

THE SELF IN TIME: THE IMPACT OF PAST-FOCUS ON WELL-BEING AND  
INTERGROUP RELATIONS

OSHRAT A. HADARY

A DISSERTATION SUBMITTED TO  
THE FACULTY OF GRADUATE STUDIES  
IN PARTIAL FULFILMENT OF THE REQUIREMENTS  
FOR THE DEGREE OF  
DOCTOR OF PHILOSOPHY

GRADUATE PROGRAM IN PSYCHOLOGY  
YORK UNIVERSITY  
TORONTO, ONTARIO

SEPTEMBER 2019

© Oshrat A. Hadary, 2019

## **Abstract**

Time perception is the subjective experience of time that allows individuals to travel to the past, present, and future in their minds. The present research explores the associations between subjective time, both positive and negative individual and intergroup outcomes, and determines whether temporal focus is affected by situational factors. The aims of the present investigation are threefold: (1) examine the relationships among temporal focus and a wide range of well-being variables, (2) determine whether situational variables—specifically conflict, lack of certainty and control—affect temporal focus, and (3) examine whether the impact of temporal focus on intergroup outcomes, including potential cultural differences for this impact.

In Study 1, temporal focus, as an individual difference, and its relation to positive and negative well-being was measured utilizing a newly developed temporal focus inventory. North Americans scored significantly higher on past-focus and future-focus, relative to present-focus. Higher past-focus scores were associated with higher uncertainty avoidance, whereas higher present-focus scores were associated with higher well-being. In Study 2, lack of certainty and control were experimentally manipulated to test their effect on temporal focus. Lack of certainty and control did not affect past-, present-, or future-focus. However, higher perceived conflict resulted in a greater focus on the past. In Study 3, the associations among temporal focus, well-being, and intergroup relations were studied in Israel, a site of long-standing conflict. Israeli-Jews scored higher on past-focus than on present- or future-focus. Confirming the results of study 1, present-focus was positively related to life satisfaction. Furthermore, lower scores on past-focus and higher scores on future-focus were related to higher scores on intergroup trust. In Study 4, the effects of past- and future-focus combined with culture on intergroup outcomes were studied. When focused on the past, Israeli-Arabs scored lower on trust and reconciliation.

Cultural differences suggest that the likelihood of a resolution in a time of conflict while focused on the past may be reduced, whereas a future-focus may lead to more opportunities for reconciliation. Lastly, to further understand the effect of time and culture on intergroup relations, the mediating role of personal control was tested. A moderated-mediation analysis showed that Israeli-Arabs in the future condition scored higher on empathy compared to those in the past condition, but only when they were also low in personal control. This effect was not observed for Israeli-Jews. Whether future-focus results in higher levels of empathy in Israeli-Arabs may therefore be partially dependent on their ability to suspend personal control. The results suggest that temporal focus has important implications for both personal and social outcomes, but also that temporal focus may be amenable to modification under some circumstances.

## **Dedication**

This dissertation is dedicated to Lihy, Ethan, and Abigail Hadary.

## **Acknowledgements**

I would like to express my deepest gratitude to my supervisor, Dr. Michaela Hynie, who has guided me throughout my doctoral studies with great expertise and encouragement. I greatly appreciate Dr. Hynie's mentorship and guidance. Also, I would like to thank my committee members, Dr. Raymond Mar and Dr. Gordon Flett, for their valuable knowledge, insight, and feedback. Finally, I would also like to acknowledge the great contribution of the external examiner, Dr. Donna Rose Addis, to this dissertation.

## Table of Contents

Abstract.....	ii
Dedication.....	iv
Acknowledgments.....	v
Table of Contents.....	vi
List of Table.....	viii
List of Figures.....	ix
Introduction.....	1
Functionality of Time Perception.....	2
Temporal Focus.....	3
Well-Being.....	4
Well-Being and Temporal Focus.....	7
Mutability of Temporal Focus.....	12
The Social Aspect of Psychological Time.....	14
Summary of the Literature.....	19
Present Research.....	20
Study 1.....	20
Method.....	26
Materials.....	26
Procedure.....	30
Results.....	31
Discussion.....	39
Study 2.....	42
Method.....	44

Materials.....	44
Procedure.....	47
Results.....	47
Discussion.....	52
Study 3.....	54
Method.....	59
Materials.....	59
Procedure.....	62
Results.....	62
Discussion.....	68
Study 4.....	69
Method.....	71
Materials.....	72
Procedure.....	73
Results.....	73
Discussion.....	80
General Discussion.....	86
Limitations and Future Research.....	93
References.....	97

## List of Tables

Table 1: Study 1 – Correlations between Temporal Focus and dependent variables.....	32
Table 2: Study 1 – Correlations between Temporal Focus subscales.....	33
Table 3: Study 1 – Bivariate relationships between non-temporal variables.....	34
Table 4: Study 1 – Factor pattern.....	37
Table 5: Study 1 – Regression results for Well-being and Uncertainty Avoidance.....	39
Table 6: Study 2 – Conflict Type.....	48
Table 7: Study 2 – Descriptive statistics and Pearson correlations.....	50
Table 8: Study 3 – Descriptive statistics and correlations between variables.....	64
Table 9: Study 3 – Regression results.....	66
Table 10: Study 4 – Correlations between variables.....	75
Table 11: Study 4 – Cultural differences in Past-Focus and Future-Focus on group outcomes...77	
Table 12: Study 4 – Regression results for mediated-moderation.....	79
Table 13: Study 4 – Indirect effect of the mediator on the interaction between temporal focus and culture on group outcomes.....	79



## List of Figures

Figure 1: Study 1 – Scree plot.....	36
Figure 2: Study 4 – The effects of time and culture on group reconciliation.....	82
Figure 3: Study 4 – The effects of time and culture on group trust.....	82
Figure 4: Study 4 – Effect of Temporal Focus and culture on group empathy.....	83
Figure 5: Study 4 – The mediating role of internal control on the interaction between Temporal Focus and culture on group empathy (statistical diagram).....	84
Figure 6: Study 4 – The mediating role of internal control on the interaction between Temporal Focus and culture on group empathy (conceptual diagram).....	85

## **The Self in Time**

The life space of an individual, far from being limited to what he [or she] considers the present situation, includes the future, the present, and also the past. Actions, emotions, and certainly the morale of an individual at any instant depends upon his [or her] total time perspective (Lewin, 1942, pp. 48-49).

Time perspective is a fundamental human capacity that shapes thoughts, feelings, and behaviors about the self and others. It has been defined as the conscious or unconscious experience of time, which includes the past, present, and future (James, 1950; Lewin, 1942). Shifting attention from one timeframe to another allows individuals to psychologically distance themselves from the “here and now,” through reflection on past experiences and visualizations of possible future events (Friedman, 2005). To add to Lewin’s (1942) perspective, psychological time extends beyond the individual and impacts interpersonal and intergroup relations. It is the lens through which individuals evaluate not only themselves but also others, and shapes how individuals manage difficult situations such as conflict. Psychological time has been studied as a personality variable that is consistent over time. However, shifts in psychological time may also occur under specific situations. Uncovering the potential causes of shifts in psychological time will clarify the reasons why individuals dwell on a timeframe, and the impact it may have on well-being and social relationships. The current program of study examines how individuals perceive themselves in time, the well-being correlates that are associated with focusing on different periods of time, cultural differences in perceptions of time, and the contextual factors that impact time perception. Although perception of time has been studied utilizing different well-being variables, no study to our knowledge used a wide array of well-being variables

simultaneously with a unique temporal inventory that measures temporal focus. Furthermore, the creation of a new temporal focus inventory to measure psychological time in real-life settings to determine the impact of conflict, in connection with control and uncertainty, on intergroup outcomes is unique to the present investigation.

### **Functionality of Time Perception**

Past-focus has been associated with poor well-being, and present-focus has been associated with good well-being (Drake, Duncan, Sutherland, Abernethy, & Henry, 2008; Dunkel & Weber, 2010; Hodara & Vasquez, 2009; van Beek, Berghuis, Kerkhof, & Beekman, 2011; Zimbardo & Boyd, 1999). If psychological time is malleable due to situational factors, then conditions can be altered and controlled to create shifts from non-functional to functional timeframes. At any given moment, thoughts can drift from the present to the past or future and back. The notion that individuals always function in the present, or in actual time, is nothing more than an erroneous assumption. The psychological or *subjective* ability to travel in time varies greatly from actual or *objective* time. Objective time, or clock time, is the time that is measured by hours, days, and months, years, and so on. Subjective time, or psychological time, is thoughts about the past, present, or future that are independent of objective time. Objective time is different from subjective time in that it cannot be stopped, reversed, or fast-forwarded. It continues in a linear and unidirectional fashion that progresses towards the future (McGrath & Tschan, 2004). Individuals attend to objective time because it regulates day-to-day activities and indicates when performance may be at its best or worst (Still, 1972). Subjective time may also be linear, but unlike objective time, it can follow a bidirectional or cyclical pattern whereby individuals can visit and revisit the past, present, and future. Subjective time is functional because it can be used to construct and reconstruct personal episodes, which are possibly shaped

by schemas or cognitive frameworks, and these episodes aid in the organization and comprehension of information (Neisser, 1976). Subjective time can also be dysfunctional, particularly when a focus on a single timeframe results in maladaptive behaviors or negative outcomes that impact well-being.

### **Temporal Focus**

The psychological experience of time allows for the construction of temporal trajectories that place weight, value, and order to significant life events. Psychological time varies greatly from person to person, in that people can focus to varying degrees on the past, present, or future. *Temporal focus* is a prolonged utilization of one timeframe and is often considered to be an individual difference variable that may be related to a host of other individual, motivational, social, and cultural factors. It shapes individuals' personality and affects behavior in predictable ways (Taber, 2013). As a personality variable, temporal focus affects individuals' thoughts, emotions, and behavior in way that impact well-being, interpersonal relationships, and goals. However, temporal focus can also be the outcome of certain thoughts, feelings, actions, or situational conditions. For example, the extent to which one expects a specific outcome, favorable or unfavorable, combined with the expected value of the outcome, may direct a person towards or away from a certain timeframe (Atkinson, 1964). Although temporal focus is expected to shift throughout the day, individuals may be motivated to focus their attention on a particular timeframe (Rush & Grouzet, 2012). For example, setting and attaining goals requires planning and organization that may require a focus on the future. Alternatively, working through and solving problems involves personal reflection, which can lead to a past-focus. Both examples are adaptive strategies of shifting one's attention from one timeframe to another in order to achieve a particular outcome. Less adaptive strategies may include continuously

perfecting goals and thereby dwelling too long on the future, or continuously avoiding certain problems and thereby avoiding the past altogether. The extent that focusing on a certain timeframe is adaptive or maladaptive may depend on whether the outcomes of this focus are good or bad.

Individuals tend to focus on a particular timeframe because it contains information that is vital to understanding the self. However, it may be dysfunctional for individuals to hold a bias towards a particular timeframe while neglecting the others (Boniwell & Zimbardo, 2004). A fixation on the past may result in the dismissal of present pleasures, a fixation on the future may result in the dismissal of past experiences and lessons, and a fixation on the present may result in the dismissal of future consequences. Moreover, placing great emphasis on one particular timeframe at the cost of neglecting the others, may affect individuals both personally and on an interpersonal or social level. On a personal level, temporal focus may influence well-being. On a social level, temporal focus may influence interpersonal and intergroup outcomes. Temporal focus can provide a framework for understanding personal challenges, maintaining one's well-being, and reducing social issues that lead to intergroup conflict if left unresolved. Thus, identifying the causes and consequences of temporal focus is paramount to understanding not only perceptions of self and other, but also improving well-being and cultivating interpersonal relations.

### **Well-Being**

Temporal focus can promote or inhibit well-being. There are two leading, and competing, approaches to the study of well-being: subjective well-being (Diener & Diener, 1995; Diener, Emmons, Larsen, & Griffin, 1985) and psychological well-being (Ryff, 1989; Ryff & Singer, 1998). The former approach focuses on hedonism and defines well-being as individuals' self-

evaluations of their cognitive and affective states, which includes global life satisfaction and positive affect (Diener, Emmons, Larsen, & Griffin, 1985; Busseri, Sadava, & Decourville, 2007). The latter approach focuses on eudaimonism and defines well-being as individuals' pursuit of psychological growth and existential meaning (Ryff & Singer, 1998).

Subjective well-being aims to identify the variables that contribute to the healthy functioning of individuals through two main components: emotion and life satisfaction (Busseri, Sadava, & Decourville, 2007; Diener, Suh, Lucas, & Smith, 1999). The affective component is comprised of self-reported pleasant and unpleasant emotions (Kahneman & Riis, 2005), and the cognitive component is comprised of individuals' self-evaluation of their life satisfaction as a whole (Brulde, 2007). A positive bidirectional relationship exists between life satisfaction and positive affect, which suggests that positive evaluations lead to greater life satisfaction and vice versa (Schwarz & Clore, 1983). This positive association between positive affect and life satisfaction was found in 41 nations, suggesting that having a good life is linked to feeling good across the globe (Suh, Diener, Oishi, & Triandis, 1998). Subjective well-being has also been defined as having a healthy balance between positive and negative emotions (i.e., many positive emotions and few negative emotions) in addition to being satisfied with life (Diener, 1984).

Psychological well-being differs from subjective well-being in that it centers on personal growth, purpose, and meaning. Ryff (1989) conceptualized psychological well-being as consisting of six dimensions: (a) personal growth, (b) autonomy, (c) self-acceptance, (d) purpose in life, (e) environmental mastery, and (f) positive relations with others. Personal growth is marked by continuous development and progress towards the realization of one's potential and includes openness to new experiences. Autonomy is achieved by securing independence, resisting social pressures, and mastering self-regulation. Self-acceptance is maintained by

holding a positive attitude and feelings of satisfaction with the self. Purpose in life is obtained by having a sense of direction and meaning in life that fosters a future outlook. Environmental mastery is achieved through displaying competence over one's surroundings and exercising control over external activities. Lastly, positive relations with others is expressed by nurturing satisfying and trusting relationships with others. Although subjective well-being and psychological well-being are correlated, they are distinct concepts (Joshanloo, 2016). Subjective well-being emphasizes the affective component of well-being, which is likely to be fleeting and vary from situation to situation (Steger, 2016). Psychological well-being, on the other hand, emphasizes the development of skills and abilities that are enduring and lead to more stability across situations.

