reputational integrity of fashion brands.

Although the precise articulation of originality varies across jurisdictions, the Canadian, American, and European copyright frameworks converge around a relatively low threshold for protection. In Canada, the Supreme Court in *CCH Canadian Ltd v Law Society of Upper Canada* held that a work will be considered original where it reflects the exercise of “skill and judgment,” meaning intellectual effort that is neither purely mechanical nor trivial.²³⁷ United States jurisprudence similarly recognizes originality where a work contains a minimal degree of creative expression, a formulation articulated by the Supreme Court in *Feist Publications* as requiring only a “modicum of creativity.”²³⁸ European Union law adopts a comparable approach, requiring that a protected work constitute the author’s own intellectual creation, a standard consistently affirmed by the Court of Justice of the European Union in decisions such as *Infopaq International A/S v Danske Dagblades Forening* and *Painer v Standard VerlagsGmbH*.²³⁹ Despite these doctrinal variations, the threshold for originality across these jurisdictions remains deliberately modest, ensuring that copyright protection attaches to a broad range of expressive works from the moment of their creation.

Importantly, however, the Canadian copyright framework adopts a more restrictive approach in relation to utilitarian works of applied art, including many forms of fashion design. While fashion designs may initially qualify for copyright protection upon creation by satisfying the originality requirement articulated in *CCH*, this protection may be curtailed where the design is reproduced in significant quantities. Under section 64(2) of the Copyright Act (Canada), copyright protection is generally unavailable for designs applied to useful articles once the article has been reproduced more than fifty times.²⁴⁰ At that stage, the design effectively transitions into the domain of industrial design protection, requiring registration under the industrial design regime in order to secure continued legal protection. This statutory carve-out reflects a long-standing policy distinction in Canadian intellectual property law between artistic expression and mass-produced utilitarian objects, with fashion designs often occupying an uncertain position at the intersection of these two categories. Significantly, this limitation may operate differently in digital environments. Virtual fashion items and purely digital garments that exist only within virtual platforms or the metaverse may not constitute “useful articles”

²³⁷ *CH Canadian Ltd. v. Law Society of Upper Canada*, *supra* note 230.

²³⁸ *Feist Publications*, *supra* note 227.

²³⁹ *Painer v Standard VerlagsGmbH*, *supra* note 235. See also, *Infopac International*, *supra* note 234.

²⁴⁰ *Copyright Act* RSC 1985 c C-42, s. 64(2).

in the same sense as physical clothing. As a result, such digital designs may remain within the copyright regime without triggering the mass-production limitation that applies to physical fashion goods, potentially affording broader and longer-lasting protection to digital fashion creations.

Within the European Union, by contrast, the originality requirement has been interpreted more expansively in the context of works of applied art, including clothing and product design. In *Cofemel – Sociedade de Vestuário SA v G-Star Raw CV*, the Court of Justice of the European Union held that clothing designs may receive copyright protection provided that they satisfy the general EU originality standard, rejecting the notion that works of applied art must demonstrate any additional aesthetic or artistic merit.²⁴¹ Copyright protection therefore depends solely on whether the work reflects the author's own intellectual creation. This approach was further refined in *Brompton Bicycle Ltd v Chedech/Get2Get*, where the Court confirmed that objects possessing functional characteristics may nevertheless qualify for copyright protection where the designer exercised free and creative choices in determining the product's appearance.²⁴² Together, these decisions underscore that the originality requirement applies uniformly across artistic and functional domains, provided that the resulting work reflects creative freedom rather than purely technical constraints.

Recent litigation involving Birkenstock sandals illustrates how these principles are applied by national courts within the EU copyright framework. In 2025, the German Federal Court of Justice concluded that several Birkenstock sandal models did not qualify for copyright protection as works of applied art because their form was largely dictated by functional and ergonomic considerations rather than independent artistic expression.²⁴³ The German Federal Court of Justice's decision contributes significantly to the post-*Cofemel* development of EU case law on the copyright protection of works of applied art since the Court held that originality requires demonstrable creative choices reflecting the author's intellectual input, rather than aesthetic appeal, cultural significance, or commercial success. While retaining traditional terminology such as "artistic achievement," the judgment interprets these concepts through the framework established by the Court of Justice of the European Union, placing a clear evidentiary burden on claimants to demonstrate creative freedom and illustrating how national courts reconcile domestic legal language with harmonized EU standards. By contrast, a Dutch court reached a different conclusion in related proceedings, ordering a retailer to cease selling copies of certain Birkenstock models after determining that those designs could qualify for copyright protection under the EU originality standard.²⁴⁴ These divergent outcomes highlight an important characteristic of the European copyright system: although the definition of a protected "work" is harmonized at the EU

²⁴¹ *Cofemel – Sociedade de Vestuário SA v G-Star Raw CV*, *supra* note 155.

²⁴² *SI and Brompton Bicycle Ltd v Chedech/Get2Get*, *supra* note 156.

²⁴³ Bundesgerichtshof [BGH], I ZR 16/24; I ZR 17/24; I ZR 18/24, 20 February 2025.

²⁴⁴ *Birkenstock IP GmbH v Scapino Retail BV*, ECLI:NL:RBMNE:2025:5837 (Rechtbank Midden-Nederland [District Court of Midden-Netherlands], 12 November 2025).

level, the factual determination of whether a particular design reflects the author's own intellectual creation remains a matter for national courts.²⁴⁵

Against this doctrinal background, the migration of fashion designs into virtual environments raises additional questions regarding how these principles apply to digital artifacts circulating within the metaverse. Virtual garments, branded avatar accessories, and tokenized fashion assets may incorporate expressive design choices analogous to those embodied in physical products, thereby satisfying the originality threshold recognized across Canada, the United States, and the European Union. At the same time, the digital nature of these assets complicates the assessment of infringement, particularly where reproductions occur through user-generated content on decentralized platforms or through blockchain-based distribution of digital goods. In such circumstances, the core inquiry remains whether a substantial part of the original expressive work has been reproduced without authorization. The technological environment in which these reproductions occur may therefore introduce novel evidentiary and enforcement challenges, but it does not fundamentally alter the doctrinal principles governing copyright protection of creative works in the fashion industry.

The introduction of the role of copyright law in this industry and in this context would be remiss not to call attention to the U.S. *Star Athletica* case which was monumental for the fashion industry in North America that essentially underscored the historical inconsistencies and uncertainty of copyright law in this industry. *Star Athletica* in this case argued that clothing designs were not copyrightable since its aesthetic designs were linked to their utilitarian purpose as a uniform. This case held that certain artistic features of a design on a useful article could be afforded protection if the feature:

(1) can be perceived as a two- or three-dimensional work of art separate from the useful article, and (2) would qualify as a protectable pictorial, graphic, or sculptural work either on its own or fixed in some other tangible medium of expression if it were imagined separately from the useful article into which it is incorporated.²⁴⁶

In accordance with this finding, the inclusion of patterns and graphics within a design may warrant protection, alongside any sculptural elements affixed to the garment. Importantly, however, the *Star Athletica* decision does not suggest that the design of a garment is categorically excluded from copyright protection. Rather, protection may extend to elements of the design that embody separable artistic expression, even where those elements are incorporated into a functional article. Comparable principles appear across other jurisdictions. In the European Union, clothing designs may qualify for copyright protection as works of applied art where they meet the originality standard of the author's own intellectual creation, as articulated in cases such as *Cofemel*. In Canada, as noted previously, originality is assessed according to the "skill and judgment" standard, meaning that expressive design features

²⁴⁵ TFL, "Dutch Court Sides With Birkenstock in Sandals Copyright Battle" (14 November 2025), online: *The Fashion Law* <<https://www.thefashionlaw.com/dutch-court-sides-with-birkenstock-in-sandals-copyright-battle/>>.

²⁴⁶ *Star Athletica, L.L.C. v. Varsity Brands, Inc.*, 137 S. Ct. 1002 (2017) [*Star Athletica*].

incorporated into fashion items may likewise attract copyright protection where they reflect sufficient intellectual effort.

Moreover, the obstacle of the "useful article" doctrine, which precludes protection for the majority of tangible fashion designs, does not necessarily pose a hindrance to digital fashion, characterized by two- or three-dimensional visual works rather than functional clothing items, provided it meets the criteria of a pictorial or graphic work outlined in the *Copyright Act*. This differentiation suggests that, given an original digital dress design exhibiting a minimum degree of creativity surpassing that of a conventional dress design, acquiring IP protection for a digital design might prove relatively more straightforward compared to its physical equivalent, by circumventing the functionality constraint. In Canada, this distinction may be even more pronounced due to the statutory carve-out for industrial designs contained in the *Copyright Act*. As noted, under section 64, copyright protection for designs applied to useful articles generally ceases once the article has been reproduced more than fifty times, at which point protection must instead be sought through the industrial design regime. This limitation is tied to the statutory definition of an "Article," defined in section 64(1) as "any thing that is made by hand, tool or machine."²⁴⁷ Whether a purely digital fashion asset constitutes such a "thing" remains uncertain. Virtual garments, avatar accessories, and other metaverse-based fashion items may not possess the functional characteristics associated with physical clothing and may therefore fall outside the scope of the industrial design carve-out. As a result, digital fashion designs may be capable of maintaining copyright protection in circumstances where their physical counterparts would lose such protection once mass-produced.

Emerging litigation suggests that courts may increasingly confront these definitional questions. For example, in *Getty Images (US) Inc v Stability AI Ltd*, the court considered whether an "article" under copyright legislation could include intangible digital files, signalling the growing relevance of these issues for the protection of creative works in digital environments.²⁴⁸ This raises a particularly interesting doctrinal question when copyright protection for digital fashion designs is compared with the treatment of physical fashion designs under Canadian law. If a digital garment design qualifies for copyright protection as a pictorial or graphic work, and if it falls outside the industrial design carve-out because it is not a "useful article" within the meaning of the *Copyright Act*, the resulting protection could be broader than that afforded to many physical fashion designs. In such a scenario, the copyright subsisting in the digital design (i.e. existing initially as a virtual asset of three-dimensional model) would protect the underlying artistic expression embodied in the work itself, irrespective of the medium in which it is reproduced. If that protected digital design were then reproduced in the physical world,

²⁴⁷ *Copyright Act* RSC 1985 c C-42, s. 64(1).

²⁴⁸ *Getty Images (US) Inc v Stability AI Ltd*, [2023] EWHC 3090 (Ch) (High Court of Justice (England and Wales), Chancery Division).

by manufacturing a real garment that copies the digital design, the resulting object could arguably constitute an infringing reproduction of the original artistic work. In other words, it is conceivable that a real-world copy of a digital fashion design might infringe copyright, whereas a real-world copy of an equivalent physical fashion design might not, because the latter may already have fallen outside the scope of copyright protection through the operation of the industrial design carve-out.

While this possibility remains largely theoretical, it highlights how the migration of fashion into digital environments may disrupt the traditional boundaries between copyright and industrial design law. Courts across jurisdictions have struggled to reconcile the functional character of garments with the protection of artistic expression, producing doctrinal tests such as conceptual separability in the United States and statutory limitations such as the industrial design carve-out in Canada. These frameworks, however, were largely developed with physical fashion objects in mind. As courts increasingly confront disputes involving virtual garments, NFTs, and other digital fashion assets, they may need to reconsider how statutory concepts such as “useful articles,” “reproduction,” and “articles made by hand, tool, or machine” apply to creative works that originate in virtual environments but later manifest in physical form. It also suggests that the legal characterization of digital files and virtual assets will play an increasingly important role in determining the scope of copyright protection in the emerging metaverse economy. The migration of fashion into digital environments therefore raises a prior and more fundamental question: to what extent do the legal descriptions of copyrightable fashion goods translate to virtual fashion goods at all? Unlike physical garments, virtual fashion items are not necessarily constrained by utilitarian function and often exist as purely expressive digital objects composed of visual design, software code, and interactive elements. As a result, the protection of digital fashion may not depend solely on the copyright status of the garment design itself, but also on the protection afforded to the digital architecture through which the work is created and experienced. This shift suggests that copyright analysis in the metaverse may increasingly resemble the treatment of complex multimedia works such as video games, where protection arises across multiple creative layers rather than from a single physical object.

Further, recent exemplary copyright protection established within the fashion industry against copying and piracy is found in French legislation. This thesis focuses on French law not because it is necessarily unique among European jurisdictions, but because of the abundance of multinational luxury brands operating out of France historically. Article 112-2 of the *Code de la Propriété Intellectuelle* provides a list of copyrightable fashion goods. It states, “Seasonal clothing and adornment industries are deemed to be those industries which, due to the requirements of fashion, frequently renew the form of their products, and in particular sewing, fur, lingerie, embroidery, fashion, shoes, gloves, leather goods, the manufacture of high-end or special haute couture fabrics, the production of adornments and

bootmakers and the factories of upholstery fabrics.”²⁴⁹ Article L111-1 of the *Code* stipulates that within these industries, “the author of a work of the mind enjoys on this work, by the mere fact of its creation, an exclusive intangible property right and enforceable against all. This right includes intellectual and moral attributes as well as patrimonial attributes.”²⁵⁰ It protects “the rights of authors in all works of the mind, whatever their genre, form of expression, merit or destination.”²⁵¹ In practice, this means that many fashion creations may qualify for copyright protection at the moment of their creation, provided they meet the originality threshold recognized across European copyright jurisprudence. While similar principles of copyright apply in other jurisdictions, including Canada and the US, the French framework has historically been significant for the fashion industry due to its explicit recognition of a wide range of fashion goods and its longstanding commercial centrality.

In this respect, it can also provide us with an interesting assessment of the legal protections of the metaverse in terms of its application of video games as multimedia creations. Similarly, the metaverse allows for the simultaneous uses of multiple reproduction methods, including sounds, text, and digital images. The French *Cryo* judgement of the Cour de cassation (“complex works”), determined that protections within video games are made in a distributive manner where each element can be protected individually (i.e. code, script, database) by copyright, as long as it fulfils the condition of originality.²⁵² The court in this judgement held that “...a video game is a complex work that cannot be reduced to its software dimension alone, regardless of its importance, so that each of its components is subject to the regime applicable to it according to its nature.”²⁵³ French law recognizes originality in the individual creative processes of digital creations. Under this reasoning, creative elements such as software code, graphical interfaces, scripts, and audiovisual components may each attract copyright protection as separate works. Although the case arose in the context of video games rather than fashion, its reasoning provides a useful conceptual framework for understanding the protection of creative works within the metaverse. Virtual fashion designs similarly exist within digital ecosystems composed of multiple creative layers, suggesting that copyright protection may arise not only in the visual design of the garment itself but also in the code, digital models, and interface structures that enable its existence within a virtual environment. In this respect, the legal analysis of digital fashion may increasingly resemble that applied to multimedia creations such as video games, where protection is distributed across the different creative components that collectively produce the user’s experience.

²⁴⁹ France, Article L112-2 CPI.

²⁵⁰ France, Article L111-1 CPI.

²⁵¹ France, Article L112-1 CPI.

²⁵² Cour de cassation (1re civ), 25 June 2009, no 07-20.387, arrêt no 732.

²⁵³ *Ibid.* See also, Karine Disfier-Mikus & Marguerite Senard, “Copyright 2023 - France”, online: *Chambers and Partners Global Practice Guides* <<https://practiceguides.chambers.com/practice-guides/copyright-2023/france/trends-and-developments>>.

Originality is a central criterion for copyright protection under EU law, including the *InfoSoc Directive*: if a digital asset or design meets the originality threshold, it is treated as an artistic work and protected accordingly.²⁵⁴ It may be a persuasive argument to consider all digital fashion (or digital designs) as computer programs under the Directive on the Legal Protection of Computer Programs (“Software Directive”), treating them as literary works with functional and visual elements.²⁵⁵ However, the elements to which the Software Directive refers to are determined by the code and not by the human designer, therefore, they may need to be treated independently.²⁵⁶ This view is also supported by the CJEU case *Nintendo v PC Box* which states that analogous video games, “constitute complex matter comprising not only of a computer program, but also graphic and sound elements, which, although encrypted in computer language, have a unique creative value which cannot be reduced to that encryption. In so far as the parts of a videogame, in this case, the graphic and sound elements, are part of its originality, they are protected, together with the entire work, by copyright in the context of the system established by *Directive 2001/29*.”²⁵⁷ Digital designs in this capacity would likely meet the requirements of originality with respect to exhibiting creative expression, but further, may actually be better regarded as separate artistic works in their own right as visually perceived, despite being developed through coding. However, although the graphical user interfaces (GUIs) may be categorized as protectable by copyright, the specific design elements may lack originality and may not be protected in practice.²⁵⁸ Nevertheless, the scope is substantially broad as the CJEU takes an “abstract” approach to protection, broadening the safeguards for digital designs, and by extension, digital use of non-digital designs can be considered as infringement as well.^{259 260}

In comparable jurisdictions outside the EU, courts have also recognized expressive elements of video games and interfaces as protectable beyond mere functional code. In the United States, for example, *Tetris Holding, LLC v. Xio Interactive, Inc.* confirmed that the “look and feel” of a game-clone interface, its specific audiovisual expression, can be protected under copyright, not just the underlying program instructions.²⁶¹ In this case the defendant replicated the look and play experience of the game

²⁵⁴ EU, *Directive 2001/29/EC of the European Parliament and of the Council of 22 May 2001 on the harmonisation of certain aspects of copyright and related rights in the information society*, [2001] OJ, L167, at 10–19, and ECLI:EU:C:2019:721, paras 30, 49, 53–56.

²⁵⁵ EU, *Directive 2009/24/EC of the European Parliament and of the Council of 23 April 2009 on the legal protection of computer programs*, [2009] OJ, L111, at 16–22.

²⁵⁶ Heidi Härkönen & Natalia Särämäkari, “Copyright and digital fashion designers: the democratization of authorship?” (2023) 18:1 *Journal of Intellectual Property Law & Practice* 42–57, online: <<https://academic.oup.com/jiplp/article/18/1/42/6974661>>.

²⁵⁷ ECLI:EU:C:2014:25.

²⁵⁸ Mikko Antikainen, “Differences in Immaterial Details: Dimensional Conversion and Its Implications for Protecting Digital Designs Under EU Design Law” (2021) 52:2 *IIC* 137–168, online: <<http://link.springer.com/10.1007/s40319-020-01010-0>>. See also, ECLI:EU:C:2010:816.

²⁵⁹ *Ibid.*

²⁶⁰ Note: Majority of digital fashion designs are not produced directly on the platforms themselves. Instead, they are created using three-dimensional software applications, and as a result, the terms and conditions for use and ownership on these platforms would not affect the designer's status as an author or the protection of the design. See Härkönen & Särämäkari, *supra* note 256 at 2.

²⁶¹ *Tetris Holding, LLC v Xio Interactive, Inc.*, 863 F Supp (2d) 394 (DNJ 2012).

Tetris while writing its own code. The court held this still infringed copyright since the defendant reproduced the protected audiovisual expression. The copyright covered components included the distinct geometric shapes (called “tetrominoes”), the appearance of the game board and grid, the falling of pieces creating a completed line before disappearing, and overall specificity in its visual arrangement and presentation.²⁶² In Canada, *Nintendo of America Inc. v. King* demonstrated enforcement of copyright and anti-circumvention provisions where devices that enabled access to copyrighted video game content were found infringing, reflecting strong judicial protection of video game works inclusive of their expressive components.²⁶³ The Court held that providing service or device (such as modchips or flash cartridges) designed to bypass Nintendo’s Technological Protection Measures (TPMs) constituted both circumvention of digital locks and copyright infringement under the *Copyright Act*.²⁶⁴ The “circumvention devices” that allowed Nintendo consoles to run unauthorized game copies, undermined Nintendo’s exclusive rights to reproduce and distribute its copyrighted works. These rules were added to Canadian copyright law preceding this case to strengthen digital rights management protections. Thus, digital designs in the capacity of videogame software and audiovisual digital content, would likely meet the requirements of originality of copyrighted works where they exhibit creative expression and, further, may be better regarded as separate artistic works in their own right as visually perceived despite being developed through coding.

Copyright protects markets for creative works not only within the jurisdiction in which it operates, but also transnationally through international agreements that harmonize minimum standards of protection. France, the United States, and Canada are all signatories to the principal multilateral copyright instruments, including the Berne Convention for the Protection of Literary and Artistic Works, the WIPO Copyright Treaty, the WIPO Performances and Phonograms Treaty, and the Agreement on Trade-Related Aspects of Intellectual Property Rights (TRIPS). These agreements establish baseline protections that produce a significant degree of alignment across national copyright regimes. As a result, creators operating within the metaverse, and in digital creative markets more broadly, may rely on a shared framework of protection that extends beyond domestic borders, helping to guard against infringement by actors located in foreign jurisdictions. At the same time, the existence of harmonized legal standards does not necessarily guarantee effective enforcement in practice, particularly in decentralized or cross-border digital environments. The international legal mechanisms most relevant to the operation of copyright protection within the metaverse will therefore be examined in greater detail in Chapter Four.

²⁶² *Ibid.*

²⁶³ *Nintendo of America Inc v King*, 2017 FC 246, 1 FCR 509.

²⁶⁴ *Ibid.*

Liability for infringement of copyright owners' economic rights may occur in cases of copying in the Metaverse, including where there is "1) strikingly similar or nearly identical copying occurs for virtual worlds and virtual objects that simulate the real world and real objects; or 2) substantial similarity exists for unique virtual worlds and virtual objects."²⁶⁵ Selling unauthorized copies of works or communicating them to the public may also produce liability for copyright infringement. Finally, it is important to note that author's moral rights may be implicated by uses of their creative work in the Metaverse. Authorship as an essential element of copyright law includes fashion designers as copyright authors.²⁶⁶ It is important to acknowledge that in the fashion industry there is a tendency not to credit the de facto author, instead promoting someone as an author who would not otherwise be an author in copyright terms, especially with the hierarchal structure of 'star culture' to elevate the brand and a single head designer for example, instead of crediting the other co-creating authors. This lack of equality between authors who create fashion affects the moral rights of the authors are ignored at the expense of brand-building. It has therefore been suggested that the metaverse make create new opportunities for greater equality amongst designers: "As digital fashion practitioners challenge the prevailing authorship conventions of fashion, the emergence of digital fashion has the potential to bring the concept of fashion authorship closer to copyright authorship."²⁶⁷

In terms of copying for virtual platforms themselves, virtual reality applications including the underlying computer coding can be analogous once again to video games in a parallel space where case law is clear.²⁶⁸ In the case of *Stern Electronics v. Kaufman*, it was determined that a video game can be deemed original because of the "repeated appearance of the same sequence of numerous sights and sounds in each" gaming experience.²⁶⁹ The Court also found that the audiovisual display and underlying computer code can also be deemed to be copyright protected and the audiovisual display can be considered original, as originality is determined when "someone first conceived that the audiovisual display would look and sound like."²⁷⁰ In this manner, any virtual work, whether it be a digital asset or any other form, is not a direct replica of reality; rather, it represents an author's expression based on their perception of reality. As Risch and Russo argue, "The ability to render a realistic image into an electronic expression is at least as creative as rendering a realistic image into a photograph...in addition, the computerization of virtual objects, virtual works, and virtual realities provides opportunities for creative extensions to real-life objects, works, and realities."²⁷¹ However, the scope of copyright

²⁶⁵ Michael Risch & Jack Russo, "Virtual Copyright" in *Research Handbook on the Law of Virtual and Augmented Reality* (Edward Elgar Publishing, 2018).

²⁶⁶ Stina Teilmann-Lock, "The Fashion Designer as Author: The Case of a Danish T-shirt" (2012) 28:4 Design Issues 29–41, online: <<https://www.jstor.org/stable/23273849>>.

²⁶⁷ Heidi Härkönen & Natalia Särämäkari, *supra* note 256.

²⁶⁸ This thesis explores the protection of virtual assets primarily from a brand perspective. The copyrightability of computer programs and coded interfaces developed on the back end of metaverse platforms will not be explored further in this thesis due to its limited scope.

²⁶⁹ *Stern Electronics v. Kaufman*, 669 F (2d) 852 (2d Cir. 1982). See also, Rische & Russo, *supra* note 158.

²⁷⁰ *Ibid* at 856.

²⁷¹ Risch & Russo, *supra* note 265.

protection will heavily depend on a jurisdiction’s approach to balancing the conflicting interests of “creative incentives and competitive value.”²⁷² Moreover, issues of derivative works and fair use may arise in the metaverse, where users may create and share content that incorporates copyrighted materials in transformative ways. Determining what constitutes fair use and what requires authorization (and by whom) can be challenging in this dynamic and evolving digital space – a point of further discussion below in Chapter 3, Section 3.7.

The complexities of copyright in the context of the metaverse are extensive. The metaverse is a unique digital environment where virtual and physical elements coexist, and both can be subject to copyright protection. Again, virtual elements such as digital designs, avatars, virtual goods, even trademark logos, and other creations can be protected under copyright law as original works of authorship.²⁷³ These virtual assets are treated as digital content and can be subject to the same copyright protections as any other creative work. At the same time, elements from the physical world, such as branded products, trademarks, copyrighted artwork, and other tangible items, can also find their way into the metaverse through user-generated content or official collaborations between brands and virtual platforms. This raises complex copyright considerations, as the use of these physical world elements in the digital realm may require permission from the original copyright holders. Perhaps even more complex are the nuances brought about by user-generated content itself, which may become associated with the brand by extension through user engagement in a branded virtual environment. Users can create and share original content including designing their own avatars or performing activities through their virtual identity which can be protected by copyright. This is another area in which the scope of protection becomes key, and so it is to this question that we now turn.

2.3 The Scope of Copyright Protection

Copyright in this space manifests a parallel role for works that have a real-world counterpart as well as for virtual artistic works, as virtual applications will nearly always contain original authorship. The nuances of copyright’s scope will be analyzed with regard to the role that copyright plays in NFTs in particular, as we see this form of virtual token being popularized, with jurisprudence on how to address issues that may prove to have applications in other jurisdictions. However, it is important to begin with an understanding of how NFTs are protected in terms of copyright law in this space. Again, NFTs leverage blockchain technology and have the ability to record ownership and authenticity as a unique asset. Once a cryptographic token is generated, or “minted”, it has been digitally published on the blockchain and is immutable. Within the metaverse, copyright law plays a role not only in branding

²⁷² *Ibid.* See also, *Berkla v. Corel Corp.*, 66 F (Supp. 2d) 1129 (E.D. Cal. 1999).

²⁷³ See *Euro-Excellence Inc. v. Kraft Canada Inc.*, [2007] 3 S.C.R. 20, 2007 SCC 37. The Federal Court of Appeal found that secondary infringement provisions of the Copyright Act could be used as a tool to prevent importation of certain bars of chocolate into Canada relying on the copyrights subsisting in the trademark logos on the bar’s packaging.

designs, but it is also significant with respect to non-fungible tokens as an alternative form of ownership, confounded with legal IP implications.

The U.S. *Copyright Act* details a list of exclusive rights conferred by copyright ownership, but the three that are relevant in the context of NFTs include: 1) the right to reproduce the copyrighted work; 2) the right to prepare derivative works based on the copyrighted work; and 3) the right to distribute copies of the copyrighted work through sale.²⁷⁴ In Canada, similarly, copyright protects the three fundamental exclusive rights of reproduction, first publication, and public performance of the work or a substantially part thereof.²⁷⁵ However, NFT ownership issues are often difficult to neatly resolve under the legal guard of copyright. It is important to firstly highlight that even though ownership of a digital asset is established through purchase of an NFT, the underlying copyright may not be conferred, and the digital asset may still be viewed or downloaded by any user. Where NFTs are a combination of both an underlying digital work and a token, the purchaser may acquire ownership over the token, or the certificate of authenticity, rather than the underlying works in some cases. Similarly, having physical ownership of an item in real-life, does not confer a right to transform that item into an NFT for commercial purposes. In Canada, for copyright to be transferred to the purchaser, the copyright owner must include an express written assignment with signature.²⁷⁶ Although ownership offers control over a creative work, this specific control is not directly transferrable unless the creator themselves takes the required action in order to ensure that rights are solidified since it is not an automatic process and can be limited.²⁷⁷ This is similar to purchasing a signed copy of an original edition of a novel – the purchaser only has ownership of the copy of the novel, not the ownership of the works itself. The ownership of the thing confers no rights to reproduction, publish or publicly perform the work. In this scenario and those alike, there would be no copyright assignment, rather, in the case of transfer of ownership of a digital asset, there would typically be a limited license agreement between the parties within a smart contract. Smart contracts can automatically execute the transfer of NFT ownership, while including governing rules applicable to the token, such as the terms of purchase or resale, and creating a license that informs collectors about the limitations on use such as reproduction.²⁷⁸

Moreover, according to Canadian copyright legislation, the creator of the artistic content connected with the NFT retains moral rights pertaining to that content, regardless of whether they hold the copyright itself. Moral rights granted to an author upon the creation of a copyrighted work encompass the entitlement to maintain the integrity of the work, the option, under appropriate

²⁷⁴ *Copyright Act*, 17 USC § 106.

²⁷⁵ *Entertainment Software Assn v Society of Composers, Authors and Music Publishers of Canada*, 2012 SCC 34, 2 SCR 231.

²⁷⁶ *Copyright Act* RSC 1985 c C-42, s. 13(4).

²⁷⁷ Cam Thompson, “NFTs and Intellectual Property: What Do You Actually Own?”, (14 October 2022), online: *CoinDesk* <<https://www.coindesk.com/learn/nfts-and-intellectual-property-what-do-you-actually-own/>>.

²⁷⁸ *Ibid.*

circumstances, to be acknowledged as the author by name or pseudonym, and the right to preserve anonymity. These moral rights are non-transferable but can be waived either partially or in their entirety.²⁷⁹ Again, the smart contracts accompanying each NFT may address these rights in different ways. Smart contracts vary in terms of waivers of moral rights, for example, or which proprietary rights are transferred to the purchaser, with limitations potentially being imposed on the ability of its owner to modify, alter, reproduce, or commercialize the digital file. Creators of NFTs can embed specific terms in a smart contract to ensure the payment of royalties to the creator, or designated third parties, occur upon subsequent resales of the NFT. It is therefore afforded the same copyright protection as its physical counterpart, if not enhanced protection since resale royalties on physical works of visual art do not exist in the Canadian context. Importantly, since copyright does not automatically transfer to the purchaser of an NFT, absent an agreement stating otherwise between the NFT creator and subsequent owners, the original copyright holder retains, amongst other things, the right to create new NFTs based on the same underlying work. This can significantly impact the value of an NFT as rarity often influences its worth. Accordingly, a person seeking to mint an NFT must hold sufficient copyright ownership or licensing rights in the underlying work to tokenize it. Individuals who do not hold full copyright, such as licensees or partial rights holders, must therefore determine whether their rights permit the creation and commercialization of NFTs. This issue arose in a recent dispute in the United States, where artist Jay-Z brought legal action against Damon Dash, a co-founder of his record label Roc-A-Fella Records, after Dash attempted to mint and auction an NFT associated with the album *Reasonable Doubt*. The claim alleged that Dash’s minority ownership interest in the label did not grant him sufficient rights in the underlying copyright to tokenize and sell the work.²⁸⁰

In most cases, however, NFT creators place restrictions on commercial use and often only include the right to “use, copy and display” the NFT as a personal, non-exclusive license.²⁸¹ Unless there is an explicit assignment of copyright in accordance with the requirements of the *Copyright Act*, ownership of the underlying copyright remains with the copyright holder regardless of who owns the NFT. The transfer of an NFT does not, by itself, transfer copyright in the associated work. As a result, any royalties derived from the reproduction, distribution, or other exploitation of the work continue to belong to the copyright owner unless otherwise provided for by contract or license. If the IP license is detailed and is considered a copyright license, a creator can designate rights to the purchaser, while still theoretically retaining control and/or ownership of the copyright (or other IP) and can also give a license directly to each succeeding NFT owner. This can come in the form of commercializing the NFT through selling the artwork on merchandise, creating a book or series with the related NFT character, or other

²⁷⁹ *Copyright Act*, RSC 1985, c C-42, s 14.1(2).

²⁸⁰ *Roc-A-Fella Records, Inc. v. Damon Dash* (18 June, 2021), Complaint, No. 1:21-cv-5411.

²⁸¹ “Demystifying NFTs and Intellectual Property: What You Need to Know”, online: *Finnegan | Leading IP+ Law Firm* <<https://www.finnegan.com/en/insights/articles/demystifying-nfts-and-intellectual-property-what-you-need-to-know.html>>.

innovative commercial uses within the physical or virtual world. We see an interesting example of this illustrated through Yuga Lab Inc’s Bored Ape Yacht Club licensing structure, as explored earlier.

It is evident that NFTs can be connected to a creative work by firstly, being used to control a digital copy of the work, and secondly, it could be used to control the copyright in the virtual work with the individual who owns the copyright NFT entitled to control how it is reproduced. The Bored Ape Yacht Club collaborations are particularly interesting to assess the potential of NFTs in the metaverse. Although the terms and conditions state that an NFT purchaser also owns the underlying Bored Ape and the art completely, copyright law does not exactly allow for such an unequivocal statement. U.S. copyright law for instance, maintains a high threshold for what is required to transfer ownership of a copyright. Section 204(a) of the *Copyright Act* outlines, “A transfer of copyright ownership, other than by operation of law, is not valid unless an instrument of conveyance, or a note or memorandum of the transfer is in writing and signed by the owner of the rights conveyed or such owner’s duly authorized agent.”²⁸² Under U.S. federal law, the terms and conditions published on a website may qualify as a written instrument for the purposes of copyright transfer. Electronic signatures or other forms of digital assent may satisfy the statutory requirement that copyright assignments be in writing. The more significant difficulty arises from the structure of NFT transactions themselves. Smart contracts that facilitate NFT transfers operate autonomously on the blockchain and may be executed without any direct interaction with the platform’s contractual terms governing intellectual property rights. As a result, NFTs may be transferred between parties who have never assented to the website terms that purport to define copyright ownership or licensing rights. As noted by James Grimmelmann, this creates a potential privity problem: while the original purchaser may have agreed to certain contractual restrictions, subsequent purchasers who acquire the NFT on secondary markets may not be bound by those same terms.²⁸³ This is because the smart contract and the off-chain terms are often separate: the smart contract on a public blockchain governs the transfer of the token, whereas the licensing terms governing intellectual property rights are typically housed off-chain on a website or platform. Purchasers on a secondary market may never be presented with, or have agreed to, the original contractual provisions that purportedly grant or restrict usage rights.²⁸⁴ Where assent cannot be established, the enforceability of the accompanying copyright provisions becomes uncertain. Jurisdictions may differ in how they treat this issue, but the underlying concern is doctrinally similar to classic privity and consent problems in contract law: no “meeting of the minds” means no enforceable contract against a party who never agreed to the license terms tied to the NFT. Courts or legislatures are only beginning to grapple with whether smart contracts can or should incorporate mechanisms that

²⁸² *Copyright Act*, 17 USC § 204.

²⁸³ James Grimmelmann, “The IC3 NFT License” (2022) SSRN Journal, online: <<https://www.ssrn.com/abstract=4169092>>.

²⁸⁴ Stuart Levi, Mana Ghaemmaghami, & Gabriel Mohr, “Skadden Discusses the Growing Complexity of Commercial Rights Issues In NFTs” (1 June 2022), online: CLS Blue Sky Blog <<https://clsbluesky.law.columbia.edu/2022/06/01/skadden-discusses-the-growing-complexity-of-commercial-rights-issues-in-nfts/>>.

require assent to licensing terms upon every transfer, or whether alternative structures, such as token-bound licenses that automatically convey rights with the token, are needed to ensure enforceability across secondary sales.²⁸⁵

The licensing framework adopted by Yuga Labs for its Bored Ape Yacht Club collection illustrates the complexity of this arrangement. The project's terms grant NFT holders extensive rights to create derivative works based on their ape characters and permit broad commercial exploitation of those derivatives. While this approach encourages community participation and brand expansion, it also introduces uncertainty from a licensing perspective, particularly where downstream owners may not have expressly agreed to the governing contractual terms. One proposed response to this issue is to structure NFT rights as a non-exclusive copyright license that automatically accompanies ownership of the token. Unlike a copyright assignment, a non-exclusive license does not require the same formal signature requirements and may therefore be granted through publicly available terms that apply to each successive purchaser of the NFT. In this way, the license may travel with the NFT itself, ensuring that each new owner receives a defined set of usage rights while the original copyright holder retains underlying ownership of the work.

This approach is illustrated in the licensing model adopted by RTFKT. The platform's terms and conditions (as of November 2021) provide that:

1. ... Any digital works of authorship or other content made available through the Platform to an owner of a Digital Collectible that is intended as an "Additional Benefit" (as that term is defined in the Digital Collectible Terms) will be identified as such on the Platform or at the time of download. Any such content will be licensed to you for as long as you own the applicable Digital Collectible pursuant to the terms of any license presented at the time of download or, if no such terms are presented, pursuant to the applicable Digital Collectible Terms as Related Content for that particular Digital Collectible.²⁸⁶

The platform's terms and conditions provide that any digital works of authorship or other content made available to an owner of a digital collectible as an "Additional Benefit" will be licensed to that owner for as long as they retain ownership of the relevant digital collectible. The terms further clarify that such content will be licensed either pursuant to specific license terms presented at the time of download or, if none are provided, under the applicable digital collectible terms governing related content for that particular NFT.²⁸⁷ By structuring rights in this manner, the framework attempts to ensure that each subsequent owner receives defined rights in the associated digital content while the underlying intellectual property remains with the original creator. These licensing challenges make clear that ownership of an NFT alone does not resolve questions of copyright, derivative works, or enforceability, particularly on secondary markets. Non-exclusive licenses can clarify what rights are granted and

²⁸⁵ Grimmelmann, *supra* note 283.

²⁸⁶ "RTFKT Platform Terms of Service", (18 November 2021), online: RTFKT <<https://rtfkt.com/tos>>.

²⁸⁷ *Ibid.*

preserve the creator's underlying intellectual property, but they also underscore how the metaverse introduces new layers of legal and technical complexity. This naturally leads to the next set of issues for brands: tracking NFT ownership, calculating and distributing royalties, and enforcing rights across a patchwork of jurisdictions.

2.4 Ownership in the Metaverse

The other complex gap for brands using their IP in the metaverse is the traceability of ownership, royalty calculations and infringement in a jurisdictionally complex legal landscape – the latter complexity will be discussed in Chapter 4. Traditionally, it has been difficult to trace ownership of goods to their source but NFTs hosted on the blockchain offer a solution to this problem by functioning as an ownership ledger that cannot be destroyed. However, it may alternatively be possible for NFTs to be sent to a "burn" address to remove them from circulation.²⁸⁸ The traceability of NFT ownerships, if within circulation, may also create new revenue streams for creators and NFT artists by simplifying revenue calculations for royalties owed, and by automating each sale's resulting royalty to be received upon each sale. Therefore, NFT sale transactions are relatively accessible, making it easier to calculate the total transaction value generated from a single NFT over the course of its existence. The questions that may arise, however, include whether damages for unauthorized use should be based on total resale value of the unauthorized NFT, if each subsequent owner should be subject to liability, and further, how domestic courts will assign liability between creators or minters, sale platforms, and purchasers.²⁸⁹ Therefore, fashion brands seeking to enter or establish themselves in the metaverse must be meticulously cognizant of the evolving intricacies of the metaverse as well as the legal infrastructure surrounding terms and conditions, including the licensing structure, traceability, and overall ownership of NFTs.

NFTs rarely confer IP rights to the purchaser. Instead, purchasers typically have a right to display the digital asset, however, the legalities around whether or not NFTs count as proof of title to a digital replica of the original asset is unclear.²⁹⁰ In this regard, "owning an NFT merely grants an individual bragging rights due to their possession of a digital asset and the value is mostly intrinsic due to an asset's potential cultural significance... despite the lack of legal decision on the issue, NFTs are designed to confer proof of title as they purport to represent ownership of another asset and instead, have been considered an asset constituting property by the courts, albeit in obiter dicta."²⁹¹ Judges have

²⁸⁸ Brigitte, Chan, Prudence Etkin & Tamara Céline Winegust, "IP Metaverse Series - Part I: Brands are Plugging in and Cashing in - Protecting Trademarks and Copyright in Virtual Goods and Services", online: *Bereskin & Parr* <<http://www.bereskinparr.com/doc/ip-metaverse-series-part-i-brands-are-plugging-in-and-cashing-in-protecting-trademarks-and-copyright>>.

²⁸⁹ *Ibid.*

²⁹⁰ "The Legal Issues of the Metaverse and NFTs - The Good, The Brag, and The Ugly", (26 July 2022), online: *The WS Society* <<https://www.wssociety.co.uk/features/2022/7/22/gbjg3k7v1vt5l6ckt28man5epe5tbf>>.

²⁹¹ *Ibid.*

been cautious when defining crypto assets as property, as supported in *AA v Persons Unknown*, noting, “there is a difficulty in treating Bitcoins and other cryptocurrencies as a form of property.”²⁹² The court, however, was persuaded that crypto assets transacted using cryptocurrency are considered property consistent with the remarks in *Osbourne v Persons Unknown*.²⁹³ In the *Osbourne* case, the High Court of England and Wales granted an injunction to freeze the digital assets that were stolen and prevent further transfer of the NFTs, which confirms that NFTs are deemed to be property in the eyes of the law for the purposes of legitimacy of ownership and proof of title. As Kasiyanto and Kilinc suggest, ownership in the metaverse can be categorized into two particular types: licensing and actual ownership.²⁹⁴ In the licensing model, the platform provider retains ownership and merely licenses the use of assets to users, for example, virtual items in future metaverse platforms. However, this approach arguably restricts the full potential of the metaverse as embracing true ownership represents the ideal implementation of metaversal property law. True ownership empowers users with complete and genuine ownership rights over their virtual assets, leading to a more robust and dynamic metaverse experience.²⁹⁵

At present, NFTs are primarily governed by contract law, which alone is insufficient to support their intended function within the metaverse. Under existing rules, a user who acquires virtual land or other digital assets remains subject to the platform provider’s discretion. If a virtual asset were removed, the purchaser would retain only the NFT itself, without access to the underlying asset. This undermines the central purpose of the NFT – that it serves as a proof of ownership of the associated digital property.. Hypothetically, if a virtual asset is removed, all that remains is the ownership of the corresponding NFT. This situation contradicts the very reason that the user may have purchased the NFT – to claim ownership of the associated asset. From a legal perspective, such removal could constitute a violation of the purchaser’s property interests in the NFT, a breach of contract, and potentially unjust enrichment by the platform. Without formal recognition of the NFT’s role as evidence of title, the metaverse cannot fully realize its ambition of replicating the ownership structures and rights that exist in the physical world. In other words, the legal system must acknowledge the NFT not merely as a contractual right, but as a functional digital property interest capable of supporting enforceable claims.

A similar challenge arises with the interoperability of specific metaverse platforms like Roblox. When consumers acquire virtual goods on the Roblox platform, these items remain confined within the Roblox ecosystem, and are owned by the platform itself. Hence, resolving the issue of interoperability is crucial, as is addressing the question of ownership. However, the solution may not lie in a traditional

²⁹² *AA v Persons Unknown who demanded Bitcoin on 10th and 11th October 2019 and others* [2019] EWHC 3556 (Comm).

²⁹³ *Osbourne v Persons Unknown & Ors* [2023] EWHC 340 (KB). See also, The WS Society, *supra* note 290.

²⁹⁴ Safari Kasiyanto & Mustafa R Kilinc, “Legal Conundrums of the Metaverse” (2022) 1:2 Journal of Central Banking Law and Institutions, online: <<https://jcli-bi.org/index.php/jcli/article/view/25>>.

²⁹⁵ *Ibid.*

blockchain but rather in a distributed ledger that is collectively owned, immutable, and transparent. In this context, implementing a distributed ledger owned collectively by all participants can foster a decentralized and transparent environment. Such a ledger would ensure that ownership of virtual assets is not concentrated solely within the metaverse platform but distributed among its users. By employing a transparent and immutable system, users can confidently claim ownership and transfer virtual goods between different metaverse platforms, thereby promoting interoperability and enhancing the overall metaverse experience. Accordingly, blockchain can be thought of in terms of public and private infrastructure. Public physical spaces are typically owned by the government and although it is public, private enterprises generate revenue in those spaces.