Temporal focus may be influenced by individuals' desire or motivation to acquire and develop their skills in order to enrich their psychological well-being. Aligned with the psychological well-being approach, three motivational variables may influence psychological time: (a) life domains, (b) goal achievement, and (c) internal control (Seginer & Liliach, 2004). Life domains that impact temporal focus can be relational, instrumental, or existential. The relational domain includes social and familial relations (e.g., marriage and friendships), the instrumental domain includes academic and career endeavors (e.g., higher education and career goals), and the existential domain includes physical and psychological threats resulting from events like trauma and war. Victims of trauma, especially, have the tendency to mentally rehearse the atrocities they witnessed in the past, which can contribute to symptoms of depression and post-traumatic stress (Niederland, 1981). Past-focus relates to all three motivation variables, but its strongest relations are with life domains and internal control.

## **Well-Being and Temporal Focus**

The affective and cognitive dimensions of subjective well-being are associated with past, present, and future thinking. A great deal of literature has examined the unhealthy outcomes associated with a past-focus, in particular. Specifically, having a past-focus has been associated with higher levels of perceived stress and depression (Hodara & Vasquez, 2009). Individuals who experience depressive symptoms may experience more disruption in simulation of future events, more so than past events, specifically future events are simulated with less specificity and tend to be overgeneralized (Addis, Hach, & Tippett, 2016). Thinking negatively about the past is also related to anxiety, unhappiness, and a general decrease in well-being (Anagnostopoulos & Griva, 2012; Astrom, Wiberg, Sircova, Wiberg, & Carelli, 2014; Griffin & Wildbur, 2016; Papastamatelou, Unger, Giotakos, & Athanasiadou, 2015; Zimbardo & Boyd, 1999). There are two predominant ways that past-focus influences well-being: rumination and regret.

Rumination is defined as repetitive thoughts and negative emotions about the past (Nolen-Hoeksema, 1991; Nolen-Hoeksema, Wisco, & Lyubomirsky, 2008). These repetitive thoughts are associated with poor well-being including depression, anger, aggression, anxiety, worry, negative mood, impaired concentration, decreased motivation, lower life satisfaction, decreased happiness, and problematic social relationships (Elliott & Coker, 2008; Lyubomirsky & Nolen-Hoeksema, 1995; Nolen-Hoeksema et al. 2008; Nolen-Hoeksema & Watkins, 2011; Peled & Moretti, 2010; Watkins, 2008; Ysseldyk, Matheson, & Anisman, 2007). Regret, defined as feelings of sadness and disappointment that stem from a missed opportunity or failure to achieve a goal (Jokisaari, 2003), is also associated with negative outcomes. This includes depression (Coleman, 1999), low life satisfaction (DeGenova, 1993; Kinnear & Metha, 1989), and poor psychological well-being (Jokisaari, 2004; Mandel, Hilton, & Catellani, 2005; Torges, Stewart,



& Miner-Rubino, 2005). However, these associations between temporal focus and well-being are not based on experiments that allow for causal inferences. It is therefore possible that well-being outcomes predict temporal focus, temporal focus predicts well-being outcomes, both may be true, or some third variable could explain their inter-relations.

Nonetheless, revisiting past conflicts and reframing past incidents of violence are part of understanding and coping with trauma (Baum, 1990; Niederland, 1981). Past thinking facilitates the process of “working through” the trauma and negative memories that may prevent individuals from moving forward and forgiving others for their transgressions (Walser & Hayes, 2006). The benefits of thinking about the past to cope with difficult situations may be short-lived, because keeping the past alive prevents individuals from engaging with the present or future in meaningful ways (Hayes, Strosahl, & Wilson, 2012). It is important to consider that some past-focus is healthy, because it plays an integral part in a balanced time perspective that includes aspects of all three time periods (Drake, Duncan, Sutherland, Abernethy, & Henry, 2008). The past may also serve an important function in future thinking. Learning from past negative events and regrets can lead to personal growth, and possibly in the long run, greater overall well-being. Furthermore, working through the difficulties of the past may foster a proactive approach to future challenges. Although negative outcomes may be unavoidable, they can be used to improve one’s outlook and self-evaluation. Alternatively, individuals can learn to identify when past thinking impacts them negatively and shift their attention from a less functional timeframe to a more adaptive one, like the present.

Thoughts about the present are not likely to include learning from past experiences or planning for the future, but rather engaging in the “here and now.” Many positive outcomes are associated with present thinking. Consistently, across numerous studies, the present is associated

with positive outcomes and higher well-being (Drake, Duncan, Sutherland, Abernethy, & Henry, 2008; Shipp, Edwards, & Lambert, 2009; Tseferidi, Griva, & Anagnostopoulos, 2016; Zimbardo & Boyd 1999). This is in contrast to focusing on the past or future, with life satisfaction being lower when focusing on the past than the present, and life satisfaction also decreasing the further out one looks into the future (Ryff, 1991). Moreover, not only is life satisfaction higher in the present than the past or future beneficial, also the perception that the present is “the best possible” is an important adaptive mechanism (Gomez, Grob, & Orth, 2013). Individuals in the later stages of life reported increases in positive affect when focused on the present in comparison to the past or future (Lennings, 2002). Because certain timeframes are more adaptive than others, it is important to identify the causes of temporal focus. If the underlying causes of temporal focus can be identified, then reframing or working through the situations that lead to a temporal focus that is associated with poor well-being would help to maintain healthy well-being. One factor that can affect temporal focus is a feeling of control over events in one’s life and existential concerns such as dealing with uncertainty (Seginer & Liliach, 2004).

***Uncertainty.*** Lewin (1942) identified uncertainty as an important factor in determining well-being, specifically as it relates to subjective time rather than objective time. Uncertainty is a condition in which information is unknown and predictions regarding outcomes cannot be made accurately (Colman, 2008). Because uncertainty is undesirable to most, attempts are often made to reduce or avoid it (Morselli, 2013; Sorrentino & Roney, 2000). Uncertainty is higher when attention is focused on the future rather than present (Bal & van den Bos, 2012). The future cannot be predicted with complete accuracy, therefore shifts in psychological time can occur in an attempt to avoid uncertainty. For example, when the future is uncertain, individuals prefer the present timeframe but when the present is uncertain, people prefer the future timeframe (Hardisty

and Pfeffer, 2017). The past, however, may be a more effective way of coping with an uncertain future or present. Future uncertainty, stemming from negative future thoughts, like thoughts about one's death, can be attenuated by thinking about the past (Juhl, Routledge, Arndt, Sedikides, & Wildschut, 2010; Routledge, Juhl, Abeyta, & Roylance, 2014). According to the Causal-Uncertainty model, individuals tend to look to their past in order to understand the cause of their uncertainty (Weary & Edwards, 1994; Weary, Tobin, & Edwards, 2010). An uncertain future, or an explicit future threat, may therefore serve as a motivation to focus on the past rather than the present or future.

**Control.** When people lack certainty, they also lack control, although perceptions of control can also be low in situations of high certainty (Edwards & Weary, 1998; Weary & Edwards, 1994). A subjective sense of control improves well-being, which is why individuals continuously aim to secure it (Lachman & Weaver, 1998; Rotter, 1966). Control as a personality and situational variable has been linked to temporal focus. Perception of control over specific situations is more related to future thinking than is general locus of control as a personality factor (Fingerman & Perlmutter, 1995). When people are flexible and adjust themselves to the environment in order to achieve control, they score higher on future-focus (Trommsdorff, 1994). However, when individuals perceive little control over their environments, they may be more past-focused.

There are two specific ways of thinking about control: external versus internal and primary versus secondary. External locus of control is outside the influence of the individual (e.g., other individuals, god, situational factors), whereas internal locus of control is within the influence of the individual and considered personal control (e.g., personality, abilities, behaviors; Rotter, Seeman, & Liverant, 1962). External locus of control, or control resulting from outside

forces, diminishes individuals' ability to conceptualize the past or future in comparison to internal locus of control (Platt & Eisenman, 1968). Additionally, individuals who score high on internal control are more well-adjusted and less anxious than those who score high on external locus of control. It may be the case that individuals who are high in external locus of control are less adjusted because of their inability to look into the past or future.

The extent to which control is obtained by changing the self to fit the environment, or changing the environment to fit the self, is another way of conceptualizing control. Rothbaum, Weisz, and Snyder (1982) identified two types of control related to this idea: primary and secondary control. Primary control is defined as an individual's attempt to change the environment to fit his or her needs (i.e., self as an agent of change). Secondary control is defined as one's ability to be flexible and adjust to meet the demands of the environment (i.e., self as adaptive to environmental demands). People mainly resort to primary control and only when it fails do they exercise secondary control (Zaleski, 1994). Secondary control may be utilized when the self cannot be an agent of change, or when the situation cannot be changed. For example, the past is determined and cannot be changed, thus secondary control may be activated when aspects about the past govern the present. In general, the need to secure control may be heightened in situations where psychological or physical threats exist or when individuals focus on the past or future. Whether individuals look to the past, present, or future under threat may vary from culture to culture. Thus, it is important to consider the interaction between situational factors and temporal focus.

## **Mutability of Temporal Focus**

Perceptions of control and uncertainty may be a product of the situation but may also be the result of circumstances, in which case context may affect temporary focus. Consistent with that, while psychological time is a relatively stable construct (Holman & Silver, 2005), it can also vary from situation to situation (Breesch-Grommen, 1975; Laureiro-Martinez, Trujillo, & Unda, 2017; Paixao, Abreu, & Lens, 2012). Temporal focus, as a personality trait, cannot be experimentally manipulated (Revelle, 2007), but chronic exposure to some life conditions can have an impact on temporal focus. For example, repeated exposure to conflict and uncertainty may lead to a stronger focus on the past and avoidance of the future. Traits like temporal focus can change in a variety of ways including chronic exposure to life conditions, active effort through various therapeutic approaches, or increase in salience of temporal focus in the natural environment or experimental priming. In order to determine whether certain contexts can influence individuals' temporal focus, momentarily or over extended periods of time, the question of whether thoughts about time can be manipulated or changed must be considered. Experimentally, thoughts about the past, present, and future can be manipulated temporarily and made more salient by asking individuals to think about and record past or future events, for example (Williams, Ellis, Tyers, Healy, Rose, & MacLeod, 1996). Although individuals may gravitate towards their personality tendency, personality may interact with situational variables that may provisionally shift attention from one timeframe to another. Retrieving images of the past or imagining oneself in the future temporarily focuses individuals on the past or future (D'Argembeau & Van der Linden, 2004; Rasmussen & Berntsen, 2018; Rasmussen & Berntsen, 2014). One method of temporarily focusing individuals on a particular time frame is the implicit association test (IAT) to study implicit attitudes towards time (Yang, Zhao, Guan, & Huang,

2017). Participants were asked to categorize positive or negative and past or present words into four categories: past me, present me, negative items, and positive items. Participants held a more positive attitude towards the present than the past, at least temporarily. Alternatively, participants can be trained to associate the self with the past or future using the IAT, to prime a temporary past-focus or future-focus. Priming participants' thoughts about time, even momentarily, in a controlled environment allows for the manipulation of psychological time under certain conditions.

At the state level, variability in traits can be measured from moment-to-moment and vary over actual time (Fleeson, 2001). Intraindividual variability on a trait can be measured across situations by tracking people's self-reported personality traits over time (Hodara, 2006; Moskowitz & Zurroff, 2004). For example, the diary method is a common tool for tracking daily self-reported traits and behaviors. This approach has been used in the context of therapy, in which social skills training was applied in an attempt to create long-term change in personality (Piedmont, 2001). A follow-up assessment 15 months post-treatment showed significant shifts in personality constructs such as neuroticism, agreeableness, and conscientiousness, suggesting that, in fact, effortful and chronic activation of patterns of thought can change personality traits. A 10-week personality change program produced achievable personality changes (Martin, Oades, & Caputi, 2014). In this program, participants selected a trait they desired to change and participated in program that is specific to them. The outcome of the personality change training was that personality changes were maintained over a period of four years (Martin-Allan & Leeson, 2016). The idea that personality can change over time challenges our understanding of personality as immutable traits. Significant life events and circumstances such as marriage, child-rearing, unique cultural experiences, conflict, or even trauma can in fact result in personality

changes over time (Allemand, Hill, & Lehmann, 2015; Jackson, Thoemmes, Jonkmann, Lüdtke, & Trautwein, 2012; Specht, Egloff, & Schmukle, 2011). Identifying the situational conditions that elicit a temporal focus will not only help determine which timeframe is adaptive in a given situation, but also aid in developing methods of shifting between timeframes in a functional way.

### **The Social Aspect of Psychological Time**

Psychological time not only provides the means for understanding the self, but also others within a similar social environment. What will enhance the study of psychological time is the study of individuals within different social environments. Cultures that exist in a climate of uncertainty (i.e., uncertainty that is largely associated with uncertain situational factors that tend to impact many) may attend to psychological time in a similar manner to individuals who experience chronic uncertainty (i.e., uncertainty that is largely associated with uncertain individual factors that tend to consistently impact individuals over time), but do not necessarily live in a climate of uncertainty. If we expect individuals who experience uncertainty to become past-focused, it is possible that a culture living in a climate of uncertainty will also be higher in past-focus, relative to present- or future-focus. Perpetual intercultural conflict, for example, can lead to other negative events such as unstable living conditions, experiences of trauma, and lack of security. These negative social outcomes can have an adverse effect on psychological time, specifically the development of a negative view of the future and a strong focus on the past (Holman & Silver, 1998; Lavi & Solomon, 2005). The study of culture and temporal focus, especially under certain conditions, is quite limited. Nearly all studies about psychological time have been conducted with Western populations and may not generalize to other populations.

**Culture.** A culture's shared meaning of psychological time determines how people within a culture define, utilize, and respond to psychological time. The learned meaning of

psychological time may be an influential factor in setting cultural norms, managing interpersonal and international relations, and fostering well-being. The essence of culture can be found in the shared ways individuals interpret themselves and their environments (Rohner, 1984). This broad understanding of culture can be further divided into shared norms and shared experiences. Shared cultural norms are shaped by a culture's history or past experiences and established over time. Significant historical events, such as wars and genocide, may influence a culture's interpretation of its people and environment (Lewin, 1948). These shared experiences or common situational conditions include social, spiritual, economic, and political events that influence people's conceptualization and utilization of psychological time. By virtue of sharing a physical and social setting, people from the same cultural group share experiences that may shape their temporal focus.

The extent to which people in any given cultural group share common experiences may also determine the extent to which they collectively focus on the past, present, or future. Time perspective is one of the dimensions that Hofstede argues varies between cultures, and he argues that cultural differences in perception of time may align with traditional values and perseverance (Hofstede, 1991). According to Hofstede, short-term orientation as a cultural difference includes a focus on the past and present, as well as respect for tradition and fulfilling social obligations (Minkov & Hofstede, 2012). On the other hand, a long-term orientation as a cultural characteristic includes a focus on the future in addition to thrift behavior and perseverance. Indeed, shared experiences, norms, and values are probably not independent of each other. It is possible that persisting and long-lasting shared experiences are integrated into a culture's shared belief system or norms. According to Lewin (1948), change in a culture's condition can result from a change in values and thus a change in actions. In response to a culture's actions, a new



condition may arise and result in a new shared cultural experience that impacts its people. Thus, a circular model is suggested whereby shared experiences develop into cultural norms that impact the actions of individuals, and in turn create new shared experiences for the members of this culture. It is therefore possible that even when members of a culture are no longer exposed to longstanding experiences, such as conflict, they will have internalized the temporal focus of their cultural group as a cultural norm.

*Variability in temporal focus across cultures.* Cultural differences in temporal focus suggest that certain cultures are past-focused, present-focused, or future-focused (Birth, 2006; Oettingen, 1997; Straub, 1993; Wang, Hou, Tang, & Wiprovnick, 2011). Although cultures vary in their temporal focus, their understanding of psychological time is consistent. A large-scale study measuring time perspective across 17 European countries, three Asian countries, three American countries, and one African country, showed that time perspective categories are invariant across countries and cultures (Sircova, van de Vijver, Osin, Milfont, Fieulaine, Kislali-Erginbilgic, Zimbardo, & 54 members of the International Time Perspective Research Project, 2015). That is, people's understanding of time as it relates to the past, present, and future were consistent across regions and cultures. Although this wide-scale study confirmed that the conceptualization of time is consistent across cultures, it failed to consider whether cultures differ in their focus for time perspective and how context might shape this focus.

*Situational uncertainty.* If uncertainty leads individuals to focus on the past, then it is possible for an entire group of individuals to collectively focus on the past as a result of their shared experience of uncertainty. Uncertainty may be elevated within particular cultures, especially in troubled regions where future forecasts are dim. For example, cultural groups that are engaged in ongoing conflict and violence may experience large bouts of uncertainty and

instability in comparison to cultures that experience very few existential threats. Longstanding conflict is likely to heighten stress, anxiety, and general negative well-being (Djarallah & Chorfi, 2012; Dubow, Boxer, Huesmann, Landau, Dvir, Shikaki, & Ginges, 2012; Mahjoub, Leyens, Yzerbyt, & di Giacomo, 1989). Moreover, ongoing conflict can result in the development of a negative life view, personal outlook, and future perspective (Rousseau, Fort, & Corin, 2002). There are a number of adverse outcomes of conflict and violence that can be attributed to a lack of healthcare and education, accelerated maturation in children, exposure and access to weapons, reoccurrence of violence within a community, poor protection of children, and failure to seek and obtain justice as a result of violent conflicts (UNICEF, 2002). These aversive conditions can also result in a temporal focus that may lead to additional negative psychological outcomes. Understanding the impact of conflict on temporal focus may not only shed light on the relationship between temporal focus and well-being on a social level, but also provide insights into possible interventions to help reframe thinking about time in ways that result in positive outcomes for the self and societies.

***Culture of conflict.*** Studying psychological time within a culture is advantageous because it can provide a framework for understanding psychological well-being in a time of conflict. Differences in temporal focus may be a result of different values and events that vary by culture, even within the same region. At the same time, a shared environment may result in certain conditions, such as a lack of certainty and control, that affect temporal focus and negatively impact collective well-being. Cumulative exposure to conflict and violence can result in stress and anxiety (Djarallah & Chorfi, 2012; Dubow, Boxer, Huesmann, Landau, Dvir, Shikaki, & Ginges, 2012; Seginer & Lilach, 2004), which may lead to a greater past-focus. Individuals in cultures that are impacted by intergroup conflict may focus more on the past,

because the past is a coping strategy that satisfies the need for control and security. Thus, past-focus is a double-edged sword: it is utilized as a coping strategy during uncertain and difficult situations and it is associated with a host of negative outcomes.

A good setting for studying temporal focus, culture, and conflict is the Middle East. The Middle East is a region of the world that has suffered, and continues to suffer, from ongoing conflict and this may affect temporal focus in the population. Case in point, Jordanians with post-traumatic stress disorder (PTSD), as a result of conflict and war, focused more on the past than future, and specifically the negative aspects of their pasts (Djarallah & Chorfi, 2012). In the same region of the world, Palestinian youth living in Lebanon referred to a “pain” resulting from stressful and traumatic events related to conflict and violence, and also focused on their past (Mahjoub, Leyens, Yzerbyt, & di Giacomo, 1989). A longitudinal study on the Israeli-Palestinian population found that cumulative exposure to violence leads to higher post-traumatic stress symptoms in both Israeli and Palestinian youth (Dubow, Boxer, Huesmann, Landau, Dvir, Shikaki, & Ginges, 2012), which facilitates a past-focus, specifically a negative view of the past (Djarallah & Chorfi, 2012). In cultures of conflict, the experience of trauma leads people to focus on the past, and once focused on the past, a host of negative well-being outcomes may ensue.

In the case of Israel, the hostile relationships between cultures within and outside of the country have transformed it into a culture of conflict (Bar-Tal, 2010). As a result, Israelis tend place heavy emphasis on the existential life domain. A focus on the existential domain involves continuous concern not only for one’s well-being but also the well-being of the collective (Seginer, 2005). Since the conflict in the region separates people by nationality and religion, not all Israelis share similar life experiences or collective responsibility, thus resulting in different life values and potentially different temporal foci. Significant life events, such as serving in the

military and attending university, are not mandatory for all and result in different life paths that impact temporal focus. Therefore, cultural settings and significant life events may lead to shifts in temporal focus.

### **Summary of the Literature**

Temporal focus can be examined both as an individual difference and a situational variable that shapes perceptions of the self and others. A clearer understanding of the cognitive dimension of time will help determine not only people's temporal foci, but also the motivations and consequences of focusing on a specific timeframe. Past-focus is generally associated with negative well-being (Drake, Duncan, Sutherland, Abernethy, & Henry, 2008; Hodara & Vasquez, 2009; Shipp, Edwards, & Lambert, 2009; Tseferidi, Griva, & Anagnostopoulos, 2016), although these effects are moderated by positive and negative valence (Dunkel & Weber, 2010; Papastamatelou, Unger, Giotakos, & Athanasiadou, 2015; van Beek et al., 2011; Zimbardo & Boyd, 1999). A focus on the past is both functional and dysfunctional: it is a strategy for coping with negative life events and it is associated with a host of negative outcomes. Present-focus, on the other hand, is mostly related to positive well-being, but again these relationships are nuanced (Dunkel & Weber, 2010; Hodara & Vasquez, 2009; Muro, Castellà, Sotoca, Estaún, Valero, & Gomà-i-Freixanet, 2015; van Beek et al., 2011; Zimbardo & Boyd, 1999). Whether past, present, and future lead to good or poor well-being may depend on situational factors such control, uncertainty, and conflict (Holman & Silver, 1998; Holman, Silver, Mogle, & Scott, 2016; Niederland, 1981; Yufit and Benzies, 1973). Nations with a culture of conflict experience continuous uncertainty, which may have negative consequences not only for the self, but also the collective (Bolotova & Hachaturova, 2013). The present investigation examines the impact of

temporal focus, as an individual difference and situational variable, on well-being and intergroup outcomes given the conditions of uncertainty, lack of control, and conflict.

## **Present Research**

The aim of the present research is threefold: First, to explore the relationship between individual differences in temporal focus and well-being; second, to determine the effects of two situational factors, lack of certainty and lack of control, on temporal focus; and third, to explore possible cultural differences in temporal focus and its effect on intergroup outcomes in the context of conflict. The purpose of Study 1 is to measure temporal focus as an individual differences variable and explore its association with well-being using a unique measure that meaningfully assessed three temporal foci. Study 2 examines the effects of uncertainty and lack of control on temporal focus. In Study 3, the association between temporal focus and intergroup outcomes is measured in a culture of conflict: Israel. Lastly, Study 4 aims to determine the effects of temporal focus on intergroup relations in a culture of conflict.

### **Study 1**

The purpose of Study 1 is to determine the association between temporal-focus and well-being utilizing a new measure of temporal focus. This study aims to replicate past findings that past-focus is associated with negative outcomes and present-focus is associated with positive outcomes. No past study on psychological time has examined its relations using multiple measures of well-being. In the present investigation, multiple indicators will be used to measure well-being, including life satisfaction, happiness, optimism, promotion-focus, self-esteem, self-liking, self-competence, and self-control. Indicators of worse well-being outcomes include depression, pessimism, perceived stress, prevention-focus, and need for closure.

## **Measures of psychological time.**

Past research on psychological time has predominantly utilized the Zimbardo Time Perspective Inventory (ZTPI), which separates the past timeframe into positive and negative, and the present timeframe into fatalistic and hedonistic. Past Positive is a focus on the pleasant aspects of the past, whereas the Past Negative is a focus on the unpleasant aspects of the past. A Present Fatalistic perspective suspends self-control and is guided by fate, whereas a Present Hedonistic perspective places attention on immediate pleasures and living in the moment. The future time perspective is not divided by valence, arousal, or attitude. Although the Zimbardo Time Perspective Inventory (ZTPI) is the most widely used measure of psychological time, there are some concerns with its assessment of the past, present, and future. Many of the items that measure the five time perspectives don't measure time, but rather other constructs such as control, social relations, decision-making, and arousal. For example, a sample item from the past negative subscale, is "my decisions are mostly influenced by people and things around me." This item is not related to time at all. Sample items from the present-hedonistic subscale include, "I believe that getting together with one's friends to party is one of life's important pleasures" and "taking risks keeps my life from becoming boring." Although these statements tap into hedonism, they are not related to any particular timeframe. Factoring out irrelevant information (related to arousal, for example) in time measurement should yield results that are specific to past, present, and future thinking.

The shortfalls of the ZTPI led to the construction and development of the Temporal Focus Inventory (TFI), which is central to the current dissertation. The TFI captures psychological time in a way that is specific to past, present, and future thinking (Hodara & Vasquez, 2009). The 15-item scale was designed to measure individuals' focus on psychological time regardless of

valence, arousal, and other factors. Removing these factors from the scale measurement reduces the likelihood that a particular event may be related to a timeframe based on some irrelevant factor, such as its valence or arousal. The TFI is relatively short and quick to administer. In its initial implementation, the TFI was administered to 182 psychology students together with measures of personality, interpersonal factors, motivation, and psychological well-being. The scale items loaded on three distinct factors that were identified as past, present, and future. In addition, the majority of participants focused more on the past and future than the present in a North American sample. However, living in the moment may actually be more beneficial than focusing on the past or future. In this sample, present-focus was positively associated with self-esteem, self-liking, emotional stability, openness, and life-satisfaction. In contrast, past-focus was positively related to rumination, prevention-focus, and behavioral inhibition. Future-focus was positively related to achievement motivation and promotion-focus.

According to Diener and Seligman (2009), the inclusion of a broad range of well-being constructs in a single study is rare. In the present study, the TFI will be used to measure the association between temporal focus and subjective well-being using a wide selection of well-being variables. Based on previous findings, it is hypothesized that present-focus will be positively related with positive well-being outcomes and past-focus will be related to negative well-being outcomes.

### **Measures of well-being.**

There are many different ways to tap into the negative and positive aspects of subjective well-being. The present study includes the following measures of well-being: life satisfaction, happiness, depression, optimism, pessimism, perceived stress, locus of control, regulatory focus, self-esteem, self-liking, and self-competence.

*Satisfaction, Happiness, and Depression.* Global satisfaction or dissatisfaction with one's life is an all-encompassing evaluation of one's satisfaction, rather than satisfaction with an isolated event. Well-being can also be assessed by measuring levels of happiness and depression. Happiness is the utmost goal in human motivation and a key indicator of positive well-being (Diener, 2009). It is related to life satisfaction, which is achieved by sustaining a level of happiness (Peterson, Park, & Seligman, 2005). On the other hand, negative outcomes, such as depression, result in a failure to feel good and thus decrease subjective well-being (Sweeney, Schaeffer, & Golin, 1982). Alternatively, a reduction in depression symptomology leads to an increase in subjective well-being (Diener & Seligman, 2009). Happiness and depression are thus indices of well-being, but do not encompass it in its entirety (Nisbet, Zelenski, & Murphy, 2011).

*Optimism and Pessimism.* Certain personality types are associated with positive and negative well-being outcomes. Optimists, for example, tend to expect positive outcomes and pessimists tend to expect negative outcomes, regardless of how bright or dim the future may appear (Chang & Sanna, 2001; Scheier & Carver, 1992). Optimists tend to experience higher subjective well-being than pessimists during minor or major life events ranging from pregnancy to cancer (Scheier, Carver, & Bridges, 2001). In stressful situations, optimists utilize problem-focused coping and perceive the situation to be within their control. In comparison to pessimists who distance themselves from stress, optimists accept stressful situations and reframe them positively (Scheier, Weintraub, & Carver, 1986). Optimists' positive coping strategies promote mental health and subjective well-being, especially in stressful situations (Carver, Scheier, & Segerstrom, 2010).