Blockchain can provide a censorship resistant and tamper-proof way of storing the data while integrating privacy into it as opposed to having privacy live solely on the device that individuals use to access this space, which by outcome, increases the experience of owning your own data.²⁹⁶ A key example of this would be the integration of decentralized Self-Sovereign Identity (SSI) systems where users can prove their identity using cryptographic proofs without revealing sensitive information. SSI enables users to manage their digital identities independently, without relying on centralized authorities.²⁹⁷ In the metaverse, this means individuals can authenticate themselves, access services, and prove credentials without exposing unnecessary personal information. For example, a user could prove they are over 18 to enter a virtual event without disclosing their exact age or identity. This system allows individuals to maintain privacy while still meeting verification requirements, enhancing consumers' sense of ownership and control over their digital identities. Cryptographic mechanisms such as zero-knowledge proofs (ZKPs) can further enhance privacy. For instance, a user could demonstrate ownership of virtual property or a rare digital asset or have a specific membership status in a virtual community without revealing their entire wallet or transaction history. This ensures that privacy is embedded into the metaverse experience while maintaining transparency and trust through blockchain technology.²⁹⁸ Efforts like the European Self-Sovereign Identity Framework (ESSIF) aim to create standardized protocols for digital identities, facilitating seamless and secure interactions across different platforms within the metaverse. Such frameworks are crucial for ensuring that privacy-preserving technologies are universally adopted and effective.²⁹⁹

²⁹⁶ “The BoF Podcast - The Web3 Debate: A Reality Check on Fashion and the Metaverse”, (19 May 2023), online: *The Business of Fashion* <<https://www.businessoffashion.com/podcasts/technology/the-bof-podcast-the-web3-debate-a-reality-check-on-fashion-and-the-metaverse/>>.

²⁹⁷ Siem Ghirmay et al, Self-Sovereign Identity for Trust and Interoperability in the Metaverse (arXiv, 2023).

²⁹⁸ *Ibid.*

²⁹⁹ Alex Grech, Ira Sood, & Lluís Ariño, “Blockchain, Self-Sovereign Identity and Digital Credentials: Promise Versus Praxis in Education” (2021) 4 *Front Blockchain*, online:<<https://www.frontiersin.org/articles/10.3389/fbloc.2021.616779/full>>.

Data ownership in the metaverse enables brands to engage directly with consumers by licensing personal information and tailoring experiences in response to user interactions. By obtaining consented access to consumer data, brands can reward engagement, personalize content, and generate actionable insights while maintaining privacy protections.³⁰⁰ Beyond reactive personalization, users can license their intent to purchase, allowing brands to move from predicting consumer behavior to establishing authenticated, first-party data relationships with prospects and customers. This creates richer and more relevant datasets that can be leveraged to enhance personalization while respecting user consent. In this context, mechanisms such as loyalty programs, subscriptions, rewards, and token-gating emerge as innovative methods for commercializing user engagement. Users can accumulate on-chain histories represented as NFTs, reflecting their participation in both digital and physical experiences. These tokenized records can unlock additional experiences and serve as markers for advertisers or brands seeking to target individuals with tailored offers. By integrating user-generated content, these systems not only enhance engagement but also transform the dynamics of advertising and brand-consumer interaction, introducing a layer of direct, blockchain-verified engagement that did not exist in traditional ad-tech ecosystems.

2.4.1 *User-Generated Content Ownership*

Virtual games such as *Second Life* are often considered predecessors to the concept of the metaverse, but they may not embody the full vision of a comprehensive metaverse. As the "metaverse" refers to a collective virtual space that encompasses multiple interconnected digital platforms, where users can interact with each other and the virtual environment in real-time, this means that it is more expansive and dynamic than virtual gaming and gaming platforms. However, there are lessons to be learned from how the ownership of virtual goods, and especially branded goods, are addressed in the metaverse. In November 2003, Linden released a revised set of terms of service for *Second Life* stating, "Linden acknowledges and agrees that, subject to the terms and conditions of this Agreement, you will retain any and all applicable copyright and other intellectual property rights with respect to any Content you create using the Service."³⁰¹ Linden's outlook was advanced for its time as the change in policy implements what metaverse platforms today will seek to adopt, which will be significant for fashion brands operating within this space. In Linden's press release, the change in policy was explained to be in appreciation of their recognition of "the fact that persistent world users are making significant contributions to building these worlds and should be able to both own the content they create and share in the value that is created. The preservation of users' property rights is a necessary step toward the emergence of genuinely real online worlds."³⁰² However, the sharing in the value that is created and the

³⁰⁰ *Ibid.*

³⁰¹ 'Terms of Service', online: *Second Life* <<http://secondlife.com/corporate/tos.php>>.

³⁰² *Ibid.*

preservation of users' property rights in the context of a branded virtual space may prove to be problematic.

Contracts that exist in this space include service agreements and end-user licensing agreements to create a contractual relationship between a platform owner and their users, as well as agreements for interactions between platform users. This may include consumer-to-business, business-to-consumer, consumer-to-consumer, business-to-business and in this context, business-to-avatar. The underpinning of end-user agreements will also be integral in the implementation of provisions to prevent reproduction and modification of existing copyright, trademark or industrial designs; however, this may prove to be insufficient for copyright owners. For many gaming platforms the End-User License Agreement (EULA) states that the IP rights of gamers vest with the game providers, depriving the user of any rights over the potential use of a character or item.³⁰³ The current major players in blockchain-based metaverse platforms have been taking a different approach to allow users to have ownership rights, and this trajectory will likely continue since it would otherwise hinder the metaverse's full potential for interoperability – the ability to transfer digital assets, identities, and experiences across platforms. Although such decentralized ownership models appear to promote interoperability and greater user control over digital assets, important structural tensions remain. Dominant digital platforms often resist interoperability because closed ecosystems reinforce network effects and preserve competitive advantages. As scholars have observed in the context of digital platforms, interoperability can reduce switching costs and weaken the market power that arises from network effects.³⁰⁴ While interoperability, particularly the ability to move digital assets or identities between platforms, may benefit users and support the broader development of the metaverse, platform operators may have limited incentives to facilitate such portability. Intellectual property frameworks sit at the centre of this tension. Depending on how ownership rights, licensing structures, and platform governance are designed, IP law may either support the portability of digital assets across platforms or reinforce proprietary environments that restrict interoperability.³⁰⁵ In this sense, intellectual property rights may function both as an enabler of user ownership and as a mechanism through which platforms maintain control over their digital ecosystems.

These platforms leverage NFTs to provide verifiable ownership and transferability of digital assets which offer more decentralized models of ownership for users to have control over their creations and may have the benefit of monetizing such creations. Some examples include Decentraland, CryptoVoxels, Somnium Space, and Sandbox. In Decentraland's terms and conditions, ownership of content is outlined as such:

³⁰³ Andrew Jankowich, "EULAw: The Complex Web of Corporate Rule-Making in Virtual Worlds" (2006) 8:1 TJTIP 1.

³⁰⁴ Carl Shapiro, "Antitrust in a Time of Populism" (2018) 61:1 Intl J Ind Org 714 at 724–26.

³⁰⁵ James Grimmelman, "The Law and Economics of Digital Assets" (2022) 67:2 *Vill L Rev* 335.

All title, ownership and Intellectual Property Rights over the Content created by users belongs to the users who created said Content. Neither the Foundation nor the DAO have any Intellectual Property Rights over the user's Content. The creator of the Content may impose its own terms, conditions and licenses for access and use of said Content. You are advised to review any such terms, conditions and policies before accessing any such Content. All Content must comply with the Content Policy.³⁰⁶

Decentraland is built on the Ethereum blockchain and allows users to create, own, and monetize digital assets using NFTs called 'LAND'. Users can buy, sell, and trade virtual land, as well as create and showcase their own content within the metaverse. In terms of NFTs, the platform also states,

All title, ownership and Intellectual Property Rights over NFTs, including without limitation, Wearables, belong to the creator of the NFT...To the fullest extent possible, the creator will waive any moral rights over the NFTs upon transfer to third parties. Neither the Foundation nor the DAO have any Intellectual Property Rights over NFTs created by users. All NFTs must comply with the Content Policy.³⁰⁷

The moral rights clause is important since it implies that once an NFT is transferred to a third party, the original creator no longer has control over how it is used or displayed within Decentraland. The creator cannot exercise moral rights to object to modifications, control how the NFT is associated or displayed, or demand attribution. However, what happens when there is a conflict between an original creator's moral rights and a user's content rights if they have, for example, built upon a creator's virtual clothing or virtual items with their own user-generated content? The resolution here will depend on several factors, including the jurisdiction's copyright laws, the terms and conditions of the metaverse platform, and the specific circumstances of the conflict. If a user's content infringes upon a creator's moral rights or otherwise under copyright law, or if it infringes their trademark or industrial design rights, a brand may have grounds to enforce their rights through the platform's enforcement mechanisms such as content moderation systems and trigger takedown requests or commence litigation if there has been serious infringement which has led to, e.g., brand dilution and misappropriation.

Notably, under the Canadian *Copyright Modernization Act*, in certain circumstances, users are permitted to create their own content by combining or using existing copyright material.³⁰⁸ This is subject to the provision that: a) "use of, or the authorization to disseminate, the new work or other subject-matter is done solely for non-commercial purposes;" b) "the source... is mentioned if it is reasonable in the circumstance to do so;" c) "the individual had reasonable grounds to believe the work was not infringing copyright;" and d) it "does not have a substantial adverse effect, financial or otherwise, on the exploitation or potential exploitation of the existing work or other subject-matter — or copy of it — or on an existing or potential market for it, including that the new work or other subject-matter is not a substitute for the existing one."³⁰⁹ Therefore, in Canada, user-generated content that uses copyright protected content within this virtual space *may* be acceptable for non-commercial use and

³⁰⁶ "Terms of Use", online: *Decentraland* <<https://decentraland.org/terms>>.

³⁰⁷ *Ibid.*

³⁰⁸ *Copyright Modernization Act*, SC 2012, c. 20, s 29.21(1).

³⁰⁹ *Ibid.*

distribution of branded virtual goods and other use-generated virtual content within the metaverse, particularly if it does not negatively affect the brand's reputation, does not amount to confusion, and does not affect the financial stability of the brand (assuming such harms could constitute a substantial adverse effect on future exploitation of the work used). Of course, fair dealing for purposes of, e.g., parody, satire, criticism or review will also be permitted. Brands, however, may still argue their case for trademark infringement, including for depreciation of goodwill in accordance with section 22 of the *Trademarks Act*. Moreover, the availability of any such statutory user rights is likely subject to the terms and conditions established by the platform or provider and agreed to (in theory at least) by the consumer.

2.5 Virtual Fashion Show Protection Through Copyright

Another example of a developing area where copyright plays a significant role in the metaverse is virtual fashion events. Virtual fashion shows, in particular, are organized with complex technological elements to showcase a fashion brand's new collection to concurrently engage a virtual and physical consumer audience. The legal framework in France, including the French Intellectual Property Code (*Code de la Propriété Intellectuelle*) Article L. 112-1, provides that "all works of the mind are protected regardless of their gender, form of expression, merit, or purpose, provided that they are original". This provision, as the French Supreme Court has established, also includes fashion shows, opening a whole new perspective for how extended reality, and the events that it holds, can potentially be flooded with intellectual property claims. This is evident in the case of *Ashby v Gaulme, Kenzo et Lacroix*, where a copyright infringement suit was examined with regard to both clothes as well as the fashion shows themselves brought by the French Federation of Couture and five haute-couture companies including Chanel, Christian Dior, and Hermes against three photographers, who had uploaded unauthorized photographs and videos of the fashion shows online.³¹⁰ The French Federation of Couture developed a system in which press organizations must agree to standard contract terms, authorizing them to use photographs taken at fashion shows for "information purposes with express exclusion of any commercial purposes."³¹¹ However, the photographers claimed that they were allowed to upload the photographs for the purposes of reporting under Article L. 122-5, No. 9 of the French Intellectual Property Code and under Article 10 Freedom of Expression of the European Convention on Human Rights.³¹² Under Article L. 122-5, an author of a copyrighted work cannot restrict the "reproduction or communication to the public, in whole or in part, of a graphic, architectural, or artistic work in written, audio-visual, or online forms for the exclusive purpose of immediately informing the public, as long as

³¹⁰ *Ashby v Gaulme, Kenzo et Lacroix*, Court of Appeal of Paris, 13e chambre, 17 January 2007. See also, *Ashby v Gaulme, Kenzo et Lacroix*, French Court of Cassation, 5 February 2008.

³¹¹ *Ibid.*

³¹² Rossella Esther Cerchia & Barbara Pozzo, eds, *The New Frontiers of Fashion Law* (MDPI - Multidisciplinary Digital Publishing Institute, 2021). See also, *Ashby v Gaulme, Kenzo et Lacroix*, French Court of Cassation, 5 February 2008.

the author's name is clearly indicated.”³¹³ The French Court of Appeal and the European Court of Human Rights (ECHR) denied the application of the exception and the freedom of expression claim and held that the defendants were liable for copyright infringement, pursuant to Articles L 335-2 and 3 of the French Intellectual Property Code.³¹⁴

In the United Kingdom and Canada, virtual fashion shows may be protected under section 3(1) of the U.K. *Copyright, Designs, and Patents Act (CDPA)* and section 3(1) of Canadian *Copyright Act* respectively, if interpreted to fall within the two categories of “dramatic works” or “choreographic works”.³¹⁵ The direction of the shows, the staging of models whether in a virtual environment or parallel physical event space, can be interpreted as a form of choreography since models must walk in a certain way or order, with a certain degree of dramaticism or ‘sufficient dramatic unity’, wearing the fashion designs’ clothing in an aesthetically pleasing manner.³¹⁶ This threshold in U.K. case law has been seen to primarily require for the substance of work to not be left to chance or arbitrariness.³¹⁷ These issues will be examined by the courts in this metaversal space as extended reality comes into fruition. Virtual fashion shows have the potential to not only capture or replicate an experience transporting its users, but also to create a layered virtual experience as an overlay to the real world, mainly through holograms and artificial simulations. In fact, hologram use dates to the early 2000s when Alexander McQueen created a hologram version of Kate Moss modelling an extravagant organza gown. More recently, we have seen Maisie Wilen utilize Yahoo Immersive, an extended reality mechanism and a multi-format photoshoot with volumetric capture which featured a series of augmented reality hologram models for the brand’s Autumn/Winter 2022 collection.

³¹³ Code de la propriété intellectuelle [CPI] [Intellectual Property Code], art L.122-5, no 9 (Fr).

³¹⁴ *Ibid.*

³¹⁵ *Copyright, Designs and Patents Act* (U.K.), 1988 c. 48.

³¹⁶ *Ibid.* See also, *Kantel v Grant* [1933] Ex CR 84 at 92–94 (Exchequer Court of Canada). *Green v Broadcasting Corporation of New Zealand* [1989] 2 All ER 1056 (PC), and *Hutton and Denali Music Ltd v Canadian Broadcasting Corp* (12 February 1992), 120 AR 291 (Alta CA).

³¹⁷ *Norowzian v Arks Ltd (No 2)*, [2000] EMLR 67; *The Ukulele Orchestra of Great Britain v Erwin Clausen and another (t/a the United Kingdom Ukulele Orchestra)*, [2015] EWHC 1772 (IPEC); *Banner Universal Motion Pictures Ltd v Endemol Shine Group Ltd*, [2017] EWHC 2600; *Green v Broadcasting Corp of New Zealand*, [1989] RPC 469, applied in *Robin George Le Strange Meakin v British Broadcasting Corporation and others*, [2010] EWHC 2065 (Ch) at paras 29–31 (Arnold J).



Figure 3: Maisie Wilen Fall-Winter 2022 Collection, A Holographic Experience Powered by Yahoo.³¹⁸

The designer, Maisie Schloss states, “It was an opportunity to bring so much fantasy to the show and also do things that you can’t do in real life. We were able to utilize effects. One girl gets electrocuted, one girl has bubbles coming out of her mouth. The realm of possibility in real life no longer applies.”³¹⁹

Current camera technology, while advanced, remains limited in its ability to fully capture the subtleties and textures of certain textiles and materials. However, with the integration of augmented reality (AR) technologies, innovations such as optical illusion prints, mattified sequins, and holographic vinyl become fully realizable, enabling high-resolution capture that supports immersive AR experiences for virtual engagement.³²⁰ This technological evolution significantly transforms the manner in which consumers interact with fashion, allowing them to engage not only with shoppable content but also with storytelling, interactive narratives, and experiential showcases. From a marketing perspective, this creates multiple vectors of engagement, often surpassing traditional visual or print media, thereby amplifying the commercial and cultural impact of fashion presentations.³²¹ The substantial investment that designers devote to developing these immersive environments further underscores the necessity of robust intellectual property protections, guarding against imitation, unauthorized reproduction, and consequential misappropriation. Beyond commercial considerations, these immersive creations often encapsulate artistic and cultural expression, encompassing social, political, and historical symbolism, while simultaneously providing a platform for the individual expression of originality. In this context, the protection of such digital and hybrid representations is not merely a question of economic incentive

³¹⁸ “Maisie Wilen Fall-Winter 2022 Collection, A Holographic Experience Powered by Yahoo”, (November 2022), online: *Youtube* <<https://www.youtube.com/watch?v=ltzfDjLIIVk>>.

³¹⁹ Zofia Zwieglinska, “Exclusive: Holograms have landed on the NYFW catwalk”, (12 February 2022), online: *Glossy* <<https://www.glossy.co/fashion/exclusive-holograms-have-landed-on-the-nyfw-catwalk/>>.

³²⁰ *Ibid.*

³²¹ *Ibid.*

but also of safeguarding creative integrity, ensuring that the authorship and unique expressive qualities of designers are recognized and preserved within both physical and virtual marketplaces.

2.6 Protection of AI Generated Works and Copyright in the Metaverse

It remains apparent that we still have many unanswered queries regarding who can claim authorship rights of the collective work created by artificial intelligence as well. Will products of AI be protected in the same way copyright protection operates in the physical world? It should be noted that this thesis references virtual goods and other mechanisms within the metaverse to include only original works created by human authors. Although extensive exploration is beyond the scope of this thesis, it is constructive to briefly outline the intersection of AI generated works and copyright in the context of the metaverse. As Craig notes in her assessment of tech-neutrality, the real challenge in this respect is to prevent AI generated creative innovations from upsetting the balance of copyright interests, its normative objectives and consequentially undermining the social and cultural value of authorship and the public domain.³²² The question of tech-neutrality is not whether the same rules apply regardless of medium, but whether applying those rules produces outcomes consistent with what IP law is meant to serve: incentivizing creation, protecting investment, and critically, serving the public interest in access and expression. Where tech-neutral application fails that test, the appropriate response is to design new governance frameworks that are built around the purposes IP law is meant to achieve instead of attempting to stretch existing frameworks. As Craig posits, “true technological neutrality requires not simply the seamless expansion of legal rights into new technological contexts, but the careful, contextual recalibration of rights and interests in light of shifting values and changing circumstances.”³²³

Holistic efforts of policymakers to respond to technological progression should not neglect AI generated works as copyright protection of AI creations may be relevant for other digital adaptations and virtual goods within this space. This may be dependent on if the jurisdiction asserts that creative works must be original to receive copyright protection where originality may be linked to the physical person of the author. In many jurisdictions, including Canada, the United States, Australia and most of Europe, copyright, and its sole attachment to “original” works of authorship implies just that; the origin must be from a human author, a “natural person” with “direct intellectual involvement in the resulting expression.”³²⁴ We see further evidence of this in the European context in Article 6 of *Italian Copyright Law*, for example, which states, “the original entitlement of the acquisition of copyright consists of the

³²² Carys J Craig, “The AI–copyright challenge: tech-neutrality, authorship, and the public interest” in *Research handbook on intellectual property and artificial intelligence* (Cheltenham, UK; Northampton, MA, USA: Edward Elgar Publishing, 2022). See also, Carys J Craig, “Technological Neutrality: Recalibrating Copyright in the Information Age” (2017) Osgoode Legal Studies Research Paper No 186, online: <https://digitalcommons.osgoode.yorku.ca/olsrps/186>

³²³ *Ibid.*

³²⁴ Craig, *supra* note 322. See also, U.S. Copyright Office, Compendium of U.S. Copyright Office Practices § 306 (3d ed. 2017).

creation of the work, as a particular expression of intellectual work of the author.”³²⁵ Additionally, EU copyright law specifically views originality as deriving from the personality of the author. It is “intended as the display of personality, freedom and creativity of the author”.³²⁶ The key elements of originality are founded on the author of the matter at issue, which exemplifies the relationship between originality and personality of the creator.

As Craig highlights, “what the AI is doing when it generates a works is not authorship—in an ontological sense, the AI is not an ‘author’ with rights or interests in the copyright balance; and second but relatedly, in a teleological sense, the mere proliferation of AI-generated products does not reflect the kind of creative process or practice that copyright is intended to foster.”³²⁷ This is important for us to conclude with since within this virtual space, brands have already employed the tools of AI within XR to be used for virtual forms of commerce which would potentially complicate matters further. Although jurisdictions such as the European Union, United Kingdom and Canada are all conducting consultations to reassess copyrightability, to extend copyright to AI works would be doing a disservice to the human minds who create original and creative works, and would inevitably cause an obstacle to authorship and creative progress.³²⁸ Moreover, in connecting these concepts to the application of digital fashion, the relevance of authorship is equally as important as physical fashion, and particularly important in terms of passing the threshold of originality to acquire protection within virtual spaces.

Although algorithmic artworks may not be afforded copyright protection, human choices that determine the creative influence and the amount of implementation of those creative ideas, may still attract protection.³²⁹ In terms of guidance, it is recommended that brands create an audit trail using data sets from clients or the brand’s repository such as imagery or design inputs to which they own the IP, in order to adapt and update images. Brands can take precautions by ensuring that they use their own specific collection of archives that AI can utilize for its learned data, including the brand’s detailing, fabrics and specific textures which become the brand’s “DNA”. This is the model which will then assist with recreation and downstream development while ensuring protection of copyright. There are many AI tools such as Maison Met’s simplified workflow tool or Stable Diffusion’s ControlNet, that are AI generated consumer facing products which seek to boost creative ideas while augmenting their workflow and creativity. The bandwidth of design teams must keep up with the development of AI and the metaverse in this regard in order to see efficacious results. Regardless, as Craig posits, policymakers should refrain from “misattributing human attributes, intentionality, and expressive agency to AI.”³³⁰

³²⁵ Italy, Regulation 22 aprile 1941, n. 633.

³²⁶ Eleonora Rosati, “The Monkey Selfie case and the concept of authorship: an EU perspective” (2017) 12:12 Journal of Intellectual Property Law & Practice 973–977, online: <<http://academic.oup.com/jiplp/article/12/12/973/4705990>>.

³²⁷ Craig, *supra* note 322.

³²⁸ *Ibid.*

³²⁹ *Burrow-Giles Lithographic Co. v. Sarony*, 111 U.S. 53, 58 (1884).

³³⁰ Craig, *supra* note 322.

Since AI lacks the functional equivalence to human-authored works, legal reform should prioritize other technological progressions within the metaverse to support the public interest objectives of copyright law, particularly in the context of protecting fashion designers and consumers.

Recent case law has significantly clarified the limits of current copyright doctrine in the context of works generated by artificial intelligence. Particularly, jurisprudence in the United States, has crystallized the principle that copyright protection attaches only to works originating from human authorship. the litigation surrounding *Thaler v. Perlmutter, Register of Copyrights* illustrates this point.³³¹ Thaler sought to register a visual artwork generated autonomously by his generative AI system, the “Creativity Machine,” naming the machine itself as the author. The U.S. Copyright Office denied the registration on the basis that the Copyright Act requires a human being to be the author of a work, a position reinforced by the U.S. District Court for the District of Columbia and subsequently affirmed by the U.S. Court of Appeals for the D.C. Circuit, stating that an AI system cannot be an “author” under the Act because only human beings can satisfy the statutory threshold of authorship.³³² The appellate court explained that only human creativity, even when mediated through advanced tools, satisfies the statutory threshold for authorship, and that neither the machine nor its operator could be credited as the author absent meaningful human creative input. The U.S. Supreme Court declined to review the case, effectively leaving intact the lower courts’ interpretation that AI-generated works lacking human creative input are not eligible for copyright protection under current law.³³³ This line of authority reinforces that works created solely by a machine, without human direction, skill, or judgment, cannot obtain copyright, even as generative models become more capable.³³⁴

In Canada, the doctrinal landscape continues to develop, but existing statutory frameworks and administrative practice suggest a similar human-centric authorship threshold. Section 3 of the Copyright Act contemplates protection for “original literary, dramatic, musical and artistic works,” traditionally interpreted to require human skill and judgment.³³⁵ Although no Canadian appellate decision has directly addressed a work created entirely by AI, the Canadian Intellectual Property Office has rejected attempts to list non-human entities as authors, instead recognizing only the human operator where sufficient human contribution exists.³³⁶ Commentators such as Michael Geist and Carys Craig have emphasized that AI-assisted works may be copyrightable only if a natural person makes a sufficient creative contribution; what remains unsettled is how to apportion credit for works involving substantial

³³¹ *Thaler v. Perlmutter, Register of Copyrights and Director of the United States Copyright Office, et al*, 2023 BAH 22-1564, (DC 2023) (Memorandum Opinion). See also, *Thaler v Vidal*, 43 F.4th 1207 (Fed Cir 2022).

³³² *Ibid*.

³³³ *Thaler v. Perlmutter*, Petition denied, SCOTUS (March 2, 2026) (U.S. Supreme Court refuses to review lower courts’ rejection of AI-only authorship)

³³⁴ *Thaler v. Perlmutter*, *supra* note 329.

³³⁵ *Copyright Act*, RSC 1985, c C-42, s 3.

³³⁶ Canadian Intellectual Property Office (CIPO), *Copyright Registration for Works Created with AI Tools* (CIPO, 2025), online: <https://www.ic.gc.ca/eic/site/cipointernet-internetopic.nsf/eng/wr04568.html>

generative assistance from AI.³³⁷ Recent cases illustrate this uncertainty: *CanLII v. Caseway AI* is addressing whether a legal research AI trained on bulk copyrighted material may have infringed copyright,³³⁸ while *Toronto Star v. OpenAI* examines whether generative AI systems that scrape and train on news content infringe copyrights and whether fair dealing can apply in that context.³³⁹ Administrative practice similarly highlights ambiguity in this area. The CIPO granted copyright registration for the AI-assisted painting *Suryast*, listing both a human creator and an AI application as co-authors, though this registration has been challenged under s. 57(4) of the *Copyright Act* on the grounds that an AI alone cannot be an author.³⁴⁰ This doctrinal framework, in parallel to the U.S. emphasis on human intervention, suggests that purely machine-generated content, absent substantive human creative input, would likely fail the threshold for copyright protection in Canada absent legislative reform or future judicial clarification.

These judicial developments occur against a backdrop of significant regulatory reform aimed at adapting intellectual property and digital governance frameworks to the realities of AI. Notably, the EU *AI Act* proposes a tiered risk-based approach to governing AI systems, categorizing applications into unacceptable, high-risk, and limited-risk classes, and embedding obligations for transparency, human oversight, and data governance for high-risk AI systems.³⁴¹ Although the *AI Act* does not directly amend copyright law, its emphasis on transparency and human accountability in AI deployment may influence future interpretations of authorship and creative agency in digital works and could inform how jurisdictions assess the role of the “guiding human hand” when AI is used as a tool or collaborator in creative processes.³⁴² As courts and regulators continue to confront these questions, cases involving hybrid AI/human content and the regulatory principles embodied in initiatives like the AI Act will shape how creators, brands, and platforms navigate intellectual property rights in an era of ubiquitous generative technology.³⁴³

As jurisdictions apply copyright protection to assets within the metaverse, it is likely that more rigorous and expansive standards and interpretations of infringements may be required. This necessitates considering the fair use doctrine, the issue of idea-expression dichotomy, and other copyright-related matters that may arise with the increasing user participation in this environment, especially in cases where user-generated content creation occurs in a branded metaverse or where

³³⁷ Carys J Craig, “Artificial Intelligence and the Limits of Copyright Law” (2021) 34:2 *Intellectual Property Journal* 123. See also, Michael Geist, “AI and Copyright: Who Owns AI-Generated Works?” (2023) Centre for International Governance Innovation Policy Brief.

³³⁸ *CanLII v Caseway AI*, Notice of Civil Claim, BCSC Vancouver Registry (filed 2024).

³³⁹ *Toronto Star Newspapers Ltd v OpenAI, Inc.*, Statement of Claim, Ont Sup Ct J (filed 2024).

³⁴⁰ Samuelson-Glushko Canadian Internet Policy and Public Interest Clinic, *Application to Rectify CIPO Register under s. 57(4), Suryast Painting* (2025) (mondaq.com).

³⁴¹ European Union, Regulation (EU) 2024/1689 of the European Parliament and of the Council of 13 June 2024 laying down harmonised rules on artificial intelligence (Artificial Intelligence Act), [2024] OJ L 1689 (AI Act).

³⁴² European Commission, “The Artificial Intelligence Act”, online: <https://digital-strategy.ec.europa.eu/en/policies/regulatory-framework-ai>

³⁴³ European Commission, “Navigating the AI Act” (Digital Strategy, 2024), online: <https://digital-strategy.ec.europa.eu>

artistic works are created or inspired by branded virtual assets. These virtual assets may already have registered protection, but they also represent virtual goods intentionally simulating real-life physical contexts and brand data that are simultaneously active in the real world. This intersection of the virtual and real realms raises unique challenges in applying copyright law effectively, making it essential for policymakers and legal experts to carefully examine and adapt copyright principles to accommodate the complex nature of metaverse environments and the diverse forms of creative expression they engender.

2.7 Patents and Industrial Design in the Metaverse

The modern fashion industry has undergone significant transformation, evolving from a primary focus on utility, to one which incorporates and embraces cutting-edge and innovative technologies. This evolution recently led to the integration of embedded technology into wearable products and accessories that serve as supplementary or even primary components that enable various functionality advancements. They can aid in diagnosing medical conditions, assist with treatment, and provide convenient ways to connect with smartphones and other devices. At the touch of a button on a wearable or digital accessory, users can access and engage with systematically embedded technology. This convergence of fashion and technology has introduced new possibilities for enhanced functionality and user experiences in the realm of fashion. Not only is it capable of collecting and utilizing data to enhance a user's health and lifestyle, but it can also provide for improved comfort and convenience. Leaps ahead, this has now developed further to encompass extended reality (XR) with the blurring of our physical and virtual worlds within the metaverse. In this sense, patent protection becomes critical, especially in the fashion industry where historically, these rights were relatively limited. The advent of novel materials, advanced manufacturing techniques, and the integration of complex metaverse and extended reality elements have brought about significant complexities in the fashion industry. Notably, the inclusion of functional features within designs and the rapid dissemination of new designs to other products have heightened the importance for brands to adopt a scrupulous approach to their IP strategies.

Relevant to the metaverse are both utility patents and industrial design rights (known as design patents in the United States), which though their respective functions and doctrinal limits must be carefully distinguished. Utility patents protect functional inventions, including the technological systems and processes underlying extended reality (XR) environments, whereas industrial design law protects only the ornamental appearance of an article. The present difficulty is that industrial design regimes have been historically premised on the existence of a “finished article”, raising uncertainty as to whether, and in what circumstances, purely digital or virtual objects fall within this category. Under

the Canadian *Industrial Design Act*, “shape, configuration, pattern or ornament and any combination of those features that, in a finished article, appeal to and are judged solely by the eye” are protected, subject to the requirement of originality.³⁴⁴ This formulation underscores the central doctrinal constraint: the design must be applied to a “finished article”, rather than existing as a purely disembodied visual expression.³⁴⁵ By analogy, a depiction of clothing within a painting would not render those garments protectable “articles”; instead, protection would attach, if at all, to the artistic work as a whole under copyright.³⁴⁶ Similarly, a virtual garment that exists only as part of a broader digital environment may not clearly satisfy the requirement of being a discrete article to which design features are applied. While certain screen-displayed designs, such as graphical user interfaces, have been accommodated within existing frameworks, often by treating the display device as the relevant article, this reasoning does not map neatly onto standalone virtual goods, including avatar clothing and digital accessories circulating independently within metaverse platforms.³⁴⁷ A comparable limitation arises under U.S. design patent law, which requires embodiment in an “article of manufacture,” reinforcing the same conceptual tether to materiality.³⁴⁸

This doctrinal ambiguity is particularly significant given the increasing economic and cultural prominence of virtual fashion and digital wearables within the metaverse. Notably, much of the existing intellectual property activity in this space has concentrated on utility patent protection for enabling technologies, including AR, VR, and MR systems, rather than on the aesthetic features of the virtual goods themselves. Companies such as Meta, Roblox, NVIDIA, Epic Games, Apple, Microsoft, and Unity Technologies have primarily focused on patenting the infrastructure of immersion, rather than securing protection for the visual design of virtual fashion assets. This divergence underscores a central tension: while the technological architecture of the metaverse is well protected, the ornamental and expressive dimensions of digital fashion remain only partially accommodated within existing industrial design frameworks, thereby exposing a gap between legal doctrine and contemporary modes of creation and commercialization.³⁴⁹

The regimes surrounding industrial design rights recognize the “public policy benefit of providing protection for ornamental aspects of articles, including their shape, configuration, colour, or pattern...[it] recognizes that articles may have aesthetic value that is expensive to create, but easy to

³⁴⁴ *Industrial Design Act* RSC 1985, c I-19, s 2.

³⁴⁵ *Kantel v Grant*, [1933] Ex CR 84 at 92–94. See also, *Hutton v Canadian Broadcasting Corp* (1989), 26 CPR (3d) 481 (FCTD).

³⁴⁶ *Copyright Act*, RSC 1985, c C-42, ss 2.

³⁴⁷ Canadian Intellectual Property Office, *Industrial Design Office Practice Manual* (Ottawa: CIPO).

³⁴⁸ 35 USC § 171; See also, *Samsung Electronics Co v Apple Inc*, 580 US 53 (2016); *Curver Luxembourg SARL v Home Expressions Inc*, 938 F (3d) 1334 (Fed Cir 2019).

³⁴⁹ Victor, Krichker, Paul Blizzard & Benjamin Todd, “IP Metaverse Series - Part III: Industrial Design Protection in the Metaverse”, (15 August 2022), online: *Bereskin & Parr - IP Metaverse Series* <<http://www.bereskinparr.com/doc/ip-metaverse-series-part-iii-industrial-design-protection-in-the-metaverse>>.

copy.”³⁵⁰ By obtaining design patents or industrial design protection, fashion brands can safeguard their innovative and visually appealing virtual fashion creations or virtual assets, including the unique visual or ornamental aspects of a product design. In the U.S. Code regarding patents for designs section 171 (a) provides that “whoever invents any new, original, and ornamental design or an article of manufacture may obtain a patent...”³⁵¹ In the United States, design patent protection requires that a claimed design be “applied to or embodied in an article of manufacture” under 35 U.S.C. § 171.³⁵² While U.S. practice permits applicants to claim the visual appearance of a design through drawings, sometimes described as a “picture patent,” and allowing protection of either the design as a whole or selected elements thereof, this flexibility does not displace the foundational requirement that the design be tied to an article.³⁵³ In practice, this has enabled protection for graphical user interfaces and screen-displayed designs, where the display device is treated as the relevant article of manufacture. However, it remains uncertain whether purely virtual, non-functional objects, such as standalone digital fashion items existing independently of any physical or device-bound context, would satisfy this requirement. Accordingly, it should not be assumed that the appearance of virtual goods in the metaverse, without more, falls within the current scope of U.S. design patent protection. One challenge on a metaverse platform is that the scope of protection granted by a design patent is limited to the views depicted in the patent. However, one strategy to broaden the coverage is to file an application that encompasses the overall design concept, rather than precisely matching each specific detail. By taking this approach, the possibility to extend the protection beyond the exact depiction, allowing for broader coverage of the design avails itself. However, it is not inconceivable to think that it may soon become possible to have a 3D digital file attached to a patent application that represents the virtual asset and the experience that it provides more accurately, rather than being limited to a pictorial adaptation in the form of a 2D drawing. Further difficulties may arise in meeting the originality test. Fackrell purports that, “design patent requirements of novelty and non-obviousness do not subsume copyright’s creativity requirement....Therefore, it is simply not correct to assert or assume that the standard of design patent validity is “higher” than the standard for copyrights...— it’s just different.”³⁵⁴ In this regard, they are independent obstacles to be passed by a creator in order to obtain IP rights. According to Fackrell, this is the reason why many design patents in the U.S. neglect to meet the low standard of “minimal creativity” asserted by the Supreme Court in *Feist*,³⁵⁵ The standard of originality obstacle is critical, and one should not “assume that it is subsumed within the other requirements of patentability” – a sentiment that will be applicable in the digital space as well.

³⁵⁰ *Ibid.*

³⁵¹ 35 USC § 171(a).

³⁵² *Ibid.*

³⁵³ *Ibid.*

³⁵⁴ Sarah Fackrell, “Uncreative Designs” (2024) 73:1437 Duke Law Journal 1485–1487, online: <<https://papers.ssrn.com/abstract=4496762>>.

³⁵⁵ *Ibid.*

A discussion on patents in this space would be remiss and inadequate if it did not address Nike Inc's registration for a "system and method for providing cryptographically secured digital assets."³⁵⁶ As a creative blockchain-enabled system for recording and transferring the ownership of shoes, the patent describes how the digital assets shall be attached to the physical products. Further, it outlines that the ownership of the shoes would be recorded on the blockchain-based platform at the time of purchase and can be traceable with each owner and transfer. The patent consists of "cryptographic digital assets for footwear and apparel" facilitated by a methodology for developing such assets and decentralized computing systems using blockchain control mechanisms for "mining, intermingling, and exchanging blockchain-enabled digital shoes and apparel."³⁵⁷ The patent description provided in the registration explains the use of these methods:

By way of example, and not limitation, there are presented cryptographic digital assets that are provisioned through a blockchain ledger of transaction blocks and function, in part, to connect a real-world product, such as a physical shoe, to a virtual collectible, such as a digital shoe. When a consumer buys a genuine pair of shoes—colloquially known as "kicks"—a digital representation of a shoe may be generated, linked with the consumer, and assigned a cryptographic token, where the digital shoe and cryptographic token collectively represent a "CryptoKick". The digital representation may include a computer-generated avatar of the shoe or a limited-edition artist rendition of the shoe. The digital asset may be secured by an encryption-protected block that contains a hash pointer as a link to a related block in a decentralized blockchain, a transaction timestamp, and transaction data.

As this suggests, the CryptoKick patent introduces a novel concept where, upon making a purchase, the buyer is granted a corresponding NFT to verify authenticity and ownership of the item. If the NFT and its associated item are subsequently sold or traded in the future, the digital tokens can be transferred along with the physical object. Moreover, the patent goes on to describe a ground-breaking feature referred to as "breeding." This innovative process involves combining two distinct NFTs to generate an offspring NFT, a capability that was previously non-existent before this patent. Consequently, this breeding mechanism enables the creation of new digital and physical pairs by incorporating elements from two different NFTs, offering the consumer an unprecedented level of creativity and versatility within the metaverse. The collector now becomes the designer to a certain extent as new colourways and original pairings are now possible.

This level of creative freedom and versatility within the metaverse space offers exciting possibilities for customization and exclusivity of Nike's Cryptokicks. Through this system, the digital metaverse and physical real-world can seamlessly merge. Collectors can not only showcase their creations within the digital realm but also have the potential to manifest their designs into physical products, thereby blurring the boundaries between virtual and tangible experiences. This convergence opens novel avenues for the fashion and design industry, enabling unique and personalized offerings to

³⁵⁶ "System and method for providing cryptographically secured digital assets", Patent No US10505726B1 (28 May 2019).

³⁵⁷ *Ibid.*

customers, and pushing the boundaries of traditional product creation and ownership in the metaverse. Therefore, this has become a key example of best practices in this space, which utilizes patent protection and ensures the leveraging of a brand's safeguarded presence for longevity and commercialization in the metaverse. In practice, collectors who combine NFTs to produce a new "offspring" token typically obtain a limited licence to use and display the resulting digital asset, rather than full ownership of the underlying intellectual property embodied in the brand design.³⁵⁸ The brand owner, in this case, Nike, generally retains trademark rights in the Nike marks, trade dress, and product configuration, as well as any copyright or design rights in the original sneaker artwork. The collector's contribution through "breeding" may generate a new tokenized instance or configuration, but this is usually treated as a derivative asset governed by the platform's licensing terms, not a wholly independent IP work owned by the user.³⁵⁹ Consequently, unless the licensing framework expressly grants broader rights, the collector effectively owns the NFT token and associated transfer rights, while Nike retains the core IP in the brand, underlying designs, and patented system enabling the customization process.

Nike is not the only prominent company creating evolutionary changes in this space. We see many other companies developing their technologies to cater towards a metaversal audience. ArentFox Schiff's IP group states that among metaverse-specific technologies that companies are seeking patents for are "systems for optimizing shared views of virtual objects to multiple wearers of VR headsets; algorithms for generating and moving virtual shapes and scenes in a VR environment based on hand gestures, head motion, or line of sight of the user; systems for generating haptic feedback corresponding to users' interaction with virtual objects in a virtual environment; and methods for generating 3D avatars of the users, which emulate users' appearance and behaviour," among many others.³⁶⁰ With regard to ensuring that these technologies meet the requirements to successfully obtain a patent, brands must avoid issues that cause rejection, such as the ones under 35 U.S.C. § 101, and must from the onset "emphasize technical improvements of the technology, incorporate technical steps that can be argued as non-abstract, and ensure that a specification fleshes out a problem-solution combination that can be tied to a practical application."³⁶¹ The CryptoKick is an exemplary case study as it demonstrates the opportunity for overlap and interplay of multiple intellectual property rights within one digital innovation, and illustrates how brands are utilizing crypto technology and blockchain-based systems to re-invent the retail space with their convergence of the metaverse.

³⁵⁸ World Intellectual Property Organization, *Intellectual Property and Blockchain: A WIPO White Paper* (Geneva: WIPO, 2022) at 27–30

³⁵⁹ Dev Gangjee, "Non-Fungible Tokens and the Future of Trade Marks" (2023) 18:2 *Journal of Intellectual Property Law & Practice* 95 at 99–101

³⁶⁰ Michael Fainberg & Mohammad Zaryab (ArentFox Schiff), "Patenting the Metaverse", (25 March 2022), online: *JD Supra - Legal News* <<https://www.jdsupra.com/legalnews/patenting-the-metaverse-9675581/>>.

³⁶¹ *Ibid.* See also, 35 U.S.C. § 101. Also see, *Alice Corp. v. CLS Bank International*, 573 U.S. 208 (2014).