*Perceived Stress.* Stress, defined as the psychological and emotional tension resulting from demanding and challenging situation, undermines subjective well-being (Diener, Suh, Lucas, &



Smith, 1999). Much of the research on stress has been related to negative outcomes, mainly depression (Hammen, 2006). The reciprocal-stress model states that stress predicts and results from maladaptive affect and behavior (Kim, Conger, Elder, & Lorenz, 2003), which underscores the complex association between stress and subjective well-being. Stressful life events decrease subjective well-being, which may result in more feelings of stress. In combination with other variables, like pessimism for example, subjective well-being will decline further. Therefore, coping with stress is crucial for subjective well-being, mainly because it may prevent the generation of further stress. Coping with stress starts with determining whether individuals perceive stress in their lives. Individuals who perceive stress as unchanging and uncontrollable, are more likely to experience negative outcomes such as depression (Sweeney, Anderson, Bailey, 1986). Thankfully, the negative effects of perceived stress may be lessened by maintaining a sense of control.

*Perceived Control.* If a degree of control can be achieved during challenging situations, the impact of stress may be mitigated. According to Rotter (1966), an internal locus of control is the tendency to attribute control internally or towards the self (e.g., abilities, skills, and efforts), whereas external locus of control is the tendency to attribute control externally or away from the self (e.g., other people, situations, and luck). Higher scores on external locus of control are associated with less subjective well-being (Pu, Hou, & Ma, 2017). Moreover, internal locus of control predicts better psychological adjustment (Cooper, Okamura, & McNeil, 1995). Exercising self-control, or self-regulating thoughts, actions, and emotions, is another way of conceptualizing control. Self-regulation also plays an integral role in goal achievement. Individuals who are high in self-control are more likely to achieve their goals, resulting in greater

subjective well-being (de Ridder, Lensvelt-Mulders, Finkenauer, Stok, & Baumeister, 2012; Hofmann, Luhmann, Fisher, Vohs, & Baumeister, 2014).

*Regulatory Focus.* Goals are the purpose of an activity or outcome that may drive individuals towards or away from a particular state (VandenBos, 2007). People tend to approach desired states and avoid undesired states (Förster, Higgins, & Idson, 1998). When it comes to goals, avoidance goals, which means evading undesired outcomes, are antecedents of stress, which in turn decreases subjective well-being (Elliot, Thrash, & Murayama, 2011). Promotion- and prevention-focus are orientations that assess how people attain goals (Higgins, 1997). Individuals who are promotion-focused approach positive outcomes (gains) and avoid the absence of positive outcomes (losses). Prevention-focused individuals also avoid the loss of positive outcomes (losses), but strategize to thwart negative outcomes as well (Higgins, Friedman, Harlow, Idson, Ayduk, & Taylor, 2001). Promotion-focused individuals attend more to positive information, positive affect, and optimism than prevention-focus individuals (Hazlett, Molden, & Sackett, 2011; Pattershall, Eidelman, & Beike, 2012; Yoon, Sarial-Abi, & Gürhan-Canli, 2012). In contrast to prevention-focus, promotion-focus predicts a higher quality of life and greater subjective well-being (Manczak, Zapata-Gietl, & McAdams, 2014; Ouyang, Zhu, Fan, Tan, & Zhong, 2015). Having a disposition towards promotion-focus is also associated with high self-esteem, in that people with high self-esteem tend to focus more on promotion than prevention strategies following a threat (McGregor, Gailliot, Vasquez, & Nash, 2007).

*Self-Esteem, Self-Liking, Self-Competence.* Self-reported self-esteem, or a person's sense of self-worth, predicts both components of subjective well-being, positive affect and life satisfaction, and psychological well-being (Paradise & Kernis, 2002; Schimmack & Diener, 2003). In fact, self-esteem is one of the strongest predictors of subjective well-being (Diener,

2009). Although self-esteem is often measured as a global factor, it is actually multidimensional and comprised of two factors: self-liking and self-competence (Tafarodi & Swann, 1995). Self-liking captures the extent that one affectively approves or disapproves of the self, and self-competence is one's self-evaluation of his or her efficacy (Tafarodi & Milne, 2002). The association between these two distinct factors of self-esteem to well-being has not been thoroughly investigated to date. Thus, both self-liking and self-competence will be considered to be measures of well-being.

## Method

**Design.** This study utilized a cross-sectional correlational design.

**Participants.** A total of 227 (male = 57, female = 170) first year psychology undergraduate students at a large university in Toronto, Canada participated in this study in exchange for 1% credit towards their course grade in an introductory psychology course.

## Materials

**Temporal Focus.** The Temporal Focus Inventory (TFI; Hodara & Vasquez, 2009) contains 15 items that measure past-, present-, and future-focus (see Appendix A). A sample item from the Past subscale is: "I can't escape my feelings about the past and how it has shaped who I am today." A sample item from the Present subscale is: "The present shapes my understanding of myself." A sample item for the Future subscale is: "I catch myself dreaming about the future and what my life would be like." The response scale ranges from 1 (*strongly disagree*) to 7 (*strongly agree*). Cronbach's alpha for the past subscale ( $\alpha = .83$ ), present subscale ( $\alpha = .76$ ), and future subscale ( $\alpha = .79$ ), indicated good internal reliability in the current sample. The TFI has previously shown to have good psychometrics, past subscale ( $\alpha = .84$ ), present

subscale ( $\alpha = .77$ ), and future subscale ( $\alpha = .79$ ), indicating good internal consistency (Hodara & Vasquez, 2009).

**Life Satisfaction.** To measure participants' level of satisfaction with their life, the Satisfaction with Life scale was used (*SWLS*; Diener, Emmons, Larsen, & Griffin, 1985). The five-item scale contains questions such as: "The conditions of my life are excellent." The response scale for this measure ranged from 1 (*strongly disagree*) to 7 (*strongly agree*). Cronbach's alpha for the scale indicated good internal reliability,  $\alpha = .86$  (see Appendix B). The Satisfaction with Life Scale has been shown to have good psychometric properties, with an alpha reliability coefficient of .87 and a test-retest reliability after a two-month period of .82 (Diener, Emmons, Larsen, & Griffin, 1985).

**Happiness.** To measure participants' level of happiness, we included the subjective happiness scale (*SHS*; Lyubomirsky & Lepper, 1999). This 4-item scale includes a 7-point response scale that ranges from 1 to 7 (see Appendix C). A sample item is: "Compared to most of my peers, I consider myself: 1 (*less happy*) to 7 (*more happy*)." The scale had good internal reliability in the current data ( $\alpha = .75$ ). This measure of happiness was also found to have good internal reliability ( $\alpha = .87$ ) and was positively correlated with the Satisfaction with Life Scale ( $r = .66, p < .01$ ) (Mattei & Schaefer, 2004).

**Depression.** The revised Beck Depression Inventory was used to measure participants' level of depression (*BDI-II*; Beck, Steer, & Brown, 1996). The 21-item scale contains four responses that ranged from 0 to 3 (see Appendix D). The rating scale included unique response scale statements for each item. For example, an item that measures feelings of guilt includes four possible responses: "I don't feel particularly guilty", "I feel guilty a good part of the time", "I feel guilty most of the time", and "I feel guilty all of the time." The internal reliability of this

scale was high ( $\alpha = .95$ ). The revised Beck Depression Inventory has good psychometric properties and, in the past, has exhibited good internal consistency ( $\alpha = .86$ ; Beck & Steer, 1984).

**Optimism/Pessimism.** The Revised Life Orientation Test was used to measure participants' optimism and pessimism (LOT-R; Scheier, Carver, & Bridges, 1994). The 10-item scale contains a response scale that ranges from 1 (*strongly disagree*) to 4 (*strongly agree*). A sample item from the optimism subscale is: "In uncertain times, I usually expect the best", and a sample item from the pessimism subscale is: "If something can go wrong for me, it will." The optimism ( $\alpha = .66$ ) and pessimism ( $\alpha = .60$ ) subscales produced acceptable internal reliabilities (see Appendix E). Higher internal consistency scores for optimism ( $\alpha = .70$ ) and pessimism ( $\alpha = .74$ ) have also been reported in the past (Glaesmer, Rief, Martin, Mewes, Brähler, Zenger, & Hinz, 2012).

**Perceived Stress.** The Perceived Stress Scale (*PSS*; Cohen, Kamarck, & Mermelstein, 1983) was used to measure participants' perceptions of their own stress (see Appendix F). The 10-item scale includes a response scale that ranges from 0 (*never*) to 4 (*very often*). A sample item is: "In the last month, how often have you felt nervous and 'stressed'?" In the present study, the scale produced good internal reliability ( $\alpha = .79$ ). In past work, the Perceived Stress Scale has been shown to have good psychometric properties, with an alpha reliability coefficient of .82 (Ezzati, Jiang, Katz, Sliwinski, Zimmerman, & Lipton, 2014).

**Self-Control.** The Brief Self-Control Scale (*BSCS*; Tangney, Baumeister, & Boone, 2004) measures dispositional self-control (see Appendix G). The 13-item scale includes responses that range from 1 (*not at all*) to 5 (*very much*). A sample item is: "I wish I had more self-discipline." The scale produced an alpha reliability coefficient of .75. It has demonstrated

good internal reliability in past work (Malouf, Schaefer, Witt, Moore, Stuewig, & Tangney, 2014; Tangney, Baumeister, & Boone, 2004).

**Need for Closure.** The Need for Closure Scale–Short Form (Roets & Van Hiel, 2011) measures an individuals' need to reduce ambiguities and uncertainties in their environments (Cacioppo & Petty, 1982). The 15-item scale includes responses that range from 1 (*totally agree*) to 6 (*never agree*). The scale produced an alpha reliability coefficient of .68. However, the scale has previously demonstrated good psychometric properties with internal consistency scores of .87 (Roets & Van Hiel, 2011) and .88 (Atak, Syed, & Çok, 2017).

**Regulatory-Focus.** This scale was used to measure prevention-focus and promotion-focus (Lockwood, Jordan, & Kunda, 2002). The 18-item scale includes a response scale that ranges from 1 (*not at all true of me*) to 7 (*very true of me*). A sample item from the prevention-focus subscale is: “In general, I am focused on preventing negative events in my life”, and a sample item from the promotion-focus subscale is: “In general, I am focused on achieving positive outcomes in my life.” The prevention-focus ( $\alpha = .74$ ) and promotion-focus ( $\alpha = .88$ ) subscales produced good internal reliabilities in the present study (see Appendix H). This measure has been shown to have good psychometric properties, with an internal consistency of .81 for promotion focus and .75 for prevention focus (Lockwood, Jordan, & Kunda, 2002).

**Self-Esteem.** In order to measure participants' assessment of their self-worth, the Rosenberg Self-Esteem Scale (*RSES*; Rosenberg, 1965) was used (see Appendix I). The 10-item scale has response options that range from 1 (*strongly disagree*) to 4 (*strongly agree*). A sample item is: “on the whole, I am satisfied with myself.” The Rosenberg self-esteem scale produced good internal reliability ( $\alpha = .91$ ). This measure has been shown to have good psychometric properties, with an alpha reliability coefficient of .91 (Brems & Lloyd, 1995).

**Self-Liking/Self-Competence.** The Revised Self-Liking / Self-Competence Scale (*SLSC-R*; Tafarodi & Swann, 2001) was included as a second measure of participants' perception of their self-worth and efficacy (see Appendix J). The 16-item questionnaire includes a response scale that ranges from 1 (*strongly disagree*) to 5 (*strongly agree*). A sample item from the self-liking subscale is, "I am secure in my sense of self-worth", and a sample item from the self-competence subscale is, "I am highly effective at the things I do." The self-liking ( $\alpha = .76$ ) and self-competence ( $\alpha = .81$ ) scales produced good internal reliabilities. The Self-Liking / Self-Competence Scale has been shown to have good psychometric properties, with an internal consistency of .90 for Self-Liking and .82 for Self-Competence. In addition, test-retest reliabilities of .78 for Self-Liking and .75 for Self-Competence were obtained after a three-week period (Tafarodi & Swann, 2001). A high internal consistency for this measure has also been found in previous studies (Tafarodi, Marshall, & Milne, 2003; Tafarodi & Milne, 2002).

### **Procedure**

Participants were invited to participate in a study on "people's perceptions of themselves over time" online, through an undergraduate research participant pool. Participants selected to participate in this study from a list of studies for course credit in their Introduction to Psychology class. First, participants completed a consent form online (see Appendix K). Second, participants completed a series of questionnaires that included measures of demographics, positive and negative well-being outcomes, and temporal focus. Lastly, participants were thanked for partaking in the study and debriefed online. Participants received their course credit immediately following the completion of the study or opting out of the study.

## Results

### Temporal Focus

A repeated measure paired *t*-test was conducted to determine participants' temporal-focus. On average, participants scored higher on past-focus ( $M = 6.42$ ,  $SD = 1.30$ ) than present-focus ( $M = 6.01$ ,  $SD = 1.16$ ),  $t(226) = 4.73$ ,  $p < .001$ ,  $d = .33$ , 95% CI [1.19, 2.88]. In addition, participants scored higher on future-focus ( $M = 6.47$ ,  $SD = 1.33$ ) than present-focus ( $M = 6.01$ ,  $SD = 1.16$ ),  $t(226) = 4.75$ ,  $p < .001$ ,  $d = .37$ , 95% CI [-3.24, -1.24]. There were no statistically significant differences between past-focus and future-focus.

### Variables Related to Temporal Focus

To control for the elevated Type I error due to the multiple tests, only correlations significant at an alpha threshold of .01 will be discussed.

**Past-Focus.** The highest correlations for past-focus were with prevention-focus ( $r = .39$ ,  $p < .001$ , 95% CI [.27, .52]), promotion-focus ( $r = .23$ ,  $p < .001$ , 95% CI [-.18, .14]), and perceived stress ( $r = .18$ ,  $p = .006$ , 95% CI [-.09, .23]), see Table 1.