The role that industrial designs (design patents) play in the fashion industry in this space are often in the form of ornamental elements of VR and AR to create virtual spaces for users to interact, or virtual clothing worn by avatars to ensure unique and protectable visual designs that have a novel aspect of its appearance. Rather than assuming that virtual garments, avatar accessories, or immersive spatial designs fall comfortably within existing industrial design regimes, it is necessary to recognize that the doctrinal foundation of these rights remains tied to the concept of an “article of manufacture”.³⁶² In many jurisdictions, this requirement has limited the direct protection of digital objects themselves. Instead, industrial design law has gradually extended to protect graphical user interfaces (GUIs) and related screen-displayed elements (such as icons, fonts, and interface layouts) where the design is considered part of a product displayed on a physical device.³⁶³ These software-based visual elements shape the user experience and help distinguish one brand’s digital ecosystem from another, thereby performing functions similar to ornamental design in the physical marketplace. Judicial developments illustrate both the potential and the limits of this approach. It is evident that GUIs are an integral element protected by design patents through cases such as the *Apple Inc v Samsung Electronics Co.*³⁶⁴ In this case, the United States Court of Appeals for the Federal Circuit upheld a significant damages award for infringement of Apple’s design patents covering aspects of the iPhone’s graphical user interface, confirming that certain screen-displayed designs can qualify for design protection when tied to a device as the relevant article of manufacture.³⁶⁵ Yet this framework remains imperfect for the metaverse. If protection is confined to digital designs merely as they appear on a screen, it does not adequately capture the independent commercial value of virtual objects such as avatar clothing, accessories, or immersive architectural environments. As commentators have observed, “effective protection of these rights requires recognition of virtual objects as articles to which industrial design protection can apply,” rather than limiting protection to two-dimensional displays on physical devices.³⁶⁶ Consequently, the emergence of fully immersive digital marketplaces may require jurisdictions to reconsider the scope of industrial design protection and potentially expand it to encompass virtual goods and other digital assets that function as the aesthetic equivalents of physical products within virtual environments.³⁶⁷ Such an approach would better reflect the growing convergence of physical and digital commerce and ensure that designers operating in the metaverse receive protection comparable to that available for tangible fashion products.

³⁶² World Intellectual Property Organization, *Industrial Designs: Guidelines for Examination* (Geneva: WIPO, 2021) at 5–6.

³⁶³ *Apple Inc v Samsung Electronics Co*, 786 F (3d) 983 (Fed Cir 2015).

³⁶⁴ *Ibid.*

³⁶⁵ *Ibid.* See also, “Graphical User Interface for a Display Screen or Portion Thereof”, US Patent No D604,305S (23 June 2007).

³⁶⁶ Mark P. McKenna, “Industrial Design Protection for Graphical User Interfaces: Expanding the Concept of the Article of Manufacture” (2020) 37:2 BCL Rev 455 at 462.

³⁶⁷ World Intellectual Property Organization, *Intellectual Property and the Metaverse: Challenges and Opportunities* (Geneva: WIPO, 2023) at 21–23.

As noted, the United States provides protection for patent designs for a “new, original and ornamental design or an article of manufacture...”³⁶⁸ To comply with the article of manufacture requirement, the USPTO requires applicants to show the design applied to or was embodied in an article of manufacture, but again, this can be complicated when applied to virtual assets. The USPTO therefore conducted consultations to understand the public view on the article of manufacture requirement and protection of “designs for projections, holograms, and virtual and augmented reality (PHVAR)” as they will be relevant for substantial industrial design protection for virtual assets in the metaverse.³⁶⁹ Supporters of PHVAR design protections commented on their appreciation of virtual assets as new forms of ornamental software-generated objects which can be seen to be analogous to GUIs, fonts and logo and have asserted that the “tangible” requirement is not an explicit one under section 171.³⁷⁰ Supporters argue that it would be a significant step for the U.S. to remove the requirement for a computer-generated icon to be embodied within a computer screen in order to support a “technologically neutral” design protection structure.³⁷¹ One commenter suggested that the “interpretation of the ‘article of manufacture’ should be extended to computer generated images of many of the emerging technologies...[and] that the USPTO should interpret the term broadly enough that the image may be a component of the overall product.”³⁷² These supporting comments express the opinion that there is no substantial distinction between computer-generated type fonts and other computer-generated designs and therefore, PHVAR elements and GUIs should all be a part of a broad group of graphical interfaces that should be afforded equal protection – that the ephemeral and non-static physical nature of designs for PHVAR should not be disqualified.³⁷³

Critics of the view that these designs should be protectable under 35 U.S.C. § 171 argue that virtual assets are not fundamentally new types of designs, rather, they are virtual representations of a physical asset. This may not always be the case, however. One opposing commenter suggested that, “the article of manufacture requirement helps ensure that design protection is accorded only to the design’s ornamental aspects, aiding both courts and examiners in making determinations regarding eligibility for protection.”³⁷⁴ Further, the commenter stated, “untethering the scope of a design patent from the article of manufacture would compromise the patent’s ability to define the patented design and

³⁶⁸ 35 U.S.C. § 171(a).

³⁶⁹ USPTO, “Summary of public views on the article of manufacture requirement of 35 U.S.C. § 171” (2022) United States Patent and Trademark Office Working Paper, online: <<https://www.uspto.gov/sites/default/files/documents/USPTO-Articles-of-Manufacture-April2022.pdf>>.

³⁷⁰ *Ibid.*

³⁷¹ *Ibid.*

³⁷² USPTO, *Summary of public views on the article of manufacture requirement of 35 U.S.C. § 171* (United States Patent and Trademark Office, 2022).

³⁷³ *Ibid.* In support, commenters pointed to the U.S. Court of Customs and Patent Appeals’ decision in *In re Hruby* and indicated that “the court found that the portion of a water fountain which is composed entirely of water qualifies as an article of manufacture. See also, *In re Hruby*, 373 F (2d) 997 (C.C.P.A. 1967).

³⁷⁴ *Ibid.* See also, Krichker, Blizzard & Todd, *supra* note 347.

to give later innovators clear notice of its metes and bounds.”³⁷⁵ With regard to the article of manufacture requirement, commentators also suggested that:

maintaining the connection between the protected design and the article of manufacture to which it is applied is crucial for at least the three following reasons: First, it is necessary for design patents’ notice function: tying design patent protection to a specified article of manufacture provides usable notice. Second, the article of manufacture assists parties in distinguishing between a designs [sic] functional and ornamental aspects. Third, it ensures that design patents efficiently protect what the patentee has contributed over the prior art while leaving room for other novel and innovative designs. In short, the article of manufacture anchors a design patent.³⁷⁶

The Canadian *Industrial Designs Act* requires that a registrable design (i.e., icons, computer interfaces as status designs) must be applied to a “finished article” which means that non-physical metaversal aspects such as XR may not be considered as a protected element unless it can be applied to a physical finished article.³⁷⁷ With regard to computer-generated animated designs, similar to the U.S. treatment of the article of manufacture requirement, for computer-generated animated designs for example, CIPO requires that each frame of the animation was examined as an individual design which accumulated several design applications for a single animated design. At present, CIPO recognizes that sequences of coordinated graphics can contribute to a unique visual effect which is now appropriately protected by industrial design rights. Section 8.05.08 of the Industrial Design Office Practice Manual, states, “The Industrial Design Office accepts as registrable subject matter computer-generated animated designs that change in appearance while viewing. The reproductions submitted in the application will be viewed as a sequence of frames that define the computer-generated animated design.”³⁷⁸ Therefore, in this sense, it may be likely that other elements within the metaverse that are similar to the technological elements of animated designs, may be protected. However, there is still a long way to go to ensure clarity for protective measures in the metaverse.

The Canadian Modernization of Industrial Design regimes were consistent with joining the Hague Agreement Concerning the International Registration of Industrial Designs which establishes an international system allowing industrial designs to be protected cross-jurisdictionally, covering 96 countries.³⁷⁹ This Agreement follows the International Classification for Industrial Designs (Locarno Classification). The classification’s 14th edition has been developed to include class 14-04 “augmented reality graphical user interfaces [for screen display]” (ID No. 105098), reflecting WIPO’s response to current trends around the metaverse. These progressions indicate Canada’s outlook concerning ensuring

³⁷⁵ *Ibid.*

³⁷⁶ *Ibid.* See also, Guidelines for Examination of Design Patent Applications for Computer-Generated Icons, 61 Fed. Reg. 11380–82 (Mar. 20, 1996).

³⁷⁷ Canadian Intellectual Property Office, *Industrial Design Office Practice Manual*, December 2021 update (Ottawa: Innovation, Science and Economic Development Canada, 2017) at s 8.04.

³⁷⁸ Industrial Design Office Practice Manual | Innovation, Science and Economic Development Canada/Government of Canada”, online: *Government of Canada* <<https://manuels-manuals.opic-cipo.gc.ca>>.

³⁷⁹ “Hague System – The International Design System”, online: WIPO <<https://www.wipo.int/hague/en/index.html>>.

that innovation is encouraged and that effective protection of design rights in the metaverse is supported. North America, however, may be seen by some in this regard as surprisingly lagging behind in terms of making legal advancements toward digital designs and economies. A change in design protection would further global harmonization, and unfortunately if the opposing critiques remain unresolved, it may cause further delays towards positive progression. Meanwhile, U.S. companies are continuing to make trailblazing developments and investments in such technologies within the metaverse and therefore, the underlying pressure for design protection will perhaps reach a boiling point in the foreseeable future as IP laws to support investments and innovations and to prevent unauthorized copying and infringement will become critical issues to be addressed.

The extension of industrial design protection to purely virtual objects in the metaverse, however, remains a contested policy question, with critics cautioning that such expansion may not constitute a desirable or necessary progression. Expanding exclusive rights over digital designs risks over-propertyization, potentially constraining downstream creativity, limiting interoperability across platforms, and restricting user-driven innovation in environments that depend on remixing and collaborative creation.³⁸⁰ From this perspective, the imposition of additional proprietary layers may undermine the openness that has historically driven technological development in digital ecosystems. At the same time, it is arguable that the absence of robust industrial design protection has not hindered innovation. As fashion increasingly transitions into the metaverse, the question arises whether expanding protection to digital garments and virtual designs would enhance innovation or, conversely, disrupt this equilibrium by imposing excessive proprietary control over spaces that depend on remixing, interoperability, and rapid creative exchange. Indeed, the continued investment and experimentation in virtual goods, NFTs, and immersive environments suggests not only that existing frameworks are sufficient to sustain commercial activity and incentivize creation³⁸¹, but also that the absence of exclusive monopoly rights in the form of industrial design protection may itself be consistent with – if not conducive to – continued innovation in the metaverse.³⁸²

Protection for graphical user interface and designs are available in many jurisdictions globally that grant design registrations without regard to the appearance of an article of manufacture such as a display screen, as demonstrated in jurisdictions such as Japan, Singapore, and the European Union.³⁸³ The European Union in particular has one of the most flexible systems with regard to filing and eligibility requirements with a broad scope of subject matter for design, supported by regulations from

³⁸⁰ Mark A. Lemley, “IP in a World Without Scarcity” (2015) 90:2 *NYU Law Review* 460 at 468–472.

³⁸¹ Dev Gangjee, “Non-Fungible Tokens and the Future of Trade Marks” (2023) 18:2 *Journal of Intellectual Property Law & Practice* 95 at 99–102. See also, Thomas McCarthy, “Non-Fungible Tokens (NFTs) and Trademark Law” (2022) 105:6 *Trademark Reporter* 1279 at 1285–1288.

³⁸² World Intellectual Property Organization, *Intellectual Property and the Metaverse: Challenges and Opportunities* (Geneva: WIPO, 2023) at 18–23.

³⁸³ USPTO, *supra* note 367.

the *EU Design Directive*³⁸⁴ and *Community Design Regulation (CDR)*.³⁸⁵ This includes EU-level protections through a Registered Community Design (RCD) or national design patent registration (i.e. Registered Design Protection in France).³⁸⁶ The RCD system provides for unified mechanisms for protecting visual aspects of virtual designs in this space. Generally, graphical user interface protection includes, “visual elements of a computer program, graphical designs, computer-generated images, and even intangible visual designs, so long as the design represents the appearance of a product” defined under EU law as including graphic symbols and other visually perceptible design features, but excluding the underlying computer program itself.³⁸⁷ Additionally, the EUIPO, unlike the USPTO, does not require for an article of manufacture to be displayed in the drawings. The European Commission’s ‘Proposal for a Regulation of the European Parliament and of the Council to amend Council Regulation (EC) No 6/2002 on Community designs and repealing Commission Regulation (EC) No 2246/2002’³⁸⁸, as well as the ‘Proposal for a Directive of the European Parliament and of the Council on the legal protection of designs’, now reflected in the recast Directive and amended Community Design Regulation,³⁸⁹ seeks to “encourage innovation and the creation of new product design in the digital age [as] there is an increasing need for accessible, future-proofed, effective and consistent legal protection of design rights.”³⁹⁰ It aims to implement design protection system in the EU that are updated for the new digital landscape, including the metaverse, and make them “accessible and efficient” and to “allow applicants to reproduce their designs anywhere in a clear and precise way, using generally available technology.”³⁹¹ As articulated in the EU’s design reform package, initially proposed by the European Commission and now reflected in the recast Directive and amended Community Design Regulation,

To this end it is necessary to give unitary definitions of the notions of design and product, which are clear, transparent, and technologically up-to-date considering also the advent of new designs not being embodied in physical products. Without the list of relevant products being an exhaustive one, it is appropriate to distinguish products embodied in a physical object, visualised in a graphic, or that are apparent from the spatial arrangement of items intended to form, in particular, an interior environment.

³⁸⁴ EU, *Directive 98/71/EC of 13 October 1998 on the legal protection of designs*, OJ L289/28, 28 October 1998.

³⁸⁵ Regulation 6/2002 of 12 December 2001 on Community designs, OJ L3/1, 5 January 2002.

³⁸⁶ There is some uncertainty regarding the use of unregistered design rights in the EU and if showcasing pieces in a virtual environment constitutes “first publication” and does the use of a protected design amount to use under Articles 10 and 19 CDR?

³⁸⁷ *IP Policy and International Affairs Bulletin*, “As industrial designs move to the virtual environment, laws and practices around the globe are changing” (USPTO, 2022). Note: Under the Directive 98/71/EC on the legal protection of designs and the Council Regulation (EC) No 6/2002 on Community designs, a “product” is specifically defined as: “any industrial or handicraft item, including inter alia parts intended to be assembled into a complex product, packaging, get-up, graphic symbols and typographic typefaces, but excluding computer programs.”

³⁸⁸ EC, *Proposal for a Regulation of the European Parliament and of the Council amending Council Regulation (EC) No 6/2002 on Community designs and repealing Commission Regulation (EC) No 2246/2002*, [2022] 2022/0391/COD.

³⁸⁹ EC, *Proposal for a Directive of the European Parliament and of the Council on the legal protection of designs*, [2022] 2022/0392/COD. See also, *European Union, Regulation (EU) 2024/2822 of the European Parliament and of the Council of 23 October 2024 amending Council Regulation (EC) No 6/2002 on Community designs and repealing Commission Regulation (EC) No 2246/2002*, [2024] OJ L 2822. See also, European Commission, *Proposal for a Regulation of the European Parliament and of the Council amending Council Regulation (EC) No 6/2002 on Community designs*, COM(2022) 666 final (28 November 2022).

³⁹⁰ *Ibid.*

³⁹¹ *Ibid.*

In this context, it should be recognised that the movement, transition or any other sort of animation of features can contribute to the appearance of designs, in particular those not embodied in a physical object.³⁹²

The Directive recognizes a definition of designs and products not embodied in a physical object that is clear, transparent, and technologically updated will be a distinction that other jurisdictions will look to for modelling their own regulatory practices. Products are defined as “any industrial or handicraft item other than computer programs, regardless of whether it is embodied in a physical object or materialises in a digital form, including... graphic works or symbols, logos, surface patterns, typographic typefaces, and graphical user interfaces.”³⁹³ In the same article, designs are defined as “the appearance of the whole or a part of a product resulting from the features, in particular, the lines, contours, colours, shape, texture, materials of the product itself and/or its decoration, including the movement, transition or any other sort of animation of those features.”³⁹⁴ These definitions clearly and broadly include elements that are materialized in a digital form, making the proposal for a regulation aligned with the technological advancements of today. It also may prove to offer brands operating in this space greater scope for legal certainty and transparency as to the subject matter eligibility for design protection in the metaverse.

Against this backdrop, the need for greater international harmonization in design protection standards becomes increasingly apparent, particularly as digital assets circulate seamlessly across jurisdictions while legal protections remain territorially fragmented. The lack of harmonization between different jurisdictions can often burden applicants with limited resources, especially foreign applicants who designate the U.S. through the Hague system and prepare drawings that conform to the EU rather than U.S. requirements, only to face refusal and subsequent revision under stricter U.S. formalities. International organizations, including INTA, recognize the growing commercial significance of GUIs, graphical animations, holographic and extended reality designs (PHVAR), extending to include virtual interior designs, and accordingly, they recommend that these should be eligible for registration independently without requiring them to be placed on a physical article.³⁹⁵ INTA proposes that PHVAR designs should be stipulated, “(i) independent of any other form of IP protection available; (ii) regardless of the technical means of creating it, and (iii) whether such designs are integral to the operation of a (electronic) device, interactive with a user or (electronic) device, or placed or embodied in a physical article or electronic device, e.g., projected onto a screen, monitor, or other display; projected on to a surface or into a medium (including air); or otherwise only appear when technology

³⁹² *Ibid.*

³⁹³ *Ibid.*

³⁹⁴ *Ibid.*

³⁹⁵ *Guidelines for Examination of Industrial Designs a Report on Consensus Points for Examination of Industrial Design Applications* (INTA Design Law And Practice Subcommittee, 2021).

is activated.”³⁹⁶ The emphasis here is on device-neutral protection, ensuring that eligibility does not depend on the medium through which a design is perceived. This approach reflects a shift toward accommodating the realities of metaverse technologies and underscores the importance of reforming existing legislative frameworks to better capture digitally native design subject matter.

Recent multilateral developments further signal movement toward procedural harmonization, though not necessarily substantive convergence. The Riyadh Design Law Treaty, adopted under the World Intellectual Property Organization in 2024, seeks to streamline and simplify international design registration procedures, particularly for applicants seeking protection across multiple jurisdictions.³⁹⁷ While the Treaty represents a significant step toward reducing administrative burdens and improving access to global design systems, it remains largely procedural in nature and does not resolve the substantive divergences concerning what constitutes a protectable design.³⁹⁸ In particular, it does not mandate the recognition of purely digital or virtual designs as eligible subject matter, leaving unresolved the very challenges posed by the metaverse.³⁹⁹ As such, while the Riyadh Treaty enhances efficiency within existing frameworks, further substantive alignment, particularly regarding the recognition of non-physical and dynamic designs, will be necessary to achieve meaningful global harmonization in this space. While the Riyadh Design Law Treaty represents a step toward procedural convergence, it builds upon existing frameworks such as the Hague Agreement Concerning the International Registration of Industrial Designs, which already enables applicants to secure protection across multiple jurisdictions through a single international filing.⁴⁰⁰ This system has significantly streamlined global design protection and expanded access to international markets. However, its effectiveness also remains contingent on the substantive laws of designated states, which continue to diverge on the threshold issue of what constitutes a protectable design. As a result, while procedural harmonization has advanced considerably, particularly through WIPO-administered systems, substantive harmonization, especially regarding non-physical, animated, and immersive digital designs, it remains incomplete. Further, although global design law is undergoing incremental procedural harmonization, substantive fragmentation persists, particularly with respect to digital and metaverse-based subject matter.

Industrial design protection overall can provide several benefits for fashion brands designing virtual assets within the metaverse. Protection of these rights seeks to facilitate the establishing and maintaining of brand identity and differentiation by protecting specific design elements. Having a

³⁹⁶ *Model Design Law Guidelines – A Report on Consensus Points for Design Rights Laws* (INTA International Design Harmonization Subcommittee of the Designs Committee, 2023).

³⁹⁷ World Intellectual Property Organization, *Riyadh Design Law Treaty* (adopted 2024).

³⁹⁸ *Ibid.*

³⁹⁹ World Intellectual Property Organization, *Intellectual Property and the Metaverse: Challenges and Opportunities* (Geneva: WIPO, 2023) at 18–23.

⁴⁰⁰ World Intellectual Property Organization, *Hague Agreement Concerning the International Registration of Industrial Designs* (Geneva: WIPO, 1999).

unique virtual asset can differentiate a brand from competitors and build recognizable fashion presence. Brands can then further leverage this presence by creating licensing and collaboration opportunities for their virtual designs to other users or developers to create new revenue streams and to expand their brand reach. Industrial design protection can also provide a legal mechanism against copying of a unique and recognizable virtual fashion design with safeguards for replicating without permission to provide the basis for enforcement against infringement in the metaverse. Infringement of design patents occur “if in the eye of an ordinary observer, giving such attention as a purchaser usually gives, two designs are substantially the same, if the resemblance is such as to deceive such an observer, inducing him to purchase on supposing the other... and must prove a preponderance of the evidence.”⁴⁰¹ Further, if the “claimed and accused designs are ‘sufficiently distinct’ and ‘plainly dissimilar,’ the patentee fails to meet its burden of proving infringement as a matter of law.”⁴⁰²

In a scenario whereby the claimed and accused’s designs are not plainly dissimilar, it may be beneficial to compare the two designs with prior art to identify specific differences that are not noticeable in the abstract but would be important to the “hypothetical ordinary observer familiar with the prior art” with ornamental aspects of the design as a whole.⁴⁰³ If identification of prior art is entirely based on virtual assets, blockchain mechanisms of traceability can be relied on. Blockchain applications provide a mechanism for designers to register (a hashed fingerprint of) their unpublished designs on the blockchain. In this manner, a “time-stamped, immutable proof of the design or other creation will come into existence, without the need to make the design available to the public.”⁴⁰⁴ This immutable legal proof of registration on a blockchain can be used as reliable evidence in any potential registration procedures, as well as in ownership, authorship or priority disputes, documentation, and for transactions such as the sale of the design rights or to assist with a design patent infringement action. Moreover, remedies for a successful design patent infringement action may include a permanent injunction against future infringement, profits earned by the infringer, and the patent-holder’s damages.⁴⁰⁵ These efforts would seek to recover not only the design right for the virtual asset, but also the brand’s identity within the metaverse and potentially the physical consumer market.

Industrial designs (design patents in the U.S.) have a notable role in the metaverse within the context of the fashion industry. They have the potential to play a significant role in the metaverse within

⁴⁰¹ *Egyptian Goddess, Inc. v. Swisa, Inc.*, 543 F (3d) 665, 670, 279 (Fed Cir 2008).

⁴⁰² *Ibid* at 678. See also, Barbara Kolsun & Douglas Hand, *The Business and Law of Fashion and Retail* (Durham, North Carolina: Carolina Academic Press, 2020).

⁴⁰³ *Ibid*.

⁴⁰⁴ Javier García, ed, *Fashion Law: Trends and New Challenges* (Paris, France: LexisNexis: UIA International Association of Lawyers, 2020).

⁴⁰⁵ Christopher A Guerreiro et al, “Federal Court of Appeal confirms presumptive entitlement to injunctive relief and accounting of profits in patent infringement cases”, online: *Norton Rose Fulbright* <<https://www.nortonrosefulbright.com/en/knowledge/publications/e17c37b7/federal-court-of-appeal-confirms-presumptive-entitlement>>.

the fashion industry, but their applicability remains doctrinally constrained under current law. While virtual representations of fashion products and designs are increasingly created, commercialized, and traded in immersive environments, industrial design regimes have traditionally protected only the ornamental appearance of physical articles. As a result, the extent to which purely digital fashion items, such as avatar clothing or virtual accessories, can be protected remains uncertain and varies across jurisdictions. In practice, protection has been more readily available for graphical user interfaces and screen-displayed designs, where the design is tied to a device as the relevant “article,” rather than for fully independent virtual objects. Accordingly, it cannot be assumed that industrial design law, as it currently stands, systematically enables fashion brands to secure protection for the aesthetic features of virtual goods in the metaverse. Notwithstanding these limitations, there is a compelling normative case for extending industrial design protection to encompass digital and metaverse-based fashion assets. Virtual garments and accessories perform functions analogous to their physical counterparts: they convey brand identity, embody creative expression, and carry significant commercial value within digital marketplaces. Denying design protection to such assets risks creating a regulatory gap in which visually distinctive digital designs are vulnerable to imitation without adequate recourse, particularly where copyright or trademark protections may be ill-suited to capture purely aesthetic features. Extending industrial design regimes to recognize virtual objects as protectable subject matter would enhance legal certainty, incentivize investment in digital fashion innovation, and align intellectual property law with the evolving realities of commerce in immersive environments. At the same time, such reform would need to be carefully calibrated to avoid over-propertization, ensuring that protection does not unduly restrict interoperability, user creativity, or the iterative nature of design in the metaverse.

To conclude on this chapter’s observations on the role in which trademark, copyright and industrial designs in the context of the fashion industry play within the metaverse, it is evident that brands must be cognizant of creating branding mechanisms and designs in a proactive and defensive manner in this advancing space. As the metaverse persistently evolves, the challenge for fashion moving into the digital realm will be enforcement, territoriality and traceability, as well as the potential interoperability of these platforms, along with the inevitable challenges of applying conventional legal doctrines in this context. It may also be a practical mechanism for governments, trademark and copyright offices and treaty organizations to consider revised standards of review for governance in virtual and augmented realities.⁴⁰⁶ It is evident that fashion brands must adopt deliberate and forward-looking intellectual property strategies that are both proactive and defensive in nature. While

⁴⁰⁶ Note: As a leading example, the Trademark Manual of Examining Procedure (TMEP) released by the USPTO includes practical knowledge in the form of screenshots and mock-ups of acceptable use-cases in the context of the Internet. An extended version of this manual to examine virtual environments and to provide guidance of acceptable and unacceptable IP use in the metaverse would be helpful. See, Catherine Mateu et al, *supra* note 166.

trademarks and copyright presently offer the most immediate and adaptable forms of protection for digital fashion assets, the application of industrial design law remains partial and uneven, exposing a structural gap between existing legal frameworks and the realities of immersive, digitally native commerce. As the metaverse continues to evolve, the principal challenges will not only concern enforcement, territoriality, and traceability, but also the interoperability of platforms and the increasing difficulty of mapping conventional legal doctrines onto decentralized and borderless environments.

In this context, the question is not merely how existing rights can be enforced, but whether they are conceptually sufficient. The absence of comprehensive protection for virtual designs may, on one view, reflect a productive openness that enables innovation and user-driven creativity; yet it may also signal a misalignment between legal protection and commercial value in digital markets. Accordingly, there is a growing need for governments, intellectual property offices, and international bodies to consider measured recalibrations of doctrinal standards, particularly with respect to the recognition of digital and non-physical subject matter. Any such evolution must strike a careful balance – extending protection where necessary to incentivize investment and preserve brand integrity, while avoiding over-propertization that could stifle the very dynamism that defines the metaverse. Ultimately, the development of coherent judicial approaches and internationally harmonized regulatory practices will be essential in shaping a legal environment capable of addressing misappropriation and fostering sustainable innovation within this emerging global digital ecosystem.

Chapter 3: IP Law and its Limitations in the Metaverse

3.1 Introduction to IP Law and its Limitations

Scholars such as James Boyle posit that “the new state-created property rights may be ‘intellectual’ rather than ‘real,’ but once again things that were formerly thought of as either common property or uncommodifiable are being covered with new, or newly extended, property rights.”⁴⁰⁷ This can be applied in the most recent iterations of the metaverse and the philosophical conceptions of “digital emancipation” in application of IPR which comes with its own set of challenges within this space. As early cases have shown, violations of IPR through sales made for the purposes of profit or to confuse consumers as to the source of or endorsement of virtual goods being sold, have presented issues of misappropriation of trademarks, dilution, cybersquatting, false designation of origin and description, and injury to business reputation. These legal issues surrounding the integrity of consumer-engagement mechanisms and brand strategy question whether brand owners can rely on intellectual property registrations that strictly cover blockchain technology, BNFT/NFTs, and other relevant digital assets to enforce their rights in the metaverse.

In the context of NFTs, potential copyright infringement can involve violations of both reproduction and communication rights. Specifically, unauthorized reproduction can occur if the NFT includes copyrighted material without permission of the copyright owner. If the NFT facilitates the distribution or public display of the copyrighted work in a way not originally intended or authorized by the copyright owner, it may infringe on the rights to communicate the work to a new audience.⁴⁰⁸ With regard to trademark infringement of NFTs, this may occur when unauthorized parties mint an NFT linked to the underlying asset without the owner’s permission and advertises, offers or sells the NFT using the owner’s registered trademarks. Such acts may violate the trademark owner’s exclusive rights to use the mark, and may also give rise to a likelihood of consumer confusion and/or trademark dilution.⁴⁰⁹ The link between the limitations of IP law in this space and the legal issues surrounding digital assets require further exploration, with inspiration and exemplar from the recent case of *Hermès International, et al. v. Mason Rothschild*.⁴¹⁰

This section aims to outline limitations within the scope of trademark and copyright law and to tie lessons learned from recent U.S. case law to understand if there may be room for expansion within Canadian legislation to more effectively protect brands within virtual spaces. It focuses on the

⁴⁰⁷ James Boyle, “The Second Enclosure Movement and the Construction of the Public Domain” (2003) 66:1 Law and Contemporary Problems 33–74, online: <<https://scholarship.law.duke.edu/lcp/vol66/iss1/2>>.

⁴⁰⁸ *Supra* note 43.

⁴⁰⁹ *Ibid.*

⁴¹⁰ *Hermès International, et al. v. Mason Rothschild*, 1:22-cv-00384 (SDNY Jun. 23, 2023).

application of confusion liability and its limitations jurisdictionally, brand dilution, depreciation liability and its limitations, as well as copyright limitations and their intersection with Freedom of Expression legislation. In this ever-evolving digital context, case law and legislation from the U.S. can be applied as best practices with strong persuasive authority for Canadian Courts. As I will argue, it will require further legislative development in Canada, however, to sufficiently address the metaversal and external reality nuances applicable to intellectual property rights. This is not only important from a branding perspective, but also critical to ensure that legal interventions and reform efforts overall are realized to guide digital development, including generative AI and digital assets, to serve the social values and public objectives that intellectual property rights are preordained to serve – including the creative progress that copyright law is intended to facilitate.

3.2 U.S. Lanham Act Protections

As a first point of reference, the *Lanham Act* governs trademarks at the federal level in the United States, providing a comprehensive framework for both registered and unregistered marks. At its core, protection under the Act requires that a mark be distinctive and used in commerce, such that it functions to identify and distinguish the source of goods or services. Distinctiveness may be inherent (as in arbitrary or fanciful marks) or acquired through secondary meaning, while “use in commerce” requires bona fide commercial use in connection with goods or services that affect interstate commerce.⁴¹¹ Registered marks benefit from significant procedural and substantive advantages, including a presumption of validity, ownership, and exclusive right to use, whereas unregistered marks may still be protected under § 43(a) of the Act upon proof of goodwill and likelihood of confusion.⁴¹² Registration on the Principal Register under § 2 of the Act (15 U.S.C. § 1052) confers significant procedural and substantive advantages, including constructive notice of the registrant's claim of ownership nationwide,⁴¹³ a legal presumption of the registrant's exclusive right to use the mark in commerce in connection with the registered goods or services,⁴¹⁴ and the possibility of achieving “incontestability” status after five years of continuous post-registration use pursuant to 15 U.S.C. § 1065.⁴¹⁵ Incontestable status substantially narrows the grounds upon which a registration may be challenged, making it a powerful enforcement tool. Unregistered marks, by contrast, may still obtain protection under § 43(a) of the Act (15 U.S.C. § 1125(a)) provided they have acquired sufficient distinctiveness through use, whether inherently distinctive or having acquired secondary meaning in the

⁴¹¹ *Lanham Act*, 15 U.S.C. § 1127 (1946).

⁴¹² *Lanham Act*, 15 USC §§ 1115(a), 1125(a).

⁴¹³ *Lanham Act*, 15 USC § 1072

⁴¹⁴ *Lanham Act*, 15 USC § 1057(b) (providing that a certificate of registration on the Principal Register shall be prima facie evidence of the validity of the registered mark and of the registrant's exclusive right to use the mark in commerce).

⁴¹⁵ *Lanham Act*, 15 USC § 1065. See also, *Park 'N Fly, Inc v Dollar Park & Fly, Inc*, 469 US 189 (1985) at 193–196 (affirming the significance of incontestability status and the limitations it places on challenges to registered marks).

relevant marketplace.⁴¹⁶ The Supplemental Register, available for marks that are capable of distinguishing goods or services but have not yet acquired distinctiveness, affords more limited protections and does not carry the evidentiary presumptions of the Principal Register.⁴¹⁷

The scope of protection under the *Lanham Act* extends beyond mere registration to encompass a range of causes of action, most notably trademark infringement (§ 32), false designation of origin and unfair competition (§ 43(a)), and dilution of famous marks (§ 43(c)).⁴¹⁸ Central to infringement analysis is the likelihood of confusion standard, which assesses whether consumers are likely to be misled as to the source, sponsorship, or affiliation of goods or services. In the context of the metaverse, this inquiry becomes more complex, as consumer interactions occur through avatars, virtual marketplaces, and immersive environments that blur traditional indicators of source and affiliation. Nonetheless, U.S. courts have increasingly demonstrated a willingness to adapt these doctrines to digital contexts, recognizing that virtual goods and experiences may carry the same source-identifying function, and thus the same potential for consumer confusion, as their physical counterparts.

Importantly, the *Lanham Act* also possesses a measure of extraterritorial reach, allowing the U.S. courts to assert jurisdiction over foreign defendants where their conduct has substantial effects on U.S. commerce, as established in *Steele v. Bulova Watch Co.*⁴¹⁹ In this case, the U.S. Supreme Court affirmed that the Act could apply to infringing activities occurring abroad where there is a sufficient nexus to U.S. interests, including effects on domestic commerce or harm to a U.S. trademark holder.⁴²⁰ Subsequent jurisprudence has refined this analysis, focusing on factors such as the citizenship of the defendant, the degree of effect on U.S. commerce, and the potential for conflict with foreign law.⁴²¹ Within the metaverse, where digital activities are inherently borderless, this doctrine is particularly salient: infringing uses of trademarks in virtual environments – despite occurring across decentralized, global environments – may still produce real-world commercial effects, including reputational harm, diversion of consumers, and dilution of brand value within U.S. markets. Accordingly, the extraterritorial application of the *Lanham Act* provides a doctrinal basis for extending trademark protection into virtual spaces, while simultaneously raising complex questions regarding jurisdiction, enforcement, and the limits of national legal authority in a globally interconnected digital ecosystem.

⁴¹⁶ *Lanham Act*, 15 USC § 1125(a). See also, *Two Pesos, Inc v Taco Cabana, Inc*, 505 US 763 (1992) at 768 (holding that inherently distinctive trade dress is protectable under § 43(a) without proof of secondary meaning); see also *Qualitex Co v Jacobson Products Co*, 514 US 159 (1995) at 163 (recognizing that a mark may acquire distinctiveness sufficient for protection through secondary meaning).

⁴¹⁷ *Lanham Act*, 15 USC § 1091 (establishing the Supplemental Register and its scope). See also, Catherine Mateu et al, *supra* note 166 (discussing the practical implications of register distinctions in the context of virtual goods and metaverse trademark filings).

⁴¹⁸ *Ibid*, ss 1114(1), 1125(a), 1125(c).

⁴¹⁹ *Steele v. Bulova Watch Co.*, 344 U.S. 280 (1952).

⁴²⁰ *Ibid*.

⁴²¹ *Vanity Fair Mills Inc v T Eaton Co*, 234 F (2d) 633 (2d Cir 1956).

Recently, Courts had the timely task of clarifying whether intangible assets such as NFTs qualify as “goods” under the *Act*. Notably, in the context of false designation of origin, cybersquatting, and trademark infringement through the use of the Bored Ape Yacht Club (BAYC) marks, in the *Yuga Labs, Inc. v. Ripps* case, the defendant created a knockoff collection of NFTs known as Ryder Ripps Bored Ape Yacht Club.⁴²² The defendant argued that in *Dastar Corp v Twentieth Century Fox Film Corp.*,⁴²³ the Supreme Court had held that “the ‘origin’ of the ‘goods’ about which consumers may be confused must relate to the tangible videotapes being sold and not the creative content on the videotapes.” The defendant argued that BAYC did not own the marks since NFTs are intangible and therefore not “goods” within the meaning of the *Act*.⁴²⁴ The district court disagreed with this argument, citing a law review article stating that, “intangibility does not exclude NFTs from having other characteristics of ‘goods,’ including being individually transferrable between owners, storable for indefinite periods of time, exclusively owned by a single owner, and distinguishable based on their source.”⁴²⁵ The Court’s decision in *Hermès* was also referenced, stating that, “given the centrality of consumer confusion to trademark law generally, it is best to view this issue from the perspective of the prospective consumer... Individuals do not purchase NFTs to own a ‘digital deed’ divorced from any other asset – they buy them precisely so that they can exclusively own the content associated with the NFTs.”⁴²⁶ The Court in *Yuga Labs* therefore concluded that the goods did not need to be tangible to be eligible for protection under trademark law and so plaintiffs had a valid ownership claim to the marks at issue. Remarkably, this case marks one of the first cases to highlight that intangibility does not exclude digital assets from having the characteristics of “goods” for the purposes of intellectual property protections. The Court reiterated the following:

Blockchain technology has revolutionized digital assets and allowed the creation of unique digital goods that are non-fungible. New digital goods like NFTs that are built with ledgers have essentially imported the external labelling function for source indication into the file of the digital asset itself, although in an intangible form.⁴²⁷

⁴²² *Yuga Labs, Inc. v. Ryder Ripps, et al*, No. 22-56199 (9th Cir. 2023) [*Yuga Labs*].

⁴²³ *Dastar Corp. v. Twentieth Century Fox Film Corp.* (02-428) 540 U.S. 806 (2003) 34 Fed. Appx. 312, Reversed and Remanded.

⁴²⁴ Melanie J Howard & Kyle Petersen, “Yuga Labs, Inc. v. Ripps”, (21 April 2023), online: *Loeb & Loeb LLP* <<https://www.loeb.com/en/insights/publications/2023/05/yuga-labs-inc-v-ripps>>.

⁴²⁵ *Yuga Labs*, *supra* note 420. See also, Thomas McCarthy, “Non-Fungible Tokens (NFTs) and Trademark Law” (2022) 105:6 *Trademark Reporter* 1279.

⁴²⁶ *Hermès Int’l v. Rothschild*, 22-cv-384 (JSR), 12 (S.D.N.Y. Jun. 23, 2023).

⁴²⁷ *Yuga Labs*, *supra* note 420.

3.3 Hermès v Rothschild – Case Study



Figure 4: Mason Rothschild, MetaBirkins Digital NFT collection.⁴²⁸

The dispute in *Hermès v Rothschild* is an excellent example of the kinds of conflicts that can arise for brands in a digital marketplace such as the Metaverse.⁴²⁹ In this case, artist Mason Rothschild created an NFT of the Birkin bag, contrary to the trademark rights that Hermès International and Hermès of Paris, Inc. (“Hermès”) has registered in the Birkin name and distinctive appearance and trade dress rights in the design. These “MetaBirkin” NFTs were sold on a digital marketplace ranging from USD \$13,000 to 65,000 using the Hermès’s globally recognizable Birkin word mark and trade dress, monopolizing a space in the digital market and generating revenue, allegedly amounting to more than \$1 million, that Hermès itself had not yet tapped into.⁴³⁰ For perspective, a physical Hermès Birkin in the real world can range from USD \$10,000 to a 400,000 limited edition Birkin Faubourg – and can jump straight to \$1.9 million for a Birkin encrusted with over 2000 diamonds, a Birkin by Japanese Designer Ginza Tanaka (as pictured below).

⁴²⁸ Mason Rothschild, MetaBirkins (2021–2022), digital NFT collection, online: MetaBirkins <metabirkins.com>.

⁴²⁹ *Hermès International, et al. v. Mason Rothschild*, 1:22-cv-00384 (SDNY Jun. 23, 2023).

⁴³⁰ Chan, Brigitte et al, “IP Metaverse Series - Part I: Brands Are Plugging In And Cashing In - Protecting Trademarks And Copyright In Virtual Goods And Services - Trademark - Canada”, online: <<https://www.mondaq.com/canada/trademark/1173782/ip-metaverse-series---part-i-brands-are-plugging-in-and-cashing-in--protecting-trademarks-and-copyright-in-virtual-goods-and-services>>



Figure 5: Hermès, Limited Edition Béton Matte Alligator & Blanc Togo Birkin 20, Platinum Handbag.⁴³¹

Rothschild had capitalized on the Birkin brand and was subsequently accused of various offenses, including trademark infringement, dilution, misappropriation of the Hermès's Birkin trademark, cybersquatting,⁴³² false designation of origin and description, and injury to business reputation.⁴³³ Rothschild filed a motion to dismiss the action, arguing that his MetaBirkin creation should be considered artwork and therefore guaranteed full protection under the U.S. First Amendment. He also claimed that the Birkin name only serves as a title for his artwork and not as a source identifier for the NFTs. Additionally, he argued that the *Rogers v Grimaldi* precedent, which balances the public interest in protecting free expression, should apply in this case.⁴³⁴ Given the potential relevance of the Rogers test in the context of metaversal uses of marks, the next section explains the test and its recent limits in some detail.

3.4 Rogers Test and Parody – Artistic Works

Trademark law aims to create safeguards for consumers through liability incurred for using word marks, images, or symbols that are confusingly similar to others in identifying the source of goods or services. In the U.S., this protection also has a restriction on expression which then causes a discrepancy between trademark law and freedom of expression afforded by the First Amendment, especially with respect to artistic works. Therefore, the speech-protected two prong approach in the 1989 United States District Court ruling, *Rogers v Grimaldi*, is an important argument to assess in this case's context. The *Rogers* test determines whether or not trademark use in the context of artistic works violate the Lanham Act by: 1) determining whether the work is “expressive” by “communicat[ing] ideas

⁴³¹ Hermès, *Limited Edition Béton Matte Alligator & Blanc Togo Birkin 20* (2024), handbag, online: Sotheby's <sothebys.com/en/buy/auction/2024/handbags-accessories/limited-edition-beton-matte-alligator-blanc-togo>. See also, "The Most Expensive Handbag in the World", *Vogue* (UK), online: Vogue <vogue.co.uk/article/platinum-handbag>.

⁴³² Note: Rothschild was charged with cybersquatting due to unlawfully registering the MetaBirkins.com to promote the MetaBirkin NFTs.

⁴³³ Hermès Challenge of ‘MetaBirkin’ NFTs to Continue”, online: *Norton Rose Fulbright* [https://www.nortonrosefulbright.com/en/knowledge/publications/844123f5/Hermès Challenge of “MetaBirkin” NFTs to Continue](https://www.nortonrosefulbright.com/en/knowledge/publications/844123f5/Hermès%20Challenge%20of%20MetaBirkin%20NFTs%20to%20Continue).

⁴³⁴ *Rogers v Grimaldi*, 875 F.2d 994; 57 USLW 2692; 10 U.S.P.Q.2d 1825; 16 Media L. Rep. 1648. See also, Ramos *supra* note 48.

or express[ing] points of view” and 2) if the work is in fact considered expressive, then in order to find trademark infringement it must be shown that the defendant’s use “either (i) is not *artistically relevant* to the work, or (ii) is explicitly misleading to consumers as to the source or content of the work.”⁴³⁵ Historically, we see from several cases, such as *Louis Vuitton Mallatier, S.A v. Warner Bros. Entertainment Inc.* for example, that the standard held for determining whether a work is “expressive” is low, and the standard for “explicitly misleading” is relatively high.⁴³⁶

The June 2023 U.S. Supreme Court ruling, *Jack Daniel’s Properties, Inc. v. VIP Products LLC* (*Jack Daniel’s*), however, marks new precedent for dealing with trademark infringement.⁴³⁷ The Supreme Court unanimously ruled that a dog-themed chew toy resembling a Jack Daniel’s whiskey bottle was not automatically shielded from trademark infringement and dilution claims by the First Amendment as the “Bad Spaniels” toy mimicked the distillery’s bottle shape, font, and color scheme, altering only “Old No. 7” to “The Old No. 2 on your Tennessee Carpet for parodic effect. It states that the applicability of the *Rogers* test is limited and does not apply where an alleged infringer uses a trademark “as a designation of source for the infringer’s own goods” – in the way that is most relevant to the Lanham Act. Justice Kagan quoted a decision from the U.S. District Court for the Southern District of New York in this case concluding that the *Rogers* test “kicks in when a suit involves solely ‘non-trademark uses of [a] mark—that is, where the trademark is not being used to indicate the source or origin’ of a product, but only to convey a different kind of message.”⁴³⁸ In contrast, “*Rogers* ‘has no proper role’ where a trademark use is ‘at least in part’ for ‘source identification,’ which the Court identifies [again, quoting the same SDNY opinion] as where a defendant may be ‘trading on the good will of the trademark owner to market its own goods.’”⁴³⁹ This is the case even if the infringer is making an “expressive comment”. Additionally, *Jack Daniel’s* argued that the Lanham Act already establishes a clear likelihood of confusion standard for infringement. It sufficiently addresses First Amendment rights of constitutionally protected speech without a heightened requirement for infringement for expressive works. Further, they argued that the *Rogers* test is too expansive and would then immunize “any humorous knock off” from liability, aside from what would be considered a counterfeit.⁴⁴⁰ This is important in the context of brands operating within the metaverse because, in a world of virtual products, defendants may often try to justify trademark uses as being for expressive purposes, including for “humorous or parodic purposes”.

⁴³⁵ Anthony J Dreyer et al, “Supreme Court Sharply Limits Applicability of *Rogers v. Grimaldi* Test for Trademark Infringement”, (8 June 2023), online: *Skadden, Arps, Slate, Meagher & Flom LLP* <<https://www.skadden.com/insights/publications/2023/06/supreme-court-sharply-limits-applicability>>.

⁴³⁶ *Louis Vuitton Mallatier S.A v. Warner Bros. Entm’t Inc.*, 868 F. Supp. 2d 172, 177 (S.D.N.Y. 2012).

⁴³⁷ *Jack Daniel’s Properties, Inc. v. VIP Products LLC*, *supra* note 151.

⁴³⁸ Dreyer, *supra* note 387. See also, *Tommy Hilfiger Licensing, Inc. v. Nature Labs, LLC*, 221 F. Supp. 2d 410, 414 (S.D.N.Y. 2002).

⁴³⁹ *Ibid.*

⁴⁴⁰ *Jack Daniel’s Properties, Inc. v. VIP Products LLC*, *supra* note 151.

The key lesson from the Court in *Jack Daniel's* is that such expression would already be addressed within a likelihood of confusion analysis when litigation arises and would not justify the strict application of an expansive First Amendment argument on its own. The Court also addressed dilution in this respect reiterating a similar finding, that in terms of statutory interpretation, the Lanham Act's "exclusion of non-commercial uses of a mark from dilution liability does not immunize parody, criticism or commentary when a defendant uses a mark as a designation of source for its own goods."⁴⁴¹ Therefore, in the application of the *Rogers* test, Courts would need to continue to assess the viability and scope of the test in the context of the infringement itself in light of the decision in *Jack Daniel's*. It makes it clear that it is not pertinent whether a work has an expressive component if the trademark is being used with the intention or effect of source identification. If the "expression" is being used as a source mark, it "does not warrant application of the heightened First Amendment standards."⁴⁴²

The Supreme Court's decision in *Jack Daniel's Properties, Inc v VIP Products LLC* clarifies an important threshold issue: where a mark is used as a source identifier, the heightened First Amendment protections associated with the *Rogers v Grimaldi* test do not apply, even if the use is expressive or humorous.⁴⁴³ This clarification is particularly consequential for the fashion industry, where branded virtual and physical goods are routinely marketed as consumer products and where parody often trades on iconic marks and trade dress to generate commercial value. In such contexts, the inquiry turns less on whether the work is expressive in nature and more on how the mark functions in the marketplace. On remand (post-Supreme Court clarification), the VIP Products litigation illustrates both the continued relevance and the limits of parody doctrine after *Jack Daniel's*. Although the trial court found "Bad Spaniels" to be a successful parody and therefore unlikely to cause consumer confusion, leading to dismissal of the infringement claim, it nonetheless held that the product diluted the *Jack Daniel's* mark by tarnishment.⁴⁴⁴ Crucially, the court emphasized that parody does not immunize a defendant from dilution liability and that the very irreverence that dispels confusion may simultaneously generate unsavory associations harmful to brand goodwill. The analysis further suggests that courts will look beyond the parody mark itself to the nature of the product and its expressive content, particularly where that content introduces scatological or otherwise distasteful themes. For fashion brands, this signals a meaningful doctrinal recalibration: parody remains viable, but only within constrained boundaries.⁴⁴⁵ While luxury and fashion houses may be expected to tolerate playful critique of their prestige or pricing, parodic uses that embed trademarks in contexts perceived as degrading, unwholesome, or reputation-damaging, whether in physical goods or virtual environments, are increasingly vulnerable to dilution claims. In this way, *Jack Daniel's* reinforces trademark law's role

⁴⁴¹ Dreyer, *supra* note 387.

⁴⁴² *Ibid.* See also, *Vans, Inc. v. MSCHF Product Studio, Inc.*, No. 22-1006 (2d Cir. 2023).

⁴⁴³ *Jack Daniel's Properties, Inc. v. VIP Products LLC*, *supra* note 151.

⁴⁴⁴ *Ibid.*

⁴⁴⁵ *Ibid.*

as a tool for preserving brand meaning and market signaling, even as it leaves unresolved the precise contours of permissible parody in commercial fashion markets.

The Supreme Court stated that a threshold of when an infringement challenges an expressive work, “is not appropriate when the accused infringer has used a trademark to designate the source of its own goods – in other words, has used a trademark as a trademark.”⁴⁴⁶ This is relevant to the previous *MetaBirkin* analysis as well. Arguably, *MetaBirkin* would be understood as a source-identifying trademark, with the effect that, post-*Jack Daniel’s*, the Rogers test would likely not be available to save the use from an infringement finding notwithstanding any artistic, parodic, or expressive intent behind it. Additionally, in alignment with *Rogers*, it was important to prove that Rothschild intended to “induce members of the public to believe the [artwork] was prepared or otherwise authorized by [the trademark holder].”⁴⁴⁷ Determination of intent is important to understand if Rothschild used the mark with the intent of goodwill exploitation, regardless of when the intent was formed, or for a particular artistic purpose. Further, the likelihood of consumer confusion analysis is also relevant here as Hermès offered persuasive evidence relevant to the traditional *Polaroid* factors for assessing confusion,⁴⁴⁸ which weighed heavily in contradiction to Rothschild’s arguments. Specifically, Hermes pointed to the resemblances between the design of the Birkin handbag’s distinctive features and the *MetaBirkin* NFTs which are “testimony that confirms the Birkin bag’s distinctive place in American cultural life; and statements suggesting that Hermes intended to “bridge the gap” by entering the NFT space.”⁴⁴⁹ Actual consumer confusion was evidenced by a consumer study⁴⁵⁰ conducted by subject matter expert Dr. Bruce Isaacson, which found that “the net confusion among NFT purchasers was 18.7%... and concluded that there was a substantial likelihood of confusion.”⁴⁵¹ This was further supported through evidence that, among other things, many members of the press including *L’Officiel*, *Elle*, *New York Post*, and *Challenges* were actually confused into believing Hermès was associated with the NFTs. In social media comments, consumers expressed that they felt they had been “scammed” into thinking they were getting the real Birkin handbag. There was also a communication from Rothschild admitting to the actual consumer confusion.⁴⁵² One evidentiary communication stated, “to shed confusion between the Hermes Birkin and its *successor* . . . [Rothschild] made the decision to separate [METABIRKINS] from the old and make [them] known as the new ‘MetaFurkins.’”⁴⁵³ Supported by Rothschild’s infringing conduct, his private communications of admitting knowledge of the confusion, and false statements under oath, the jury in this case found that Rothschild intentionally made misrepresentations

⁴⁴⁶ *Jack Daniel’s Properties, Inc. v. VIP Products LLC*, *supra* note 151.

⁴⁴⁷ *Twin Peaks*, 996 F.2d at 1379 (2d Cir. 1993).

⁴⁴⁸ *Polaroid Corp. v. Polarad Elecs. Corp.*, 287 F.2d 492 (2d Cir. 1961).

⁴⁴⁹ *Hermes International v. Rothschild*, 22-cv-384 (JSR), 12 (S.D.N.Y. Jun. 23, 2023) [*Hermès*].

⁴⁵⁰ See *Lon Tai Shing Co., Ltd. b. Koch-Lowy*, 1992 WL 18806, *3 (S.D.N.Y. Jan. 28, 1992) that found that a survey that could support that at least 18% of respondents reflecting actual consumer was the threshold to be met in this Circuit.

⁴⁵¹ *Hermes International v. Rothschild*, 22-cv-384 (JSR), 12 (S.D.N.Y. Jun. 23, 2023) Ex. 21 at 734:20–23; Ex. 30 at 19.

⁴⁵² *Ibid*, Ex. 21 at 789:1–794:24; Exs. 23–26, and Ex. 28 at 8–9; Ex. 29 at 347–348.

⁴⁵³ *Ibid*, Ex. 22 at 1.

and misled consumers by adopting the Birkin mark and trade dress in association with his NFTs. His intent can be summarized through his consistent assertions that “the project’s expressive purpose was clear from its inception... [the NFTs are] ‘part of [an] artistic experiment to see how people with money and influence who drive the culture would respond to’ the MetaBirkins and ‘whether they actually would ascribe value to the ephemeral MetaBirkins’ in the same way they attached value to the physical Birkin bags.”⁴⁵⁴ The Court was clear on this point of clarification and had established that Rothschild’s decision to focus his work on the Birkin bag did not stem from genuine artistic expression, rather, it centered on “an unlawful intent to cash in on a highly exclusive and uniquely valuable brand name...”⁴⁵⁵

Tying the lessons in *Jack Daniel’s* back to *Hermès v Rothschild*, Hermès stated that “instead of dispelling confusion, Rothschild’s modification [of the Birkin mark]” with the “addition of the generic term ‘META’ to [the] Birkin Mark creates the explicitly misleading impression that Hermès ... is offering Birkin handbags in the Metaverse. This confusion was exacerbated by the appearance of the digital handbag, which looks like a Birkin handbag.”⁴⁵⁶ It highlights the competitive proximity of Birkin handbags and ‘MetaBirkins’ (the NFT and associated website) as well as the evidence of actual confusion. Such alleged confusion created significant difficulties for Hermès, including its plans for legitimate NFT projects. In Rothschild’s use of Hermès’ registered Birkin trademark on the website he entitled as ‘metabirkins.com’ to monetize NFTs entitled ‘MetaBirkins NFTs’, the mark was deemed explicitly central to his project – intentionally and explicitly misleading consumers.

It was held that Rothschild was liable on all three counts of trademark infringement, dilution, and cybersquatting, and that he was not shielded by the First Amendment protections that apply to expressive and not-explicitly-misleading works, awarding Hermès roughly \$133,000 in damages.⁴⁵⁷ Since it was found that Rothschild intended to deceive consumers, his claim to First Amendment protection was waived as it does not reduce or remove liability for intentional fraud or deliberately cause consumer confusion. The Court granted a permanent injunction to prevent further infringement related to the Birkin mark by Rothschild or his employees including the collection of royalties from secondary market NFT sales. This is due to the fact that the infringement will not only affect the perception of exclusivity if the brand were to extend into this market but will potentially affect the brand’s equity due to dilution. As a result of the infringement, it was argued, Hermès lost the opportunity to potentially commercialize on its own NFTs first. Nicolas Martin, Hermès’s general counsel, testified that, “[t]he fact that our main trademark has been used by a third party without our

⁴⁵⁴ *Ibid.*

⁴⁵⁵ *Ibid.*

⁴⁵⁶ TFL, “Hermès v. Rothschild: The MetaBirkins Trial in Brief”, (27 January 2023), online: *The Fashion Law* <<https://www.thefashionlaw.com/hermes-v-rothschild-the-metabirkins-trial-in-brief/>>.

⁴⁵⁷ TFL, “Hermès v. Rothschild: A Timeline of a Case Over MetaBirkins NFTs”, (29 March 2023), online: *The Fashion Law* <<https://www.thefashionlaw.com/hermes-v-rothschild-a-timeline-of-developments-in-a-case-over-trademarks-nfts/>>.

authorization on the digital asset, which is similar to our product, if we are to enter into this new digital world, if we want to bring our most iconic handbag in this digital world, there would always be a reference to this MetaBirkin. . . we lost this opportunity of being the first on the market, which I think is really something very impactful for Hermès.”⁴⁵⁸ Maximilien Moulin, head of Hermès’s innovation laboratory, spoke to this point as well when Court’s inquiry regarding the infringement’s interference with Hermès’s NFT development prospects. He stated that Rothschild’s NFT project interfered in a manner that potentially causes confusion that could impact Hermès’ own NFT project, among other digital projects. In the context of the metaverse, there would be many opportunities for trading on the good will of the trademark owner as we see in *Hermès v Rothschild* and will certainly see with other instances of infringement in the metaverse. Digital assets, and by extension, generative AI creations, will cause an added layer of complexity to the application of infringement liability, and may have a variety of new hurdles to pass within different jurisdictions. Bringing the question back home, we might ask – what if the MetaBirkin case had been pursued before the Canadian Federal Court, would there be any significant variance with how brands operating within Canada would approach the nuances of the law in the context of digital assets?

The key challenge for Hermès in this case was that the Birkin trademark was, at the time, only registered for its physical goods and had no registration relating to virtual goods and digital assets (including NFTs) and therefore, Hermès could not argue exclusive use-based rights. Instead, it fell within the realms of the U.S. “natural zone of expansion” doctrine, which asserts that a trademark owner, even in the absence of demonstrating the use of their mark in a contested region, or in a particular commercial market, can assert rights over that area by establishing that it aligns with their prospective or inherent expansion. This doctrine has historically been utilized to broaden the safeguard provided by a trademark registration to encompass goods and services beyond those initially specified in the claimant’s registration, as well as to extend protection within various geographical areas. In this case, if the value of a virtual good or digital asset is derived from physical goods (i.e., handbags, clothing accessories, etc.), or generally, any physical-world value, it is only logically appropriate for the owners of those virtual assets to benefit. Canadian courts do not specifically follow this doctrine; however, Canadian registrations have the capacity to provide protection for goods and services that may not be explicitly covered by the registration. Common law rights for unregistered trademarks can be enforced through an action for the common law tort of passing off, which aside from the establishment of use, also includes the element of a pre-existing commercial reputation of the mark. In both cases, however, the law recognizes the harm that may be done by unauthorized uses of a mark in potential areas of future expansion.

⁴⁵⁸ *Hermes Int’l v. Rothschild*, 22-cv-384 (JSR), 12 (S.D.N.Y. Jun. 23, 2023) Ex. 1 at 197:4–12.

Beyond registration, common law passing off provides an additional avenue of protection, requiring the plaintiff to establish goodwill in the mark, a misrepresentation likely to deceive the relevant public, and resulting damage, without requiring active use in every market or product category in which protection is sought.⁴⁵⁹ The Supreme Court of Canada's decision in *Veuve Clicquot Ponsardin v. Boutiques Cliquot Ltée* confirms that depreciation of goodwill under section 22 of the Trademarks Act requires neither direct competition between the parties nor use in the same product category. It recognizes the associative power of a famous mark – its capacity to evoke quality, prestige, or exclusivity – as a protectable proprietary interest in its own right.⁴⁶⁰ This principle applies with particular force in the metaverse, where the commercial value of a branded NFT or virtual wearable derives almost entirely from the associative power of its physical-world counterpart. The Federal Court's decision in *Orkin Exterminating Co. v. Pestco Co. of Canada*, extending passing off protection to a plaintiff whose reputation had spilled over into the Canadian market from a foreign jurisdiction, further resonates in the cross-jurisdictional and platform-agnostic environment of metaverse commerce.⁴⁶¹ Finally, the Supreme Court's observation in *Mattel, Inc. v. 3894207 Canada Inc.* that the fame and strength of a mark entitles it to a correspondingly broader scope of protection across a wider range of goods and services supports the proposition that a mark of the Birkin's global recognition would command expansive protection before Canadian courts – potentially encompassing virtual goods and digital assets that trade on its reputation even absent a specific virtual goods registration.⁴⁶²

Further, although the ruling in *Hermès v. Rothschild* may prove persuasive before Canadian courts, it is not binding, and the doctrinal landscape governing the intersection of trademark law and expressive works differs in ways that are both meaningful and, in several respects, more protective of trademark rights in Canada than in the United States. A comparative assessment is therefore warranted to identify applicable parallels and anticipate the possible outcomes should Canadian courts be presented with analogous questions arising from the commercialization of unauthorized virtual goods or NFT collections bearing protected marks. For instance, the Canadian courts have seen conflicts between freedom of expression as guaranteed by the Canadian Charter of Rights and Freedoms and trademarks that represent a form of expression. The Charter, similar to the U.S. Constitution, does not protect free speech absolutely but rather allows for limitations on free expression that are “prescribed by law as can be demonstrably justified in a free and democratic society.”⁴⁶³ Both the Canadian Charter of Rights and Freedoms and the First Amendment to the United States Constitution protect expressive

⁴⁵⁹ *Ciba-Geigy Canada Ltd v Apotex Inc.*, 1992 CanLII 33 (SCC), 44 CPR (3d) 289 at para 12. See also, *Perrier SA v Canada Dry Ltd*, 1982 64 CPR (2d) 116 (Ont HC) at 121.

⁴⁶⁰ *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée*, 2006 SCC 23 at paras 46–48, 63–67; *Trademarks Act*, RSC 1985, c T-13, s 22.

⁴⁶¹ *Orkin Exterminating Co v Pestco Co of Canada* (1985), 5 CPR (3d) 433 (Ont CA) at 449–452.

⁴⁶² *Mattel, Inc v 3894207 Canada Inc.*, 2006 SCC 22 at paras 54–58 [Mattel]. See also, *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée*, *supra* note 82.

⁴⁶³ *Canadian Charter of Rights and Freedoms*, Part 1 of the Constitution Act, 1982, being Schedule B to the Canada Act 1982 (UK), 1982, c 11 a.

freedom, but the architecture of those protections differs significantly in ways that bear directly on trademark disputes. Again, the First Amendment provides robust protection for expressive works, including commercial speech to a more limited degree, and it was precisely this constitutional context that gave rise to the *Rogers v. Grimaldi* test, a judicially developed framework designed to balance trademark rights against expressive freedom in the context of artistic works,⁴⁶⁴ which has since been substantially curtailed by *Jack Daniel's Properties, Inc. v. VIP Products LLC*, limiting its application where a defendant uses a mark commercially as a source identifier.

The Canadian framework operates differently and, in several respects, more protectively of trademark owners. Section 2(b) of the Charter protects expressive freedom broadly, including commercial expression, but section 1 permits limitations that are prescribed by law and demonstrably justified in a free and democratic society – a balancing mechanism with no U.S. constitutional equivalent.⁴⁶⁵ Critically, however, Canadian courts have never been required to justify trademark protection through a section 1 analysis, and the commercial and source-identifying functions of a mark have consistently been treated as determinative. This was demonstrated in *Michelin & Cie v. CAW-Canada*, where the Federal Court declined to extend Charter protection to a union's use of the Michelin trademark in protest materials, finding that the commercial and reputational interests of the mark owner prevailed, and in the Cooperstock line of cases, where Canadian courts similarly refused to shield defendants who appropriated well-known marks for critical or expressive purposes from trademark liability on constitutional grounds, reinforcing the principle that expressive motivation does not override the source-identifying and reputational functions that trademark law is designed to protect.⁴⁶⁶ More significantly, Canadian trademark law contains no statutory analog to the fair use defences that limit dilution liability under the *Lanham Act*, including the U.S. statutory exceptions for parody, comparative advertising, and non-commercial use codified at 15 U.S.C. § 1125(c)(3), nor any equivalent to the Rogers test even in its post-Jack Daniel's weakened form.⁴⁶⁷ Canadian law therefore arguably affords brand owners stronger and more consistent protection against the commercial exploitation of a mark's associative or reputational value. Relevant in the metaversal context, branded NFTs and virtual goods derive their commercial appeal directly from the recognition value of an established mark rather than from any independent expressive quality.

⁴⁶⁴ Anthony J Dreyer et al, "Supreme Court Sharply Limits Applicability of Rogers v Grimaldi Test for Trademark Infringement" (8 June 2023), online: Skadden, Arps, Slate, Meagher & Flom LLP <https://www.skadden.com/insights/publications/2023/06/supreme-court-sharply-limits-applicability>.

⁴⁶⁵ *Canadian Charter of Rights and Freedoms, Part 1 of the Constitution Act, 1982, being Schedule B to the Canada Act 1982 (UK)*, 1982, c 11, ss 2(b), 1.

⁴⁶⁶ *Michelin & Cie v National Automobile, Aerospace, Transportation and General Workers Union of Canada (CAW-Canada)* (1996), 71 CPR (3d) 348 (FCTD) at 371–375. See also, *Irate Passenger Alliance (Cooperstock) v Air Canada* (2000), (FCTD) (unreported) [Cooperstock]. See also, *United Airlines, Inc. v. Cooperstock*, 2017 FCA 153. See also, Wendy Matheson & Eran Lipes, "Freedom of Expression and Trade-marks: Revisiting the Interface" (2000), online: Osgoode Digital Commons https://digitalcommons.osgoode.yorku.ca/all_papers/356/.

⁴⁶⁷ *Lanham Act*, 15 USC § 1125(c)(3). See also, *Federal Trademark Dilution Act of 1995*, Pub L No 104-98, 109 Stat 985 (Jan 16, 1996). See also, *Trademarks Act*, RSC 1985, c T-13, s 22.

3.5 Passing Off, Consumer Confusion Liability, and its Limits

Passing off is a common law tort which protects the goodwill associated with a business or product. Codified in the Canadian Trademarks Act⁴⁶⁸ and cited by the Courts as one of the primary arguments to be made, in a passing off action, a plaintiff must prove three components: “the existence of goodwill, the deception of the public due to a misrepresentation and actual or potential damage to the plaintiff”.⁴⁶⁹ In this context, it could be argued that Rothschild contravened section 7(b) by directing the public attention to his NFTs in such a way “as to cause or be likely to cause confusion,... to direct attention to them, between his goods, services or business and the goods, services or business of another.”⁴⁷⁰ As Hermès effectively argued, the work gave the misimpression of the origin – that Rothschild’s work was in connection with or approved by Hermès. This was supported by Rothschild’s MetaBirkin media communications including its Instagram and Twitter handles “@METABIRKIN” and hashtags such as “#NotYourMothersBirkin,” in which consumer interactions demonstrated confusion regarding Hermès’ involvement in the creation of or affiliation with the MetaBirkin NFTs.

Another significant factor to a successful passing off claim would be that the owner or licensee would need to demonstrate commercial reputation in the geographical area in which it seeks to enforce its rights through sole use of its mark or trade name, whether registered or not. This intuitively goes hand in hand with the logical reasoning of consumer confusion, since a reputation can only be acquired through public acknowledgement which develops the marks’ goodwill and attracts customers. It would likely cause an individual to be confused if the mark were to be mimicked and the goodwill were to be taken advantage of by another brand. The reputation is demonstrated by several factors including the evidenced duration of time that the rightful owner has used the mark in question to identify its goods or services in the market. This is based on various other factors including the distinctiveness of the mark, significant advertising, and sales utilizing the mark. According to Section 6 of the Trademarks Act, in determining confusion, the Courts would examine the relevant circumstances (s.6(5) of the *Act*) including:

- (a) the inherent distinctiveness of the trademarks or trade names and the extent to which they have become known;
- (b) the length of time the trademarks or trade names have been in use;
- (c) the nature of the goods, services or business;
- (d) the nature of the trade; and
- (e) the degree of resemblance between the trademarks or trade names, including in appearance or sound or in the ideas suggested by them.⁴⁷¹

⁴⁶⁸ RSC 1985, c T-13.

⁴⁶⁹ *Ciba-Geigy Canada Ltd. v. Apotex Inc.* 1992 CanLII 33 (SCC), 44 C.P.R. (3d) 289 (S.C.C.)

⁴⁷⁰ *Ibid.*, s.7 (b).

⁴⁷¹ *Ibid.* s.6(5).

In the case at hand, Hermès has a longstanding history that dates back to 1937 when the equestrian riding supply maker Thierry Hermès created the brand in Paris and was later passed on to the next six generations of Hermès heirs.⁴⁷² Hermès developed a global reputation and impact in 1956 when photographs of the Princess of Monaco (who had used the Sac à Dépêches bag to cover the secret of her baby bump at the time) were plastered all over magazines, and shortly after popularized by her and the public's love for the bag to the extent that Hermès renamed it, the 'Kelly' in her honour in 1977.⁴⁷³



Figure 6: Hermes Kelly Bag Review and Iconic Handbag: The Kermes Kelly.⁴⁷⁴

The focus slightly shifted towards the Birkin from 1984 with a more uniquely structured trapezoid handbag unwaveringly known as a “status” bag. As Hermès’s CEO Robert Chavez testified, the BIRKIN trademark is invaluable as it considered to be one of their main assets⁴⁷⁵, and the Birkin handbags (including the Birkin trade dress) are “recognizable [b]ecause of all the publicity, attention, media that’s been given to the bag over the many decades, people recognize the bag from a distance. They recognize it in photographs. They recognize it on the street. It’s just a very highly recognizable handbag.”⁴⁷⁶ Hermès is globally renowned for its handmade leather handbag and luggage collections which would make the case for a passing off claim even if they did not have a registered mark in the digital space.

⁴⁷² “Six Generations of Artisans”, online: *Hermès Paris* <<https://www.hermes.com/ca/en/content/271366-six-generations-of-artisans/>>.

⁴⁷³ “Iconic Handbag: The Hermès Kelly”, (13 April 2018), online: *The Restory* <<https://www.the-restory.com/2018-4-13-iconic-handbag-the-herms-kelly/>>.

⁴⁷⁴ “Luxury Designer Bag Investment Series: Hermès Kelly Bag Review”, (11 August 2020), online: *Save Spend Splurge* <<https://www.savespendsplurge.com/luxury-designer-bag-investment-series-hermes-kelly-bag-review-history-prices-2020/>>. See also, *The Restory*, note 400.

⁴⁷⁵ *Hermès Int’l v. Rothschild*, 22-cv-384 (JSR), 12 (S.D.N.Y. Jun. 23, 2023) at 151:15—16 [*Hermès*].

⁴⁷⁶ *Ibid* at 48:25–49:8.

In Canada, trademark protection operates through a layered framework of common law and statutory rights that together provide brand owners with robust, and in certain respects, broader remedies than those available at common law alone. At common law, the tort of passing off affords protection to both registered and unregistered marks, requiring the plaintiff to establish the classic trinity of goodwill, misrepresentation, and damage.⁴⁷⁷ It is important to note, however, that passing off is fundamentally a confusion-based cause of action: unlike the statutory depreciation of goodwill provision under section 22 of the *Trademarks Act*, the common law does not recognize a freestanding dilution or depreciation claim in the absence of misrepresentation or likelihood of confusion.⁴⁷⁸ The extended form of passing off, recognized in *Erven Warnink BV v. J. Townend & Sons (Hull) Ltd.*, may in principle extend liability to misrepresentations concerning the quality, type, or characteristics of goods.⁴⁷⁹ It would be applicable in the metaverse context, for example, where the commercialization of MetaBirkin NFTs may be said to misrepresent that the digital assets belong to the same category of luxury goods as authentic Hermès products, even without direct confusion as to source. The *Trademarks Act* supplements and significantly strengthens these common law foundations rather than displacing them. The Act codifies and broadens existing passing off remedies while simultaneously creating exclusive national rights in registered marks, protecting against hypothetical confusion across all geographical regions within Canada, and adding the distinct cause of action for depreciation of goodwill in association with a registered mark under section 22 – a cause of action that, as affirmed in *Veuve Clicquot Ponsardin v. Boutiques Cliquot Ltée*, does not require proof of competition between the parties or likelihood of confusion, but only that the defendant's use of the mark in connection with its wares or services is likely to have the effect of depreciating the value of the goodwill attaching to the registered mark.⁴⁸⁰ For a mark of the inherent distinctiveness and global recognition of the Birkin, immediately identifiable as a source indicator of singular strength, the combined operation of these statutory and common law protections would afford Hermès the broadest available scope of protection before Canadian courts, with the strength of the mark amplifying both the breadth of the confusion analysis and the sensitivity of the depreciation of goodwill inquiry.⁴⁸¹

According to Canadian Courts, misrepresentation arises when a mark or name that is confusingly similar is used, creating a likelihood of consumer confusion or error. Where the ordinary consumer, acting with imperfect recollection and considered as a matter of first impression, would

⁴⁷⁷ *Ciba-Geigy Canada Ltd v Apotex Inc*, 1992 CanLII 33 (SCC), 44 CPR (3d) 289 at para 12, See also *Perrier SA v Canada Dry Ltd*, 1982 64 CPR (2d) 116 (Ont HC) at 121.

⁴⁷⁸ *Trademarks Act*, RSC 1985, c T-13, s 22. See also, *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée*, 2006 SCC 23 at para 46.

⁴⁷⁹ *Erven Warnink BV v J Townend & Sons (Hull) Ltd*, [1979] AC 731 (HL) [Warnink]

⁴⁸⁰ *Trademarks Act*, RSC 1985, c T-13, ss 7, 22. See also, *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée*, 2006 SCC 23 at paras 46–48, 63–67. See also, *Toys "R" Us (Canada) Ltd v Herbs "R" Us Wellness Society*, 2020 FC 682 at paras 22–28.

⁴⁸¹ *Mattel, Inc v 3894207 Canada Inc*, 2006 SCC 22 at paras 54–58 [Mattel]. See also, *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée*, *supra* note 82 at para 20.

mistakenly believe that the goods or services of the defendant are those of, are authorized by, or are otherwise affiliated with the plaintiff.⁴⁸² In this respect, as we see in the *Hermès v Rothschild* case, there was an actionable instance of misrepresentation which had occurred the instant consumers intended to procure goods or services from Hermès and inadvertently received the NFTs from Rothschild which included sufficient similarities and resulted in confusing the public. It was found in this case that Rothschild intentionally misled consumers into believing that Hermès had an affiliation or was supporting the NFTs. As Courts have cited on numerous occasions, “the most successful form of [trademark] copying is to employ enough points of similarity to confuse the public with enough points of difference to confuse the courts.”⁴⁸³ This standard is codified in section 6 of the *Trademarks Act*, which defines confusion as arising where the use of one trademark would likely lead to the inference that the goods or services associated with it are manufactured, sold, leased, hired, or performed by the same person as those associated with the other mark, whether or not the goods and services are of the same general class or appear in the same class of the Nice Classification.⁴⁸⁴ The multi-factorial confusion analysis under section 6(5) directs courts to consider the inherent distinctiveness of the marks and the extent to which they have become known, the length of time the marks have been in use, the nature of the goods or services and the trade, the degree of resemblance between the marks in appearance, sound, or the ideas they suggest, and all surrounding circumstances. The Supreme Court affirmed in *Mattel, Inc. v. 3894207 Canada Inc.* and *Veuve Clicquot Ponsardin v. Boutiques Cliquot Ltée* that the fame and strength of the plaintiff's mark is a significant contextual factor capable of widening the scope of confusion across a broader range of goods, services, and commercial contexts.⁴⁸⁵

Applying this framework to the facts of *Hermès v. Rothschild*, the commercialization of MetaBirkin NFTs bearing striking visual and nominal similarities to the Birkin mark constituted an actionable instance of misrepresentation from the moment consumers were exposed to the digital assets in the marketplace, the evidence at trial establishing that consumers, upon encountering the MetaBirkin NFTs, formed the belief that Hermès had authorized, endorsed, or was otherwise affiliated with Rothschild's project.⁴⁸⁶ As courts have observed on numerous occasions, the most effective form of trademark appropriation involves deploying sufficient similarity to confuse consumers while maintaining sufficient distinction to complicate the legal analysis. It should be noted, however, that the section 6 confusion assessment under the *Trademarks Act* is an objective inquiry directed at the likely

⁴⁸² *Ciba-Geigy Canada Ltd v Apotex Inc*, *supra* note 478. See also, *Masterpiece Inc v Alavida Lifestyles Inc*, 2011 SCC 27 at paras 40–41.

⁴⁸³ *Perrier S.A. v. Canada Dry Ltd.*, 1982 64 CPR (2d) 116 (Ont. HC) at 121.

⁴⁸⁴ *Trademarks Act*, RSC 1985, c T-13, s 6(1), (2). See also, *Masterpiece Inc v Alavida Lifestyles Inc*, *supra* note 84 at para 49.

⁴⁸⁵ *Trademarks Act*, RSC 1985, c T-13, s 6(5). See also, *Mattel*, *supra* note 482 at paras 54–58, *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée*, *supra* note 481 at para 20. See also, *Masterpiece Inc v Alavida Lifestyles Inc*, *supra* note 84 at paras 40–49.

⁴⁸⁶ *Hermès International, et al v Mason Rothschild*, 1:22-cv-00384 (SDNY Jun 23, 2023). See also, Dev Gangjee, “Non-Fungible Tokens and the Future of Trade Marks” (2023) 18:2 *Journal of Intellectual Property Law & Practice* 95 at 99–101.

perception of the average consumer; it is not a subjective inquiry into the defendant's intent, and a defendant's intention to cause confusion, while potentially relevant to the assessment of remedies and to the credibility of surrounding circumstances, is not a constituent element of the statutory confusion analysis itself.⁴⁸⁷ That said, evidence of deliberate appropriation, as was present in *Hermès v. Rothschild*, where Rothschild's marketing strategy demonstrably traded on the Birkin's cultural distinction, may properly inform the court's assessment of the surrounding circumstances under section 6(5)(e) and its evaluation of the overall commercial context in which the marks were used.⁴⁸⁸

A more doctrinally coherent approach is to distinguish between statutory infringement under s. 20 of the Trademarks Act and the common law tort of passing off, rather than blending them together. Under s. 20, infringement is established where a registered trademark is used in association with goods or services and the impugned use is likely to cause confusion with the registered mark; on a strict reading, this does not depend on the “use” definition in s. 4, which is relevant to determining use by the owner for purposes of validity rather than strictly for infringement.⁴⁸⁹ In contrast, cases involving digital identifiers such as domain names, illustrated by *BC Auto Liquidators Inc v Prince George Auto Auction Ltd* and *Cooperstock*, demonstrate how courts assess confusion where a mark is incorporated into a domain or online identifier that signals source in a digital environment.⁴⁹⁰ In the present context, the use of the “MetaBirkin” naming convention, associated domain references, and related online descriptors may support a finding that the defendant is using a confusingly similar mark in a manner that misrepresents source. Separately, a claim in passing off at common law requires proof of (i) goodwill, (ii) misrepresentation leading to confusion, and (iii) resulting or likely damage, including loss of sales, market share, or control over the brand.⁴⁹¹ While these doctrines overlap in their concern with confusion, they are analytically distinct and should be applied in a structured manner to the facts at issue.⁴⁹²

3.6 Dilution/Depreciation Liability and its Limits

Where the confusion threshold required to sustain a passing off or infringement claim under sections 19 and 20 of the Trademarks Act is not met, section 22 offers a distinct and meaningful cause

⁴⁸⁷ *Trademarks Act*, RSC 1985, c T-13, s 6(5). See also, *Masterpiece Inc v Alavida Lifestyles Inc*, *supra* note 483 at para 40, see also *Mattel*, *supra* note 482 at para 56.

⁴⁸⁸ *Trademarks Act*, RSC 1985, c T-13, s 6(5)(e). See also, *Hermès International, et al v Mason Rothschild*, *supra* note 408. See also, *Subway IP LLC v Budway, Cannabis & Wellness Store*, 2021 FC 583 at paras 22–28.

⁴⁸⁹ *Trademarks Act*, R.S., 1985, c. T-13, s. 4(1).

⁴⁹⁰ *BC Auto Liquidators Inc. v. Prince George Auto Auction Ltd.*, 2013 BCSC 1708. See also, *United Airlines, Inc. v. Cooperstock*, 2017 FCA 153.

⁴⁹¹ *Ciba-Geigy Canada Ltd v Apotex Inc*, [1992] 3 SCR 120 at 132–34, *Kirkbi AG v Ritvik Holdings Inc*, 2005 SCC 65 at para 66.

⁴⁹² *Mattel Inc v 3894207 Canada Inc*, 2006 SCC 22 at para 50; *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée*, 2006 SCC 23 at paras 20–22.

of action: the depreciation of goodwill.⁴⁹³ Unlike the confusion-based causes of action, section 22 does not require that consumers be misled as to source, affiliation, or sponsorship. It requires only that the defendant's use of a registered mark is likely to depreciate the value of the goodwill attaching to it, making it a particularly significant tool in the metaverse context where an unauthorized NFT collection or branded virtual asset may exploit a mark's cultural cachet and associative power without necessarily generating confusion in the traditional sense.⁴⁹⁴ A critical structural limitation must, however, be acknowledged: on the plain language of section 22, the depreciation of goodwill cause of action is available only in respect of registered trademarks, leaving owners of unregistered marks, however well-known, dependent on the confusion-based requirements of passing off at common law and without recourse to this provision.⁴⁹⁵ This stands in contrast to the United States, where the Lanham Act's dilution provisions extend protection to famous marks regardless of registration status.⁴⁹⁶ The distinction between registered and unregistered marks thus remains one of the most consequential structural fault lines in Canadian trademark law as applied to virtual goods and digital assets, and it is to the scope and limits of dilution and depreciation liability in this context that the following section turns.

Under the U.S. Federal Trademark Anti-Dilution Act, as referenced in the *Hermès v Rothschild* case, nationally recognized brands have the legal right to file lawsuits if the utilization of their trademark in advertising or product branding results in "tarnishing" or "blurring" the distinctiveness of the trademark.⁴⁹⁷ Similar to the U.S. cause of trademark dilution, the Section 22 of the Canadian Trademarks Act protects against the depreciation of goodwill – specifically prohibiting the “use a trademark registered by another person in a manner that is likely to have the effect of depreciating the value of the goodwill attaching thereto”.⁴⁹⁸ An assessment of depreciation of goodwill is approached through a four-part test set out by the Supreme Court of Canada in *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée* (2006).⁴⁹⁹ The test consists of four integral components, substantiated on a balance of probabilities. Firstly, the claimant must demonstrate that the defendant utilized its registered mark in association with goods or services. It is noteworthy that the defendant need not have used the mark "as a trademark," meaning as a source identifier. Secondly, the claimant must establish that its registered trademark possesses a significant level of goodwill. Unlike the comparable EU and U.S. regulations, section 22 does not necessitate the mark to be well-known, rather the third-party's use of a mark should be “sufficiently similar” to evoke a consumer's “mental association” of the two marks in

⁴⁹³ *Trademarks Act*, RSC 1985, c T-13, ss 19, 20, 22.

⁴⁹⁴ *Trademarks Act*, RSC 1985, c T-13, s 22(1). See also, Catherine Mateu et al, *supra* note 166.

⁴⁹⁵ *Trademarks Act*, RSC 1985, c T-13, s 22. See also, *Ciba-Geigy Canada Ltd v Apotex Inc*, *supra* note 456, at para 12.

⁴⁹⁶ *Lanham Act*, 15 USC § 1125(c). See also, *Federal Trademark Dilution Act of 1995*, Pub L No 104-98, 109 Stat 985 (Jan 16, 1996).

⁴⁹⁷ Federal Trademark Dilution Act of 1995, Pub. L. No. 104-98, 109 Stat. 985 (Jan. 16, 1996), *amending* the Trademark Act of 1946, *codified* at 15 U.S.C. § 1125.

⁴⁹⁸ *Trademarks Act*, R.S., 1985, c. T-13, s. 22.

⁴⁹⁹ *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée*, 2006 SCC 23.

question to increase the likelihood of depreciation of value of goodwill.⁵⁰⁰ However, a crucial caveat is that the defendant cannot be found to have devalued the goodwill if it has not been established to exist. Thirdly, the claimant must prove that its mark was employed in a way that was likely to have an adverse impact on the associated goodwill, indicating a linkage between the mark and the goodwill. Fourthly, the claimant must demonstrate that the probable effect of such usage would be to diminish the value of its goodwill, constituting damage to the claimant's interests.⁵⁰¹

Canadian jurisprudence expanded the application of the depreciation remedy in this regard through the Federal Court's decision in *Toys "R" Us (Canada) Ltd v Herbs "R" Us Wellness Society*.⁵⁰² This case pertained to a judgement against a cannabis store and dispensary operating under the name "Herbs R Us", whereby the Federal Court granted a permanent injunction, damages and costs in favour of Toys R Us on the grounds that Herbs R Us' branding depreciated Toys R Us' goodwill – although not similar enough to cause consumer confusion. As noted in this case:

Depreciation can come about not only through disparagement, but also the reduction of distinctiveness resulting from a mark being "bandied about by different users," through a blurring of brand image, or from a "whittling away" of the brand's power to distinguish the owner's goods or services.⁵⁰³

The Court established that the depreciation remedy includes marks that are not particularly the same, but contain a similar "look and feel" or similar "striking elements" as the registered mark in question nonetheless.⁵⁰⁴ However, the expanded scope of depreciation of goodwill claims in Canada will: "a) at a minimum, require the third-party mark to be the same as the registered mark and b) at a maximum, vaguely recognized that such claims extend beyond identical marks and mere misspellings."⁵⁰⁵ The findings of this case are tremendously significant because it confirmed the accessibility of the depreciation remedy where the impugned mark is not the same, but rather has a similar "look and feel" as the registered mark.⁵⁰⁶ This is illustrated in *Toys "R" Us v Herbs "R" Us*, and more recently in *Subway IP LLC v Budway, Cannabis & Wellness Store*, where courts have extended protection to well-known marks against parody or referential uses that appropriate their commercial distinctiveness and

⁵⁰⁰ *Ibid.*

⁵⁰¹ *Ibid.* See also, Graham Hood, "Power Play: Federal Court's decision in Energizer Brands, LLC v Gillette Company narrows test for depreciation of goodwill in comparative advertising cases", (19 July 2023), online: *Smart & Biggar* <<https://www.smartbiggar.ca/insights/publication/power-play-federal-court-s-decision-in-energizer-brands-llc-v-gillette-company-narrows-test-for-depreciation-of-goodwill-in-comparative-advertising-cases>>.

⁵⁰² *Toys "R" Us (Canada) Ltd v Herbs "R" Us Wellness Society*, 2020 FC 682.

⁵⁰³ *Ibid.*

⁵⁰⁴ *Ibid.*

⁵⁰⁵ "Playtime's over: Toys R Us wins trademark depreciation of goodwill claim against Herbs R Us", (23 July 2020), online: *Norton Rose Fulbright* <<https://www.nortonrosefulbright.com/en-ca/knowledge/publications/ec4a7c19/playtimes-over-toys-r-us-wins-trademark-depreciation-of-goodwill-claim-against-herbs-r-us>>. See also, *Veuve Clicquot Ponsardin v Boutiques Cliquot Ltée*, *supra* note 82.

⁵⁰⁶ Note: An additional notable point was that this case was brought by way of a summary application procedure with the Federal Court which highlights the likelihood of brands bringing more cases similar to this to protect their brands in the context of the metaverse due to the cost-effective nature of a summary application.

“look and feel.”⁵⁰⁷ These cases confirm that depreciation liability may arise where a defendant leverages the reputational force of a mark in a manner that risks dilution or tarnishment, even where the use is not identical and may carry expressive or humorous elements. These decisions may be deemed to be a contentious nuance, however, as it causes obstacles for innovative or creative marketing and branding approaches that seek to use parody in the name of free expression. At the same time, the doctrine remains grounded in a structured, fact-specific analysis of resemblance, distinctiveness, marketplace context, and the likelihood of association. This ensures that protection does not extend to mere inspiration or thematic similarity, but is confined to uses that cross the threshold into appropriation of goodwill. Applied to the Birkin scenario in the metaverse, the analysis turns on whether the impugned virtual goods or NFTs create a recognizable association with the Hermès Birkin mark sufficient to engage s. 22 – demonstrating that Canadian law calibrates protection to safeguard brand value without foreclosing legitimate innovation or expression.