**Present-Focus.** The highest correlations for present-focus were with happiness ( $r = .31$ ,  $p < .001$ , 95% CI [.19, .47]), self-liking ( $r = .30$ ,  $p < .001$ , 95% CI [.02, .52]), life satisfaction ( $r = .29$ ,  $p < .001$ , 95% CI [.01, .35]), and promotion-focus ( $r = .29$ ,  $p < .001$ , 95% CI [-.09, .24]).

**Future-Focus.** The highest correlations for future-focus was with promotion-focus ( $r = .42$ ,  $p < .001$ , 95% CI [.27, .60]).

As predicted, present-focus was associated with a host of positive well-being outcomes. Also as predicted, past-focus was associated with negative well-being variables, but surprisingly it was also related to promotion-focus. Control and uncertainty measures were not strongly associated with temporal focus. In addition, Past-, Present-, and Future-focus were also



correlated with one another ( $r$ s range = .28 to .45, all  $p$ 's < .001; see Table 2). The intercorrelations were moderate in magnitude, keeping with the expectation that past, present, and future tap different constructs. A factor analysis was conducted as a data-reduction strategy, to better understand the pattern of associations between these variables and to uncover underlying latent factors contributing to these patterns.

Table 1

Correlations between Temporal Focus and Dependent Variables

		Past	Present	Future
Life Satisfaction	$r$	.03	.20	.14
	$p$	.632	.002	.040
Optimism	$r$	.01	.21	.10
	$p$	.939	.001	.130
Self-Esteem	$r$	.10	.28	.16
	$p$	.119	<.001	.015
Self-Liking	$r$	.09	.30	.10
	$p$	.173	<.001	.116
Self-Competence	$r$	.03	.20	.14
	$p$	.632	.002	.040
Happiness	$r$	.01	.33	.06
	$p$	.861	<.001	.334
Depression	$r$	.05	-.12	-.05
	$p$	.442	.073	.485
Pessimism	$r$	.12	-.03	-.14
	$p$	.077	.600	.033
Perceived Stress	$r$	.18	-.10	-.02
	$p$	.006	.132	.726
Prevention	$r$	.39	.07	.08
	$p$	<.001	.297	.235
Promotion	$r$	.23	.29	.42
	$p$	<.001	<.001	<.001
Locus of Control	$r$	.11	-.01	-.09
	$p$	.089	.864	.190
Lack Self-Control	$r$	.01	.01	-.06
	$p$	.878	.930	.355
Need for Closure	$r$	.14	-.03	.12
	$p$	.032	.641	.062

Table 2

Correlations between Temporal Focus Subscales

		TFI Past	TFI Present	TFI Future
TFI Past		1		
TFI Present	<i>r</i>	.45	1	
	<i>p</i>	<.001		
TFI Future	<i>r</i>	.28	.32	1
	<i>p</i>	<.001	<.001	

*Note.* TFI = Temporal Focus Inventory

Table 3  
Bivariate Relationships between Non-Temporal Variables

Variable	M	SD	1	2	3	4	5	6	7	8	9	10	11	12	13	14
1. Life Satisfaction	4.58	1.30	<i>r</i> - <i>p</i>													
2. Optimism	1.68	.33	<i>r</i> .37 <i>p</i> <.001	-												
3. Self-Esteem	3.00	.51	<i>r</i> .54 <i>p</i> <.001	.49	-											
4. Self-Liking	4.88	1.12	<i>r</i> .48 <i>p</i> <.001	.53	.86	-										
5. Self-Competence	4.53	.88	<i>r</i> .42 <i>p</i> <.001	.34	.67	.62	-									
6. Happiness	4.95	1.05	<i>r</i> .58 <i>p</i> <.001	.51	.55	.56	.45	-								
7. Depression	.67	.56	<i>r</i> -.48 <i>p</i> <.001	-.39	-.55	-.53	-.43	-.32	-							
8. Pessimism	1.46	.32	<i>r</i> -.31 <i>p</i> <.001	-.41	-.41	-.37	-.40	-.12	.43	-						

9. Perceived Stress	2.06	.54	<i>r</i>	-.54	-.31	-.39	-.43	-.31	-.28	.48	.33	-					
			<i>p</i>	<.001	<.001	<.001	<.001	<.001	<.001	<.001	<.001	<.001					
10. Prevention	4.43	.98	<i>r</i>	-.20	-.21	-.20	-.25	-.32	-.02	.25	.31	.43	-				
			<i>p</i>	.003	.002	.002	<.001	<.001	.750	<.001	<.001	<.001					
11. Promotion	5.36	.97	<i>r</i>	.42	.30	.45	.38	.35	.24	-.36	-.26	-.11	.20	-			
			<i>p</i>	<.001	<.001	<.001	<.001	<.001	<.001	<.001	<.001	.084	.002				
12. Locus of Control	.41	.13	<i>r</i>	-.22	-.11	-.07	-.08	-.09	-.09	.15	.12	.20	.11	-.10	-		
			<i>p</i>	.001	.096	.280	.228	.182	.177	.021	.078	.003	.100	.116			
13. Lack Self-Control	4.03	.87	<i>r</i>	-.17	-.24	-.31	-.35	-.45	-.11	.28	.22	.21	.14	-.17	.07	-	
			<i>p</i>	.011	<.001	<.001	<.001	<.001	.087	<.001	.001	.002	.036	.008	.285		
14. Need for Closure	3.41	.33	<i>r</i>	-.08	-.01	-.05	-.06	-.09	-.03	.15	.19	.23	.42	.08	.08	-.14	
			<i>p</i>	.257	.912	.912	.338	.161	.637	.023	.003	<.001	<.001	.216	.208	.033	-

---

## Factor Analysis

A principal axis factor analysis with an oblimin rotation was conducted in order to identify the underlying factors for the well-being variables. The scree plot suggested that a 2-factor solution is optimal (see Figure 1). The first factor had an eigenvalue of 5.60 and explained 39.98% of the variance. Examination of the factor pattern matrix for the first factor showed that the well-being variables of life satisfaction, optimism, self-esteem, self-liking, self-competence, happiness, and promotion-focus loaded positively at over .35 (see Table 4). The variables of depression, pessimism, lack of self-control and perceived stress loaded negatively at .35 or higher on this factor. The first factor seems to be encompassing subjective well-being and was thus labeled Well-Being.

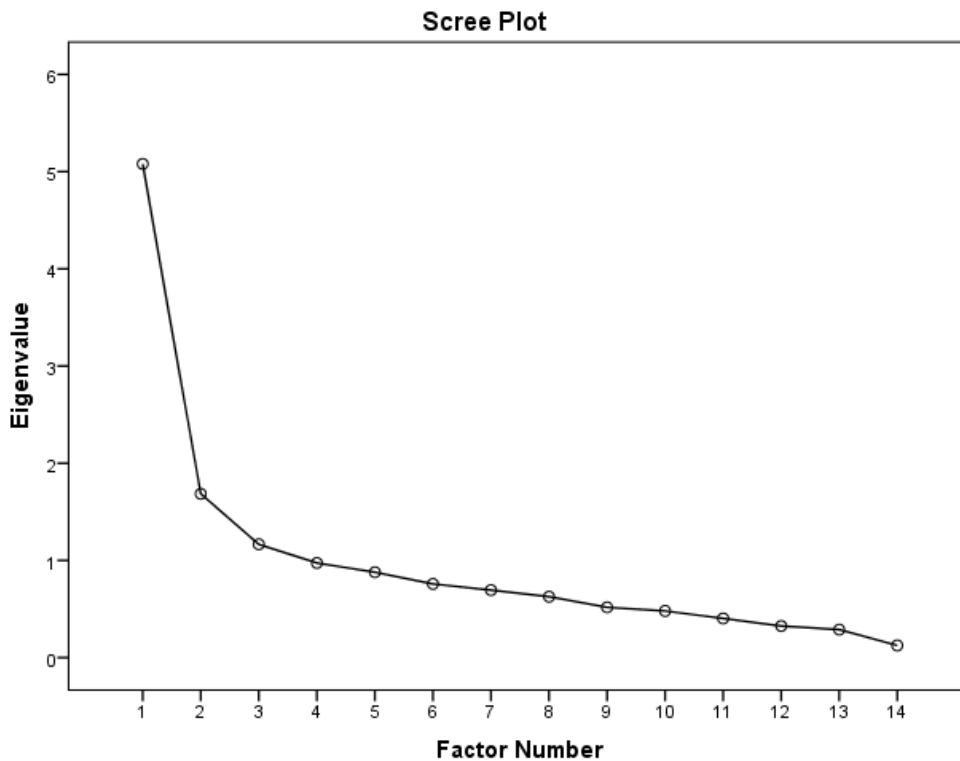


Figure 1. Scree Plot

The second factor had an eigenvalue of 1.71 and explained 12.21% of the variance. The variables of prevention-focus, perceived stress, and need for closure loaded on the second factor with loadings higher than .35. The second factor seems to be encompassing uncertainty avoidance and prevention-focus, and was thus labeled Uncertainty Avoidance.

Next, factor scores were computed by averaging the negative loading variables and subtracting this mean from the mean of the positive loading variables. The method of summing all scores of variables loading on a factor allows variables with greater standard deviations to account for more variance in the factor score (Tabachnick & Fidell, 2013). Furthermore, averaging the scores for each factor can be beneficial when comparing across factors with different numbers of items (DiStefano, Zhu, & Mîndrilă, 2009). Well-Being Scores ranged from -9.95 to 33.26 ( $M = 16.08$ ,  $SD = 8.59$ ). Uncertainty Avoidance scores ranged from 24.00 to 49.33 ( $M = 37.20$ ,  $SD = 4.95$ ).

Table 4

Factor Pattern

	Factor 1	Factor 2
Life Satisfaction	.613	-.199
Optimism	.605	-.047
Self-Esteem	.889	.063
Self-Liking	.851	.021
Self-Competence	.697	-.031
Happiness	.639	-.175
Depression	-.650	.174
Pessimism	-.489	.258

Perceived Stress	-.404	.508
Prevention	-.129	.697
Promotion	.594	.302
Locus of Control	-.149	.169
Lack Self-Control	-.450	-.103
Need for Closure	.111	.629

---

### Regression Analysis

Scores for Well-Being and Uncertainty Avoidance were regressed separately onto past-, present-, and future-focus. To determine whether temporal focus predicts the first factor, Well-Being was regressed on the three temporal foci, while controlling for gender. The hierarchical multiple regression revealed that in Model 1, Gender ( $\beta = -.02, p = .98$ ) did not contribute to the model,  $F(1, 225) < .01, p = .98, 95\% \text{ CI} [-2.63, 2.57], R^2_{\text{adj}} = .00$ . Introducing the temporal focus variables explained an additional 10% of the variation in Well-Being,  $R^2_{\text{cha}} = .10$ . Only two variables in the second model made a statistically significant contribution to the prediction of Well-Being: past-focus ( $\beta = -.17, p = .02, 95\% \text{ CI} [-.41, -.03]$ ) and present-focus ( $\beta = .30, p < .001, 95\% \text{ CI} [.23, .66]$ ), see Table 5. The overall model was statistically significant,  $F(4, 222) = 5.82, p < .001, f^2 = .11, R^2_{\text{adj}} = .08$ . After accounting for gender and the other forms of temporal focus, higher past-focus scores were associated with lower Well-Being, whereas higher present-focus scores were associated with higher Well-Being.

To determine whether temporal focus predicts the second factor, Uncertainty Avoidance was regressed on the three temporal foci while controlling for gender. The hierarchical multiple regression revealed that in Model 1, Gender ( $\beta = -.02, p = .72, 95\% \text{ CI} [-1.77, 1.22]$ ) did not contribute to the model,  $F(1, 225) = .13, p = .72, R^2_{\text{adj}} = .00$ . Introducing the temporal focus

variables explained an additional 15% of the variation in Uncertainty Avoidance ( $R^2_{cha} = .16$ ). Only two variables made a statistically significant contribution to the model predicting Uncertainty Avoidance: past-focus ( $\beta = .44, p < .001, 95\% \text{ CI } [.23, .44]$ ) and present-focus ( $\beta = -.21, p = .003, 95\% \text{ CI } [-.30, -.06]$ ), see Table 5. The overall model was statistically significant,  $F(4, 222) = 10.23, p < .001, f^2 = .19, R^2_{adj} = .14$ . After accounting for gender, higher past-focus scores were associated with higher Uncertainty Avoidance, whereas higher present-focus scores were associated with lower Uncertainty Avoidance.

Table 5

Regression Results for Well-being and Uncertainty Avoidance

	Well-Being		Uncertainty Avoidance	
	$\beta$	$p$	$\beta$	$p$
Gender	-.03	.69	.03	.61
Past-Focus	-.17	.02	.44	<.001
Present-Focus	.30	<.001	-.21	.03
Future-Focus	.11	.12	.02	.75

## Discussion

Study 1 confirmed the hypothesis that past-focus is related to negative well-being and present-focus is related to positive well-being (Drake, Duncan, Sutherland, Abernethy, & Henry, 2008; Muro, Castellà, Sotoca, Estaún, Valero, & Gomà-i-Freixanet, 2015; Shipp, Edwards, & Lambert, 2009; Tseferidi, Griva, & Anagnostopoulos, 2016). Despite the benefits of a present-



focus, participants focused more on the past and future than the present. The factor analysis revealed two underlying factors for the well-being measures: Well-Being and Uncertainty Avoidance. Although locus of control and uncertainty did not emerge in the bivariate correlations, uncertainty avoidance as a general factor did emerge in the factor analysis, and this factor was significantly related to past and present temporal focus. Specifically, higher past-focus scores predicted higher Uncertainty Avoidance and lower Well-Being. Conversely, higher present-focus scores predicted lower Uncertainty Avoidance and higher Well-Being. Utilizing numerous measures of well-being, the present findings not only support previous associations between well-being and psychological time, but also demonstrate that temporal focus predicts well-being and uncertainty.