The *Hermès* case is a contemporary example, supported in various other cases, including *Gucci America, Inc v Guess?, Inc.*, of a successful dilution claim that was made on the merits that it implies that ‘irreparable harm’ has been inflicted on the plaintiff, “based on the ensuing loss of goodwill and ability to control one’s reputation” which allowed for injunctive relief.⁵⁰⁸ This is true part and parcel with the support of the U.S. Modernization Act of 2020 (“TMA”) which certified Hermès to be entitled to “‘a rebuttable presumption of irreparable harm’ by virtue of the jury verdict in its favour on its trademark infringement claim.”⁵⁰⁹ Although the TMA presumption is a contentious point of debate in district courts and circuits in the U.S., the Court in this case took the view that the burden of persuasion is placed on the proven infringer. Rothschild contended that the MetaBirkins NFTs did not impede Hermès’ NFT project, emphasizing their distinct nature compared to Hermès’ prospective NFTs, as the intention for which was to be used “as certificates of authenticity to customers who purchase physical Hermès’ products.”⁵¹⁰ However, the critical issue lies in consumer confusion, supported by evidence from Hermès, as consumers have in fact mistakenly associated Hermès with the MetaBirkins NFTs. This confusion, fueled by Rothschild’s continued use of the Birkin mark during litigation, posed a high risk of irreparable harm by potentially eroding Hermès’ ability to capitalize on the “goodwill and reputation” of its marks for a profitable NFT project. The “continued ‘appropriation of the [plaintiff’s mark] [w]ould dilute and eventually dispel the distinctive quality of the [mark, and the goodwill and reputation consumers attached to it],’ causing irreparable harm.”⁵¹¹ Further, to be entitled to injunctive

⁵⁰⁷ *Subway IP LLC v Budway, Cannabis & Wellness Store*, 2021 FC 583. See also, *Toys “R” Us (Canada) Ltd v Herbs “R” Us Wellness Society*, *supra* note 500.

⁵⁰⁸ *Gucci America, Inc. v. Guess?, Inc.*, 868 F.Supp.2d 207, 243 (2012).

⁵⁰⁹ 15 U.S.C. § 1116(a).

⁵¹⁰ *Hermès*, *supra* note 448.

⁵¹¹ *Ibid*, quoting *Stern’s Miracle-Gro v. Shark Products*, 823 F.Supp. 1077, 1094 (S.D.N.Y. 1993).

relief, Hermès had to satisfy the four requirements as established by the Supreme Court in *eBay Inc. v. MercExchange, L.L.C.*:

(1) that it has suffered an irreparable injury; (2) that remedies available at law, such as monetary damages, are inadequate to compensate for that injury; (3) that, considering the balance of hardships between the plaintiff and defendant, a remedy in equity is warranted; and (4) that the public interest would not be disserved by a permanent injunction.⁵¹²

Although in weighing the hardships of both the plaintiff and claimant, Hermès in this case satisfied the burden of all requirements and it was found that an equitable remedy was in fact warranted.

3.7 Determination of Equitable Relief

The determination of what would be an appropriate form of equitable relief in this case is unique considering the context of the digital space in which the NFTs operated. It is also interesting to note that determinations would be also be varied if contemplated across jurisdictions, and parallels could be drawn particularly in the approach that the Court in the *Hermès* case took in contrast with how the Canadian Court may look to resolve the question of relief. Firstly, in light of the prospect at the time of persisting consumer confusion through Rothschild’s continuation of sale and marketing of the NFTs, Rothschild and any of his officers who were in “active concert or participation” with him were “enjoined from using the Birkin marks or otherwise misleading the public about the source of the MetaBirkins NFTs” including any social media reference.⁵¹³ This would be a standard form of permanent injunctive relief that would be applied as a strict application of the law following similar conclusions from the court authority, likely universally. Second, given the jury’s verdict of the liability of cybersquatting, the Court ordered for Rothschild to transfer the www.metabirkins.com domain address to Hermès, exercising its statutory powers to do so.⁵¹⁴ Third, although the U.S. courts may exercise their authority to order the delivery and destruction of materials bearing a mark in cases of significant and ongoing irreparable harm, here, the court deemed the remedy of transferring any NFTs and smart contracts to be unnecessary. Justifiably, this is because past actions do not predict future actions, and Hermès would be entitled to recourse to seek civil or criminal charges against Rothschild if further violations were to ensue. The court noted that, “[since] MetaBirkins NFTs are at least in some respects works of art, the Court, out of an abundance of caution, chooses to enter a narrower injunction that would remedy continued consumer confusion while avoiding any potential constitutional problems.”⁵¹⁵ This is where there may be slight variations in the application of precedent in terms of the scope of caution that a

⁵¹² *eBay Inc. v. MercExchange, L.L.C.*, 547 U.S. 388 (2006).

⁵¹³ *Hermès*, *supra* note 448.

⁵¹⁴ 15 U.S.C. § 1125 (d)(C).

⁵¹⁵ *Hermès*, *supra* note 448.

court is concerned with depending on their freedom of expression or equivalent legislative mechanisms – or in the absence these mechanisms.

Finally, the Court ordered Rothschild to relinquish any profits he derived from the MetaBirkins NFTs, including royalties and transfer income, or other financial benefits that he received from resales since the trial’s onset. Under the Lanham Act, disgorgement is “measured by the profits [gained by] the defendant [through] his infringement, the costs of the action, and damages.”⁵¹⁶ Therefore, it is at the discretion of the Court as to whether or not it will grant net profits under the *Act* and principles of equity, and here the court considered that he intentionally designed the MetaBirkin NFTs to mislead consumers to believe there was an association between the NFT project and Hermès to exploit its goodwill. Other principles of equity that were considered here and would be addressed in similar cases are the “availability and adequacy of other remedies” and “the degree of certainty that the defendant benefited from the unlawful conduct” – both of which were determined in Hermès’ favour.⁵¹⁷ Similarly, in considering permanent injunctive relief within a Canadian Court, as rooted in common law and equity traditions, the principles that would be applied include irreparable harm, balance of convenience, public interest, good faith, specific performance to remedy infringement, and enforcement of the injunction.

3.8 Copyright and its Limitations

While the fashion industry ought to ensure the prevention of consumer confusion through respecting trademark protection, they must also incentivize the production of creative content in respect and appreciation for copyright principles. However, it may be difficult to justify the findings of infringement in cases where virtual realities such as metaversal platforms simulate real-world realities with similarities that may be indicative of copying from a plaintiff’s creation. Along with this, the digital and fast-paced nature of the environment causes other issues that may cause discontentment for brand owners protecting their IP in this space as the law has always had to perform a balancing act of public purpose along with the creators’ interest in mind. As primary demonstrations of these limitations, fair dealing (and similarly the ‘fair use doctrine’ in the U.S.) affords third parties with the ability to use copyright works of other brands without copyright infringement liability in particular circumstances. Further, doctrines such as limited use and the first sale doctrine, which may constrain an IP owner’s ability to assert infringement in respect of goods and services already lawfully sold to a consumer, operate as defences that must be considered in evaluating the viability of a claim.

⁵¹⁶ See, *Fleischmann Distilling Corp. v. Maier Brewing Co.*, 386 U.S. 714, 720 (1967); *Lexington Furniture Indus. v. The Lexington Co.*, 19-cv-6239 at *18-19 (S.D.N.Y. Oct. 24, 2022); *George Basch Co. Inc. v. Blue Coral, Inc.*, 968 F.2d 1532, 1539 (2d Cir. 1992).

⁵¹⁷ *Hermès*, *supra* note 448.

3.8.1 Fair Use and Fair Dealings

In the metaverse, the permissibility of using copyrighted material is jurisdiction-specific and turns on distinct statutory frameworks. In Canada, the analysis is governed by the Copyright Act, which confines fair dealing to enumerated purposes, namely research, private study, education, parody, satire, criticism, and review, as well as the user-generated content exception in s. 29.21.⁵¹⁸ The Supreme Court of Canada has confirmed that these purposes must be interpreted broadly and liberally, but they remain exhaustive and statutorily defined, not open-ended.⁵¹⁹ Accordingly, characterizations such as “transformative use,” “artistic reproduction,” or “expressive purpose” are not independent grounds for fair dealing; rather, they may only be relevant within the fairness analysis once a qualifying purpose is established. Accordingly, activities in the metaverse such as virtual fashion shows, the creation of user-generated digital assets, or NFTs incorporating pre-existing works, may fall within fair dealing where they satisfy a prescribed purpose and the fairness factors. These factors, articulated by the Supreme Court of Canada, include the purpose of the dealing, the character of the dealing, the amount taken, the nature of the work, the availability of alternatives, and the effect on the work’s market.⁵²⁰ In addition, s. 29.21 permits certain non-commercial user-generated uses, provided that the use is lawful, the source is credited, and the use does not have a substantial adverse effect on the existing work. These provisions are particularly relevant in the metaverse, where users routinely remix, adapt, and circulate copyrighted material in virtual environments. By contrast, in the United States, fair use under s. 107 of the Copyright Act is deliberately open-ended and includes illustrative purposes such as criticism, comment, news reporting, teaching, scholarship, and research.⁵²¹ Within this framework, U.S. courts have treated transformative use as a central consideration, asking whether the secondary work adds new expression, meaning, or message, and thereby alters the original with a new purpose or character.⁵²² This flexibility enables U.S. courts to accommodate evolving forms of digital creativity, including a wide range of metaverse activities, though the analysis ultimately turns on a holistic balancing of statutory factors, including market impact. In Canada, lawful metaverse uses must fit within narrowly defined statutory purposes before fairness is assessed, reflecting a structured and closed framework. In the United States, by contrast, the open-ended fair use doctrine, anchored by the transformative use inquiry, provides greater flexibility to accommodate novel and emergent digital practices.

As the purpose of these immersive virtual realities are user participation, simulation, recreation, and the transcendent interaction between the real and virtual realities, brands who interact with these platforms should support and anticipate, to some degree, that they are inspiring user-generated works

⁵¹⁸ *Copyright Act*, RSC 1985, c C-42, ss 29–29.2, 29.21.

⁵¹⁹ *CCH Canadian Ltd v Law Society of Upper Canada* at paras 48–51.

⁵²⁰ *Ibid.*

⁵²¹ 17 USC § 107.

⁵²² *Campbell v Acuff-Rose Music Inc*, 510 US 569 (1994).

and a creative development that extends from the simulations that they have created. The protection afforded to new virtual work is contingent on the originality introduced beyond the existing work.⁵²³ However, establishing infringement of the pre-existing work becomes more challenging due to the adaptability and modifiability of the application for ongoing development of virtual creations. Aligned with a similar line of thought, courts will be likely to recognize that virtual realities that simulate real goods and services, as we see taking place in the virtual fashion marketplace, are based upon pre-existing materials and real-life works. This makes the scope of copyright protection limited, and therefore, the requirements for finding infringement will be more rigorous. As Risch and Russo note,

Though copyright law contains no statutory formula for what constitutes infringement, absent copying of underlying code, the idea/expression dichotomy contained in Section 102(b) of the U.S. *Copyright Act* will likely permit a greater degree of freedom for virtual authors and virtual artists to create new virtual objects, new virtual works, and new virtual worlds based on pre-existing virtual reality materials...federal courts will [therefore] strive even more rigorously to filter from the infringement analysis any virtual elements that derive directly from unprotected ‘idea, procedure, process, system, method of operation, concept, principle, or discovery, regardless of form’ excluded from copyright protection under Section 102(b) of the Copyright Act.⁵²⁴

Further, while the metaverse introduces new modalities for the creation, display, and circulation of expressive works, it does not displace the core principles that govern copyright analysis. Courts will continue to apply established doctrines – such as substantial similarity, merger, and, in the United States, fair use and First Amendment considerations – in assessing whether protected expression has been unlawfully appropriated. As such, the merger doctrine can limit the scope of protection in accordance with the fact that “a single object may not be protectable when expression and idea merge for that object.”⁵²⁵ This principle is not unique to virtual environments but applies where the range of expressive choices is constrained, ensuring that copyright protection does not extend to ideas themselves. Similarly, fair use under s. 107 of the U.S. Copyright Act and the First Amendment operate as structural limitations on copyright protection, ensuring that protection does not unduly restrict freedom of expression.⁵²⁶ While metaverse environments may increase the volume and visibility of user-generated and interactive content, they do not alter the underlying legal framework. Rather, these doctrines will continue to be applied to novel factual scenarios as courts assess infringement and permissible use within both digital and physical contexts.

As we see in Section 107 of the Copyright Act, the fair use defence of a copyrighted work is determined on a case-by-case basis by factors of including the consideration of:

- (1) the purpose and character of the use, including whether such use is of a commercial nature or is for non-profit educational purposes;
- (2) the nature of the copyrighted work;

⁵²³ Risch & Russo, *supra* note 265.

⁵²⁴ *Ibid.*

⁵²⁵ *Ibid.*

⁵²⁶ 17 USC § 107.

- (3) the amount and substantiality of the portion used in relation to the copyrighted work as a whole;
and
- (4) the effect of the use upon the potential market for or value of the copyrighted work.⁵²⁷

We can apply this to the context of fashion brands operating within metaverse as firstly, in terms of “purpose and character of the use”, if a brand's use of copyrighted material in the metaverse serves a transformative purpose, such as creating new and distinct virtual experiences or artworks, it may be more likely to qualify as fair use. Non-profit educational or non-commercial uses may also weigh in favour of fair use. This would be the case if a fashion brand hosts a virtual show within the metaverse, showcasing its latest designs in an immersive and transformative environment, if the primary purpose is artistic expression and brand promotion rather than direct commercial gain, it may strengthen the fair use argument. Secondly, the “nature of the work” plays an important role in determining fair use as we will see that creative and original works such as unique virtual assets containing fashion designs may receive stronger protection. Particularly in the context of a brand incorporating copyrighted patterns or designs into virtual goods such as virtual clothing or handbags in the metaverse, if they significantly transform the original designs, adding new artistic elements or functionalities, it may be possible to pursue a fair use claim. Third, with regard to the applicability of fair use in consideration of the “amount and substantiality of the portion used in relation to the copyrighted work,” it is more likely to be applicable if the brand uses only a limited and necessary portion of the copyrighted material.⁵²⁸ In the metaverse, a brand could incorporate copyrighted elements that are essential for the intended purpose without reproducing the work in its entirety, such as through integrating elements from the physical product they are attempting to simulate. Lastly, if the brand's use of copyrighted material in the metaverse does not negatively impact the potential market for the original work or its value, fair use may be more defensible. For instance, if the use is non-competitive and does not attempt to, inadvertently or not, substitute the original in the market, fair use arguments may be stronger. Especially in a case whereby a fashion brand offers virtual replicas of its products within the metaverse, but the virtual items are non-transferable and purely for visual consumption. If this does not diminish the demand for the physical items and is seen as a form of digital marketing or engagement, it may align with fair use principles.

We see this in Canada in an *almost* equivalent structure through Section 29 of the Canadian Copyright Act, which holds that fair dealing for the purpose of “research, private study, education, parody or satire does not infringe copyright,” as well as fair dealing for the purpose of “criticism or review”, “news reporting”, and “non-commercial user-generated content” provided that the use of the copyrighted work is considered fair.⁵²⁹ The Supreme Court of Canada in *CHH Canadian Ltd. V. Law*

⁵²⁷ 17 U.S.C. § 107.

⁵²⁸ *Ibid.*

⁵²⁹ *Copyright Act*, R.S.C., 1985, c. C-42.

Society of Upper Canada outlined non-exhaustive factors to identify if a use qualified as fair dealings including, “purpose, character, amount, alternatives, nature, and effect” as aligned with the U.S. framework for fair use.⁵³⁰ One of the primary differences would be that the concept of fair dealings has “a ‘closed list’ of enumerated purposes unlike fair use; fair dealing has [an] open ended set of 6 ‘fairness’ factors which may or may not be used in every analysis, fair use has statutorily prescribed set of 4 factors; fair use analysis has been informed by First Amendment/free speech considerations, and fair dealing has not engaged in this analysis at length.”⁵³¹

As explored earlier, in the *Hermès* case, Rothschild argued that his MetaBirkin creation should be considered artwork, and therefore, guaranteed full protection under the U.S. First Amendment – and by extension, he claimed – unsuccessfully – that the digital works were entitled to the protection of the fair use defence. His use of Hermès’ mark and associated indicia was found to appropriate the source-identifying and commercial value of the Birkin brand rather than merely comment upon or transform it in a manner sufficient to satisfy fair use under s. 107. His use of Hermès’ mark and associated indicia was found to appropriate the source-identifying and commercial value of the Birkin brand rather than merely comment upon or transform it in a manner sufficient to satisfy fair use under s. 107. Viewed through a Canadian lens, the result is unlikely to differ. The uses at issue would be assessed under the closed categories of fair dealing in ss. 29–29.2 of the *Copyright Act*, or potentially under the user-generated content exception in s. 29.21.⁵³² However, the incorporation of the Birkin mark and associated design elements into commercially marketed NFTs would likely fall outside these exceptions, as such uses are not readily characterized as research, private study, education, parody, satire, criticism, or review, nor would they typically satisfy the non-commercial and source-attribution conditions required under s. 29.21.⁵³³ Accordingly, if the conduct does not qualify as fair use under the more flexible U.S. framework, it is even less likely to be excused under Canada’s more structured and purpose-limited fair dealing regime.

3.8.2 First Sale Doctrine and Exhaustion

The first sale doctrine is interesting from a digital perspective as typically, the first sale doctrine is a defence to an alleged copyright or trademark infringement of the distribution right if the defendant overcomes the burden of proof that they had lawfully owned the copy that was distributed. Under

⁵³⁰ *CCH Canadian Ltd. v. Law Society of Upper Canada*, [2004] 1 S.C.R. 339, 2004 SCC 13. See also, *Alberta (Education) v. Canadian Copyright Licensing Agency (Access Copyright)*, [2012] 2 S.C.R. 345, 2012 SCC 37, and *Society of Composers, Authors and Music Publishers of Canada v. Bell Canada*, [2012] 2 S.C.R. 326, 2012 SCC 36.

⁵³¹ “Artistic license and use of copyright in creative pursuits”, (5 November 2020), online: *Dentons* <<https://www.dentons.com/en/insights/articles/2020/november/5/artistic-licence-and-use-of-copyright-in-creative-pursuits>>.

⁵³² *Copyright Act*, RSC 1985, c C-42, ss 29–29.2.

⁵³³ *Ibid.*

section 109(a) of the U.S. Copyright Act, “...the owner of a particular copy or phonorecord lawfully made under this title, or any person authorized by such owner, is entitled, without the authority of the copyright owner, to sell or otherwise dispose of the possession of that copy or phonorecord.”⁵³⁴ Unlike this doctrine in the U.S., the Canadian equivalent is referred to as the concept of “exhaustion” which stipulates that once the copyright owner sells or transfers ownership of a particular copy of their work, they lose control over the distribution and subsequent sale of that specific copy. The doctrine of exhaustion in this regard is represented by the “proposition that the enforceability of the intellectual property rights embodied in a tangible object are extinguished, or ‘exhausted’, after its first sale. It limits intellectual property rights upon the transfer of ownership of a material object. The rule, common law in origin, allows for the resale of patented articles, trademark-emblazoned clothing, and books, without infringement.”⁵³⁵ The doctrine’s application to digital assets in the metaverse, raises several questions and challenges since in this particular context, if the copyright owner sells or transfers ownership of an NFT representing a digital asset, it could be argued that they have exhausted their rights over that specific copy of the digital asset. Consequently, the new owner of the NFT may have certain rights to use, display, or resell that digital asset within the parameters of the metaverse. However, the application of the first sale doctrine to digital assets in the metaverse is complicated by the ease of replication and distribution of digital content, the potential for unauthorized copying and dissemination, and the difficulty in distinguishing between original copies and unauthorized duplicates. The terms and conditions contained within smart contracts associated with NFTs may impact the applicability of the first sale doctrine. However, since the smart contract imposes restrictions on the subsequent use or transfer of the digital asset, those restrictions may supersede the rights conferred by the first sale doctrine.

Another issue that may come into play is the degree of control that brands may or may not have over their digital assets, including the ability to dictate how and where their virtual items are used and displayed within the metaverse. This could involve implementing digital rights management (DRM) technologies or entering into licensing agreements with virtual world platforms to govern how their digital assets can be used and displayed within those environments to safeguard their brand’s IP. DRM technologies which enable fashion brands to embed restrictions or access controls directly into their digital assets could limit the ability to transfer or copy a virtual fashion item, ensuring that it remains within the authorized user's possession to ensure control even after the first sale. Overall, the copyright mechanisms in place to ensure the protection of a brand’s digital assets are in parallel with their rights for physical goods. However, as explored, nuances do exist with respect to first sale and fair use that may create limitations for the range of protection afforded within this space.

⁵³⁴ 17 U.S.C. § 109(a).

⁵³⁵ Antonio Turco, “I’m So Tired: IP Rights Exhaustion”, online: *CPST Intellectual Property Inc* <<https://cpstip.com/so-tired-ip-rights-exhaustion.html>>.

Chapter 4: Transnational IP in a Territorial System: The Digital Challenge of Governance

4.1 Introduction to Transnational IP in a Territorial System

The contextual framework that is being explored, namely the metaverse, is one that is multifarious in nature. The governance structures of the metaverse, while being met with layers of domestic and international enforcement challenges, also have other core dynamics at play. Of primary concern are territoriality, traceability, and decentralization – issues that will be explored at the outset of this chapter to lay a comprehensive foundation for the high-level global challenges that will then be addressed with respect to governance in this space. The metaverse, for the proceeding discussion, should be thought of as an intensification of technological developments that we have seen in the recent evolution and advancements of the world wide web (i.e., the “Internet”), interlaced within everyday human experience, rather than a new and unknown frontier. The constant technologization of our global society demands an actively evolving governance structure – one that can be adequately applied to the complexities of the metaverse in a practical manner. As human actions have become inseparable from this technologization, and the infrastructure that is attached to it, this extended reality too requires protection on an international level. Without the typical restrictions of time or space, the metaverse offers a playground for IP infringement without the consequences and extensive enforcement structures that we find in traditional markets and real-world jurisdictions. This makes it easier for participants to perpetrate unlawful acts with real-world impacts beyond the financial and reputational implications on a global scale – unbounded by national borders.

This chapter will address the nature of the metaverse including its decentralized mechanisms, pseudonymity, traceability, and interoperability. It will then outline the current protection systems encompassing this space for digital assets and related regimes. As an extension of this exploration, it will also be valuable to outline the current cross-border cooperation concerning Internet disputes, which may be applicable and instructive for addressing disputes within other online virtual environments. Finally, this chapter will provide a perspective on the issue of establishing jurisdiction in the metaverse, and cross-jurisdictional conflict with respect to private international law interventions with high-level recommendations.

It is important to remember the stakeholders involved in the context of the fashion industry within the metaverse, especially to assess where the damage of IP infringement is likely to be focused, and for understanding potential governance mechanisms. The major players are private corporations (operating within, if not owning these platforms), fashion brands and other related businesses, metaverse platform creators and/or operators, and users or consumers. As has been observed by experts

in this space, the primary framing of metaverse governance has been exclusively lead by commercial interests, thus, “there is very little public debate about how our future digital environment should look, who should design it, what its purpose should be and what standards should govern its operation.”⁵³⁶ Further, it is concerning that “by the time other actors (state, civil society organizations, etc.) join in, standards would already be set and, therefore, difficult to change, even if they are deemed to be societally or politically suboptimal or completely undesirable.”⁵³⁷ These standards would be different in democratic versus non-democratic nations depending on the balance of power and the amount of influence that they have on technology and censorship.⁵³⁸ As platforms are generally owned by private corporations, there is a lack of state intervention having a stake in operating or governing the metaverse. It is therefore becoming increasingly clear that the underlying motivations for development are purely corporate and commercially driven. Indeed, this is clear from one of the introductory premises of this thesis itself; namely, that the scope of IP commercialization for fashion brands in the metaverse is tremendous and, therefore, governance is needed for brand protection in the industry as a leading group of innovators in this space. Thus, governance may seem, from the offset, to fall into the realm of corporate dispute mechanisms.

As such, this presents a series of questions: In a metaverse platform owned by Meta, for instance, who would have authority to litigate and what would Meta’s role be? Would Meta be willing to be held to the same standard of fairness and reasonableness that courts are adhering to? Should Meta have this procedural and rule-making authority – and what would this look like? For now, it seems that it would require an abundance of foundational governance tools such as monitoring and enforcement, well beyond current terms of service for users and businesses engaging with these platforms. Platform authority such as this should raise significant concerns with respect to corporate perspectives of capitalism and monetization that may supersede their judgement of the equal and universal protection of IP rights. The damage of IP infringement would inevitably fall on vulnerable fashion brands, especially the small businesses seeking to operate, but also protect their IP, within this space. As highlighted in earlier chapters, vulnerability in this regard ranges from risks of brand dilution and misappropriation to the resulting loss of significant revenue. There is therefore a need for clear and adequate protection in terms of commercial governance and jurisdictional IP dispute resolution in the context of the metaverse for brands looking to expand in this space.

Typically, when a business is commercially expanding beyond its home country, they must consider which substantive governing law to use outside of their jurisdiction and expressly state this in

⁵³⁶ Harriet Moynihan, Marjorie Buchser, & Jon Wallace, “What is the Metaverse?”, (25 April 2022), online: *Chatham House* <<https://www.chathamhouse.org/2022/04/what-metaverse>>.

⁵³⁷ Kalpokas & Kalpokienė, *supra* note 50.

⁵³⁸ *Ibid.*

the agreement provisions, aligning its terms according to the chosen governing law. This seeks to guarantee that parties are mutually agreeing to the legal framework that will govern the protection of commercial and intellectual property rights, fulfilling their responsibilities, and interpreting and enforcing the agreement in the case of disputes. Corresponding to these terms are jurisdictional clauses to stipulate how disputes are to be resolved and, typically, establishing whether they are to be resolved through courts or arbitration clauses. These terms are traditionally dependent on the location of the parties, where the contract is going to be fulfilled, and where rights are registered – but also upon the relative power of the parties. In a borderless commercial metaverse, however, questions will arise surrounding who has jurisdictional authority, who should be held accountable for infringement and for enabling processes of enforcement, what remedies and redress exists, and who should be responsible for the regulation of intellectual property infrastructure embedded and operating within these spaces. Trademark law, for example, raises not only questions of enforcement but also more fundamental issues concerning the subsistence of trademark rights. Since trademark protection is territorial and depends on legally recognized “use” within a jurisdiction, determining where a use occurs in decentralized digital environments becomes critical for establishing priority, entitlement, and maintaining registrability under statutes such as the Trademarks Act. Accordingly, for trademark owners operating in the metaverse, the challenge extends beyond locating infringing conduct to the threshold question of whether activity occurring in virtual platforms constitutes legally cognizable trademark use within the relevant jurisdiction.

Under the principle of territoriality, intellectual property rights are created, defined, and enforced within the jurisdiction that grants them, such that protection is inherently limited to national borders.⁵³⁹ At the same time, the international IP system seeks to mitigate fragmentation through instruments such as the Agreement on Trade-Related Aspects of Intellectual Property Rights (TRIPS), which establishes minimum standards of protection and enshrines principles of national treatment and most-favoured-nation treatment, requiring member states to afford foreign rights holders treatment no less favourable than that accorded to domestic rights holders. These mechanisms promote a degree of harmonization, but do not displace the fundamentally territorial character of IP rights.⁵⁴⁰ As a result, disputes are typically adjudicated under domestic law, with courts applying their own legal standards to conduct that occurs within, or has sufficient connection to, their jurisdiction. In practice, this often means that liability may arise where infringing conduct targets or causes harm within a particular territory, even if the defendant is located abroad, reflecting the principle that rights are territorial but enforcement may follow the locus of harm.⁵⁴¹ This dynamic is particularly evident in cases involving

⁵³⁹ Myra Tawfik, “International Intellectual Property Law” in *Canadian Trademark Law* (casebook).

⁵⁴⁰ Agreement on Trade-Related Aspects of Intellectual Property Rights, 15 April 1994, 1869 UNTS 299, arts 3–4.

⁵⁴¹ Graeme B Dinwoodie, “The International Intellectual Property System: Challenges and Opportunities” (2010) 28 *Cardozo Arts & Ent LJ* 1.

cross-border digital activity, such as in *Google Inc v Equustek Solutions Inc*, where the Supreme Court of Canada affirmed the ability of domestic courts to grant remedies with extraterritorial effect to address harm within the forum.⁵⁴² While these frameworks demonstrate ongoing efforts toward international coordination, they also underscore the limits of harmonization and the persistent challenges of enforcing IP rights in a globalized and digitally interconnected environment.⁵⁴³ Accordingly, this discussion is confined to the role of domestic IP law within such a framework, without attempting to exhaust the broader and highly complex field of international IP enforcement.

By its very nature, the metaverse transcends traditional boundaries between jurisdictions and potentially blurs territorial limitations. By its very nature, the metaverse transcends traditional territorial boundaries and further complicates the application of jurisdictional limits. However, this is not a novel phenomenon. The challenges posed to territorial intellectual property regimes by cross-border activity have long been evident in international trade, global entertainment markets, and, most notably, the Internet itself.⁵⁴⁴ As Murray posits, “In brief, the online environment, in either incarnation [(‘meta’ or the ‘cyber’ Internet)], undermines the customary connection between geography on the one hand and the government power of control, user behaviours and effects, legitimacy of regulatory policies, and the territorial extent of the application of laws on the other.”⁵⁴⁵ In this respect, the metaverse builds on pre-existing tensions rather than introducing them for the first time. That said, the metaverse may intensify these challenges in a distinct way. Whereas the Internet facilitates cross-border interaction within existing national frameworks, the metaverse aspires to create immersive, persistent, and interoperable virtual environments that resemble self-contained jurisdictions or markets. This raises the possibility of a quasi-autonomous digital space in which users, assets, and transactions operate with a heightened sense of internal coherence, thereby further straining the traditional linkage between territorial sovereignty and regulatory control. Accordingly, while the metaverse is part of a continuum of transnational developments that challenge territoriality, it may represent an incremental shift toward the functional creation of a virtual “marketplace” that operates alongside, and at times in tension with, existing legal systems.

The metaverse, as a separate virtual world, challenges the relevance of geographically based jurisdiction to an even greater extent. Imagine a scenario where a Decentraland user, for example, based in Canada engages with the platform through purchase of a digital asset or piece of virtual land from another user using ‘MANA’ tokens and, through this act, enters into a contract with a user based in

⁵⁴² *Google Inc v Equustek Solutions Inc*, 2017 SCC 34, [2017] 1 SCR 824.

⁵⁴³ *Ibid.*

⁵⁴⁴ Graeme B Dinwoodie, “The Architecture of the International Intellectual Property System” (2004) 77:2 S Cal L Rev 213; see also Myra Tawfik *supra* note 537.

⁵⁴⁵ Andrew Murray, *Information technology law: the law and society*, fourth edition ed (Oxford, United Kingdom ; New York, NY: Oxford University Press, 2019).

Europe. In this case, should Canadian courts have jurisdiction over the dispute, and which law should they apply? Where an independent agreement is not made between the parties, next steps are unclear. In these cases, current rules on private international law should be assessed and appropriately applied. To remain globally competitive and support innovations, states may also consider introducing comprehensive legal frameworks, developed through international bodies, and tools to facilitate operation, enforcement of collateral agreements, and to ensure the protection of IRP for brands commercially engaging within this space.

Within the realm of the Internet, governance typically comes in the multifaceted forms of self-policing under the purported boundaries of platform Terms of Service, international dispute resolution, and technical avenues for seeking removal of content.⁵⁴⁶ We see this in forms of a UDRP, WIPO, or DMCA complaint submissions, determining, e.g., whether a mark or domain is “confusingly similar” to another’s mark and used and registered in bad faith as grounds to request removal, potentially followed by a litigation to obtain an injunction.⁵⁴⁷ In terms of the metaverse, in this regard, traditional IPR enforcement is at least theoretically possible along the same lines. As evident through Meta’s Horizon Worlds metaverse platform, for example, Meta’s Terms of Service gives Meta the discretion to remove infringing content through use of a ‘Designated Agent’ for submitting notification of IP infringement.⁵⁴⁸ There are, however, some complications, and this structure is largely not the case for platforms that are associated with blockchain and virtual asset and land ownership as we will explore further below.

4.2 Current Platform Governance

4.2.1 Decentralized Nature

An added layer to the complexities to the challenge of IP territoriality is the purported decentralized nature of some metaverse platforms. Decentralization is an alternative governance structure that advances user decision-making authority. In this model, control is distributed among users rather than being centralized by a single authority, which makes it more difficult to enforce IP rights as there is a lack of a central authority to regulate the platform (as in centralized systems).

⁵⁴⁶ Andrew N Choi & Cynthia A Gierhart, “Intellectual Property Enforcement in the Metaverse, Part 1”, (10 October 2022), online: *Holland & Knight* <<https://www.hklaw.com/en/insights/publications/2022/10/intellectual-property-enforcement-in-the-metaverse-part-1>>.

⁵⁴⁷ *Ibid.*

⁵⁴⁸ *Ibid.*

	Centralized governance	Decentralized governance ¹
Definition	The metaverse is controlled by a select group of large entities that operate centralized virtual platforms.	The metaverse exists via fully decentralized virtual platforms built on blockchain and not controlled by any single entity or group of entities.
Current examples	Meta Horizon Worlds, Roblox	Decentraland, The Sandbox
Decision-making actors	Company executives and boards of directors	All participants within the blockchain get a vote in the decision-making process (i.e., all token holders).
Decision-making process	Key executives and shareholders with voting rights decide the outcome of each issue.	Decisions are made through decentralized autonomous organizations (DAOs).
Decision-enforcing mechanism	Unilateral decisions are enforced by the platform in the form of revokable access, fines, platform moderations, etc.	All decisions are made through a set of code based on self-enforcing rules implemented via publicly verifiable smart contracts.
Key challenges	Lack of transparency and excessive control allow platform owners to dictate fees user access, content ownership distribution, and monetization.	DAOs can be distributed across jurisdictions and geographies, therefore, legal issues are subject to a variety of regional laws.



Figure 7: Deloitte Analysis, “Welcome to the Metaverse Presentation”.⁵⁴⁹

On metaverse platforms such as Decentraland and The Sandbox, this decentralization plays a role on a fundamental level with respect to land and currency ownership on the blockchain (either Ethereum or another blockchain) through which users are given economic and governance rights. In this regard, “parcels of land are associated with non-fungible tokens, where the non-fungibility of the NFT and association with a spatial location mimics the characteristics of real property.”⁵⁵⁰ The parcels of land are identified by coordinates, as opposed to a URL or domain name, although URLs may be relevant for trademarks in terms of ‘Land’ within a metaverse platform which can use URL identification.⁵⁵¹

The most common way that a fashion brand may enter the metaverse is through the purchase of virtual land determined by NFTs that are associated with the plot. The land acts as virtual space for brands to develop an experience for users that they target as a part of a holistic commercialization and marketing strategy. Environments are created through the use of the following: a “Stack” which consists of smart contracts, the “Catalyst software” which provides a distributed network of servers to provide content, the software development kit to allow for brands to build branded content in their own virtual space, and other apps such as the “Marketplace” and “Builder”, as such in the case of Decentraland.⁵⁵²

Placed at these technological coordinates, a metaverse may be governed in some capacity by a Decentralized Autonomous Organization (DAO) managed by a voting system involving a rule of ownership and currency.⁵⁵³ As a form of self-governance, the DAO is based on smart contracts whereby

⁵⁴⁹ Deloitte, “Welcome to the Metaverse, Presentation”, online: <[https://www2.deloitte.com/content/dam/Deloitte/ca/Documents/technology-media-telecommunications/ca-en-metaverse_101_interactive_pdf_ENG_\(new\)_AODA.pdf](https://www2.deloitte.com/content/dam/Deloitte/ca/Documents/technology-media-telecommunications/ca-en-metaverse_101_interactive_pdf_ENG_(new)_AODA.pdf)>.

⁵⁵⁰ Andrew N. Choi & Cynthia A. Gierhart, “Intellectual Property Enforcement in the Metaverse, Part 2: Metaverse Properties on the Blockchain”, (13 October 2022), online: *Holland & Knight* <<https://www.hklaw.com/en/insights/publications/2022/10/intellectual-property-enforcement-in-the-metaverse-part-2>>.

⁵⁵¹ *Ibid.*

⁵⁵² “Delegate the Reference Client roadmap to the Decentraland Foundation”, online: *Decentraland DAO* <<https://governance.decentraland.org/proposal/?id=2c061ab0-75a3-11ed-bc92-ef497b387215>>.

⁵⁵³ Choi & Gierhart, *supra* note 544.

participants obtain the power of governance through a voting system, as opposed to a centralized single entity. As Decentraland describes,

The DAO was created to help the community direct the development of Decentraland's policies, infrastructure, content moderation, and smart contracts. The DAO owns the smart contracts for Decentraland's digital assets (like LAND, Names, Wearables, etc.), so any changes made to those contracts must be approved by the DAO. Furthermore, platform-impacting decisions or changes to Decentraland's codebase (i.e. decisions that impact the entire Decentraland community, like strategic decisions for the client) must be approved by the DAO.⁵⁵⁴

Responsible for enacting passed votes as binding, the DAO Committee is selected by the community to hold a "multi-sig wallet" which facilitates actions such as "funding a Grant, banning a name, adding or removing a [point of interest] POI, implementing a Governance proposal or adding a Catalyst node."⁵⁵⁵

4.2.2 *Terms of Service and Content Policies*

Not all metaverse platforms implement a DAO; instead they rely heavily on their terms and conditions as a key instrument of enforcement. Under the Sandbox (TSB) Terms of Service, TSB has "the right, in its sole discretion, to accept or reject any Assets and/or Games." The platform therefore has the right to moderate user-generated content for IP infringement. The Terms of Service elaborates by stating,

Assets must be unique. Any Assets that exhibit obvious visual similarities to a pre-existing Asset will be removed. TSB retains the right to moderate and review Assets for copyright infringement and to remove Assets from The Sandbox that violate these Terms... You are solely responsible for ensuring that any Assets you submit to the Services comply with any applicable laws and third-party rights, including but not limited to any intellectual property rights, privacy rights and publicity rights.

Thus, the platform reserves the right to regulate any content on its platform and even remove the metadata that does not comply with their terms of service. Other platforms such as Decentraland utilizes a DAO-approved Content Policy to prohibit infringement of its terms and services. Within this system, "claims of IP infringement are handled by the Foundation, a non-profit entity, supposedly independent of the founders of Decentraland, to which notices of infringement can be sent. The Decentraland Foundation holds the IP rights over the Decentraland website and "Tools" including, the SDK 5.0 (a software development kit using entities, components, and systems (ECS)), the Marketplace, the Land Manager, and other tools. If an alleged infringer challenges the notice, the DAO determines whether the subject content must be removed.⁵⁵⁶ This process is facilitated by a voting system, whereby the participants have votes in proportion to their ownership of land or of the relevant cryptocurrency which

⁵⁵⁴ Decentraland, *supra* note 306.

⁵⁵⁵ *Ibid.*

⁵⁵⁶ *Ibid.* See also "Terms of Use", online: Decentraland <<https://decentraland.org/terms>>.

amount to voting power (VP). Determinations by the DAO are made by users participating through a series of three votes, where a proposal must meet a minimum threshold of voter power, with a simple majority of voter power in each vote, to then be adopted as a governing law on the platform.

Further, the Decentraland Terms also recognize delegated authority to the Foundation to block offending content and suspend user accounts for violating IPR, “to the extent technically possible” regardless of an operational DAO.⁵⁵⁷ Although the Foundation cannot control the infringing content that is uploaded and created within these spaces, if the user disagrees with a brand’s claim and refuses to withdraw the content, the DAO, through supporting community votes, may, “(i) block the infringing Content so as to render it inaccessible through the Tools (although it could be still accessible through other clients); and (ii) block the infringing user’s Account. Any further action, claim or remedy against the infringing user must be undertaken by the aggrieved user.”⁵⁵⁸ Since there has yet to be any cases with brands’ protection of IP on these decentralized platforms, it seems that, based on the factors for DAO determinations (who has voting power, how many votes, who can be mobilized to vote on specific issues), if land and cryptocurrency owners with a mutual interest voted consistently on IP disputes, they could effectively facilitate the regulation of IP protection on the platform. In this regard, “getting sufficient interest *in* voting may itself be a bar to the effectiveness of a DAO,” however, this system may only be deemed to be fair to some extent since it allows for participants to have a say in how the platform is governed “in direct proportion to the extent to which they have invested” in the metaversal platform.⁵⁵⁹

Arguably so, these factors are ambiguous and lack standardization in terms of what constitutes a sufficient amount of voting power, and these votes may or may not be well-intentioned. This may be problematic as in a decentralized world, the trajectory of value systems can go either way – towards a utopian, or towards a dystopian one – depending on the motivation of its participants. As a voting member of the community on a metaverse platform utilizing this structure, whether it be for political or competitive gain, votes have the power to adversely affect businesses by directly affecting brand partners and competitors in the fashion industry. As Choi notes, such votes “could put a company at risk of, for instance, business-tort liability or antitrust violations. In other words, the power to vote on issues in the metaverse, where votes and non-votes are public, can put a company in a wide variety of potentially conflicting positions that it wouldn’t otherwise have outside of the metaverse.”⁵⁶⁰ Engaging in voting brings about further reputational vulnerabilities for a brand. Again, this stems from the fact

⁵⁵⁷ *Ibid.*

⁵⁵⁸ *Ibid.*

⁵⁵⁹ *Ibid.* See also, Andrew N Choi, “DAOs, Procedural Perversity and the Metaverse”, (19 January 2023), online: *Holland & Knight* <<https://www.hklaw.com/en/insights/publications/2023/01/daos-procedural-perversity-and-the-metaverse>>.

⁵⁶⁰ Andrew N Choi, “Do Companies Need a Metaverse Voting Policy”, online: *Holland & Knight* <<https://www.hklaw.com/en/insights/publications/2022/11/do-companies-need-a-metaverse-voting-policy>>.

that all votes are made public, alongside the wallet addresses of landowners, the particulars of their qualifying voting power, and a comprehensive record of their voting history. This history includes the matters a company supported or opposed, potentially resulting in damage to their reputation. Consequently, a brand might decide to forgo its voting authority altogether.⁵⁶¹ Brand owners should be cautious of the fact that there is nothing in the Terms that prevent an interested party from acquiring a disproportionate amount of the platform's cryptocurrency (i.e., MANA in the case of Decentraland) to be used to disadvantage another party. This party may potentially use this to gain VP in DAO determinations for favourable outcomes in IP disputes in which they have a competing interest. In order to reap the benefits from participation within this governance structure of decentralized platforms, brands should instead develop a strategic policy for voting within the metaverse to ensure that they can potentially use their power to act on IP enforcement proposals and other issues that protect or leverage their brand's consumer reach within this space.

4.2.3 *Difficulties with Platform Self-Governance*

The “problem of procedural perversity”, as Choi stresses, is another alarming element that may arise due to the self-governing nature of such decentralized platforms, whereby the procedures for self-governance may eviscerate the barriers to amendment regarding the governance structure itself.⁵⁶² Choi draws comparison to philosopher Kurt Gödel's “inner contradiction loophole” in Article V of the U.S. Constitution which does not bar application to itself.⁵⁶³ Similarly, the Decentraland DAO seemingly neglects to contain any limitation “restricting application of its voting mechanism to the requirements for passage of a Governance Proposal, [and thus], a Governance Proposal could, hypothetically, revise the minimum threshold for passage of a Governance Proposal, for instance, which might arguably go against the intentions of the initial DAO creators.”⁵⁶⁴ To address these issues, the Delegation program seeks to allow for users to delegate VP to another member of “designated Delegates” to encourage “the participation of VP in the governance process and also evolve towards a more healthy VP distribution.”⁵⁶⁵ Passive users can transfer their VP to delegates who are active in governance practices and have a vested interest in its success, in order to decrease the conceivable adverse effects of ‘procedural perversity’.

Moreover, all governance rules contemplated and enacted are recorded on a “transparent, secure, and open-source ledger of the blockchain network” for stakeholders and shareholders alike to

⁵⁶¹ *Ibid.*

⁵⁶² Choi, *supra* note 558.

⁵⁶³ *Ibid.*

⁵⁶⁴ *Ibid.*

⁵⁶⁵ “Open Call for Delegates/Apply now!”, (14 January 2022), online: *Decentraland* <<https://forum.decentraland.org/t/open-call-for-delegates-apply-now/5840>>.

ensure that common goals are met.⁵⁶⁶ This is a key aspect to note – the immutability of smart contracts in DAOs may facilitate the preservation of brand IP monetization and other brand interests due to a “tamper-proof shared ledger, where all activities and transactions on the network will be recorded.”⁵⁶⁷ Hence, the DAO governance structure presents potential advantages and disadvantages. The records provide for heightened transparency and valuable public participation in the democratic development of metaverse platforms— a cyberdemocracy of sorts. Although a decentralized metaverse can be seen as an idealized formula, leveraging democratized standards to allow for users to have complete control over their data, assets, and experiences, the development of such should be viewed in a cautious light. In the forthcoming years, the metaverse holds the potential for services such as Decentralized Finance and virtual products (i.e., BNFTs) to be autonomously crafted and managed by DAOs. These DAOs will operate through smart contracts and consensus rules that oversee critical functionalities, potentially minimizing opportunities for external oversight.

4.2.4 Centralized Platforms

In contrast, centralized platforms are designed to enable users to operate within the metaverse while curating their own experience. Centralized platforms supply third parties such as fashion brand owners with the “engine, dev tools, asset libraries, and services to create virtual experiences, but the platform makes the rules, controls governance, and owns the user relationship...[meaning] that the platform takes a greater share of economic activity.”⁵⁶⁸ Unfortunately, both platform types have their own set of associated uncertainties for brand owners and users, “for decentralized, it is uncertain whether the investment required for success will even be met, and if its users can organize and build... [and] for centralized platforms, there are several tech giants jockeying for positions and it is unclear how each will differentiate (or if they will all cannibalize each other).”⁵⁶⁹ When juxtaposed with the current state of the Internet, centralized platforms bear the closest resemblance to aggregators such as Meta and YouTube. These platforms act as intermediaries, facilitating connections between users and third parties, though also wielding the power to control, disrupt, or block these connections. This strategy leverages user data to curate a highly personalized experience, consequently lessening the user's input. Transposing this model into the metaverse, however, would imply that existing issues concerning the dominance of Big Tech over the Internet would endure, and may potentially worsen, given the extensive breadth of control that would be used by the centralized owner of the metaverse.

⁵⁶⁶ Thien Huynh-The et al, “Blockchain for the metaverse: A Review” (2023) 143 *Future Generation Computer Systems* 401–419, online: <<https://linkinghub.elsevier.com/retrieve/pii/S0167739X23000493>>.

⁵⁶⁷ *Ibid.*

⁵⁶⁸ Deloitte, *supra* note 547.

⁵⁶⁹ *Ibid.*

4.3 Pseudonymity and Traceability

Decentralization, although crucial to prevent monopolistic control by specific brands and corporations, presents its own set of challenges for enforcing rights, particularly when it comes to identifying infringers and ensuring their accountability. This situation significantly complicates the enforcement of intellectual property rights. The inherent decentralized structure of blockchain technology, which facilitates transactions and ownership, also opens the door to user anonymity. This anonymity extends to the Voting Power of users who employ blockchain addresses that have not been publicly identified, allowing them to cast anonymous votes. This becomes problematic when, as discussed earlier, it entitles unknown entities to disproportionately, and possibly adversely, affect governance outcomes. The challenge of anonymity is also linked with the element of traceability. Anonymity can be achieved through pseudonymous addresses “which are unique strings of characters representing a user’s identity on the blockchain...generated through a cryptographic process and are not directly linked to a person’s real-world identity.”⁵⁷⁰ As a result, it is difficult to trace the activities of a particular user on the blockchain back to their real-world identity.” Furthermore, the potential for identity theft also looms within this domain, introducing additional concerns. Should identity theft take place, a user's digital asset and digital identity, encompassing elements like avatars, social connections, and personal data, could be compromised. An illustrative case occurred in 2022 when 17 user accounts were compromised due to vulnerabilities in smart contracts with phishing attacks targeting the OpenSea NFT marketplace, a platform that facilitates the trading of virtual assets within the metaverse. This incident led to a staggering loss of \$1.7 million USD.

Consider the following scenario: a digital avatar infringes on a brand’s intellectual property rights through creating an identical designed virtual handbag (virtual counterfeit) and selling it for cryptocurrency, translating to a dollar value. Whether the responsible avatar is controlled by an AI entity or an individual, the accountable party should bear financial liability for the harm inflicted upon the brand. This liability stems from potential consequences such as consumer confusion or the erosion of the brand's distinctiveness, necessitating the enforcement of IPR. However, the defendant’s real identity is cloaked and identified only as a numbered alias. In some cases, courts may be able to issue a court order against the platform owner to disclose the identity of an individual involved in infringing activities, even if those individuals are using digital identities or pseudonyms. Plaintiffs seeking to make a claim against an individual and name a defendant for a case of IP infringement involving cryptocurrency, may seek to discover their identity through contacting administrators of the defendant’s digital wallet (or ‘crypto wallet’), but to do so, a court order will be required since administrators would otherwise not have an obligation to release this information. However, the process and criteria for

⁵⁷⁰ ImmuneBytes, “Pseudonymity and Anonymity: Be Untraceable in the Blockchain World”, (23 January 2023), online: <<https://www.immunebytes.com/blog/pseudonymity-and-anonymity-be-untraceable-in-the-blockchain-world/>>.

obtaining such orders can vary significantly between jurisdictions and may be a burdensome process to even reach the step of a court order.⁵⁷¹ This is because the applicable jurisdiction must first be established in order to determine whether the court has the authority to request this information from crypto wallet administrators. It may be that the courts would consider the balance of the rights of the individuals, including right to privacy and freedom of expression, against the rights of IP holders who seek to protect their rights.⁵⁷² However, determinations will vary depending on the strength of evidence and nature of the infringement. Nonetheless, this may be challenging, if not impossible, if a definitive traceable link cannot be made from a digital identity to a specific real-world individual due to blockchain-based system loopholes and the nature of decentralized platforms that may complicate identification further. As metaversal technologies continue to evolve, new tools and methods for preserving anonymity or cloaking identities will continue to emerge which may significantly impact legal strategies for enforcing IP rights. Fashion brand owners will look towards innovative technologies such as decentralized identity and credential verification systems, or equivalent tools that work in alignment with blockchain technology in the hope that these will provide transparent and secure identity verification to assist with sustainable and effective IP enforcement in the metaverse.

The role of blockchain transparency is to build security through the ability to verify authenticity with a record of a virtual asset's history and identifying resales. The blockchain can be effective in several ways. For example, in protecting the authenticity of virtual fashion goods, in preventing virtual counterfeits, in reassuring users and consumers that their digital purchases are legitimate, and it may also assist with reducing operating costs through efficient data management and supply chain capabilities.⁵⁷³ This system of tracking and tracing reduces the risk of fraud and counterfeiting and discourages infringement. With effective tracing, digital assets can then be securely linked to brand's identity and ownership, ensuring that consumers can verify the authenticity and origin of a product within the metaverse, which as result, increases consumer confidence in a fashion brand. Moreover, it can ensure that cryptographic security features that can be coded into the blockchain system make it difficult for malicious actors to manipulate records or create unauthorized copies of digital assets. This helps brands maintain their reputation and protect their IPR from dilution, ensuring that virtual goods associated with their names are genuine and verifiable. We also see this manifested through the use of near-field communication (NFC) tags as authenticity codes to store a unique identity for each physical product and become proprietary through the processing of a smart contract, similar to a NFT on the blockchain, allowing for the creation of a digital twin of the particular item. Similarly, Aura Blockchain Consortium, Arianee and Temera have advanced Digital Product Passport technology to offer

⁵⁷¹ See, e.g. *Google LLC v Equustek Solutions Inc*, 2017 SCC 34, [2017] 1 SCR 824.

⁵⁷² See, e.g. Graeme B Dinwoodie, "A New Intellectual Property World Order: The International System" (2015) 1:1 *Journal of Law, Technology & Policy* 1, online: https://digitalcommons.schulichlaw.dal.ca/scholarly_works/1358/.

⁵⁷³ Alison Bringé, "Council Post: How Fashion Brands Can Enter The Metaverse", (1 July 2022), online: *Forbes* <<https://www.forbes.com/sites/forbescommunicationscouncil/2022/07/01/how-fashion-brands-can-enter-the-metaverse/>>.

information such as product origin.⁵⁷⁴ This technology provides the benefit of tracking authenticity, sourcing, general traceability, and to enhance CRM mechanisms for direct communication with consumers, sales, loyalty programming, and other creative consumer services. DPPs are being quickly adopted by many brands due to the new EU Ecosign for Sustainable Product Regulation DPP requirement for all products sold in the EU to potentially close the gap between demands for transparency and the lack of reliable product data.⁵⁷⁵ This transparency significantly reduces the occurrence of counterfeit virtual goods, as each item's history and ownership can be tracked back to its origin on the blockchain. The metaverse is increasingly becoming a significant business platform that contains fundamental infrastructure to host third parties, including brand owners. Through inherent features of transparency, immutability, and traceability, the metaverse has the potential to provide for a safe place for consumers to transact and for fashion brands to thrive.

4.4 Interoperability

The success of fashion brand business models for commercialization and the enforcement of relevant IP in the metaverse hinges on the ability to ensure interoperability and the interconnectedness of IP rights across both metaversal and sub-metaversal platforms. Interoperability is an integral element of the future of this digital economy as consumers will require the ability to move virtual assets, including virtual clothing, accessories, or avatar skins platform to platform to mirror physical world experiences, and further, to blur a user's digital and physical reality through mechanisms such as overlays and XR. Entities such as the Open Metaverse Interoperability Group, Metaverse Standards Forum, and the World Wide Web Consortium (W3C), a body focused on web standardization, have been dedicated to developing interoperability. Their goal is to facilitate smooth transitions between platforms, allowing users to effortlessly transfer online assets. This also includes possessions like land titles, virtual fashion items, and assets in the form of NFTs. The objective is to enable users to switch between platforms while maintaining a singular digital identity (or multiple) and accompanying avatars across platforms. The tremendous magnitude of commercial scalability for fashion brands, made possible with successful and efficient interoperability, will be important for policy makers to consider in order to develop effective IP governance in this space.

As Hwang and Yoon emphasize, seamless movement across sub-metaverses requires standardized protocols, data integration, and cross-platform compatibility, yet such interoperability also

⁵⁷⁴ "How Luxury Brands are Embracing the Digital Product Passports? |", online: <<https://www.fashionbi.com/insights/how-luxury-brands-are-embracing-the-digital-product-passports>>.

⁵⁷⁵ "EU's Digital Product Passport: Advancing transparency and sustainability | data.europa.eu", online: <<https://data.europa.eu/en/news-events/news/eus-digital-product-passport-advancing-transparency-and-sustainability>>.

magnifies exposure to systemic risks and governance gaps.⁵⁷⁶ Virtual environments must manage multi-source data, enforce accountability, and enable rapid service authorization while preserving user protections. Without coordinated governance frameworks, platform operators face challenges in maintaining consistent policies, auditing compliance, and mitigating conflicts that arise from overlapping services or shared digital infrastructure.⁵⁷⁷ These concerns highlight that the technical ability to transfer assets and identities across metaverse platforms is inseparable from the legal and regulatory mechanisms that govern such activity. These governance considerations directly intersect with broader questions of digital asset protection. The lack of harmonized standards increases the vulnerability of virtual goods, NFTs, and other digital assets to misuse or loss when moving between platforms. Hwang and Yoon’s analysis reinforces discussions on the necessity of robust platform governance: ensuring that operators are accountable, users’ rights are enforceable, and transactions are auditable. Moreover, the cross-border nature of the metaverse underscores the importance of international cooperation and the development of interoperable regulatory regimes, aligning with earlier arguments that protecting digital assets requires not only technical solutions but also coherent policy and legal frameworks spanning multiple jurisdictions.

4.4.1 *Challenges of Interoperability*

As Wang and others highlight, “interoperability and scalability in the metaverse indicate that users can freely shuttle across various sub-metaverses concurrently,” however, this prospect also “poses challenges to ensure fast service authorization, compliance auditing, and accountability enforcement in seamless service mitigation and multi-source data fusion.”⁵⁷⁸ Additionally, challenges related to hardware and software implementation, along with communication of metaverse interfaces, can present considerable obstacles to achieving interoperability. These challenges might potentially worsen the central issues surrounding the use of IP. These issues encompass, among others, unauthorized utilization of skins and digital fashion items, the proliferation of counterfeit virtual clothing and accessories, unauthorized exploitation of IP, and the complex matter of managing licenses’ geographical and platform scope. These complexities may arise when assets are transferred from one platform to another, crossing virtual boundaries and entering new regions within the virtual space.

To holistically understand the safeguards and frameworks that are required to be in place for remediation, we must take a prospective view and understand the nuanced considerations that are to come with a Metaverse that is entirely interoperable. Although the promise of visual uniformity in

⁵⁷⁶ Helen Hwang & John Yoon, “Policy Issues in the Metaverse Era: Interoperability and Platform Governance” (2023) Colum Bus L Rev 45 at 60–62

⁵⁷⁷ *Ibid.*

⁵⁷⁸ Wang et al, *supra* note 22.

interoperability would be ideal, at the time of writing there has been no certainty with whether digital features of a brand's intellectual property will maintain consistency across platforms. When considering the use of trademarks, for example, certain complexities merit our attention. Firstly, there could be complications arising from the variations in presentation across platforms. Secondly, the challenge emerges from the fact that the Metaverse and its sub-platforms lack distinct jurisdictions. Consequently, tailoring solutions based on jurisdictional considerations becomes impractical within this context. Within this space, there is no guarantee that trademarks (or copyrights, for that matter) will maintain uniformity across different platforms. This discrepancy could potentially pose challenges especially if a brand's trademark displays substantial variations, as INTA cautions, "to the extent that it either fails to support that brand owner's registration or it may even conflict with a third party's trademark."⁵⁷⁹ We may see this in the form of competing colour marks with distinct Pantone colour codes registered by two separate brand owners, or in other similar features which require consistency in presentation to avoid potential dispute.⁵⁸⁰ Brand owners will need to be cognizant of the fact that when attaching their trademark to a particular platform, through selling virtual clothing or accessories, branded NFTs, or creating branded experiences, consistency will be key to avoiding disputes or unintentional infringement. As trademark use in the metaverse is not territorially specific, trademarks owners may not be able to alter the appearance based on jurisdictional considerations, as one may in the physical world for the purposes of marketing, regulation, or alignment with marks registered in a particular jurisdiction. Consequently, if a brand owner has entered agreements with usage limitations (e.g., modified versions stipulated in settlements with competitors), the brand's vulnerability to liability might increase if they lack control over how, when, and where the trademark manifests on diverse platforms.⁵⁸¹ Variations in appearance may also introduce challenges in defining "how trademarks are 'associated with' or 'affixed to' goods and services in the metaverse," and how this differs from trademark use in extended or mixed realities that offer experiences, but do not involve commercial transactions to purchase virtual goods.⁵⁸²

Aside from carrying digital assets from one platform to the other (virtual or physical), users are also enabled to set preferences for digital data sharing. As the World Economic Forum brief on interoperability outlines, "By choosing either a trusted third-party intermediary or self-management with decentralized data stores, a user can create a single interoperable token that provides authentication into multiple different independent services, devices, platforms, and systems...This could be used across experiences like unlocking an AR headset, keying into a point of sale (PoS) system, completing a transaction online or badging into a building."⁵⁸³ This experience promises further development in

⁵⁷⁹ INTA, *Trademark in the Metaverse: A Report from INTA* (INTA Emerging Issues Committee, 2023).

⁵⁸⁰ *Ibid.*

⁵⁸¹ *Ibid.*

⁵⁸² *Ibid.*

⁵⁸³ *Interoperability in the Metaverse: Briefing Paper January 2023* (World Economic Forum, 2023).

terms of not only importing assets into multiple virtual spaces, but also creating more effective onboarding experience by enabling the potential for seamless transacting, data management, and improved flexibility for brand owners and consumers in an expanded virtual marketplace. Again, it also provides increased trust for consumers through the use of authentication mechanisms which creates new opportunities for the fashion industry. “By using blockchain technology – or a value exchange supported by universal data provenance and data lineage – consumers and sellers can possess greater trust in transactions. For example, a seller of a non-fungible token (NFT) can prove authenticity to a buyer as the asset’s history was enabled to move with it across platforms.”⁵⁸⁴ This could be a gamechanger for the industry as an anti-counterfeit mechanism for virtual goods created and traded in this space. Brand owners may also seek to combine this technology with AI functions to assist with enforcement of their IPR in the interim while governing infrastructure further develops.

As noted earlier, although decentralized ownership models appear to promote interoperability and greater user control over digital assets, important structural tensions remain. In principle, such portability would allow users to move between virtual environments while retaining control over their digital property, thereby reducing switching costs and encouraging broader participation in metaverse economies.⁵⁸⁵ Yet the incentives of platform operators do not necessarily align with this vision. Dominant digital platforms often benefit from maintaining closed ecosystems in which user data, digital assets, and social networks remain confined within a single environment. These structures reinforce network effects and increase user lock-in, allowing platforms to consolidate market power and retain greater control over the circulation of digital goods.⁵⁸⁶ As a result, although interoperability may benefit users and support the long-term development of the metaverse, platform providers may have limited incentives to facilitate the migration of users or assets to competing platforms. Even where the underlying technologies, such as NFTs recorded on public blockchains, technically permit cross-platform transferability, platforms may impose contractual, technical, or licensing constraints that restrict the practical portability of those assets.⁵⁸⁷

This tension poses a broader governance risk for the metaverse ecosystem. If interoperability is not meaningfully maintained, the metaverse risks fragmenting into a series of proprietary digital environments rather than developing as a connected digital infrastructure. Intellectual property frameworks lie at the centre of this tension. Depending on how ownership rights, licensing structures, and platform governance mechanisms are designed, IP law may either support the portability of digital

⁵⁸⁴ *Ibid.*

⁵⁸⁵ Carl Shapiro, “Antitrust in a Time of Populism” (2018) 61:1 Intl J Ind Org 714 at 724–26. See also, Geoffrey G Parker, Marshall W Van Alstyne & Sangeet Paul Choudary, *Platform Revolution: How Networked Markets Are Transforming the Economy* (New York: WW Norton & Company, 2016) at 103–10.

⁵⁸⁶ *Ibid.*

⁵⁸⁷ *Ibid.*

assets across platforms or reinforce proprietary control that limits interoperability.⁵⁸⁸ The way in which these competing interests are balanced will therefore play a critical role in determining whether the metaverse evolves as an open and interoperable environment or as a collection of closed digital marketplaces. While interoperability promises a more fluid digital environment in which assets, identities, and experiences move across platforms, it also exposes the limits of existing legal frameworks. In particular, intellectual property regimes remain largely jurisdictional and platform governance structures are frequently private and contractual. As digital assets circulate across multiple platforms and potentially across national boundaries, questions arise regarding how rights in those assets are recognized, enforced, and transferred within a fragmented regulatory environment. These challenges are especially pronounced for brand owners seeking to protect intellectual property in virtual environments that transcend traditional territorial boundaries.

4.5 Current International Regimes for Digital Asset Protection

As trademark rights are territorial in nature, for marks to be protected in other jurisdictions, they must be filed either directly in jurisdictions that are strategically aligned with the markets that the brand would like to be active within, or an applicant can file internationally through the Madrid System for international registration of marks. The Madrid Protocol offers brands the possibility of registering for trademark protection in more than 100 countries by filing one international application with the World Intellectual Property Organization (WIPO). These applications are assessed according to legislation existing in each designated country.⁵⁸⁹ Thus, for example, this right of priority depends, in the United States, on the ability for the brand to prove ongoing use in commerce prior to bringing an action against a potential infringer. As per Section 44(e) under the Madrid Protocol regarding applications against intervening first use, “a foreign applicant who obtains a registration without showing actual use in the U.S. has the right of priority, as of the relevant ‘constructive use’ date, over another company who first uses the mark in the U.S.”⁵⁹⁰

The first major IP accord for the protection of industrial property operating internationally was the *Paris Convention Protection of Industrial Property*, signed in 1883 in which each national signatory of the treaty agreed to respect the patents, trademarks, and related intellectual property of each foreign entity, and their inventors and designers, with the same importance as domestic entities without bias

⁵⁸⁸ Geoffrey G Parker, Marshall W Van Alstyne & Sangeet Paul Choudary, *Platform Revolution: How Networked Markets Are Transforming the Economy* (New York: WW Norton & Company, 2016) at 103–10. See also, James Grimmelmann, “The Law and Economics of Digital Assets” (2022) 67:2 Vill L Rev 335 at 350–55.

⁵⁸⁹ Canadian Intellectual Property Office, “International Trademarks under the Madrid Protocol”, (15 September 2020), online: *Government of Canada, Canadian Intellectual Property Office* <<https://ised-isde.canada.ca/site/canadian-intellectual-property-office/en/international-trademarks-under-madrid-protocol>>.

⁵⁹⁰ 15 U.S.C. § 1126(e), § 44(e)

priority.⁵⁹¹ Shortly after the Paris Convention, the Berne Convention was signed – a major international IP treaty with a focus on copyright. The *Berne Convention for the Protection of Literary and Artistic Works* (*‘Berne Convention’*), ratified by 181 countries, establishes that “contracting parties must grant exclusive rights to authors over their works irrespective of the type or form of their expression.”⁵⁹² The Berne Convention has since been supplemented by other international agreements, including the WIPO Copyright Treaty (1996), which adapts the Berne Convention to the digital environment. “This agreement (Agreed Statement concerning Article 1(4) of the WIPO Copyright Treaty) makes it clear that the storage of a protected work in digital form in an electronic medium (such as an NFT or a file, the content of which is displayed in the metaverse) constitutes a reproduction which needs the prior approval of the copyright holder.”⁵⁹³ While in principle it is a requirement to request permission to use a trademark upon a digital object, such as an NFT of an item in the metaverse, some courts have established that certain descriptive uses of third parties’ trademarks do not need prior consent.⁵⁹⁴ We see this in cases such as *AM General LLC v Activision Blizzard, Inc. et al*, explored above in Chapter 2.

Although there are regimes such as the Berne Convention, Paris Convention and other international treaties, the nuanced approaches that will be required in the metaverse may call for Private International Law (PIL) solutions. Specifically, conflict of laws rules may need to be applied in the absence of substantial international regimes that take technological advancements into considerations on an ongoing basis. However, the conflict of law solutions may vary based on whether metaverse platforms will be considered as several online platforms, or if it will be considered as a single all-encompassing “Metaverse” (akin to the “Internet”) moving forward. This will be assessed briefly within this chapter, along with its application to governance challenges and potential solutions.

4.6 Protection Regimes for Digital Assets and Related IP

If the metaverse were to function primarily as an online platform or marketplace, the underlying architecture would be heavily dependent on the terms and conditions governing user access to services, platform engagement, and virtual asset transactions within this domain. These terms are established through agreements with users or consumers who are situated within a specific jurisdiction. As a result,

⁵⁹¹ *Paris Convention for the Protection of Industrial Property Paris Convention for the protection of industrial property of March 20, 1883, as revised at Brussels on December 14, 1900, at Washington on June 2, 1911, at The Hague on November 6, 1925, at London on June 2, 1934, at Lis bon on October 31, 1958, and at Stockholm on July 14, 1967, 1883, 11851.*

⁵⁹² *Berne Convention for the Protection of Literary and Artistic Works*, 9 September 1886, Can. T.S. 1948 No. 22, 828 U.N.T.S. 221, revised most recently by Paris Act relating to the Berne Convention, 24 July 1971, 1161 U.N.T.S. 3. Note: Canada has only signed the Rome (1928) revision of this Convention; however, substantively it protects works up to the Paris (1971) revision.

⁵⁹³ Andy Ramos, “The Metaverse, NFTs and IP rights: to regulate or not to regulate?”, (June 2022), online: *WIPO Magazine* <https://www.wipo.int/wipo_magazine/en/2022/02/article_0002.html>.

⁵⁹⁴ *Ibid.* Note: We see this in cases relating to video games, for example in the case regarding the famous Humvee trademark, of A.M. General. See, *AM General LLC v Activision Blizzard, Inc. et al*, No. 17 Civ. 8644, 2020 WL 1547838, at *1 (S.D.N.Y. Mar. 31, 2020).

they are subject to the intellectual property safeguards and other provisions outlined by that jurisdiction, irrespective of whether the defendant's server, in the context of legal proceedings, is located outside that jurisdiction.⁵⁹⁵ Within the business-to-consumer context, the conventional application of the "directed activity" criterion, which serves to determine a business's establishment within a distinct jurisdiction and consequently subjects it to that jurisdiction's legal framework, becomes notably complex when applied to the metaverse. This complexity arises due to the nature of immaterial services within the global metaverse, where the delineation of a specific national audience for content is challenging. Consequentially, this situation underscores the necessity for the development of a unilateral extraterritorial protection regime.⁵⁹⁶

4.6.1 *The Exemplary European Union*

In this respect, we can direct our attention to the European Union (EU) as an exemplar of regulations and standards that wield substantial influence on global markets, transcending extraterritorial boundaries. This phenomenon, often referred to as the "Brussels Effect," underscores the EU's ability to extend its regulatory impact beyond its own jurisdiction.⁵⁹⁷ European regulations, as Bradford posits, successfully externalize its norms and principles in the digital policy realm.⁵⁹⁸ Through a marketplace-focused approach, the EU ensures the digital sovereignty of its citizens and businesses via instruments such as the E-commerce Directive (Directive 2000/31/EC), the Platform-to-Business Regulation (P2B), the General Data Protection Regulation (GDPR), and the recent Digital Services Act and Digital Markets Act, and is in the process of considering the proposed ePrivacy Regulation and the Data Act, with the latter already in force and progressively implementing its core data-access obligations.⁵⁹⁹ In parallel, the EU has modernized product safety oversight through the General Product Safety Regulation (GPSR), in force since December 2024, which explicitly covers digital and hybrid products and applies obligations to all economic operators, including manufacturers, marketplaces, and online fulfillment services, with market surveillance expected to intensify in the near future.⁶⁰⁰

Complementing this framework, the EU AI Act establishes a risk-based regime for trustworthy AI, defining obligations for providers, deployers, and manufacturers of high-risk AI systems, with

⁵⁹⁵ Users enter into this contract through providing personal data as consideration accordingly to legislation, including the Directive (EU) 2019/770 regarding the supply of digital content and DSA, Article 3.1.

⁵⁹⁶ "Conflict of Laws and the Metaverse", (13 June 2023), online: *European Association of Private International Law (EAPIL)* <<https://eapil.org/2023/06/13/conflict-of-laws-and-the-metaverse>>.

⁵⁹⁷ Anu Bradford, "The Brussels Effect" (2012) 107:1 *Northwestern University Law Review* (Columbia Law and Economics Working Paper No.533), online: <<https://papers.ssrn.com/abstract=2770634>>. See also, Anu Bradford, *The Brussels Effect: How the European Union Rules the World* (New York: Oxford University Press, 2020).

⁵⁹⁸ *Ibid.*

⁵⁹⁹ EAPIL, *supra* note 594.

⁶⁰⁰ Regulation (EU) 2023/988 of the European Parliament and of the Council of 10 May 2023 on general product safety, OJ L 135/1 (23 May 2023) (GPSR). See also, Reed Smith, "2026 Update: EU Regulations for Tech and Online Businesses" (7 January 2026), online: https://www.reedsmith.com/our-insights/blogs/viewpoints/102lyiv/2026-update-eu-regulations-for-tech-and-online-businesses/?utm_source=chatgpt.com

operational readiness particularly emphasized in 2026.⁶⁰¹ Collectively, these regulations articulate a comprehensive EU strategy for platform governance, data access, interoperability, and digital asset protection, encompassing privacy, safety, AI accountability, and user rights across physical, digital, and hybrid product ecosystems. By codifying principles of data portability, interoperability, and transparency, instruments such as the GDPR, the *Digital Markets Act*, and the *Data Act* directly influence how platforms operate, how user data is managed, and how virtual goods are safeguarded. The ongoing consideration of the proposed ePrivacy Regulation further signals the EU's intent to tighten rules on electronic communications and consent, reinforcing privacy protections that underpin trust in digital environments. For platforms operating in the metaverse, these evolving standards highlight the necessity of compliance not only to maintain legal certainty but also to support secure, auditable, and accountable ecosystems for digital assets and services across multiple jurisdictions.

In a European Court of Justice judgement, it was held that a computer program, including its graphical user interface, and the creations within it may be recognized as original artistic virtual works, which are protectable under copyright law. These works are protectable, and therefore, copyright here within the meaning of Directive 2001/29, as the Court emphasized, copyright “is liable to apply only in relation to a subject-matter which is original in the sense that it is its author’s own intellectual creation.”⁶⁰² This principle highlights that the creations of users and consumers on a platform may constitute copyrightable works, particularly in environments where the platform encourages innovation and co-creation. This principle is particularly significant in metaverse environments, where users frequently generate expressive digital assets, such as avatars, virtual clothing, architecture, and immersive environments, that may themselves constitute copyrightable works. The relevance of these protections varies depending on whether the metaverse is structured as an open or closed ecosystem. The relevance of these protections varies depending on whether the metaverse is structured as open or closed. In an open metaverse, users are invited to collaborate on innovative experiences and contribute new features and content, creating a richer ecosystem of copyrightable material. In such contexts, platform developers may implement agreements designed to balance the interests of the metaverse platform owner with those of content-creating users, including provisions that protect both parties’ rights, establish ownership of user-generated content, and clarify procedures for content moderation, censorship, and the removal of infringing material. These agreements are equally important for brands entering the metaverse, as they must navigate both user-created content and intellectual property risks. However, as experience with traditional copyright regimes shows, relying solely on retrospective infringement remedies, such as notice-and-takedown systems modeled on the U.S. Digital Millennium Copyright Act (DMCA), may be prove insufficient in highly dynamic virtual environments where

⁶⁰¹ European Commission, *Navigating the AI Act* (Digital Strategy, 28 January 2026), online: <https://digital-strategy.ec.europa.eu/en/faqs/navigating-ai-act>

⁶⁰² ECLI:EU:C:2010:816.

infringing material can be created, replicated, and distributed almost instantaneously.⁶⁰³ Moving forward, real-time monitoring, proactive compliance, and automated content identification will likely be necessary to prevent infringement rather than merely reacting to it after it occurs. Moving forward, real-time monitoring, proactive compliance, and automated content identification will likely be necessary to prevent infringement rather than merely reacting to it after it occurs.

The limitations of reactive enforcement mechanisms become particularly evident when examining the DMCA framework itself. The DMCA requires platforms to “accommodate and not interfere with standard technical measures...to identify or protect copyrighted works,” yet it does not mandate the development or deployment of such measures.⁶⁰⁴ As a result, while platforms may benefit from safe-harbour liability protections, the statutory framework leaves the creation and implementation of proactive technological safeguards largely optional.⁶⁰⁵ This structural gap prompted legislative efforts such as the Strengthening Measures to Advance Rights Technologies (SMART) Copyright Act introduced in the United States Congress in 2020.⁶⁰⁶ The proposed legislation sought to address this deficiency by authorizing the U.S. Library of Congress to designate and periodically update “standard technical measures” that digital platforms would be required to implement in order to maintain their liability protections.⁶⁰⁷ Under this framework, the Library of Congress worked with copyright owners, technology experts, and industry stakeholders to identify technological tools capable of detecting and mitigating copyright infringement, including automated content recognition systems, watermarking technologies, and rights-management protocols. The goal was to shift copyright protection from a primarily reactive model toward a more proactive one, ensuring that platforms hosting large volumes of user-generated content would incorporate standardized technological safeguards against piracy.⁶⁰⁸ Although the SMART Act ultimately did not pass, the policy debate it generated underscores a persistent regulatory gap: current legal regimes incentivize cooperation between platforms and rightsholders but do not compel the implementation of standardized technical protections.

These challenges become even more pronounced in the metaverse context, where digital assets may circulate across interconnected virtual environments and be replicated at scale. Current legislative frameworks, including the DMCA or analogous measures in other jurisdictions, may not sufficiently incentivize platform operators to collaborate proactively with rights holders in implementing pre-

⁶⁰³ *Digital Millennium Copyright Act*, 17 U.S.C. § 512, 1201–1205.

⁶⁰⁴ *Ibid.* See also, Juan Londoño, Jaci McDole, & Daniel Castro, “IP and the Metaverse: The Digital Millennium Copyright Act Will Face Serious Challenges in the Metaverse”, (19 September 2022), online: *Information Technology and Innovation Foundation (ITIF)* <<https://itif.org/publications/2022/09/19/ip-and-the-metaverse-the-dmca-will-face-serious-challenges-in-the-metaverse/>>

⁶⁰⁵ 17 USC § 512.

⁶⁰⁶ SMART Copyright Act of 2020, S 2992, 116th Cong (2020). See also, US, Bill S 3880, Strengthening Measures to Advance Rights Technologies Copyright Act of 2022, 117th Cong, 2022, s 3.

⁶⁰⁷ 17 USC § 512(i)(1)(B).

⁶⁰⁸ US Congress, Senate Committee on the Judiciary, SMART Copyright Act of 2020: Legislative Summary, 116th Cong (2020).

emptive anti-infringement measures. Comparable mechanisms, such as the *Uniform Domain-Name Dispute Resolution Policy* (UDRP), demonstrate that structured procedures can facilitate the removal of infringing content, but their effectiveness in the metaverse would likely demand a centralized point of contact for reporting, compliance monitoring, and complaint documentation.⁶⁰⁹ Establishing such a system may be extremely challenging, if not impossible, without some form of international coordination or oversight body. Consequently, addressing copyright concerns in the dynamic and decentralized environment of the metaverse will likely require both technological solutions such as automated content recognition, rights management tools, and ongoing collaboration between platforms, rightsholders, and potentially supranational regulatory entities. Accordingly, further developments and cooperation between platforms and rightsholders will likely be required to effectively address copyright concerns in the dynamic environment of the metaverse.

The emergence of large-scale digital networks has long raised a central policy challenge for copyright law: determining the extent to which internet and digital service providers should bear responsibility for infringing activities carried out by users of their platforms. Since the mid-1990s, legislatures have grappled with how to balance the interests of copyright owners seeking effective enforcement with the need to preserve innovation and the open architecture of the internet. One response to this challenge has been the expansion of intermediary liability, particularly through doctrines addressing contributory or enabling infringement. In Canada, this policy objective was addressed through the Copyright Modernization Act, 2012, which introduced a number of reforms to the Copyright Act aimed at clarifying the legal responsibilities of online intermediaries while maintaining a balanced copyright framework consistent with international standards. Among the most significant reforms was the introduction of Canada’s “notice-and-notice” regime, which provides a procedural mechanism for copyright owners to address alleged online infringement through internet intermediaries. Under this system, a copyright holder may send a notice of alleged infringement to the user’s Internet intermediary, typically the Internet service provider (ISP), which is then required to forward the notice to the subscriber and retain records identifying the subscriber for a prescribed period.⁶¹⁰ Although the regime does not require the removal of allegedly infringing material, it operates as a formal deterrent mechanism by requiring notification and record-keeping by intermediaries.⁶¹¹ In this respect, the regime reflects Canada’s attempt to balance enforcement with due process by encouraging compliance without imposing immediate takedown obligations.

⁶⁰⁹ Internet Corporation for Assigned Names and Numbers (ICANN), *Uniform Domain-Name Dispute Resolution Policy* (adopted 24 October 1999, last amended 28 October 2021), online: <https://www.icann.org/resources/pages/policy-2012-02-25-en>

⁶¹⁰ *Copyright Act*, RSC 1985, c C-42, ss 41.25–41.27.

⁶¹¹ *Ibid* s 41.26(1).

A related objective of the *Copyright Modernization Act* was to “clarify Internet service providers’ liability and make the enabling of online copyright infringement itself an infringement of copyright.”⁶¹² This goal was implemented through the introduction of the “enabling infringement” provision in s. 27(2.3) of the *Copyright Act*, which establishes liability for persons who provide a service primarily for the purpose of enabling acts of copyright infringement.⁶¹³ This provision effectively codifies a form of secondary liability analogous to the inducement doctrine articulated by the United States Supreme Court in *MGM Studios Inc v Grokster Ltd*, thereby expanding the circumstances under which digital intermediaries may be held responsible for facilitating infringing activities.⁶¹⁴ Together with the notice-and-notice regime, the enabling infringement provision reflects Canada’s effort to calibrate intermediary responsibility in the digital environment without imposing blanket liability on service providers. As Michael Geist observes in the context of Canadian copyright reform debates, the policy objective was to move beyond polarized rhetoric surrounding digital copyright enforcement and toward a more balanced framework capable of addressing the realities of digital technologies and online platforms.⁶¹⁵ In particular, the legislative reforms culminating in the *Copyright Modernization Act* sought to reconcile competing interests by clarifying intermediary liability, introducing notice-based enforcement mechanisms, and preserving the broader copyright balance between creators, intermediaries, and users.

A further layer of protection introduced through the 2012 amendments concerns Technological Protection Measures (TPMs), commonly referred to as digital locks. The amended *Copyright Act* provides legal protection against the circumvention of TPMs, thereby supporting the use of technological safeguards that allow copyright holders to control access to and use of their works.⁶¹⁶ These digital locks enable copyright holders to determine how their works are accessed and distributed in digital environments, including online platforms and virtual spaces. However, the strengthened protection for TPMs has generated ongoing debate regarding the balance between technological enforcement and users’ rights. In particular, concerns arise where TPMs restrict activities that would otherwise be lawful under the *Copyright Act*, including fair dealing or format-shifting exceptions. Circumstances may arise where an individual circumvents a TPM to access a work for a purpose that would otherwise fall within fair dealing, or to exercise a permitted user right such as format shifting. Although these activities may be non-infringing under the *Copyright Act*, the anti-circumvention provisions may nonetheless prohibit access where technological protection measures are in place.⁶¹⁷ As

⁶¹² *Copyright Act*, RSC 1985, c C-42, s 27(2.3). See also, *Copyright Modernization Act*, SC 2012, c 20

⁶¹³ *Copyright Act*, RSC 1985, c C-42, s 27(2.3).

⁶¹⁴ *MGM Studios Inc v Grokster Ltd*, 545 US 913 (2005).

⁶¹⁵ Michael Geist, ed, *From “Radical Extremism” to “Balanced Copyright”: Canadian Copyright and the Digital Agenda* (Toronto: Irwin Law, 2010), online: <https://www.michaelgeist.ca/2010/10/radical-extremism-book-intro/>

⁶¹⁶ *Copyright Act*, RSC 1985, c C-42, ss 41.1–41.21.

⁶¹⁷ *Copyright Act*, RSC 1985, c C-42, ss 29–29.2, 41.1–41.21. See also, Carys J Craig, “Locking Out Lawful Users: Fair Dealing and Anti-Circumvention in Canadian Copyright Law” in Michael Geist, ed, *From “Radical Extremism” to “Balanced Copyright”: Canadian Copyright and the Digital Agenda* (Toronto: Irwin Law, 2010).

Craig observes, the legal protection afforded to technological protection measures risks allowing copyright holders to “lock out lawful users,” effectively enabling technological controls to override the copyright balance by preventing uses that the law would otherwise permit, including fair dealing. This concern becomes particularly salient in the context of metaverse platforms, where digital assets and virtual environments may be governed primarily through code-based access controls embedded within platform architecture rather than through traditional copyright enforcement mechanisms.⁶¹⁸ This tension highlights the broader challenge facing copyright law as digital environments evolve. While intermediary liability rules, notice-based enforcement mechanisms, and technological protection measures were developed to address infringement in the early internet era, their adequacy in emerging digital ecosystems such as the metaverse remains uncertain. As immersive platforms increasingly rely on user-generated content, interoperable digital assets, and decentralized creative participation, existing legal tools may require further adaptation to ensure that intellectual property protections remain effective without undermining innovation and lawful user activity.

The EU InfoSoc Directive (Directive 2001/29/EC) and the Directive on Copyright in the Digital Single Market (Directive 2019/790, “DSM Directive”) are particularly relevant to the metaverse, as they establish the legal framework governing the liability of online intermediaries and the use of copyright-protected works in digital environments. Under the InfoSoc Directive, hosting providers are generally not liable for content uploaded by users unless they are aware of illegal activity and fail to act to remove or disable access to infringing material, a principle broadly comparable to the DMCA safe-harbour regime in the United States. The DSM Directive, in turn, introduces more stringent obligations for online content-sharing service providers, including platforms that may qualify as metaverse environments, by requiring that they obtain licenses from rights holders for all creative content uploaded by users and implement measures to prevent unauthorized uploads (Art 17).⁶¹⁹ These provisions are intended to ensure that copyright holders receive fair remuneration for the use of their works, including commercial exploitation in virtual environments, with potential mechanisms such as smart contracts facilitating the tracking and distribution of royalties in digital transactions.

In addition, the EU’s broader digital regulatory framework, including the Platform-to-Business Regulation (*P2B Regulation*), the *Digital Services Act*, and the *Digital Markets Act*, provides complementary governance for intermediary platforms, promoting transparency, fairness, and accountability in online commercial interactions.⁶²⁰ While these regulations were designed for general

⁶¹⁸ *Ibid.*

⁶¹⁹ EU, *Directive 2019/790 of the European Parliament and of the Council of 17 April 2019 on copyright and related rights in the Digital Single Market and amending Directives 96/9/EC and 2001/29/EC* [2019] OJ L 130, 17.5.2019, p. 92–125.

⁶²⁰ Platform-to-Business Regulation - Regulation (EU) 2018/1125 of the European Parliament and of the Council of 25 July 2018 on promoting fairness and transparency for business users of online intermediation services [2018] OJ L 197/1 (*P2B Regulation*). See also, Digital Services Act – Regulation (EU) 2022/2065 of the European Parliament and of the Council of 19 October 2022 on a single market for digital services and amending Directive 2000/31/EC [2022] OJ L 277/1 (*Digital*

e-commerce and digital services, their principles are readily extendable to metaverse platforms, particularly when such platforms operate as core intermediaries facilitating access, trade, or content sharing in immersive environments. Together, the InfoSoc Directive, DSM Directive, and associated platform regulations underscore the EU's emphasis on safeguarding rights, ensuring data protection, and maintaining robust regulatory standards in its internal market. For the metaverse, this framework offers a model for harmonizing intellectual property protection, intermediary liability, and equitable remuneration across jurisdictions, providing valuable guidance for other states considering regulatory approaches to immersive digital spaces.

However, the platforms themselves are protected from liability for user-generated content under the Canada–United States–Mexico Agreement (CUSMA), which mirrors the protections of Section 230 of the U.S. *Communications Decency Act* (CDA).⁶²¹ Article 19.17 of CUSMA provides that interactive computer service providers are not treated as content creators for material posted by users and are shielded from liability for third-party content, while also receiving immunity for good-faith content moderation actions. These provisions extend to content uploaded within the metaverse, ensuring that platforms facilitating user-generated creations are not automatically held liable for infringing activities, provided they do not themselves contribute to the creation of such content. This framework complements existing DMCA and Canadian notice-and-notice protections and further supports the development of virtual environments where user participation and content creation are central. Similarly, Section 230(c)(1) states, “no provider or user of an interactive computer service shall be treated as the publisher or speaker of any information provided by another information content provider.”⁶²² In practice, Section 230 would immunize a service provider, such as a metaverse platform owner, from claims addressing the provider as the publisher, provided that (i) the service qualifies as an interactive computer service, (ii) the content is created by third-party users, and (iii) the claim arises solely from that user-generated content.⁶²³ Proponents of Section 230 emphasize that it was intended to allow service providers to moderate user content in good faith and ensure its lawfulness without creating new liability.⁶²⁴

However, with respect to copyright and intellectual property, these safe-harbour protections are limited. They are contingent on adherence to notice-and-takedown schemes (such as the DMCA in the

Services Act). See also, Digital Markets Act - Regulation (EU) 2022/1925 of the European Parliament and of the Council of 14 September 2022 on contestable and fair markets in the digital sector [2022] OJ L 265/1 (*Digital Markets Act*).