The study of time can meaningfully improve our understanding of well-being; however, a review of cross-national data provided by the World Database of Happiness (WDH), revealed that only 10% of data included time-related assessments (i.e., reference to the past, present, or future). Psychological time, specifically temporal focus, provides unique information that can improve how well-being is measured and studied. Furthermore, the present study includes a wider range of well-being variables than previous studies on temporal focus research. Study 1 shows that the measure's subscales are correlated but not too great an extent, which suggests that the three subscales of the TFI measure the three different aspects of time – past, present, and future. The measure yielded findings that fit with the expectations of the study and previous literature, which supports its validity.

In interpreting the findings of the present study, limitations must be considered. A correlational design was used, which does not permit for cause-and-effect conclusions. As a result, it cannot be concluded that past-focus causes a reduction in Well-Being, for example. In

addition, a select number of measures were used to capture positive and negative well-being. The interpretation of well-being is limited to the measures that were included. Although these measures are common in Western societies, they measure individuals' perceptions of their subjective well-being and may not generalize to other populations and settings. Well-being can be expanded to include measures that are not included in the current study, such as life meaning, spirituality, and physical health (Cooke, Melchert, & Connor, 2016; Linton, Dieppe, & Medina-Lara, 2016). The examination of intraindividual variables, such as changes in individuals' subjective well-being from day to day, would improve our understanding of how well-being is perceived over time. Furthermore, the examination of culture would enhance our knowledge of intercultural differences in psychological time and its relation to subjective well-being. Lastly, the sample was predominantly female and may not generalize beyond this population.

A more global, perhaps more objective, assessment of well-being may include indicators that apply to diverse groups or cultures. Broader environmental factors may affect individual well-being such as economic prosperity, educational attainment, and physical safety, and psychological time. For example, life satisfaction is correlated more strongly with financial wealth in poor than wealthy countries (Oishi, Diener, Lucas, & Suh, 1999). In addition, there are cultural differences in how success is defined, which impacts people's perceptions of well-being (Diener & Lucas, 1999). Case in point, the association between others' material wealth and well-being was stronger for Singaporeans than Americans (Wirtz & Scollon, 2012). In countries where academic performance predicts financial success, the importance of academic success may greatly contribute to one's overall evaluation of his or her well-being. Lastly, the protection of one's physical well-being, especially in the context of conflict or violence, may be vital to

improving subjective well-being (Bar-Tal, 2000). Therefore, a closer examination of life conditions, such as conditions of uncertainty and control, is implemented in Study 2.

## **Study 2**

To better understand the association between past-focus and negative outcomes, we began to investigate the effects of aversive situations, in particular to determine the effects of lack of certainty and control on temporal focus. In this study, uncertainty and control are experimentally manipulated. It is hypothesized that uncertainty, in combination with lack of control, would result in greater past-focus. In Study 1, past-focus was associated with negative outcomes and predicted greater Uncertainty Avoidance. Thus, it is possible that uncertain situations also cause individuals to focus on the past and this may have implications for people's well-being.

Certainty has clear associations with well-being. Certainty is the strong conviction that a particular outcome is likely to occur. Positive certainty is the firm knowledge that a positive outcome will occur, whereas negative certainty is the firm knowledge that a negative outcome will occur. When individuals are assured that there is a strong probability that a negative outcome will unfold, they score higher on negative well-being outcomes such as depression (Andersen & Lyon, 1987). In addition, a sense of hopelessness accompanies the certainty of negative outcomes or absence of positive outcomes, which also results in negative well-being (Abramson, Seligman, & Teasdale, 1978). Conversely, expectations of positive outcomes are related to improved well-being, motivation, and approach goal strategies (Lench, 2011).

Uncertainty may also predict well-being, and in ways that depend on the nature of the uncertainty. Uncertainty may be found in the unpredictability of others' behaviors, one's environment (e.g., natural disasters), and other unexpected events. When uncertainty is aversive,

it leads people towards avoidance behaviors (Higgins, 1998). People may actively avoid timeframes that contain uncertain information and focus on timeframes that contain known information. Individuals also seek to confirm their knowledge and perceptions (Swann, Rentfrow, & Guinn, 2003), perhaps by searching through self-verifying information in the different timeframes. If uncertainty shifts people's attention to or from a particular timeframe, it can serve as a strategy to shift individuals' attention to time in functional ways.

Uncertainty can shift individuals' attention from one timeframe to another (Hardisty & Pfeffer, 2016). When the present is uncertain, individuals tend to focus on the future. However, when the future is uncertain, people tend to focus on the present. In order to avoid uncertainty, individuals shift their attention to a timeframe that is certain. Past research has not investigated whether attention is focused towards or away from the past during uncertainty. If uncertainty is heightened in a particular timeframe, for example the future, individuals may shift their attention to a more certain timeframe in order to reduce the feeling of overall uncertainty, like the past. Uncertainty-identity theory suggests that individuals are motivated to reduce uncertainty about themselves (Hogg, 2007), and the strategies they use to do so may be related to shifts in temporal focus. Individuals may look to the past in order to understand the cause of uncertainty (Weary & Edwards, 1994), and to prevent thoughts of an unpredictable and insecure future (Morselli, 2013).

The experience of uncertainty is likely to be accompanied by perceived lack of control, as lack of control is associated with higher uncertainty (Weary & Edwards, 1994). Greater uncertainty results from a perceived lack of control over time, such that lack of control at one point predicts later uncertainty (Edwards & Weary, 1998). Lack of control is also related to well-being such that low internal locus of control results in higher anxiety and lower well-being (Platt

& Eisenman, 1968). In relation to psychological time, low perceived control results in higher dissatisfaction with the past, present, and future (Sugiyama, 1994). Thus, it is predicted that higher uncertainty and no control will result in higher past-focus than present- or future-focus.

## **Method**

**Design.** The design of this study is a 2 (control: control, no control) x 3 (uncertainty, negative certainty, positive certainty) between-group experimental design. Participants were randomly assigned to one of the six experimental conditions.

**Participants.** A total of 227 (male = 59, female = 168) first-year psychology undergraduate students participated in this study in exchange for course credit. On average, participants were 19.85 years of age ( $SD = 3.94$ ; range = 17 to 48 years).

## **Materials**

**Demographics.** Participants completed a short demographics questionnaire, which required them to answer questions related to age, gender, ethnicity, race, religion, language, and citizenship (see Appendix L).

**Uncertainty.** Participants were randomly assigned to one of three uncertainty conditions: uncertainty, positive certainty, and negative certainty (see Appendix M). In each condition, participants read a short excerpt about the impact economic uncertainty and certainty (positive or negative) have on students' employment and financial stability after graduation. Thereafter, participants answered a short questionnaire containing open-ended questions about their perceptions of their future employment and behaviors following graduation. These open-ended questions were designed to engage students in thoughts about uncertainty, positive certainty, or negative certainty.

**Uncertainty Manipulation Check.** In order to check the uncertainty manipulation, participants were presented with four questions regarding the information that was manipulated (Appendix N). Each item had a 6-point response scale, ranging from 1 (*very uncertain/negative/unlikely/hard*) to 6 (*very certain/positive/likely/easy*). Sample items are: “According to the article, how certain is Canada’s economic situation?” and “What is the likelihood that graduates will find jobs after graduation.” One question asked participants to rate Canada’s economy and the responses options were good, bad, and uncertain.

**Personal Control.** Participants were randomly assigned to one of two personal control conditions: control and no control. After reading about economic uncertainty and certainty, participants in the control condition read the following excerpt:

*Experts believe that you as an individual can control how the economic situation impacts you. Certain actions like earning a degree, obtaining employability skills, and gaining relevant work experiences will help you control how much the world economy impacts you.*

Participants in the no control condition read the following excerpt instead:

*Experts believe that you as an individual cannot control how the economic situation impacts you. No actions like earning a degree, obtaining employability skills, or gaining relevant work experiences can help you control how much the world economy impacts you.*

The uncertainty and personal control manipulations were fully crossed in a 3x2 experimental design with a total of six possible conditions: uncertainty and control (UC), uncertainty and no control (UNC), positive certainty and control (PC), positive certainty

and no control (PNC), negative certainty and control (NC), negative certainty and no control (NNC).

**Personal Control Manipulation Check.** Participants were asked whether they believe that they have control over what happens in their lives. The response options to this single item were yes or no (see Appendix N).

**Temporal Focus.** The Temporal Focus Inventory (TFI; Hodara & Vasquez, 2009) was used to measure past-focus ( $\alpha = .79$ ), present-focus ( $\alpha = .71$ ), and future-focus ( $\alpha = .77$ ).

**Well-Being.** Measures of negative and positive well-being were included to replicate the findings of Study 1. The revised Beck Depression Inventory was used to measure depression, one of our measures of negative well-being (*BDI-II*; Beck, Steer, & Brown, 1996),  $\alpha = .92$ .

Our second measure of negative well-being was the state-anxiety subscale of the State-Trait Anxiety Inventory (*STAI*; Spielberger, 1989). This 20-item subscale asks participants to report on how anxious they feel at the time of completing the questionnaire (see Appendix O). Sample items of the state-anxiety subscale are: “Right now I feel at ease” and “At this moment I feel upset.” The response scale for this questionnaire ranges from 1 (*not at all*) to 4 (*very much so*). Scores can range from 20 to 80, with higher scores indicating more anxiety ( $\alpha = .79$ ). The *STAI* has been shown to have good psychometric properties, with an alpha reliability coefficient ranging from .92 to .95 in two different samples (Tluczek, Henriques, & Brown, 2009).

Lastly, our third measure of well-being was the Satisfaction with Life scale, used to measure life satisfaction (*SWLS*; Diener, Emmons, Larsen, & Griffin, 1985).

**Conflict.** Participants were asked to report whether they are experiencing intrapersonal, interpersonal, or group conflict. Participants who report conflict are expected to score higher on past-focus than those who do not report conflict.

**Other Materials.** The following scales were included in the package of questionnaires for exploratory purposes: Implicit Person Theories (Chiu, Hong, & Dweck, 1997) and Religiosity (DRS-R; Joseph & Diduca, 2007).

### **Procedure**

Participants were invited to voluntarily participate in a study on people's perceptions of themselves over time. The study was conducted online using York University's undergraduate research participant pool. After completing a consent form (see Appendix P), participants were randomly assigned to one of six conditions: uncertainty–control (UC), uncertainty–no control (UNC), positive certainty–control (PC), positive certainty–no control (PNC), negative certainty–control (NC), and negative certainty–no control (NNC). Participants then completed a series of questionnaires that included the measures described above. Participants also completed items to check the uncertainty and personal control manipulations. Lastly, participants were thanked for partaking in the study and debriefed online.

## **Results**

### **Descriptive statistics**

Participants were mostly of North American (24%), European (20%), and South Asian (16%) descent. Seventy percent of participants were born in Canada, and 92.5% of the participants born in Canada were Canadian citizens. A total of 68.7% declared English to be their first language. A total of 58.7% stated that they were religious, with the most common religions being Catholicism (18%) and Christianity (18%). A total of 27.8% stated that they immigrated to Canada, 67.4% stated that their parents immigrated to Canada, and 32.4% stated that their grandparents immigrated to Canada. Thirty-three percent of participants stated that they are currently experiencing conflict, which was mostly intrapersonal conflict (71%), see Table 6.



Table 6

## Conflict Type

Type of Conflict	Percent
Intrapersonal	71%
Interpersonal	22%
Self and My Group	5%
Self and External Group	1%
My Group and External Group	1%

**Manipulation-checks**

**Uncertainty manipulation check.** A one-way analysis of variance confirmed that participants in the PC condition ( $M = 4.56$ ,  $SD = 1.51$ ) believed graduates are more likely to get jobs after graduation than participants in the NC ( $M = 2.72$ ,  $SD = 1.24$ ) and uncertainty conditions ( $M = 2.87$ ,  $SD = 1.18$ ),  $F(2, 224) = 46.27$ ,  $p < .001$ ,  $\eta^2 = .05$ . Participants in the PC condition ( $M = 4.38$ ,  $SD = 1.36$ ) also rated Canada's economic situation to be significantly more positive than participants in the NC ( $M = 2.52$ ,  $SD = 1.07$ ) and uncertainty conditions ( $M = 2.89$ ,  $SD = 1.05$ ),  $F(2, 224) = 54.70$ ,  $p < .001$ ,  $\eta^2 = .05$ . In addition, participants in the PC condition ( $M = 4.05$ ,  $SD = 1.46$ ) rated graduates' ability to secure assets (e.g., car) upon graduation to be higher than did participants in the NC ( $M = 2.08$ ,  $SD = 1.07$ ) and uncertainty conditions ( $M =$

2.24,  $SD = 1.12$ ),  $F(2, 224) = 60.74$ ,  $p < .001$ ,  $\eta^2 = .08$ . Thus, the manipulation of certainty and uncertainty was successful.

**Personal control manipulation check.** A chi-square test indicated that participants in the control condition (control = 69, 62.2%) were more likely to agree that they had personal control over their lives than participants in the no control condition (no control = 42, 37.8%),  $\chi^2(1, N = 227) = 18.53$ ,  $p < .001$ ,  $d = .60$ . In addition, participants in the no control condition (no control = 77, 66.4%) were more likely to agree that they had no control over their lives than participants in the control condition (control = 39, 33.6%). Thus, the control manipulation was successful.

### **Correlations between Variables**

Past, present, and future measured by the TFI were correlated with one another, correlations ranging from .41 to .42,  $p < .01$ . Confirming the results of Study 1, past-focus was related to state anxiety ( $r = .18$ ,  $p < .01$ , 95% CI [-.03, .29]) and depression,  $r = .17$ ,  $p < .01$ , 95% CI [-.07, .25] (see Table 7). Present-focus was related to life satisfaction ( $r = .19$ ,  $p < .01$ , 95% CI [.06, .32]). Moreover, as in Study 1, future-focus was not related to any well-being measures.