⁶²¹ Communications Decency Act, 47 USC § 230 (1996).

⁶²² 47 U.S.C. § 230(c)(1); See also, Brian Levy, “Will Section 230 and DMCA Translate to the Metaverse?”, (July 19, 2022), online: *JD SUPRA* <<https://www.jdsupra.com/legalnews/will-section-230-and-dmca-translate-to4424066/>>.

⁶²³ Communications Decency Act, 47 USC § 230 (1996); see also *Zeran v America Online, Inc.*, 129 F.3d 327 (4th Cir 1997).

⁶²⁴ *Ibid.*

U.S.⁶²⁵ or the Canadian notice-and-notice system)⁶²⁶, and traditional principles of liability continue to apply.⁶²⁷ In the U.S., vicarious or contributory liability may still attach where the provider profits from or materially contributes to infringement, while in Canada, authorization or enablement liability remains relevant even if the platform is not deemed the publisher. Consequently, while CUSMA and Section 230-like protections reduce exposure for platforms, they do not eliminate liability for copyright infringement, and disputes arising between users, or between users and brands operating within metaverse spaces, remain uncertain, particularly where the service provider's role in content creation or facilitation is implicated.⁶²⁸ This evolving framework of intermediary liability and safe-harbour protections is complemented by the EU Digital Services Act, which establishes comprehensive obligations for digital platforms to ensure transparency, accountability, and the removal of illegal content, offering a regulatory model that could inform governance and compliance in metaverse environments.

4.7 Digital Services Act (DSA)

The EU's DSA is a reasonable starting point to assist in the creation of metaverse IP infringement monitoring structures. One of the purposes of the DSA is to establish transparency and accountability frameworks for online platforms. It provides that online platforms must comply with the following:

1. Having an internal complaint handling system;
2. Creating an ADR process to resolve disputes with their users (the out-of-court dispute settlement mechanism);
3. Publishing detailed reports on the removal and the disabling of illegal content or content contrary to their terms and conditions;
4. Prioritizing requests for illegal content removal from "trusted flaggers";
5. Complying with additional transparency rules for online advertising;
6. Requiring that online platforms that allow consumers to conduct distance contracts with sellers ensure that sellers can only offer goods and services via their platforms after complying with strict "Know Your Customer" procedures;
7. Keeping information about the sellers in order to help track down sellers of illegal goods or services;
8. Assisting with compliance with a seller's obligations to keep consumers informed and provide appropriate product safety information;
9. Verifying information relating to sellers using their platforms.⁶²⁹

⁶²⁵ Digital Millennium Copyright Act, 17 USC §§ 512(a)–(d) (1998); Communications Decency Act, 47 USC § 230 (1996); see also *Zeran v. America Online, Inc.*, 129 F.3d 327 (4th Cir 1997).

⁶²⁶ Copyright Act, RSC 1985, c C-42, ss 41.25–41.27, s 27(2.3) (as amended by Copyright Modernization Act, SC 2012, c 20).

⁶²⁷ Digital Millennium Copyright Act, 17 USC §§ 512(a)–(d) (1998).

⁶²⁸ Canada–United States–Mexico Agreement (CUSMA), 30 November 2018, art 19.17, online: <https://www.international.gc.ca/trade-commerce/trade-agreements-accords-commerciaux/agr-acc/cusma-aceum/text-texte/19.aspx?lang=eng>. See also, *supra* note 527.

⁶²⁹ Mateu et al, *supra* note 166. See also, Regulation (EU) 2022/2065 of the European Parliament and of the Council of 19 October 2022 on a Single Market for Digital Services and amending Directive 2000/31/EC (Digital Services Act) (OJ L 277, 27.10. 2022, pp. 1–102).

These particular requirements for better policing digital environments, especially the requirement for ADR methods, imply that the EU intends to reduce the challenge of establishing territorial court jurisdiction. However, this can be a point of contention. INTA raised specific concerns including the following: it may create difficulties for brand owners as complexities of trademark and copyright disputes may not be within the scope of the ADR out-of-court dispute resolution process; there may be inconsistent decision making for cross-border disputes through application of different national trademark legislation; and it could “encourage forum shopping in different EU Member States...with negative unintended consequences to global commerce, lawful trademark use, and free speech”, and it may lead to duplicate legal proceedings.⁶³⁰ In this regard, although the forums and remediations available for Internet dispute resolution may be applied in the context of the metaverse, the latter may require a more nuanced policy approach due to its decentralized and interoperable nature. The DSA and other initiatives such as the Internet & Jurisdiction Policy Network provides an opportunity for organizations to address the tension between cross-border online platform functionality and national jurisdictional interests. There is therefore a need to harmonize regulatory initiatives to ensure seamless economic functions, protection of the public interest, as well as the protection of IPR. A report issued by the UN Secretary-General’s High-Level Panel on Digital Cooperation noted that “while global interconnectedness has grown with the expansion of Internet access, there has been insufficient coordination of the governance of this landscape.”⁶³¹ The final recommendation encouraged, as a matter of urgency, that there be an open consultation process to construct mechanisms for global digital cooperation and architecture with multilateral partnerships and intergovernmental forums to support this initiative.⁶³²

4.8 Establishing Jurisdiction and Private International Law Interventions

Juxtaposed with conventional objects in the physical world, the metaverse poses significant challenges in determining precisely where a digital asset and other virtual goods are located as they do not occupy a clear geographical location. Typically, sovereign authority to adjudicate disputes involving tangible goods and enforcement of a judgement is restricted to their sovereign territorial boundaries, with the premise that determinations have a natural home country.⁶³³ As such, the rules of private international laws may assist with clarifying the *forum rei sitae* and *lex rei sitae* rules (“court of the place where the object is situated” and “law of the place where the object is situated”

⁶³⁰ *Ibid.*

⁶³¹ *Ibid.* See also, UN High-Level Panel on Digital Cooperation, *The Age of Digital Interdependence: Report of the UN Secretary-General’s High-Level Panel on Digital Cooperation* (New York, United Nations, 2019).

⁶³² *Ibid.*

⁶³³ *Digital assets and ETDs in private international law: which court, which law? Call for Evidence Summary* (UK Law Commission, 2024).

respectively).⁶³⁴ For example, patents are “localized” by reference to the registration where the entitlements are created and maintained – “the artificial situs of a patent is the place where the relevant register is kept.”⁶³⁵ However, the law in this evolving space is more nuanced than that and seems to also be dependent on the foundational policies and objectives underpinning each jurisdiction. We will explore some of these private international law concepts and their concern with connecting a cross-border digital asset concern and privacy law dispute to the court of a specific jurisdiction.

The metaverse as “the Metaverse” is similar to the way in which the “Internet” meets cyberterritorial difficulties relating to immateriality. As the European Association of Private International Law suggests, it may be difficult to determine a “place of provision of service” in order to establish the “applicable law to an online contract of provision of service or the use of the ‘place of the harmful event’ connecting factor in order to locate the law of the damage when a tortious situation, [an IP infringement], is committed online that is everywhere at the same time on the globe.”⁶³⁶ The fundamental challenge for private international law is in “omniterritoriality” – which describes a circumstance where the asset “cannot be linked to a specific country because they have simultaneous and equally valid connections to jurisdictions all over the world.”⁶³⁷ Due to distributed ledger technologies, a decentralized technology, this means that the virtual event, digital asset, or object arguably exists “everywhere and nowhere, at the same time”.⁶³⁸ The traditional solution that has been suggested by PIL experts consists of “detaching localization from material reality... [In this regard], fictitious location [has] been favored considering that it remains possible to give a territorial account of immaterial phenomena still marked by some tangible elements.”⁶³⁹ In this context, the difficulties of traceability due to pseudonymity regarding transactions marked by infringement or unauthorized use of trademarks in the creation of an NFT, for example, will lead courts to take account of personal connections of brands as fictional localizations to identify the specific seat of particular legal issues in a digital asset context. Connections, as such, may favour the brand’s interests (as victim) to the infringement, as we see in some ‘cybertorts’ cases thus far, but these cases have largely relied on tangible connections which are absent in the case of blockchain technology. However, in the trademark context, the analysis is not solely about territorial localization in the abstract, but also about the inherently market-based nature of trademark rights themselves. Unlike other forms of intellectual

⁶³⁴ Common Law team at the Law Commission, *Digital assets in private international law: FAQs on the relationship with tax law, banking regulation, and the financial markets*, Law Commission (2025).

⁶³⁵ *Ibid.*

⁶³⁶ EAPIL, *supra* note 594.

⁶³⁷ *Digital assets and ETDs in private international law: which court, which law? Call for Evidence Summary* (UK Law Commission, 2024). See also, Austen L Parrish & Cedric Ryngaert, eds, *Research handbook on extraterritoriality in international law*, Research handbooks in international law series (Cheltenham, UK Northampton, MA, USA: Edward Elgar Publishing, 2023).

⁶³⁸ *Ciba-Geigy*, *supra* note 456. See also, Amy Held, “Crypto Assets and Decentralised Ledgers: Does Situs Actually Matter?” in Andrea Bonomi, Matthias Lehmann, & Shaheez Lalani, eds, *Blockchain and Private International Law* (Brill, Nijhoff, 2023) 209.

⁶³⁹ *Ibid.*

property, trademark protection is fundamentally grounded in use, distinctiveness, and the ability of a mark to function as a source identifier within a particular geographic and consumer market.⁶⁴⁰ Accordingly, the existence and scope of trademark rights depend on consumer recognition and commercial use within relevant markets, such that the “localization” inquiry is, in effect, intertwined with where and how the mark acquires distinctiveness and goodwill. In this sense, digital environments such as the metaverse do not eliminate the need for localization, but instead complicate it by dispersing consumer interaction across transnational virtual spaces, while still anchoring trademark rights in the markets where recognition and goodwill are established.⁶⁴¹

4.8.1 UNIDROIT Principles on Digital Assets and Private Law

The International Institute for the Unification of Private Law (UNIDROIT) Principles on Digital Assets and Private Law (‘Principles’) is intended to be applicable to assets within the definition of “digital asset”, that is, regardless of its use of blockchain technology or distributed ledger technologies.⁶⁴² It seeks to create a transnational legal instrument to provide an international standard on the elements of proprietary digital assets. The UNIDROIT Principles cover a broad range of digital assets that are defined as electronic records that are capable of being subject to control, including those that contains information that are a valuable dataset, image, or textual expression – the composition of virtual goods, NFTs and other metaversal assets. The Principles contain legislative guidance regarding transactions and are intended to be cross-jurisdictionally implementable to reduce legal uncertainty and provide clarity for both domestic and multi-jurisdictional transactions.⁶⁴³ It is important to note here that for the purposes of these Principles, a digital asset subject to ‘control’ is defined as one “where a person can establish that it has (i) the exclusive ability to prevent others from obtaining substantially all of the benefit from the digital asset, (ii) the ability to obtain substantially all the benefit from the digital asset and (iii) the exclusive ability to change the control of the digital asset to another person.”⁶⁴⁴

The UNIDROIT Principles establish that digital assets can be the subject of proprietary rights that could be classified as “property”, or a new class of property to include digital assets, decided state to state. For these assets, the Principles work to support the protection of acquirers and transferees a soft law which is also completely agnostic as to any regulatory provisions that a nation may want to implement into domestic law. In determinations of the applicable law, the Principles have developed a

⁶⁴⁰ See, *Ciba-Geigy Canada Ltd v Apotex Inc; Mattel, Inc v 3894207 Canada Inc; Masterpiece Inc v Alavida Lifestyles Inc*.

⁶⁴¹ Graeme B Dinwoodie, “The Architecture of the International Intellectual Property System” (2004) 77:2 S Cal L Rev 213; Andrew D Murray, *Information Technology Law: The Law and Society* (4th ed, Oxford University Press, 2019).

⁶⁴² International Institute for the Unification of Private Law, UNIDROIT Principles on Digital Assets and Private Law (2024). ISBN: 978-88-86449-49-6, online: <https://www.unidroit.org/wp/content/uploads/2024/01/Principles-on-Digital-Assets-and-Private-Law-linked.pdf>.

⁶⁴³ “UNIDROIT adopts Principles On Digital Assets And Private Law”, (7 July 2023), online: *Dechert LLP* <<https://www.dechert.com/knowledge/onpoint/2023/7/unidroit-adopts-principles-on-digital-assets-and-private-law-.html/1691458309810>>.

⁶⁴⁴ *Ibid*.

“waterfall” of factors that would be one of the first points of reference for legal issues moving forward. Simply, this is broken down into the following flow of actionable priorities: Principle 5(1)(a) the law applicable is the domestic law of the State specified in the asset itself; 5(1)(b) the law applicable is the specified State in the system in which the digital asset is logged, 5(1)(c) the law applicable is governed by the autonomy of the issuer of the digital asset, and 5(1)(d) it is dependent on the State to finally choose the applicable law for forum sitting in that state, or “the law applicable by virtue of the rules of international law of the forum State.”⁶⁴⁵ This is also consistent with Article 3 of the Hague Conference Principles which “allows the parties to choose not only the law of a State but also ‘rules of law’, emanating from non-State sources.”⁶⁴⁶ The Principle in this sense do not stand as an obstacle to preventing an implementing State from accepting a supplementary regulation where there is a necessity to do so, including the conflict of laws principle. As noted, “[b]y way of example, it is perfectly possible to fully implement the PDAPL while subjecting to domestic regulatory law transactions on digital assets which are traded in a given platform or exchange in the domestic jurisdiction or which concern users located in the said jurisdiction.”⁶⁴⁷

Principle 5(1)(d) is particularly where private law requires further development in this context. The Principles leave it in the discretion of the jurisdiction applying it to develop specific approaches to implementation, thus, allowing for flexibility in its organization of application in the IP and private law context.

To the extent permitted by the applicable intellectual property law, the transferee of the digital asset might be entitled to the use and enjoyment of the information (not unlike the lawful purchaser of a book protected by copyright). Alternatively, if the information or its functionality were protected by patent law, for example, then the acquirer of the digital asset could be infringing the patentee’s rights by using the information.⁶⁴⁸

We understand through the unsuccessful HCCH-UNIDROIT Joint Project on Applicable Law to Cross-Border Holdings and Transfers of Digital Assets and Tokens, however, that more exploration is needed in this respect. The UNIDROIT Secretariat and the Hague Conference on Private International Law (HCCH) Permanent Bureau (PB) worked together to prepare a proposal of joint exploratory work on issues related to digital assets and applicable law in the context of the UNIDROIT’s project on Digital Assets and Private Law, as consistent with the findings of the HCCH Conference on Commercial, Digital and Financial Law Across Borders (CODIFI). This joint work was initiated with the objective of building upon Principle 5 and other subject areas.

⁶⁴⁵ *Ibid.*

⁶⁴⁶ *Ibid.*

⁶⁴⁷ *Item No. 6 on the Agenda: Update on Other Projects and Exploratory Work Concerning the 2023-2025 Work Programme (c) Conclusion of the Exploratory Work Conducted on the HCCH-UNIDROIT Project on Law Applicable to Cross-Border Holdings and Transfers of Digital Assets and Tokens*. UNIDROIT, 2024. C.D. (103) 13, Online: <https://www.unidroit.org/wp-content/uploads/2024/04/C.D.-103-13-Conclusion-of-the-exploratory-work-HCCH-UNIDROIT-joint-project-on-Applicable-Law-to-DAT.pdf>.

⁶⁴⁸ Dechert, *supra*, note 641.

Unfortunately, the HCCH found that there were still major gaps to be filled that are too substantial to dismiss. For example, the Principle 5 waterfall structure gives rise to the important of party autonomy, however, was deemed to have “(i) presented, allegedly, potential problems of regulatory arbitrage by digital assets issuers and intermediaries holding digital assets for their clients, (ii) did not discriminate sufficiently between the different types of digital assets, and (iii) proposed solutions which departed from the standard approach of French and European law on these matters.”⁶⁴⁹ The HCCH noted that the applicable law Principles left many questions unanswered and it was clear that the existing Principle 5, nor future instruments of soft law could displace hard regulatory frameworks of the forum State. The Principle in this regard can only establish a modest approach with the objective of intertwining with national legislation to create light handed solutions to the challenges that digital assets present concerning direct application of general legislation. The report further noted a relevant distinction regarding the transfer of digital assets in centralised and decentralised models as we see prevalent within the metaverse. In application to centralized models (CLT), the primary issues were “(i) whether there was a valid choice of law at the moment of joining the platform, and (ii) what the extent of the choice of law was in relation to transactions not concluded between the same parties (the user and the operators of the platforms) but rather between the user and other users within the platform.” Whereas with decentralized models (DLT), akin to Decentraland, “there would be merit in discussing the possibility that joining a DLT model implied joining a multilateral agreement that would in turn regulate any kind of transaction within the system.” This would be an interesting proposition to see develop as an automatic regulatory tool in the context of the metaverse. However, as to the conclusions presented, the HCCH has requested that the Council on General Affairs and Policy (CGAP) seek to initiate a new project by the PB, to facilitate a study of applicable law issues of digital tokens to coincide with the content realized through the joint exploratory work, as well as Principle 5 to avoid “fragmentation among legal instruments developed by different intergovernmental organisations on related subject matters”.⁶⁵⁰

We see similar strides through the U.K. Law Commission’s new categorization of personal property to accommodate digital assets for legal protection. In the U.S., an executive order was issued entitled ‘Ensuring Responsible Development of Digital Assets’ that advocated for an extensive digital asset regulatory framework.⁶⁵¹ These projects may address some concerns related to characterization of digital assets and transfer of property; however, further clarification is required on how these assets are acquired and transferred in the context of businesses and consumers and what governs transactions in

⁶⁴⁹ UNIDROIT, *supra*, note 640.

⁶⁵⁰ *Ibid.* See also, Permanent Bureau, *Proposal for a Normative Project: Private International Law Issues Relating to Digital Tokens*. Hague Conference on Private International Law (HCCH), March 2024, Online:

<<https://assets.hcch.net/docs/d6e2d062-7cd0-4f3d-be96-189c12164ab6.pdf>> Prel. Doc. No 5B REV of March 2024.

⁶⁵¹ US, Executive Order No. 14067 of Mar. 9, 2022, 87 Fed. Reg. 14143 (Mar. 14, 2022).

this borderless metaverse. Principally, the challenge of conflict of laws is caused by decentralized blockchain technology since the immaterial nature “undermines the ability to resort to connecting factors actually in use” and thus, “insurmountable problems occur because decentralized ledgers with no physical connecting factors are reluctant to any localization exercise.”⁶⁵² Although blockchain may provide some connection factors in PIL, through traditional connecting factors or through use of fictitious connection, there is technically no initial point of use other than an IP registration.⁶⁵³ Notwithstanding the challenges presented, it may be a useful tentative solution for obligations to be set on metaverse platforms (as a ‘intermediary secondary platform’) that create these spaces, to facilitate NFT purchasing and trading, and give access to use of their platform to regulate infringement. However, the underlying problem of territoriality persists since blockchain transactions may be pseudonymous or may have its server location rerouted through tools such as VPNs. Thus, issues of identifying the seat of a situation or infringement as well as the identification of parties transacting and engaging within these spaces will require resolution. Even if we were to follow Principle 5 for the law applicable to be the domestic law of the State specified in the asset, noted in the system in which it was logged, dictated by the issuer of the digital asset, or decided by the State for forum sitting, identifying said parties of issuers, or ensuring that applicable law is correctly addressed, may pose independent challenges.

Current legislation around jurisdiction in the metaverse is continually developing. Nevertheless, we can turn to established legal statutes to preliminarily establish a structure for comprehending the potential evaluation of cross-border conflicts. Jurisdictional determinations have been made in the physical world with the assistance of the *Brussels Regulation*⁶⁵⁴ in the EU, and *Federal Courts Jurisdiction and Venue Clarification Act of 2011* in the U.S.⁶⁵⁵ The U.S. Act presents a perspective of offering coherent directives for ascertaining jurisdiction and legal venue in disputes that transcend national borders. It further outlines the categories of cases falling under the jurisdiction of federal district courts. Additionally, the Act elucidates scenarios involving federal concerns, variations in citizenship, and other conditions that give federal courts authority to preside over cases.⁶⁵⁶ Similarly, the Brussels Regulation (Recast) aims to harmonize rules on jurisdiction and the recognition and enforcement of judgments in civil and commercial matters that apply to EU member states and enhances the cooperation and efficiency of cross-border litigation. Further, it seeks to provide a hierarchical system of these harmonized rules based on the nature of the dispute, the parties' domicile, and the location of the assets, which also incorporates the principle of "first seized" (i.e., the court first

⁶⁵² EAPIL, *supra* note 497.

⁶⁵³ *Ibid.*

⁶⁵⁴ EU, *Regulation (EU) No 1215/2012 of the of the European Parliament and of the Council of 12 December 2012 on jurisdiction and the recognition and enforcement of judgments in civil and commercial matters (recast)* OJ L 351, 20.12.2012, p. 1–32.

⁶⁵⁵ US, *Federal Courts Jurisdiction and Venue Clarification Act of 2011*, 28 USC § 1.

⁶⁵⁶ *Ibid.*

approached by the parties) to assist with determinations.⁶⁵⁷ Additionally, the Budapest Convention on Cybercrime along with institutions such as INTERPOL and Europol may also prove to be effective in its support towards preventing IP infringement in the metaverse through its provisions on international cooperation, investigations and prosecution of cybercrime.⁶⁵⁸

4.8.2 *Linden Case Law*

A recent case in the U.S. District Court for the Eastern District of Pennsylvania, *Bragg v Linden Research, Inc.* (“Linden”) developed a baseline framework for addressing determinations of jurisdiction.⁶⁵⁹ This case involved a dispute involving virtual property within the pioneering metaversal platform Second Life regarding a user-platform relationship. A player on Second Life sued the operator, Linden, “claiming that the operator [unlawfully] expropriated his property by nullifying a transaction completed by the participant and freezing his account.”⁶⁶⁰ In assessing the issue of whether the courts had jurisdiction over the defendant, the court found that:

Linden Research’s representations and marketing efforts, although regional in scope, were made to induce interaction from users all over the country with its virtual world. The court found that Linden Research had made representations nationwide regarding their virtual world that did not exclude Pennsylvania (the plaintiff’s state of residence) and that its actions were of a nature that encouraged users all over the country, including Pennsylvania, to purchase virtual property, thereby subjecting Linden Research to jurisdiction in the state.⁶⁶¹

This line of reasoning implies that any marketing, advertising initiatives, or branding endeavors by current, prospective platforms, or virtual service providers that encourage global user engagement with their platform, could potentially serve as a basis for asserting jurisdiction when pursuing claims related to intellectual property usage or infringement within specific regions.⁶⁶² The findings of *Bragg*, however, are limited to targeted marketing campaigns and operation of a metaverse platform alone is not sufficient to determine jurisdiction. Therefore, the issue of jurisdiction is only partially resolved, if at all. Lingering questions remain, including: if an IPR infringement takes place in the metaverse, where would the IP owner sue for redress or seek an injunction to prevent use, and which country (or countries) should it be applied to if multiple different jurisdictions are applicable? Where does the infringement technically occur? Further, what might be the extraterritorial reach of any judgement or court order? Although terms of use and EULAs can assist to some extent, potentially binding parties for litigation,

⁶⁵⁷ *Regulation (EU) No 1215/201*, *supra* note 652.

⁶⁵⁸ Maria Kalyvaki, “Navigating the Metaverse Business and Legal Challenges: Intellectual Property, Privacy, and Jurisdiction” (2023) 3:1 *Journal of Metaverse* 87–92, online: <<http://dergipark.org.tr/en/doi/10.57019/jmv.1238344>>.

⁶⁵⁹ *Bragg v. Linden Research, Inc.*, 487 F. Supp. 2d 593 (E.D. Pa. 2007).

⁶⁶⁰ INTA, *supra* note 206.

⁶⁶¹ *Ibid.* See also, *Bragg v. Linden Research Inc.*, *supra* note 657.

⁶⁶² *Ibid.*

it may still be challenging to find redress in the complex web of the metaverse and its technological nuances.

4.9 Establishing Jurisdiction in the Metaverse

When fashion brands intentionally target a specific demographic within this virtual space, they may inadvertently establish a connection to a particular jurisdiction through offering virtual products or services embedded with trademarks, copyrights, or industrial designs to metaverse users who are physically located in a specific territory. This jurisdiction may claim authority over disputes and enforcement related to those rights. In many decisions that we have encountered thus far, the concept of ‘targeting’ and whether the defendant manifested an *intention* to establish these commercial connections with its consumers in that jurisdiction was considered. The mere accessibility of the IP in the context of the metaverse is not a sufficient basis for concluding that the marks or copyright are displayed, for instance, in a particular metaverse platform or space, is targeted at consumers in a particular location.

At the time of writing, Canadian courts have not had to deal with this specific issue of determining jurisdiction of claims of IP infringement arising in the metaverse; however, it may be useful to assess the foundational principles that have arisen from Canadian case law regarding establishing jurisdiction. In Canada, the registered rights of IP are generally territorial, and therefore Canadian courts would not typically have jurisdiction regarding infringement occurring outside of Canada.⁶⁶³ In this regard, there may be three ways that jurisdiction in the context of IP disputes in the metaverse can be asserted against defendants that are located out of Canada: presence-based, consent-based, and assumed jurisdiction.⁶⁶⁴ The Ontario Court of Appeal in the *Muscutt* case stated:

Presence-based jurisdiction permits jurisdiction over an extra-provincial defendant who is physically present within the territory of the court. Consent-based jurisdiction permits jurisdiction over an extra-provincial defendant who consents, whether by voluntary submission, attornment by appearance and defence, or by prior agreement to submit disputes to the jurisdiction of the domestic court. Both bases of jurisdiction also provide bases for the recognition and enforcement of extra-provincial judgments...Assumed jurisdiction is initiated by service of the court’s process out of the jurisdiction pursuant to Rule 17.02.3.⁶⁶⁵

⁶⁶³ *Beloit Canada Ltée/Ltd. Et al. v. Valmet-Dominion Inc.* (now *Valmet Montreal Inc.*) (1997), 73 C.P.R., (3d) 321. (FCA); *Pro Swing Inc. v. Elta Golf Inc.*, (2006) 2 S.C.R. 612 (SCC); *Magnum Integrated Technologies Inc. v. Integrated Industrial Systems* (2010), 84 C.P.R. (4th) 211 (ON SC).

⁶⁶⁴ *Muscutt v. Courcelles* (2002), 60 O.R. (3d) 20, 2002 CanLII 44957 (C.A.) paras. 19-20 [*Muscutt*]. See also, John McKeown & Bruce A McDonald, *Targeting and the Part it Plays in Establishing Jurisdiction in Cases Involving the Use of Trademarks on the Internet* (Internet Committee Report, International Trademark Association, 2022).

⁶⁶⁵ *Ibid.*

The Court also provided a list of factors that should be considered when determining whether there is a real and substantial connection between jurisdiction and the case. These factors include the following:

- 1) The connection between the forum and the plaintiff's claim,
- 2) The connection between the forum and the defendant,
- 3) Unfairness to the defendant in having to defend the action in the forum,
- 4) Unfairness to the plaintiff in not allowing the action to proceed in the forum,
- 5) The involvement of other parties to the suit, and
- 6) The court's willingness to recognize and enforce an extra-provincial judgment.⁶⁶⁶

These factors help Canadian courts assess whether the case has a strong enough connection to the territory for the court to exercise jurisdiction over it. This "real and substantial connection" test is meant to balance the interests of both plaintiffs and defendants while ensuring that the court's jurisdiction is appropriate and just. Later, the Supreme Court confirmed presence-based and consent-based jurisdiction in the case of *Van Breda*,

...jurisdiction may also be based on traditional grounds, like the defendant's presence in the jurisdiction or consent to submit to the court's jurisdiction if they are established. The real and substantial connection test does not oust the traditional private law bases for court jurisdiction.⁶⁶⁷

As these cases are quite dated, they presume a physical world by default, and thus, require a second look when applied to the context of a global online environment. However, further into this analysis, the court may make determinations of jurisdiction through the "real and substantial connection test" developed by the Supreme Court of Canada in *Morguard Investments Ltd. v. De Savoye*.⁶⁶⁸ The test aimed to "prevent overreaching...and [to restrict] the exercise of jurisdiction over extraterritorial and transnational transactions" through allowing the court to have "*jurisdiction simpliciter*" – to assume jurisdiction."⁶⁶⁹ As grounds for a court's assumption of jurisdiction, *Van Breda* more recently set out the following factors, at least one of which the plaintiff must demonstrate:

- 1) The defendant is domiciled or resident in the province,
- 2) The defendant carries on business in the province,
- 3) The tort was committed in the province; or
- 4) A contract connected with the dispute was made in the province.⁶⁷⁰

Although this analysis is speculative, in the case of a defendant, a fashion brand claiming IP infringement in this space, it may be possible for the Court to focus on where the business operates

⁶⁶⁶ Byron Shaw & Brandon Kain, "A Real and Substantial 'Tune-Up': The Ontario Court of Appeal Reformulates the Test for Asserting Jurisdiction Against Out-of-Province Defendants", (January 11, 2011), online: *McCarthy Tétrault* <<https://www.mccarthy.ca/en/insights/articles/real-and-substantial-tune-ontario-court-appeal-reformulates-test-asserting-jurisdiction-against-out-province-defendants>>.

⁶⁶⁷ *Club Resorts Ltd. v. Van Breda*, 2012 SCC 17 (CanLII) [*Van Breda*].

⁶⁶⁸ *Morguard Investments Ltd. v. De Savoye* [1990] 3 SCR 1077.

⁶⁶⁹ *Society of Composers, Authors and Music Publishers of Canada v. Canadian Assn. of Internet Providers*, [2004] 2 SCR 427 ("SOCAN") at para 60. See also, *Haaretz.com v Goldhar*, [2018] SCC 28 at para 26, and McKeown & McDonald, *supra* note 662.

⁶⁷⁰ *Van Breda*, *supra* note 665.

from physically, where it carried on business specifically, that the tort was committed in the province, and that a contract connected with the dispute was made within the province. The latter may be problematic, as noted earlier in this chapter, since a smart contract (created by blockchain technology) may not be able to be traced to a particular province. Nonetheless, when a foreign defendant is involved, if at least one of the above presumptive factors are in fact demonstrated, then the Court will assume jurisdiction.⁶⁷¹ In the case of a copyright and trademark infringement within the metaverse, we may be able to look towards the SCC's recommendations that considerations of connecting factors in cases that involve jurisdiction and its intersection with the Internet will be decided on a case-by-case basis and include "the situs of the content provider, the host server, the intermediaries and the end user."⁶⁷² Similar considerations will be made for metaversal disputes relating to IP infringements with a potential dependence on the specific metaverse platform, the intermediary, that the infringement took place within. The degree of engagement that a consumer or brand has with the platforms may also be considered in application of the aforementioned 'real and substantial connection' test as we understand through cases such as *Equustek*.⁶⁷³ The test may consider the extent of the brand's activities (i.e. the extent of creation of virtual galleries of products, hosting events, or facilitating branded virtual assets for purchase and trading), including the frequency of interactions of users, scale of virtual commerce, and level of engagement within the Metaverse ecosystem as a whole. Further, if a brand conducts substantial business within a specific jurisdiction of a metaverse platform (identified through terms of service, platform operator's location, user agreements, locations of transactions, targeting, etc) and has a substantial user base from that jurisdiction, a real and substantial connection may be established. Regardless of any 'choice of laws' provisions in place in a user-agreement, an established connection may confirm jurisdictional determinations.

Similarly, in the U.S., the "active/passive test" established in the case of *Zippo Manufacturing v. Zippo Dot Com Inc*, the court made personal jurisdiction determinations based on whether the claim was "directly proportional to the interaction that the consumer has with the website."⁶⁷⁴ This can be applied to metaverse platforms as well in the same way as the test established in *Equustek*. In the *Zippo* case it was found that there are three dominant categories of virtual spaces (the Internet in this case). Applied to the metaversal context, first, an active platform space where parties actively do business through sale of virtual clothing or fashion related NFTs, enter into smart contracts, and "purposefully direct business activities...then "deliberately and repeatedly transmit files to the jurisdiction;" second,

⁶⁷¹ McKeown & McDonald, *supra* note 662.

⁶⁷² *Ibid.* See also, *HomeAway.com, Inc. v. Hrdlicka*, 2012 FC 1467 at para 18.

⁶⁷³ *Equustek Solutions Inc. v. Google Inc.*, 2015 BCCA 265 at para 40. See also, *Google Inc. v. Equustek Solutions Inc.*, [2017] 1 SCR 824 at para 37.

⁶⁷⁴ McKeown & McDonald, *supra* note 662. See also, *Zippo Manufacturing v. Zippo Dot Com Inc.*, 952 F Supp 1119 (WD Pa 1997).

the passive space, which provides digital information or advertises virtual fashion goods.⁶⁷⁵ In this context, personal jurisdiction is generally not found. Third, a hybrid scenario, whereby a virtual space allows for users to exchange information but not do business directly with the user.⁶⁷⁶ In a branded metaverse where the creator has the intention to promote brand values, commercialization and brand-consumer interaction, the first category most prominently occurs. Moreover, within the U.S. “recent appellate decisions have examined the effect of ‘targeting’ intellectual property owners in a particular forum as a basis for personal jurisdiction” examining “whether the defendant ‘purposefully avails itself of the privilege of conducting activities within the forum state, thus invoking the benefits and protections of its laws.’”⁶⁷⁷

In addition, the prevailing recent trend in U.S. appellate rulings have not favoured plaintiffs attempting to establish personal jurisdiction in trademark and copyright infringement cases endeavouring to utilize the ‘Effects Test’. This is particularly evident in cases where plaintiffs argue that the defendant intentionally aimed their actions at an intellectual property owner.⁶⁷⁸ Although brands venturing into the metaverse generally have the intention of capitalizing on their IP in some degree, the courts may require a more comprehensive demonstration of intentional and substantial engagement that directly targets the IP owner’s interests within the metaverse. To present this in practice, imagine a scenario where a luxury fashion brand, such as Chanel, Inc (Chanel) were to claim that there was an infringement of their interlocking ‘CC’ trademark by UserX (at the time of writing, their ‘CC’ logo was not registered in the specific class detailing virtual goods, services and other digital assets). In this case, the court would likely examine whether there is a strong connection between Chanel’s activities within its virtual showroom or space in the metaverse and the adverse effects of UserX’s infringement on Chanel’s IPR. The mere existence of Chanel’s virtual showroom does not automatically establish personal jurisdiction over UserX. The court would look for evidence of UserX’s intentional targeting, and to establish personal jurisdiction over UserX, Chanel would need to provide more tangible and explicit evidence of how UserX’s actions were indeed aimed at Chanel’s trademark rights and how they caused a significant and measurable impact. This might involve demonstrating that UserX intentionally used Chanel’s branding elements, trademark, and potential copyrighted content to attract their own customers who were interested in Chanel’s longstanding positive brand image or products. Chanel could argue that UserX’s infringing activities on the platform (and potentially other platforms if interoperable) have created confusion amongst users who might think that UserX’s unauthorized products are legitimate Chanel virtual goods. Further, they would need to establish that the resulting confusion could harm Chanel’s reputation with adverse effects on Chanel’s commercial activities

⁶⁷⁵ *Ibid.* See also, *Equustek Solutions Inc. v. Jack*, 2014 BCSC 1063, and *Equustek Solutions Inc. v. Google Inc.*, 2015 BCCA 265 at para 40.

⁶⁷⁶ *Ibid.*

⁶⁷⁷ McKeown & McDonald, *supra* note 662.

⁶⁷⁸ *Walden v. Fiore*, 571 U.S. 277, 284 (2014).

within its own virtual space, and by extension, for physical offerings outside of the metaverse. Chanel would need to show that UserX's infringement goes beyond incidental or minor use of its Chanel branding ('CC' logo trademark in this scenario), causing substantial confusion among users and directly affecting Chanel's business and reputation within the metaverse and beyond, which may strengthen Chanel's case for establishing personal jurisdiction. However, following the case of *Walden*, appellate decisions addressing personal jurisdiction claims utilizing the Effects Test where individualized targeting of IP were of primary focus, were not particularly clear. Discrepancies in outcomes among the Circuit Courts occurred and decisions were criticized for leaving a "figurative cloud of uncertainty hanging over personal jurisdiction in the digital cloud" in the context of Internet cases, and by consequence, the metaverse.⁶⁷⁹

At the very core of these arguments is the 'minimum contacts' principle established initially by the U.S. Supreme Court in the case of *International Shoe Co. v. Washington*, stating that due process requires that non-resident defendants have 'minimum contacts' with the State forum, in a manner in which the exercise of personal jurisdiction does not offend 'traditional notions of fair play and substantial justice.'⁶⁸⁰ In this respect, minimum contact determinations are made by distinguishing the types of contacts as either sufficient for a court's exercise of "specific" personal jurisdiction over the defendant from those contacts or "general" jurisdiction.⁶⁸¹ Further, the Court maintained that 'contacts' are determined by the "quality and nature of the activity in relation to the fair and orderly administration of the laws" and not solely on presence within the forum.⁶⁸² The standard assesses three factors for a court's exercise of 'specific' jurisdiction to be constitutional: its

- (1) 'claim directly arises out of, or relates to, the defendant's forum state activities'; (2) the defendant's forum contacts 'represent a purposeful availment of the privilege of conducting activities' in that forum, thus invoking the benefits and protections of the forum's laws and rendering the defendant's involuntary presence in the forum's courts foreseeable; and (3) 'the exercise of jurisdiction is reasonable.'⁶⁸³

In contrast, a state court's exercise of 'general' jurisdiction even if the claim occurred in a different state, may be considered constitutional when the activities in the forum state are substantial enough to be reasonably required to defend the claim that did not arise out of activities in that particular forum state. At present, these contacts would have to be substantial enough for the defendant to be determined as "'essentially at home' in the forum state."⁶⁸⁴ Recent Supreme Court decisions emphasize that a defendant's unilateral activities or mere foreseeability of harm are insufficient for establishing

⁶⁷⁹ William Schildknecht, *Specific Personal Jurisdiction Over Internet Torts in the Wake of Walden v. Fiore*, 56 Santa Clara L. Rev. 1, 33 (2016).

⁶⁸⁰ *International Shoe Co. v. Washington*, 326 U.S. 310, 316 (1945) (quoting *Milliken v. Meyer*, 311 U.S. 457, 463 (1940)).

⁶⁸¹ *Ibid*

⁶⁸² *Ibid*.

⁶⁸³ *Ibid*. See also, INTA, *supra* note 206, and *A Corp. v. All Am. Plumbing, Inc.*, 812 F.3d 54, 59 (1st Cir. 2016).

⁶⁸⁴ *Goodyear Dunlop Tires Operations, S.A. v. Brown*, 564 U.S. 915, 919, 924 (2011).

jurisdiction; instead, the focus is on whether the defendant's conduct meaningfully connects them to the forum state.⁶⁸⁵

In the context of virtual environments, ‘purposeful availment’ would not be satisfied through the operation of metaversal spaces in a particular state alone, nor if the platform is interactive. Rather, the Courts would need to establish that the defendant had “purposefully exploited the market of the forum state”, to the extent that it was reasonably be expected to be brought into the jurisdiction of a particular state (evident in *Plixer Int’l Inc.*, at 11).⁶⁸⁶ This may be established through a ‘substantial number of’ or ‘pattern of sales’ of virtual goods and digital asset sales in a particular state, to determine a nationwide market.⁶⁸⁷ In the *MetaBirkins* case, Hermès asserted personal jurisdiction over the defendant, Rothschild, in the state of New York on the grounds that, “(1) the defendant offered ‘METABIRKINS’ NFTs on OpenSea, among other NFT marketplaces, which is a Delaware corporation with a principal place of business in New York; (2) at least one consumer living in New York purchased a METABIRKINS NFT; and (3) defendant’s conduct had caused harm to Hermès in New York, where it maintains a principal place of business.”⁶⁸⁸ It is clear that for personal jurisdiction to be established, courts will need to consider the facts to determine sufficient “minimum contacts” in a forum.

Expanding on the analysis of personal jurisdiction in virtual environments, the U.S. Supreme Court’s decision in *Abitron Austria GmbH v. Hetronic International, Inc.* crystallizes the limits of extraterritorial application of the Lanham Act and provides a critical doctrinal touchstone for evaluating jurisdiction in the metaverse.⁶⁸⁹ The Court reaffirmed that ss.1114(1)(a) and 1125(a)(1) extend only to conduct occurring within U.S. commerce, adhering to the presumption against extraterritoriality.⁶⁹⁰ Justice Alito’s majority clarified that the proper inquiry is conduct-focused: courts must examine whether the defendant’s infringing acts themselves occurred in the United States, rather than relying solely on downstream effects such as consumer confusion, lost profits, or harm experienced in a particular forum.⁶⁹¹ This distinction underscores that mere accessibility of digital goods or virtual platforms in a forum state, even if significantly interactive, is insufficient to establish personal jurisdiction. Applied to the metaverse, *Abitron* reinforces the need for a rigorous assessment of “purposeful availment.” Courts will look for evidence that the defendant deliberately exploited the

⁶⁸⁵ *Walden v. Fiore*, 571 U.S. 277, 284–87 (2014). See also, *World-Wide Volkswagen Corp.*, 444 U.S. at 295.

⁶⁸⁶ INTA, *supra* note 206. See, *Plixer Int’l, Inc. v. Scrutinizer GmbH*, 905 F.3d 1, 8 (1st Cir. 2018), and *be2 LLC v. Ivanov*, 642 F.3d 555, 558–59 (7th Cir.2011), and *Keeton v. Hustler Magazine*, 465 U.S. 770, 781, 104 S.Ct. 1473, 79 L.Ed.2d 790 (1984).

⁶⁸⁷ *Ibid.*

⁶⁸⁸ *Hermès International, et al. v. Mason Rothschild*, 1:22-cv-00384 (SDNY Jan. 14, 2022) [‘Hermès’ or ‘MetaBirkins’]. See also, INTA, *supra* note 206.

⁶⁸⁹ *Abitron Austria GmbH v. Hetronic Int’l, Inc.*, 600 US 412 (2023).

⁶⁹⁰ *Ibid.*

⁶⁹¹ Margaret Chon, Inside or Outside?: Remarks on *Abitron v. Hetronic* (U.S. 2023), 23 *Chicago-Kent Journal of Intellectual Property* 149 at 152–158 (2023), online: <https://scholarship.kentlaw.iit.edu/ckjip/vol23/iss1/15>.

forum market, for instance through a demonstrable pattern of virtual goods sales, marketing campaigns, or engagement with users specifically in that jurisdiction.⁶⁹² Again, this case parallels the reasoning in *MetaBirkins*, where Hermès successfully asserted jurisdiction over NFT sales.

Prior to *Abitron*, commentators such as Margaret Chon argued that the Lanham Act’s reach could be extended extraterritorially through an “effects test”, which evaluates whether foreign conduct produces substantial effects within the United States.⁶⁹³ In her seminal analysis of *Steele v. Bulova*, Chon demonstrated that courts had historically applied the test to hold foreign defendants liable when their overseas acts, such as advertising, sales, or distribution, caused measurable harm to U.S. commerce or reputation.⁶⁹⁴ This framework allowed for a flexible approach to cross-border infringement, particularly relevant in the context of digital and online commerce, where the location of the infringing act and the location of its impact can diverge. Chon emphasized that the effects test recognized the practical reality of global markets, providing a mechanism for U.S. trademark law to address the extraterritorial consequences of conduct occurring entirely abroad, thereby preventing circumvention of statutory protections through geographic displacement of activity.⁶⁹⁵

Abitron provides a demonstration for the fact that courts will weigh the location of conduct, the intentionality of forum-directed exploitation, and the extent of contacts to determine whether the minimum threshold for personal jurisdiction is met. Moreover, commentators have emphasized that *Abitron*’s conduct-focused framework carries particular significance for decentralized digital environments. Rosati notes that in Web3 and metaverse contexts, the localization of infringing activity requires identifying the nexus between the virtual transaction and a specific jurisdiction, while Chon & Farley caution that courts are unlikely to stretch U.S. trademark protections extraterritorially absent evidence of deliberate targeting.⁶⁹⁶ The convergence of *Abitron* and *MetaBirkins* illustrates a consistent principle: in the virtual sphere, personal jurisdiction hinges not on mere accessibility or interactivity, but on purposeful exploitation and market-directed conduct, reinforcing the need for defendants and platforms to carefully calibrate their engagement with forum-specific users.

⁶⁹² Margaret Chon & Christine Haight Farley, “Trademark Extraterritoriality: *Abitron v. Hetronic* Doesn’t Go the Distance” (18 July 2023), *Technology & Marketing Law Blog*, online: <https://ssrn.com/abstract=4515300>. See also, Eleonora Rosati, “The Localization of IP Infringements in the Online Environment: From Web 2.0 to Web 3.0 and the Metaverse” (2023) 18:10 *Journal of Intellectual Property Law & Practice* 720–742 at 730–735, online: <https://doi.org/10.1093/jiplp/jpad077>.

⁶⁹³ Margaret Chon, *Kondo-ing Steele v. Bulova: The Lanham Act’s Extraterritorial Reach via the Effects Test* (2019) (unpublished manuscript, presented at IP Scholars Conference, DePaul University College of Law), online: https://law.depaul.edu/academics/centers-institutes-initiatives/center-for-intellectual-property-law-and-information-technology/programs/ip-scholars-conference/Documents/ipsc_2019/Chon%20-%20Paper.pdf. See also, *Steele v. Bulova Watch Co., Inc.*, 344 U.S. 280 (1952)

⁶⁹⁴ *Ibid.*

⁶⁹⁵ *Ibid.*

⁶⁹⁶ *Ibid.*

In Europe, for example, court jurisdiction regarding trademark disputes is regulated by the Brussels Regulation, and Regulation 2017/1001 on the EU Trademark referred to earlier, however, domestic provisions remain applicable where these regulations do not readily apply. The Brussels Regulation establishes international jurisdiction through the principle of domicile, unless complication arise with determining identity. Regarding infringement, Article 7(2) of the Regulation states that, “[a] person domiciled in a Member State may be sued in another Member State: ...2) in matters relating to tort, delict or quasi-delict, in the courts for the place where the harmful event occurred or may occur... [(the forum in which the tort was committed).]”⁶⁹⁷ Article 125(1) and (2) also ascertains that a claim can be brought in Member States where the defendant has its domicile or establishment in the court of a Member State, providing for “the typical *forum delicti commissi*: ‘Proceedings in respect of the actions and claims referred to in Article 124... may also be brought in the courts of the Member State in which the act of infringement has been committed or threatened....’”⁶⁹⁸ As we see in other jurisdictional predicaments, in contract disputes regarding metaversal obligations, clarity is still required with regard to questions such as, what is the “place of performance of the obligation” to establish international jurisdiction, and where would these goods be “delivered” as these issues will confound infringement disputes of IP further.⁶⁹⁹

In the metaversal context, The CJEU has adopted flexibility in the interpretation of ‘*forum delicti commissi*’ in stating that the “mere accessibility of a website from the territory of a Member State is sufficient enough basis for courts of that State to declare jurisdiction.”⁷⁰⁰ For example, the case of *AMS Neve v. Heritage Audio*, which involved a company located in Spain offering goods online to consumers in the UK and infringed on the EU and UK trademarks of a British company, assisted with solidifying this interpretation. UK Courts were found to have jurisdiction to consider the UK trademark complaint according to Article 7(2) of the Brussels Regulation. However, according to Article 125(2), an infringement of an EU trademark committed in the “Court of the Member State within which the consumers or traders to whom that advertising and those offers for sale are directed are located, notwithstanding that that third party took decisions and steps in another Member State to bring about that electronic display.”⁷⁰¹ The CJEU ruling clarifies that jurisdiction for IP infringement cases should not be restricted to the defendant’s location where the infringing content originated, as this would limit the effectiveness of alternative jurisdictional rules. Since it is often challenging for rights holders to pinpoint the exact location of infringing actions before initiating a claim, the CJEU allows legal actions to be taken in any EU member state where targeted consumers are located. This approach ensures that

⁶⁹⁷ Regulation (EU) No 1215/2012, *supra* note 652.

⁶⁹⁸ *Ibid.* See also, INTA, *supra* note 206

⁶⁹⁹ *Ibid.*

⁷⁰⁰ CJEU Judgments of 22 January 2015, C-441/13, “Hedjuk”; of 3 October 2013, C-170/12, “Pinckney”; of 21 December 2016, C-618/15, “Concurrence”.

⁷⁰¹ *AMS Neve Ltd and Others v Heritage Audio SL and Pedro Rodríguez Arribas*, ECLI:EU:C:2019:674.

courts in the member states of the targeted consumers can assess infringement effectively. The decision aligns the jurisdictional rules under the EU-Trademark Regulation with those in the Brussels I Regulation, enabling trademark owners to choose the most advantageous jurisdiction for protecting their rights from online and cross-border infringements.

Therefore, for fashion brands and designers creating and carrying out commercial activities in a specific location, this may be a clear solution, especially if it is shown that the defendant targets its activities to that Member State's market.⁷⁰² However, for disputes regarding national IP claims, CJEU case law seems to point towards favouring the "mere accessibility" criterion to assume jurisdiction (in accordance with Article 7(2) of the Brussels Regulation).⁷⁰³ Similar to the U.S. 'purposeful availment of activities in the forum' test, under this criterion, a comparable 'minimum contacts' principle would apply. Likewise, UK caselaw also exists to suggest that similar evidence would be necessary to determine that the use in the metaverse was directed or 'targeted' towards consumers located in the relevant physical territory.⁷⁰⁴ Evidence of targeting trademark use or copyright may be difficult to collect due to the automated nature of smart contracts, pseudonymity, and evolving nature of the technology. Therefore, the issue remains that users and businesses within the fashion industry in virtual environments may see challenges in establishing jurisdiction due to defendants' identities being cloaked with pseudonymity in usernames, avatars, and digital wallet addresses associated with e-commerce and monetizing on potential infringement in this space. Additionally, in these cases, where there is an insufficient establishment of factual digital identity and a defendants' contact within a forum, a court can conduct jurisdictional discovery as we have seen in recent cases of infringement claims.⁷⁰⁵ Again, the inherent decentralized nature of NFTs and transactions conducted through blockchain technologies will continue to pose jurisdictional challenges that may be nearly impossible to resolve.

The practical implication here is that the metaverse does not simply inherit existing IP enforcement challenges, it compounds them by removing the institutional intermediaries that currently make enforcement somewhat manageable. When an infringing NFT is minted on a blockchain hosted across multiple jurisdictions, marketed through a decentralized platform with no identifiable domicile, purchased by a pseudonymous user whose location is unknown, and resold automatically through a smart contract, the question of which national IP framework applies is not merely difficult to answer, it may be genuinely unanswerable within existing territorial frameworks. Harmonization would,

⁷⁰² INTA, *supra* note 206.

⁷⁰³ *Ibid*, See also, Aurelio Lopez-Tarruella, "International jurisdiction in EU trademark infringements on the internet – is it possible to complicate things even further?" (2021) 13:2 CUADERNOS DE DERECHO TRANSNACIONAL 352–361, online: <<https://e-revistas.uc3m.es/index.php/CDT/article/view/6261>>.

⁷⁰⁴ "Metaverse Make-up (Part 2) - Metaverse Report", Osborne Clarke online: <<https://togetherwith.osborneclarke.com/metaverse-report/metaverse-make-up-part-2>>.

⁷⁰⁵ i.e., *Good Job Games Bilism Yazilim Ve Pazarlama A.S. v. SayGames, LLC*, No. 20-16123, 2021 WL 5861279, at 1 (9th Cir. Dec. 10, 2021).

therefore, close those gaps by establishing agreed baseline standards for what constitutes use, for how platforms are held accountable, for how pseudonymous defendants can be identified and that apply consistently regardless of where in the virtual environment the infringing conduct occurs.

Chapter 5: Recommendations

5.1 Foundational International Convention

As the next phase of cyberspace, Web 3.0 introduces the beginnings of the Fifth Industrial Revolution (Industry 5.0) manifested as the Metaverse through the amalgamation of all virtual shared spaces blurring geographical boundaries beyond cross-border interactions. For this virtual environment to live up to its potential, IPR regulation and enforcement will be imperative. In light of the lack of clarity on jurisdictional and enforcement challenges occurring within this space, it may be beneficial for policy makers to identify frameworks for creating a unified legal mechanism to provide solutions to the many issues that have been addressed within this thesis.⁷⁰⁶ The development of a comprehensive ‘e-Jurisdiction’ and ‘Metaverse Grand Charter of Laws’ may prove to be useful in providing definitive harmonized regulation mechanisms to resolve the nuanced legal issues surrounding IP infringement.⁷⁰⁷ This would require comprehensive research in the field of information law, privacy, intellectual property, cybersecurity, criminal, commercial and other fields of law that would provide structures for the conceptualization of interplay of these fields in a fair, safe, and reasonable manner.

Alas, the juxtaposition of this recommendation against the collection of jurisdictional and operational challenges that have been addressed throughout this chapter seems to point to the conclusion that a majestic Charter or constitution, whereby jurisdictions would be able to suddenly and harmoniously allow for an independent legislative function to govern and adjudicate issues relating to members of their nations, seems improbable. Perhaps a more likely solution for adoption would be a neutral and independent body through an international convention specifically created to oversee the enforcement of ethical and practical guidelines and regulations that can be agreed upon across the globe for unified practices of monitoring, regulation, and IPR enforcement mechanisms to protect brand-consumer relations. However, the objectives of this body must also align in unification with conflicting national interests for there to be definitive agreement, which may also prove to be challenging. Nonetheless, an international convention on conflict of laws that may facilitate the regulation of legal mechanisms to apply to intellectual property rights standardization in the metaverse, or body of agreed rules in the spirit of the UNIDROIT principles, is largely overdue. With respect to targeting,

⁷⁰⁶ Oleksii Kostenko et al, “Genesis of Legal Regulation Web and the Model of the Electronic Jurisdiction of the Metaverse” (2022) 6:2 Brat L Rev 21–36, online: <<https://blr.flaw.uniba.sk/index.php/BLR/article/view/316>>.

⁷⁰⁷ *Ibid.*

conventions and delegated committees or equivalent may need to establish proper guidelines to ensure compliance with criteria to demonstrate court jurisdiction. Currently, it is unclear whether a brand owner may ‘target’ markets or platforms and exclude specific regions in order to limit their legal exposure of a claim in a court proceeding in jurisdictions that are not particularly being targeted. Therefore, to safeguard brand owners from this consequence, with little to no territorial connection to the disputes despite the transnational and decentralized nature of the metaverse, it will be critical to implement effective remediating mechanisms.

5.2 Reconceptualization of Trademark Use

Beyond the practical challenges of enforcement, trademark protection in the metaverse raises a more foundational question concerning the subsistence and territorial scope of trademark rights themselves. Trademark law has long been grounded in the principle of territoriality: rights arise and are maintained through use of a mark in connection with goods or services within a particular jurisdiction. In traditional commerce, identifying the location of such use is relatively straightforward. In digital environments, however, the question becomes considerably more complex. Where branded goods, services, or experiences are offered through decentralized virtual platforms or blockchain-based marketplaces, determining the jurisdiction in which a mark is “used” may be far from obvious. For trademark owners, this uncertainty is significant because use remains central to establishing entitlement, priority, and the continued validity of trademark rights. In Canada, for example, the concept of “use” under the Trademarks Act traditionally requires that a mark be displayed in association with goods at the time of transfer or with services that are performed in Canada. When a branded digital asset such as a virtual garment, avatar accessory, or NFT-linked product is offered through a global virtual platform, it becomes unclear whether such activity constitutes use in Canada for the purposes of establishing or maintaining trademark rights. A metaverse-based transaction may involve a user located in Canada, a platform hosted on servers in another jurisdiction, and a seller operating from yet another location. In such circumstances, identifying where the legally relevant “use” occurs becomes a threshold question.

This issue therefore extends beyond the mere detection of infringing conduct in virtual environments. Even where an unauthorized reproduction of a brand or logo is clearly visible within the metaverse, trademark owners may face an antecedent legal question: whether the relevant activity constitutes trademark use within the jurisdiction in which protection is sought. If use in a metaverse environment is not recognized as use within the relevant territory, a brand owner may encounter difficulty establishing priority against competing marks or demonstrating the ongoing use required to maintain a registration. Accordingly, the migration of commercial activity into immersive digital environments introduces a distinct doctrinal challenge for trademark law. For brands operating in the metaverse, the legal inquiry is not limited to identifying and remedying infringing uses of their marks;

it also implicates the more fundamental issue of whether trademark rights themselves can be properly established, maintained, and enforced when the relevant commercial activity occurs in a borderless virtual space. As digital fashion and branded virtual goods become more prevalent, the ability of trademark systems to meaningfully locate and recognize “use” within territorial jurisdictions will become an increasingly important consideration for rights holders seeking to secure and preserve their brand protection.

5.3 Platform Transparency and Monitoring Mechanisms

Moreover, allowing the international body to work with platforms from the outset, creating more platform transparency of content moderation, and monitoring the use of brand trademarks, copyrights, and industrial designs, alongside protecting user generated IPR, will assist in the facilitation of regulated behaviour in this space. An international convention for the metaverse with the objectives of preserving the interests of brand-consumer relations and brand IPR protection could be advantageous, along with the utilization of current conventions such as: WIPO (and WIPO’s Copyright Treaty), Berne Convention for the Protection of Literary and Artistic Works, Paris Convention for the Protection of Industrial Property, TRIPS agreement, and other instrumental conventions such as the Budapest Convention. The use of these conventions must be balanced with ensuring that enforcement is not in favour of large corporations’ interests at the expense of citizen rights. It will also be important to caution against the rule of law being outsourced to corporations that act as major stakeholders within the metaverse. The intellectual property rights of the businesses that this thesis focuses on protecting should not be secondary; instead, they should be in fair balance with other citizen interests and civil liberties, recognizing and maintaining consistent value for freedom of expression and creativity of users. This balance is key in ensuring that regulation measures of the convention are not counterintuitive. This convention would need to be mindful of its role in facilitating the prosecution of IPR infringements since there would be a discrepancy in impact when being applied to North American or European countries in contrast with its application to countries in the Global South, for example.

5.4 Equity as a Fundamental Design Principle

There may be adverse impacts on certain countries through disproportionate enforcement burdens for countries with limited resources and capacity to enforce IPR regulation who may find it difficult to comply with stringent international standards, which may then lead to less unified global practices. It may also be that the digital divide, the gap between those who have access to digital technologies and online services, may increase through strict IPR enforcement measures. This may require further technological infrastructure and legal capacity to be developed within certain countries. Businesses in countries that are more technologically advanced may be able to further leverage their IP

assets, giving them a competitive advantage in global trade, as we see evident today. This will potentially lead to certain countries gaining more economic benefit than others from metaversal engagements while other countries struggle to compete, exacerbating global economic disparities and hindering inclusive development. Policymakers must therefore consider how to create and implement a convention that allows global citizens to actively participate equally without being disadvantaged and without hindering the ability of smaller businesses, start-ups, and individuals in disadvantaged communities to engage in metaverse-related activities, ensuring strict regulations do not inadvertently limit their access to opportunities and benefits.

The distributional consequences of metaverse IP governance are not a peripheral concern to be addressed once the framework's primary architecture has been established, rather they are a foundational design constraint that must be built into the convention's structure from the outset. An international body calibrated exclusively to the enforcement needs of large incumbent actors' risks entrenching existing asymmetries of market power under the legitimizing language of global standards, while imposing disproportionate compliance burdens on the jurisdictions least equipped to bear them. The digital divide is not merely a background condition against which metaverse governance operates, it is a variable that governance choices will either widen or narrow, and that choice is a normative one that cannot be deferred. The balance this thesis advocates for is that IP rights in the metaverse are legitimate, commercially significant, and deserving of robust protection, but they must be held in genuine balance with civil liberties, freedom of expression, and the creative autonomy of users across the full range of economic circumstances in which those users participate. Not subordinated to those interests, but constitutively balanced with them, in the sense that the framework's legitimacy depends on that balance being real rather than rhetorical. A convention that permits strict IP enforcement to function as a barrier to entry for independent designers, small creators, and entrepreneurs in emerging economies, for whom equitable access to virtual markets represents one of the more consequential opportunities that the digital economy has yet produced, would be inequitable as well as self-defeating. It would instead foreclose the participatory diversity that gives the metaverse its creative and commercial vitality in the first place.

Concretely, the convention framework must incorporate at minimum three structural mechanisms to give this commitment institutional form. First, tiered compliance standards that calibrate enforcement obligations to national resource capacity, drawing on the model of TRIPS flexibilities and others alike as precedents for differentiated obligation within a harmonized framework. Second, capacity-building programs, analogous to, but more operationally specific than, WIPO's Development Agenda, that provide technical assistance, shared enforcement infrastructure, and targeted legal training to jurisdictions with limited regulatory capacity for NFT marketplaces, digital asset exchanges, and decentralized platform governance. Third, and most critically, governance participation structures that

confer genuine standard-setting authority on developing nations rather than consultative status appended to a process already shaped by North American and European commercial interests. In this respect, harmonization that reflects only the preferences of the most technologically advanced economies is not harmonization, it is the imposition of a particular set of interests dressed in the vocabulary of global consensus. A well-designed convention may not resolve the digital divide, however, the normative architecture of the framework must be deliberately designed to avoid entrenching it further. That design choice must be made now, prospectively, before commercial interests have solidified around a particular governance model and rendered structural reform politically and institutionally costly. The frameworks that are currently developed within the metaverse are likely to shape successive generations of immersive, decentralized, and AI-integrated digital environments. The opportunity to build equity, access, and creative freedom into that architecture as constitutive values, rather than accommodating them as afterthoughts once the interests of the most powerful actors have already been served, is one that international law has rarely been offered so clearly, and that it cannot afford to waste.

5.5 *The Window for Prospective Governance*

At a foundational level, coherent IP governance in virtual spaces contributes to the broader project of extending the rule of law into a domain that currently operates in a significant regulatory vacuum.⁷⁰⁸ Where participants, whether NFT creators, virtual goods consumers, or investors in digital assets, cannot rely on consistent and enforceable rules governing ownership, authenticity, and infringement in the metaverse, that space risks becoming dominated by the interests of the most powerful platform operators and the most aggressive commercial actors, entrenching rather than disrupting existing inequalities of market power.⁷⁰⁹ The pseudonymous and decentralized character of many metaverse platforms, the jurisdictional indeterminacy of NFT transactions, and the technical opacity of smart contract governance all compound this risk, creating an environment in which the absence of clear IP frameworks operates asymmetrically, providing cover for infringers while leaving creators and consumers without meaningful recourse.⁷¹⁰ Governance frameworks for virtual assets and digital goods that are transparent, technically informed, and fairly enforced build the institutional trust that is itself a precondition for the kind of sustained participation and investment that a well-functioning virtual economy requires. This rule-of-law dimension connects, ultimately, to what may be the most

⁷⁰⁸ Kalpokas & Kalpokienė, *supra* note 50. See also, Andrew Murray, *Information Technology Law: The Law and Society*, 4th ed (Oxford: Oxford University Press, 2019).

⁷⁰⁹ Carl Shapiro, "Antitrust in a Time of Populism" (2018) 61:1 *Intl J Ind Org* 714 at 724–26. See also, Geoffrey G Parker, Marshall W Van Alstyne & Sangeet Paul Choudary, *Platform Revolution: How Networked Markets Are Transforming the Economy* (New York: WW Norton & Company, 2016) at 103–10.

⁷¹⁰ Safari Kasiyanto & Mustafa R Kilinc, "Legal Conundrums of the Metaverse" (2022) 1:2 *Journal of Central Banking Law and Institutions*, online: <https://jcli-bi.org/index.php/jcli/article/view/25>. See also, "The Legal Issues of the Metaverse and NFTs — The Good, The Brag, and The Ugly" (26 July 2022), online: The WS Society <https://www.wssociety.co.uk/features/2022/7/22/gbjg3k7v1vt5l6ckt28man5epe5tbf>.

consequential long-term benefit of getting metaverse IP governance right: the opportunity to develop these frameworks prospectively, before entrenched commercial practices, platform monopolies, and vested interests make meaningful reform structurally difficult.⁷¹¹ The metaverse, and the NFT and virtual asset ecosystems that animate it, remains sufficiently hopeful that its governance architecture is still open to further regulatory development. The frameworks developed in this space are likely to inform the regulation of successive generations of immersive, decentralized, and AI-integrated digital environments, making the normative choices made now consequential well beyond the immediate context of virtual fashion or digital collectibles. A thoughtful, inclusive, and adaptable approach to the IP governance of digital goods and virtual assets could serve as a normative model for how international law responds to technological disruption more broadly: one that treats access, equity, cultural diversity, consumer transparency, and creative freedom not as secondary considerations to be accommodated after the fact, but as constitutive values built into the architecture of the system from the outset.⁷¹²

Robust but balanced IP governance equally creates incentives for innovation in virtual asset creation that extend well beyond the interests of large incumbent fashion brands. Where independent digital designers, virtual world developers, and NFT creators have confidence that their original works, whether a bespoke virtual wearable, an original GUI skin, or a novel digital collectible, will receive meaningful and enforceable protection, the metaverse becomes a more hospitable environment for sustained creative and technological investment. The development of entirely new aesthetic vocabularies for digital goods, innovative smart contract licensing structures, and novel approaches to virtual brand identity all depend, to a meaningful degree, on the existence of IP frameworks that creators can rely upon and that do not systematically advantage established players over new entrants. The risk, however, is that innovation incentives remain unevenly distributed if enforcement frameworks are calibrated primarily to the needs and resources of large commercial actors with the legal infrastructure to pursue infringement claims across multiple jurisdictions and decentralized platforms.⁷¹³ Any regulatory framework must therefore be approached with candour about its distributional consequences.

To address and navigate through some of these nuanced challenges, an international convention overseeing monitoring and enforcement measures could create mechanisms to establish consistent standards that are fair and reasonable across different countries, taking into consideration

⁷¹¹ James Boyle, "The Second Enclosure Movement and the Construction of the Public Domain" (2003) 66:1 Law and Contemporary Problems 33 at 37–42, online: <https://scholarship.law.duke.edu/lcp/vol66/iss1/2>. See also, Lawrence Lessig, *Code Version 2.0* (Basic Books, A Member of the Perseus Books Group, 2006).

⁷¹² World Intellectual Property Organization, *Intellectual Property and the Metaverse: Challenges and Opportunities* (Geneva: WIPO, 2023) at 21–23. See also, Carys J Craig, *The Legal Implications of the Metaverse* (Jack & Mae Nathanson Centre on Transnational Human Rights, Crime and Security) (Osgoode Hall Law School, York University, 2023). See also, Kalpokas & Kalpokienė, *supra* note 706.

⁷¹³ Jeanne C Fromer & Mark P McKenna, "Amazon's Quiet Overhaul of the Trademark System" (2025) 113 CLR, online: <https://www.californialawreview.org/print/amazon-trademark>. See also, Andrew N Choi & Cynthia A Gierhart, "Intellectual Property Enforcement in the Metaverse, Part 1" (10 October 2022), online: Holland & Knight <https://www.hklaw.com/en/insights/publications/2022/10/intellectual-property-enforcement-in-the-metaverse-part-1>.

resource limitations. Additionally, it could facilitate international cooperation through creating open channels of shared information, best practices, and assisted resource allocation to collectively create capacity building programs. This will assist countries with limited enforcement capabilities to develop the skills and infrastructure required for effective enforcement measures with a balanced approach, while still maintaining each nation's sovereignty and autonomy in enforcing IPR domestically. Conversely, jurisdictional and territorial scope for monitoring enforcement in a borderless environment may still prove to be challenging and an international convention may not be able to fully resolve these issues.

It is evident that, “the unseen immateriality, decentralization and anonymity characteristics of blockchain in the Metaverse are therefore calling for a change of regulatory approach.”⁷¹⁴ An international convention focused on overseeing monitoring, regulation and resulting enforcement through unified implementation could offer advantages in promoting harmonized cooperation while mitigating some of the challenges that may occur with direct national enforcement measures. However, this may still require careful consideration of jurisdictional issues and obstacles to collaboration among countries, stakeholders, and experts. If successfully achieved, the positive results of maintaining consistent and effective intellectual property rights protection could lead to favourable outcomes, at least in terms of brand-consumer relationships within the fashion industry and others operating on this platform – but ideally also for the development of a vibrant, welcoming, and well-functioning metaverse.

Conclusion

As Lessig suitably notes, similar to ordinary property rights, intellectual property rights are never absolute and are subject to the influences of state and general public interests. Lessig asserts, “your land may be taken to build a highway, [or] your car seized to carry an accident victim to the hospital... In countless ways, the system of property we call “private property” is a system that balances exclusive control by the individual against certain common state ends. When the latter conflict with the former, it is the former that yields.”⁷¹⁵ It is important that predictions are made to address challenges that may arise within the metaverse to assure that this very public interest, as well as brands' interests, are protected in harmony with one another.⁷¹⁶ Lessig's foundational observation that private control of digital infrastructure is always already conditioned by public interest claims resonates with a tradition as old as property law itself – that no system of private rights, however legitimate, operates outside the public regulatory architecture within which it is embedded.⁷¹⁷ As Lessig reminds us, land may be taken

⁷¹⁴ EAPIL, *supra* note 594.

⁷¹⁵ Lawrence Lessig, *Code Version 2.0* (Basic Books, A Member of the Perseus Books Group, 2006).

⁷¹⁶ Greg Lastowka, *Virtual Justice: The New Laws of Online Worlds* (New Haven: Yale University Press, 2010).

⁷¹⁷ Lessig, *supra* note 713.

to build a highway and a car seized to carry an accident victim to the hospital; in each case, it is the private interest that yields to the common end.⁷¹⁸ The same structural logic applies to the metaverse. The intellectual property rights of fashion brands and digital creators that this thesis has sought to protect are legitimate, commercially significant, and deserving of robust legal recognition. However, they do not, and cannot, exist in isolation from the broader public interest in equitable access, creative freedom, and accountable governance of virtual spaces. Where smart contracts perform legislative functions without democratic authorization, where platform operators write the rules of commercial engagement without public accountability, and where the absence of a coherent international framework leaves the regulatory vacuum to be filled by the most powerful private actors, it is not brand interests alone that are endangered – it is the rule of law itself. The recommendations advanced in this thesis are therefore not a constraint on the commercial potential of the metaverse; they are the precondition for it.

The evolution of the metaverse introduces unprecedented challenges necessitating innovative resolutions. The amalgamation of digital elements into reality and the creation of entirely virtual domains raises specific concerns, nevertheless, the foundational tenets of intellectual property protection remain pertinent. The realization and scope of the metaverse are uncertain, rendering its manifestation unpredictable. From the perspective of fashion brand proprietors, the metaverse offers a distinctive prospect for engaging consumers; however, as we have seen, it may come with many challenges and potential limitations for brands' seeking to protect, monitor and enforce their IPR. Similar to the Internet's failure to eliminate geographical constraints, potentially leading to infringement and non-compliance with local laws, the metaverse harbours users and virtual world operators dispersed across various jurisdictions which mirrors many of the same potential constraints. The policing of the metaverse is not novel. Various enforcement strategies, akin to those employed on the Internet, warrant consideration. Although brand proprietors frequently collaborate with reputable online marketplaces to counteract counterfeit and infringement activities, in the event that the metaverse encompasses interoperable virtual worlds, operators of such realms may share similar motivations to evade liability for contributory infringement and reputational safeguarding. Alternatively, collaboration with Payment Service Providers (PSP) may offer an enforcement solution in the metaverse, mirroring strategies employed on the Internet. The utilization of cryptocurrency for transactions within the metaverse, including payments from digital wallets or NFTs, poses challenges in traceability, but may offer solutions as the world of blockchain technology advances. Reporting mechanisms founded on terms of service or user agreements may prove efficacious, and the disablement of access through various channels may prove to be a potential solution for such challenges. In this way, enforcement through terms of service or policies, akin to those employed in search engine advertising, constitutes another avenue for tackling illicit activities in the metaverse. Notably, the metaverse is in its conceptual stage,

⁷¹⁸ Lessig, *supra* note 713.

which means it offers an opportunity to establish protocols to combat infringement through innovative solutions for digital spaces moving forward. Analogous to major technology entities collaborating with local regulations regarding the Internet, trademark protection and the suppression of sales relying on infringement can transcend jurisdictional challenges in the metaverse and combat illicit activities.

The case for coherent intellectual property governance of digital goods, NFTs, and virtual assets in the metaverse extends well beyond the economic interests of incumbent brands, encompassing a constellation of broader social, cultural, and institutional benefits that together justify a principled and prospective approach to regulation. At its foundation, effective IP governance creates the conditions of trust and consumer transparency necessary to realize the metaverse's distinctive potential as a more inclusive and accessible commercial environment than the physical markets it supplements, one in which independent creators, small businesses, and entrepreneurs from across the global economic spectrum can participate on more equal footing, provided that consumers are meaningfully protected from counterfeit virtual goods, unauthorized NFT collections, and deceptive digital representations.⁷¹⁹ Beyond inclusion, clearer governance frameworks offer the opportunity to extend meaningful protection to cultural communities whose traditional knowledge and creative expression face acute risks of digital appropriation through NFT commercialization, to empower consumers navigating the informational asymmetries inherent in smart contract transactions and virtual asset ownership, and to support the adoption of digital-first and sustainable fashion practices through IP frameworks that underpin authentication, provenance tracking, and digital product passports for virtual goods.⁷²⁰ Balanced enforcement equally creates innovation incentives for independent digital designers and virtual asset creators, while frameworks attentive to asymmetries of legal capacity and technological infrastructure can resist the risk of widening the digital divide rather than narrowing it. At its most fundamental level, the project of extending coherent and equitable rule-of-law principles into the decentralized, pseudonymous, and jurisdictionally indeterminate environment of the metaverse represents an opportunity to establish a normative model for how international IP law responds to technological disruption: one that treats access, equity, cultural diversity, and consumer transparency as constitutive values rather than secondary considerations.⁷²¹

In light of the aforementioned challenges outlined within this thesis, regulation of the metaverse has exceptional consequences for fashion brands operating within this space. Brands will see that

⁷¹⁹ Catherine Mateu et al, *supra* note 166.

⁷²⁰ Andy Ramos, "The Metaverse, NFTs and IP rights: to regulate or not to regulate?" (June 2022), online: WIPO Magazine https://www.wipo.int/wipo_magazine/en/2022/02/article_0002.html. See also, Stuart Levi, Mana Ghaemmaghami & Gabriel Mohr, "Skadden Discusses the Growing Complexity of Commercial Rights Issues In NFTs" (1 June 2022), online: CLS Blue Sky Blog <https://clsbluesky.law.columbia.edu/2022/06/01/skadden-discusses-the-growing-complexity-of-commercial-rights-issues-in-nfts/>. See also, James Grimmelman, "The IC3 NFT License" (2022) SSRN Journal, online: <https://www.ssrn.com/abstract=4169092>.

⁷²¹ Boyle, *supra* note 709. See also, Craig, *supra* note 710. See also, Lessig, *supra* note 713.

infringement mechanisms are heavily dependent on harmonized governance structures that favour creativity and the IP assets that businesses are producing. Similar to the regulation of the Internet, it may become increasingly apparent that issues relating to regional involvement could hinder successful progression. This includes regulatory lag, whereby national governments only have the capacity to regulate current and past issues, rendering legislative changes outdated by the time they are enacted.⁷²² By extension, there may not be adequate capacity to enforce these regulations which may decrease legitimacy of previous enactments. As policy and lawmakers continue to be faced with metaversal developments, possibly beyond their competence, they may fail to consider future progressions and anticipate potential loopholes of user infringement, misappropriation, escaping enforcement, and resulting consequences.⁷²³ When IP infringement does take place on these global platforms, it may be that these structures are compromised due to political priorities, lobbying, and civil society pressure, along with commercial interests and other agendas.⁷²⁴ To address these challenges, efforts are currently being made to advocate for states and civil society to weigh in to attempt to formulate ethical regulatory frameworks “before industry self-regulation and standards kick in.”⁷²⁵ With respect to these challenges, transnational cooperation will be integral for the successful governance and development of the metaverse, especially with a lens of protecting the fashion industry and other industries commercially operating within this space, and for shaping standards of intellectual property enforcement, transparency, and brand protection in extended realities. As critics of metaversal governance have stated, “for a global framework to be effective, it would necessitate cooperation between not just democracies [liberal or otherwise,] but also authoritarian states – and, as attempts at cyberspace governance to date demonstrate, such cooperation is hard to achieve.”⁷²⁶

This is further compromised by the need for a balanced intersection between corporate and state power. Presently, we see an imbalance due to the lack of state aptitude to keep up with these progressions, which pushes platforms and corporations into the driver’s seat. In the absence of the required uniform international metaverse and XR governance structures that are more sector-specific and user-dependent, technological evolutions will be sought to be managed by industry actors such as platform owners. This is accompanied by “a ‘shift from law enforced by people to law enforced by technology,’ whereby rules (including laws) are being upheld not by a threat of sanction but by the removal of the very possibility of non-compliance” which could lead to algorithmic regulation.⁷²⁷ In the future, this may prove to be beneficial for countering IP infringement. However, brands will be

⁷²² Kalpokas & Kalpokienė, *supra* note 50.

⁷²³ *Ibid.* See also, Moynihan, Buchser, & Wallace, *supra* note 534.

⁷²⁴ *Ibid.*

⁷²⁵ *Ibid.* See also, Josh Entsminger, Mark Esposito and Terence Tse, “Who Will Establish Metaverse Ethics?” (August 17, 2022), online: *Project Syndicate* <<https://www.project-syndicate.org/commentary/who-establishes-metaverse-ethics-by-josh-entsminger-et-al-2022-08>>.

⁷²⁶ Kalpokas & Kalpokienė, *supra* note 50.

⁷²⁷ *Ibid.* See also, Jamie Susskind, *Future Politics: Living Together in a World Transformed by Tech* (Oxford: Oxford University Press, 2018).

dependent on efficient algorithmic functioning and the ongoing maintenance of these algorithms (or AI) that may have the potential to track infringement. In this process, the next step would be for AI to be linked to user and brand smart contracts to flag this infringement, and possibly facilitate enforcement mechanisms with AI-enabled intermediaries. It must be noted that automated governance would also come with its own set of challenges. This may include the requirement of significant amounts of data training through allowing the AI to access a brand's entire IP portfolio, which may also include the fabric of their AI-generated content, creating additional risks in detection and moderation. Although detailing a model of governance of this kind is beyond the scope of this thesis, it is important to note these challenges, since without involving human judgement, machine learning algorithmic adaptivity may be problematic. This would significantly impact the fashion industry since it may attempt to remove or regulate content that the brands themselves have embedded into their metaversal spaces and may also apply biases and misapplications that could affect brand reputation, commercial outputs, and ultimately, prospective revenue.

Moreover, although geographical territories have been thought of as the gambit for understanding jurisdictional implications for trademark disputes, the metaverse's expansive global market proves otherwise since specific geographical reach and its potential to expand its market in the future are still in question. Frameworks for metaverse governance and IPR enforcement should therefore be developed in parallel to address circumstances relating to internet-based content, aligned with existing precedent.⁷²⁸ Meanwhile, issues of determining jurisdiction involving the complexities of decentralization and traceability may be best addressed through more creative technological solutions along with principles of conflict of laws when required. Overall, a key hinderance, besides the need for private international laws to be applied to IP enforcement, is that the inertia in our current legal structures in the context of advanced technologies seems to be that the systems "presume a physical world by default, which is in sharp contrast to the convergence (i.e. the process of bringing everything into the digital domain) that is taking place in the real world."⁷²⁹ Until policy and decision-makers are able to adapt and foresee the significant implications that the metaverse has on global citizens, legal progression and its governance structures may always be one step behind.

As previously noted, there are critical omniterritorial difficulties relating to immateriality in operating within the metaverse. As suggested, a major challenge is that it is difficult to demonstrate a "place of provision of service" in order to establish the applicable law to an online smart contract for goods and services or the use of the "place of the harmful event" factor for damages when an IP

⁷²⁸ Gretchen Yelmini, "Internet Jurisdiction and the 21st Century: Zippo, Calder, and the Metaverse" (2023), CLR 578, online: <https://opencommons.uconn.edu/law_review/578>.

⁷²⁹ Murray, *supra* note 706 at 13-14.

infringement takes place online – which is essentially a global platform.⁷³⁰ Again, the traditional solution has consisted of detaching localization from the material reality. However, in practice, there is potential for courts to resolve this by taking account of personal connections of brands as fictional localizations in order to identify the specific seat of digital situations. For these determinations, as well as the various other challenges that the metaverse poses, it may be pertinent to adopt a mechanism such as an independent body established through an international convention to oversee the development and enforcement of shared regulatory standards across jurisdictions. In some respects, this approach echoes the role of institutions such as the Internet Corporation for Assigned Names and Numbers (ICANN), which facilitates the coordination of domain name systems and supports mechanisms, such as the Uniform Domain-Name Dispute-Resolution Policy (UDRP), that help address trademark disputes within the architecture of the early Internet.⁷³¹ While not a direct analogue, the ICANN model illustrates how cooperative, quasi-regulatory governance can support the administration of a transnational digital space in a manner that respects intellectual property interests while maintaining functional interoperability. Such a framework in the metaverse could provide for more unified practices of monitoring, regulation, and intellectual property enforcement, thereby protecting brand-consumer relationships as well as the proprietary and reputational interests of rights holders. At the same time, the alignment of regulatory objectives across jurisdictions will remain a central challenge, given divergent national priorities and policy considerations. Enhancing transparency in content moderation, alongside establishing clear standards for the protection and use of trademarks, copyrights, and industrial designs in digital environments, will be critical to fostering trust and accountability. Ultimately, coordinated international mechanisms, supported by shared information, best practices, and capacity-building initiatives, may be necessary to develop consistent, fair, and effective regulatory approaches within the metaverse.

The metaverse exposes structural limitations in existing enforcement and intermediary liability regimes. Platform governance mechanisms and safe harbour frameworks, originally developed for two-dimensional online content, are increasingly misaligned with immersive environments in which infringement may be continuous, performative, and embedded in user interaction. These regulatory gaps reflect a broader misalignment between emergent digital fashion practices and the legal institutions tasked with preserving incentive structures, market transparency, and consumer trust. Accordingly, meaningful regulatory engagement must move beyond analogical extensions of existing intellectual property doctrines toward a more calibrated approach to IP governance for digital fashion goods. Such an approach may include clearer guidance on the treatment of virtual goods under copyright and trademark law, enhanced contractual standardization through licensing and platform terms, and greater

⁷³⁰ EAPIL, *supra* note 594.

⁷³¹ Internet Corporation for Assigned Names and Numbers (ICANN), “Uniform Domain-Name Dispute-Resolution Policy (UDRP)” (1999), online: <https://www.icann.org/resources/pages/help/dndr/udrp-en>.

international coordination to address the inherently transnational nature of metaverse commerce. Strengthening IP protections in this manner is essential not only to safeguard fashion brands' proprietary and reputational interests, but also to foster legitimate creative experimentation and establish a stable legal foundation for sustained growth within the digital fashion ecosystem.

A frictionless experience with innovative platforms for brand-consumer interactions and commerce will be one that navigates through these technological challenges, competition concerns, infringement enforcement, as well as jurisdictional and cryptoterritoriality, despite challenges of interoperability, traceability and the decentralized nature of the metaverse in all its glory. As fashion brands continue to embrace the metaverse, the governance landscape of these platforms will require a concurrent and consistent evolution in order to adapt to the innovative commercial marketplace that the metaverse represents, while effectively protecting intellectual property rights in this space. The blurring of the physical and virtual extended realities will require global interconnectedness and cooperation to coordinate adequate governance mechanisms through multilateral partnerships and intergovernmental support. Along with more comprehensive global regulatory frameworks, it will also require tightening and more explicit defining of intellectual property ownership of digital creations and derivative works, along with cross-border asset transfer legislation and user protection mechanisms within the marketplace.

This governance architecture with the convergence of digital assets, NFTs/NFC, and phygital goods within the metaverse presents a significant opportunity for fashion brands to expand the ways in which consumers experience, recognize, and interact with their marks. Immersive environments allow brands not only to commercialize virtual goods and digital fashion, but also to reinforce the reputational strength of their source indicators and the goodwill associated with them across both physical and virtual marketplaces. However, these opportunities must be approached with caution. The technological architecture of the metaverse, marked by decentralization, interoperability constraints, and the difficulty of locating activity within a fixed geographical territory, directly challenges the territorial assumptions upon which intellectual property protection and private international law have long been built. As a result, questions of jurisdiction, enforcement, and even the subsistence of intellectual property rights become increasingly complex in environments where commercial interactions unfold across borderless digital networks. If approached strategically, however, this evolving ecosystem represents a frontier for intellectual property innovation, new forms of brand expression, and may offer unprecedented modes of consumer engagement. By adopting holistic intellectual property strategies and adapting to the phygital convergence of physical and digital commerce, fashion brands can participate in shaping an emerging commercial and cultural landscape – one that expands the boundaries of creativity, identity, and consumer experience. In this respect, the metaverse should be understood not merely as a disruptive technological development, but as the next domain of brand participation and cultural production, where

leaders who remain attentive to both the risks and the possibilities of this metaversal frontier will be best positioned to define its future.

Finally, the recommendation for an international governance convention must be understood as operating simultaneously at distinct jurisprudential fronts: the *lex lata* – law as it is, the *lex ferenda* – law as it ought to be – and the credible institutional pathway through which normative aspiration may be translated into binding or persuasive legal architecture. To characterize the proposal as merely aspirational would be to misread its function within this thesis. The argument is not that a comprehensive metaverse constitution will emerge by legislative approval, but rather that the conditions for incremental and principled harmonization are already present and are, critically, time-sensitive. The historical trajectory of international IP coordination, whether it be from the Paris Convention, the Berne framework, or the TRIPS Agreement, demonstrates that convergence across divergent national interests is achievable through sustained multilateral negotiation, even where initial consensus is partial and enforcement mechanisms remain soft. More proximately, the UNIDROIT Principles on Digital Assets and Private Law demonstrate that expert-driven normative articulation in technically complex and jurisdictionally contested digital domains is not only achievable, but capable of exercising meaningful influence on domestic courts and legislators in the absence of formal treaty obligation. The governance vacuum that currently characterizes the metaverse is not neutral: it is being filled, in real time, by the private ordering mechanisms of dominant platform operators whose terms of service, smart contract architectures, and content moderation policies are effectively performing regulatory functions without democratic authorization or public accountability. Delay, in this context, does not preserve optionality as it may seem – it forecloses it, progressively entrenching commercial interests that will prove increasingly resistant to reform as the metaverse economy matures. At this critical juncture, the governance architecture of immersive digital environments remains genuinely open to deliberate and principled design. Holistically, it represents a prospective opportunity and a call to action, one that the *lex ferenda* tradition in international law exists to seize and shape as we navigate the complex structural foundations of cyberterritoriality and the hyper-spatiotemporal landscape of our extended reality.

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