Table 7

## Descriptive Statistics and Pearson Correlations

Variable		<i>M</i>	<i>SD</i>	1	2	3	4	5	6
1. Past	<i>r</i>	4.98	1.01	-					
	<i>p</i>								
2. Present	<i>r</i>	4.89	.87	.41	-				
	<i>p</i>			<.001					
3. Future	<i>r</i>	5.16	1.02	.40	.42	-			
	<i>p</i>			<.001	<.001				
4. State Anxiety	<i>r</i>	1.76	.41	.18	-.04	.02	-		
	<i>p</i>			.006	.579	.780			
5. Depression	<i>r</i>	.49	.43	.17	-.08	-.09	.59	-	
	<i>p</i>			.011	.208	.163	<.001		
6. Life Satisfaction	<i>r</i>	4.67	1.40	-.07	.19	.13	-.51	-.57	-
	<i>p</i>			.275	.005	.046	<.001	<.001	

## Main analysis

A mixed-model ANOVA was conducted with control (yes/no) and certainty (positive certainty/negative certainty/uncertain) as the independent variables and temporal focus (past, present, future) as the repeated measure. A ceiling effect was found for the three temporal focus variables, which was corrected through a log transformation. It was hypothesized that participants in the uncertainty and no control conditions would score higher on past-focus in comparison to participants in the certainty and control conditions. However, there was no significant interaction between temporal focus, control, and certainty,  $F(4, 442) = 1.68, p = .15$ . There were also no significant interactions between temporal focus and control,  $F(2, 442) = 1.71, p = .18$ , or temporal focus and certainty,  $F(4, 442) = .45, p = .77$ . The hypothesis that uncertainty and lack of control result in a higher past-focus was not confirmed.

Nonetheless, we did find that conflict was associated with past-focus. A total of 71% of participants reported that they were experiencing intrapersonal conflict at the time of the study. Approximately 22% of participants reported experiencing interpersonal conflict, whereas 7% reported conflict between groups. A mixed-model ANOVA was conducted with conflict as the independent variables and temporal focus as the repeated measure. A significant interaction was found between temporal focus and conflict,  $F(2, 450) = 4.58, p = .01, \eta^2 = .03$ . A test of the simple main effects revealed that individuals who reported conflict ( $M = .47, SE = .01$ ) scored higher on past-focus than those who did not report conflict ( $M = .42, SE = .02$ ),  $p = .03$ .

## Discussion

Study 2 did not confirm the hypothesis that lack of certainty and control affect past-focus, or any other timeframe. However, a significant association was found between experiencing conflict and past-focus. Specifically, individuals who reported conflict in their lives also scored higher on past-focus. Conflict, especially unresolved or ongoing conflict, may occupy individuals' thoughts through rumination and regret (Wrosch et al., 2005). However, this could be harmful and might prolong the conflict. Not only does conflict harm intergroup affiliations, it may chronically impair group members' well-being by permanently altering the association between groups in a way that deprives the rights and privileges of others (Dovidio, Gaertner, Dittmann, & West, 2012). It may be beneficial to one's well-being to focus on the future instead when it comes to conflict. Specifically, concentrating on the distant future, in comparison to the near future, results in more interpersonal forgiveness (Hodara, 2013).

The strength of this research lies in its experimental design and the ability to allow for cause-and effect inferences. However, experiments also create artificial environments that may not apply to real life settings. There may be other variables, not accounted for in the present research, that influence the effects of certainty and control on temporal focus. For example, students may not be concerned with future uncertainty as long as they are sheltered in an academic environment and focused on academic goals. It is also unclear whether different forms of control, like the control attributed to powerful others or fate that may be random or controlled, may have influenced the outcome. Perhaps measuring students' perceived stress would help determine if uncertainty and lack of control about the future are troublesome enough to cause a focus on the past. Another possible limitation of this study is that the manipulations of certainty and control may have primed participants towards thinking about the future. Asking students to

think about economic issues and prospective job opportunities is part of their future planning. In addition, the results of the present study cannot be generalized to the general population at large. These results are specific to a student population of a particular age range residing in Canada, albeit one with diverse cultural backgrounds.

It may be worthwhile to study the influence of uncertainty and control in real life settings, which impact people more than artificial lab settings. Conflict not only occurs between individuals, but also between groups. At the group level, individuals' dependency on one another can make conflict more dynamic. That is, conflicts can intensify when interdependence increases, such as when a group experiences internal or external pressures (Jehn & Mannix, 2001). In addition, members construct and reconstruct historical events that make up the past, and these reconstructions shape how individuals understand and deal with conflict (Psaltis, Franc, Smeekes, Ioannou, & Žeželj, 2017). Intentionally avoiding thoughts about negative past events, for example, may inhibit their representation and recall (Ryckman, Addis, Latham, & Lambert, 2018). Past narratives influence people's interpretation of the present and may impact how conflict is recalled and addressed in the future (Fuxman, 2013). Not only does the past influence how the future is imagined, the past may also be reconstructed from imagination (Devitt & Addis, 2016). From a collective perspective, the manner in which a group depicts and recalls its past may influence its projection of the future, which may in turn shape how it recollects and interprets the past.

The definition and utilization of psychological time may also be learned and influenced by a culture's norms, values, and shared experiences. History and past thinking play an integral role in understanding and resolving conflicts, and thus a positive relationship between conflict and past-focus is expected. Cultural differences in psychological time suggest that some cultures

tend to focus on one timeframe over others (Birth, 2006; Oettingen, 1997; Straub, 1993; Wang, Hou, Tang, & Wiprovnick, 2011). Certain contextual factors, specifically in a culture of conflict as it exists in the natural environment, may also shape temporal focus. To address these questions, Studies 3 and 4 examine temporal focus in Israel, a place where conflict has existed since before it became a sovereign state.

### **Study 3**

In Study 2, lack of certainty and control did not result in higher past-focus relative to present- and future-focus, but conflict did. The purpose of the present study is thus to examine the influence of culture and conflict on temporal focus. Utilizing a multi-method approach, the examination of temporal focus in naturalistic settings may be used to inform future laboratory experiments. In Study 2, a relationship between conflict and past-focus was evident. Specifically, individuals who reported conflict scored higher on past-focus than those who did not report conflict. Although we did not find a direct relationship between control, certainty and temporal focus in Study 2, conflict may influence temporal focus, and this in turn may be accompanied by a lack of certainty and control, which in turn may lead to negative psychological outcomes. In other words, perhaps the path of causality actually runs from conflict to temporal focus to uncertainty and control to well-being. One region in which conflict has impacted a great number of people and persisted over time is the Middle East. Within the region, Israel has had on-going conflict both internally as well as externally with its surrounding neighbors. Therefore, the examination of conflict in Israel calls for a consideration of culture and intergroup relations.

**Culture.** Cultures define and deal with conflict differently (Worchel, 2005), and common ground must be found for a harmonious coexistence. Since Israel was found in 1948, two cultural groups, Jews and Arabs, fought towards a common goal: preservation of their cultural identity

and security from existential threat. A large percentage of Jews in the Middle East reside in Israel, but a small percentage of Arabs in the Middle East reside within Israel. Israeli-Arabs make up approximately 21% of Israel's current population (Jewish Virtual Library).

Approximately 81% percent of Israeli-Arabs are Muslim that identify as Druze, Bedouins, or Palestinian. Although Israeli-Arabs are a minority in Israel, they currently hold ten seats in the Knesset (i.e., Israeli government) and are employed in various government offices. In the second round of elections in 2019, the joint Arab coalition received 13 seats, becoming the third largest party. The conflict between Jews and Arabs is complex and includes disputes over history, land, religion, economics, and even aerospace. The underlying dispute is centered around the belief that Arabs residing outside of Israel have the right to return to the land they inhabited prior to the establishment of the State of Israel. Although there have been multiple attempts to obtain peace between Jews and Arabs, none of the resolutions have been successful in the long-term. Thus, Israel and its surrounding neighbors have engaged in conflict resulting in violence and death approximately every 4-5 years. Within Israel, conflict between Jews and Arabs is continuous and ongoing. Deliberately creating conditions that expose participants to traumatizing events like those resulting from war and conflict in order to examine temporal focus is unethical and morally unacceptable. Due to the persistent conflict in the region, Israel is a place where conflict has a long presence, and thus is an ideal study site to further our understanding of temporal focus in relation to conflict.

**Intergroup Relations.** Examining the relationships between temporal focus and well-being is important for understanding individuals and groups. In order to understand the association between temporal focus and conflict between cultures, four main intergroup



outcomes are considered as possible contributors to intergroup relations: trust, empathy, identification, and reconciliation.

**Trust.** Trust has been identified as a key component of improving intergroup relations, especially in times of conflict (Cehajic, Brown, & Castano, 2008; Noor, Brown, Gonzalez, Manzi, & Lewis, 2008; Kramer, 1999). Trust is defined as a certain amount of vulnerability that accompanies the positive expectations of others' behaviors and intentions, allowing one to predict another's behavior (Rousseau, Sitkin, Burt, & Camerer, 1998). While envisioning situations in which others committed hurtful offences, trust mediated the relationship between closeness and forgiveness, more so than other responses (e.g., empathy, intent, apology, and rumination; Strelan, Karremans, & Krieg, 2017). Trust is needed for individuals, organizations, and cultures to operate harmoniously (Dirks & Ferrin, 2001; Karremans, Regalia, Paleari, Fincham, Cui, Takada, & Uskul, 2011); however, following a transgression trust is often broken and difficult to restore (Elangovan & Shapiro, 1998). The willingness to acknowledge a group's past alone, including past struggles and wrongdoings, can facilitate forgiveness and improve trust (Vollhardt, Mazur & Lemahieu, 2014). Moreover, when a leader of one group acknowledges the other group's past victimizations, trust is increased more so than when the leader acknowledges present victimization or provides no acknowledgement at all. Distrust, on the other hand, reveals negative intentions between rivals and hinders reconciliation (Nadler & Liviatan, 2004). Gaining the trust of an opponent can be a little more challenging. In times of uncertainty and ongoing intergroup conflict, trust is at high risk of erosion (Yuki, Maddux, Brewer, & Takemura, 2005).

**Empathy.** One approach to facilitating normalization and cooperation between groups is through intergroup empathy. Empathy is defined as understanding a person from his or her perspective or vicariously experiencing a person's thoughts, feelings, and perceptions

(VandenBos, 2006). Contact between groups and expressions of empathy yield positive intergroup outcomes, especially when engaging in intergroup conflict resolution (Pettigrew, 1998; Stephan & Finlay, 1999). For example, empathy for an outgroup results in more cooperative and less aggressive intergroup behaviors (Cohen, 2008). The cognitive dimension of empathy also involves perspective taking or imagining oneself from the other person's point of view (Davis, 1983). Across 50 studies, Miller and Eisenberg (1988) found that higher scores on empathy predict lower scores on aggression, physical abuse, and antisocial behaviour. For example, a study on intergroup relationships conducted in Israel found that Arab children who displayed more empathy towards Jewish children were less supportive of aggression towards Jews (Shechtman & Basheer, 2005). Empathy, specifically taking the perspective of the other, together with group identification, facilitates reconciliation (Boyle, 2015).

***Identification.*** Identification with an opposing group during a conflict, results in positive intergroup outcomes (Noor et al., 2008). According to Social Identity Theory, identification with an outgroup results in positive intergroup outcomes (Ashforth & Mael, 1989; Jackson & Smith, 1999; Richter, West, Van Dick, & Dawson, 2006). In relation to group dynamics, when a person or a group identifies with an outgroup, it recognizes the outgroup's norms and values, and therefore acts accordingly (Turner, Hogg, Oakes, Reicher, & Wetherell, 1987). Intergroup identification results in higher attachment, loyalty, and positive emotions (Jackson, 2002). There are cognitive (e.g., thinking of oneself as part of a group), affective (e.g., feelings of warmth, likeness, and cohesion with the group), and evaluative (e.g., negative and positive attitude towards the group) dimensions of group identification (Brewer & Silver, 2000; Deaux, 1996; Jackson & Smith, 1999; Mael & Tetrick, 1992; Phinney, 1990; Vaughan, Tajfel, & Williams, 1981; Turner, Hogg, Oakes, Reicher, & Wetherall, 1987; Turner, Oakes, Haslam, & McGarty,

1994). Group members who perceive a shared common fate with ingroup members can increase the bond and interdependency between members (Brewer & Silver, 2000). This psychological bond can also apply to intergroup relations, whereby a shared common fate between two groups can strengthen the bond between them.

**Reconciliation.** Intractable conflict, marked by high levels of violence over extended periods of time, penetrates individuals' cognition, social identity, as well as societal beliefs, creating a culture of conflict (Bar-Tal, 2000). As such, a stronger emphasis is placed on the need for reconciliation instead of conflict resolution or the end of a conflict. Reconciliation is the restoration of harmonious relationships between groups following a conflict (Ackermann, 1994; Gardner Feldman, 1999). It also involves changes in goals, attitudes, and beliefs between societies (Lederach, 1997). According to Bar-Tal (2009), the first step in reconciliation is the legitimization of the opponent. That is, the recognition that both sides have goals, needs, and beliefs that must be acknowledged and respected. Kelman (2004) highlights the importance of trust in achieving reconciliation. A second important step in the reconciliation process is not only acknowledging the past, but also accepting the past and understanding how it will shape a shared understanding of conflict (Gardner Feldman 1999; Hayner, 1999). Reconciliation is a process to mend damaged relationships that may or may not lead to forgiveness, but will lead to normalization and cooperation between two groups that allows for coexistence (Bar-Tal, 2013).

Looking into the future and adopting a future-focus requires thinking about relationship consequences, which may facilitate reconciliation following conflict. Past-focus, on the other hand, may result in cognitive and affective states that not only perpetuate negative well-being, but also negative intergroup relationships. Specifically, past-focus is expected to result in lower group trust, identification, empathy, and reconciliation than-present- or future-focus. On the

other hand, consistent with previous research on reconciliation and forgiveness, future-focus is expected to result in higher reconciliation than past-focus.

## **Method**

### **Participants**

A total of 80 Israeli-Jewish undergraduates (male = 13, female = 67) in a first-year psychology course at the Tel-Aviv-Jaffa Academic College participated in this study in exchange for course credit. On average, participants were 24 years of age ( $SD = 1.68$ , range = 20 to 31 years). A total of 92.5% of the sample declared Hebrew to be their mother tongue and 7.5% reported another language (not Arabic). In addition, 95% of the participants stated that they are not religious, and the remaining 5% declared that they are religious. When participants were asked whether they are currently experiencing conflict in their lives, 54% said yes and 46% said no. Approximately 93% of the participants stated that they are experiencing intrapersonal conflict, and 7% stated that they are experiencing interpersonal conflict.

### **Materials**

For this study, all research materials were translated into Hebrew.

**Demographics.** Participants completed a short demographics questionnaire, which required them to answer questions related to age, gender, mother tongue, religious status, current conflict, and type of current conflict (Appendix Q).

**Temporal Focus.** The Temporal Focus Inventory (TFI; Hodara & Vasquez, 2009) was translated into Hebrew for this study (Appendix R), and good internal reliability was observed for the past- ( $\alpha = .81$ ), present-focus ( $\alpha = .85$ ) scales, and moderate reliability for the future-focus scale ( $\alpha = .63$ ).

**Well-being.** A Hebrew translation of the Collective Self-Esteem Scale (CSES; Luhtanen & Crocker, 1992) was used to measure the importance of one's collective group to his or her own self-concept (see Appendix S). The 16-item scale contains four subscales: membership, private, public, and identity. A sample item from the membership subscale is: "I am a worthy member of the social groups I belong to." A sample item from the private subscale is: "In general, I'm glad to be a member of the social groups I belong to." A sample of the public subscale is: "Overall, my social groups are considered good by others." A sample item of the identity subscale is: "In general, belonging to social groups is an important part of my self-image." The response scale for this measure ranges from 1 (*strongly disagree*) to 7 (*strongly agree*). The subscales have been shown to have good psychometric properties, with alpha reliability coefficients ranging from .73 to .85 (Luhtanen & Crocker, 1992). In the current study, Cronbach's alpha for the four subscales produced acceptable to good internal reliabilities: membership subscale ( $\alpha = .73$ ), private subscale ( $\alpha = .75$ ), public subscale ( $\alpha = .82$ ), and identity subscale ( $\alpha = .66$ ). In addition, life satisfaction was measured using the Satisfaction with Life scale, *SWLS*; Diener, Emmons, Larsen, & Griffin, 1985 ( $\alpha = .86$ ) from Study 1. The Hebrew version of the *SWLS* is in Appendix T.

**Control.** Whereas control was manipulated in Study 2, the present study will measure different levels of control that account for factors outside of the individual (e.g., other individuals and chance). When considering culture, one's sense of control may be attributed to other significant people within or outside one's culture. The Levenson Multidimensional Locus of Control Scale (Levenson, 1973) was used to determine participants' attribution of life events (Appendix U). The 24-item scale contains three subscales: internality, powerful others, and chance. A sample item of the internality subscale is: "I can pretty much determine what will

happen in my life.” A sample item of the powerful others subscale is: “Getting what I want requires pleasing those people above me.” A sample item from the chance scale is: “When I get what I want, it is usually because I’m lucky.” The response scale for this measure ranged from 1 (*very strongly disagree*) to 6 (*very strongly agree*). Cronbach’s alpha for the three subscales produced acceptable internal reliabilities: internality ( $\alpha = .63$ ), powerful others subscale ( $\alpha = .63$ ), and chance subscale ( $\alpha = .59$ ). The Implicit Theories scale (Chiu, Hong, & Dweck, 1997) was used to measure the extent to which people believed that others can or cannot change their character (Appendix V). Individuals who believed their personal qualities (e.g., intelligence and personality) cannot be changed were said to have a fixed mindset, whereas those who believed such qualities can be changed through experience and learning were said to have a growth mindset. The three-item scale includes questions such as: “Everyone is a certain kind of person and there is not much that can be done to really change that.” The response scale ranged 1 (*very strongly agree*) to 6 (*very strongly disagree*). Cronbach’s alpha for the scale produce good internal reliability, ( $\alpha = .78$ ). The subscales were found to have good internal reliabilities with alpha equaling 0.74 for Internality, 0.79 for Powerful Others, and 0.79 for chance (Cheng, Cheung, Chio, & Chan, 2013).

**Intergroup Variables.** In order to measure conflict between the two groups of interest, Israeli-Jews and Israeli-Arabs, a 12-item scale was adapted from previous studies on the Israeli-Palestinian conflict (see Andrighetto, Halabi, & Nadler, 2017; Hameiri & Nadler, 2017). This scale measured participants’ desire for reconciliation, empathy, trust, and identification with their ingroup (Appendix W). The scale was originally written in Hebrew. A sample item from the reconciliation subscale is: “I feel that I cannot forgive the Jews/Arabs for what has happened in the past.” A single item was used to measure empathy: “When I see a Jewish/Arab mother that

mourns the death of her son that was killed I share her sorrow.” A sample item from the trust subscale is: "I believe the promises of Jewish/Arabic leaders." A sample item from the identification subscale is: "I feel a deep connection to Israeli-Arabs/Israeli-Jews." The response scale for this measure ranged from 1 (*strongly disagree*) to 7 (*strongly agree*). The Cronbach's alpha for the reconciliation ( $\alpha = .85$ ), and identity subscale ( $\alpha = .87$ ), produced good reliabilities. The trust scale only contained two items and the correlation between the two items was  $r = .39$ .

## **Procedure**

The study was conducted in-class at Tel-Aviv Jaffa Academic College between 2012 and 2013. Participants were invited to voluntarily participate in a study on information processing (Appendix X). After completing the consent form, participants completed a series of questionnaires that included measures of demographics, temporal focus, collective self-esteem, locus of control, implicit person theories, life satisfaction, and intergroup conflict. At the end of the study, participants were thanked for partaking in the study and debriefed.

## **Results**

### **Temporal Focus**

A repeated measure paired *t*-test was conducted to detect differences in temporal-focus. As expected, participants scored statistically significantly higher on past-focus ( $M = 5.48$ ,  $SD = .95$ ) than future-focus ( $M = 4.89$ ,  $SD = .94$ ),  $t(79) = 4.07$ ,  $p < .001$ ,  $d = .62$ , 95% CI [-.88, -.30]. Participants also scored statistically significantly higher on past-focus ( $M = 5.48$ ,  $SD = .95$ ) than present-focus ( $M = 4.84$ ,  $SD = .79$ ),  $t(79) = 4.84$ ,  $p < .001$ ,  $d = .73$ , 95% CI [.37, .90]. There were no significant differences between present-focus and future-focus. These findings vary slightly from those found in Study 1. In both samples, participants scored significantly higher on past-focus than present-focus, despite the advantages of focusing on the present and

disadvantages of focusing on the past to well-being. Moreover, participants also scored higher on future-focus than present-focus in the North American sample. The emphasis on the past was further supported in the Middle Eastern sample with higher scores on past-focus than future-focus.

### **Variables Related to Temporal Focus**

Table 8 shows the correlations between each temporal focus and the remaining variables. Past-focus correlated with Group Trust ( $r = -.25, p = .024, 95\% \text{ CI } [-.52, .02]$ ). Participants who scored higher on past-focus, scored lower on group trust or trusted the other group less and vice versa. For present-focus, life satisfaction was the only correlate ( $r = .33, p = .003, 95\% \text{ CI } [.08, .53]$ ). Aligned with findings in Study 1 and 2, higher scores on present-focus resulted in higher scores on life satisfaction. In addition, lower scores on present-focus resulted in lower scores on life satisfaction. Future-focus correlated with collective self-esteem ( $r = .32, p = .004, 95\% \text{ CI } [.13, .50]$ ). Participants who scored higher on future-focus also obtained higher scores on collective self-esteem, whereas, participants who scored lower on future-focus, also scored lower on collective self-esteem.

Unlike the Canadian sample, there were no strong correlations between past-focus and either present-focus or future-focus. However, present-focus and future-focus correlated with each other ( $r = .28, p = .011, 95\% \text{ CI } [.04, .83]$ ). Higher scores on present-focus were associated with higher scores on future-focus, and lower scores on present-focus were associated with lower scores on future-focus.



Table 8  
Descriptive Statistics and Correlations between Variables

	<i>M</i>	<i>SD</i>		1	2	3	4	5	6	7	8	9	10	11	12	13
1 Past	5.48	0.95	<i>r</i>	-	.09	.032	.14	-.15	.03	-.01	.04	-.10	.09	.14	.14	-.25
			<i>p</i>		.402	.778	.221	.176	.795	.909	.754	.397	.402	.226	.230	.024
2 Present	4.84	0.79	<i>r</i>		-	.28	-.05	-.14	.10	.13	.05	.33	-.03	.06	.10	-.02
			<i>p</i>			.011	.680	.219	.367	.235	.654	.003	.769	.612	.370	.831
3 Future	4.89	0.94	<i>r</i>			-	.32	-.03	-.12	.12	.08	.02	-.18	-.14	.12	.17
			<i>p</i>				.004	.803	.272	.301	.500	.829	.113	.202	.273	.138
4 Collective Self-Esteem	5.10	0.91	<i>r</i>				-	-.38	.17	.13	.13	.24	.02	.11	.16	-.06
			<i>p</i>					.001	.136	.243	.241	.028	.835	.337	.149	.580
5 LOC Internal	2.68	0.61	<i>r</i>					-	-.30	-.24	-.27	-.19	-.05	-.14	-.25	-.02
			<i>p</i>						.007	.030	.014	.092	.643	.233	.027	.860
6 LOC Other	4.01	0.65	<i>r</i>						-	.44	.13	.16	.22	.12	-.01	.08
			<i>p</i>							<.001	.259	.144	.050	.283	.916	.477
7 LOC Change	4.04	0.56	<i>r</i>							-	.00	.15	.14	-.10	-.13	.03
			<i>p</i>								.983	.178	.204	.931	.263	.785
8 Implicit Person	3.34	0.97	<i>r</i>								-	.29	.09	-.05	.10	.04
			<i>p</i>									.009	.423	.669	.399	.711
9 Life Satisfaction	4.74	1.36	<i>r</i>									-	.08	.11	-.07	.29
			<i>p</i>										.493	.356	.535	.010
10 Group Reconciliation	4.30	1.42	<i>r</i>										-	.55	-.46	.07
			<i>p</i>											<.001	<.001	.526
11 Group Empathy	5.27	1.62	<i>r</i>											-	-.22	-.02
			<i>p</i>												.045	.833
12 Group Identification	5.31	1.33	<i>r</i>												-	-.07
			<i>p</i>													.559
13 Trust	3.12	1.02														-

Note. LOC = Locus of Control

## **Temporal Focus and Intergroup Outcomes**

To determine whether temporal-focus predicts intergroup outcomes, a hierarchical multiple regression predicting each of the intergroup variables using temporal focus was conducted while controlling for age, gender, conflict, religiousness, implicit person theories, collective self-esteem, and life satisfaction (See Table 9).

**Reconciliation.** In step 1, gender, age, conflict, religiousness, implicit person theories, collective self-esteem, and life satisfaction did not contribute to the model. Introducing the temporal focus variables in step 2 explained an additional 5% of the variation in reconciliation but did not improve the equation. None of the variables measured, including temporal focus, predicted reconciliation.

**Trust.** In step 1, gender, age, conflict, religiousness, implicit person theories, and collective self-esteem, did not contribute to the model, but life satisfaction was a significant predictor, although the overall model was not statistically significant. Introducing the temporal focus variables in step 2 explained an additional 12% of the variation in trust and improved the equation. Three variables in Step 2 contributed to the model: life satisfaction, past-focus, and future-focus. Higher scores on life satisfaction resulted in higher scores on trust. In addition, higher scores on future-focus resulted in higher scores on trust. However, lower scores on past-focus resulted in higher scores on trust. The final equation was statistically significant.

**Empathy.** Step 1 was not statistically significant, and introducing the temporal focus variables explained an additional 7% of the variation in empathy. Thus, empathy was not predicted by the variables in this study.

**Identification.** The step 1 model was not statistically significant, and introducing the temporal focus variables explained an additional 2% of the variation in identification but did not

improve the equation. Group identification was not predicted by the variables in this study.

Table 9  
Regression Results

	$\beta$	$R^2_{adj}$	$R^2_{cha}$	$F_{cha}$	Sig.
<b>Reconciliation</b>					
Step 1		.03	.11	1.32	.25
Age	.17				
Gender	-.14				
Religiousness	.21				
Conflict	-.01				
Satisfaction	.03				
Implicit Person Theories	.09				
Collect SE	-.02				
Step 2		.04	.05	1.38	.26
Age	.17				
Gender	-.15				
Religiousness	.23				
Conflict	-.05				
Satisfaction	-.01				
Implicit Person Theories	.11				
Collect SE	.05				
Past	.08				
Present	.11				
Future	-.23				
<b>Trust</b>					
Step 1		.07	.15	1.84	.09
Age	-.04				
Gender	-.12				
Religiousness	.02				
Conflict	-.21				
Satisfaction	.36**				
Implicit Person Theories	-.02				
Collect SE	-.11				
Step 2		.16	.12	3.65	.02
Age	-.04				
Gender	-.09				
Religiousness	-.02				
Conflict	-.19				
Satisfaction	.42**				
Implicit Person Theories	-.03				
Collect SE	-.18				
Past	-.21*				

Present					
Future					
Empathy					
Step 1					
Age	.14				
Gender	-.02				
Religiousness	.11				
Conflict	-.05				
Satisfaction	.12				
Implicit Person Theories	-.07				
Collect SE	.08				
Step 2					
Age	.14				
Gender	-.05				
Religiousness	.14				
Conflict	-.09				
Satisfaction	.06				
Implicit Person Theories	-.06				
Collect SE	.17				
Past	.10				
Present	.16				
Future	-.25				
Identification					
Step 1					
Age	-.07				
Gender	.15				
Religiousness	-.10				
Conflict	.03				
Satisfaction	-.13				
Implicit Person Theories	.11				
Collect SE	.19				
Step 2					
Age	-.06				
Gender	.13				
Religiousness	-.09				
Conflict	.05				
Satisfaction	-.15				
Implicit Person Theories	.10				
Collect SE	.17				
Past	.09				
Present	.08				
Future	.03				

\*  $p < .01$

\*\* $p < .05$

## Discussion

In Study 2, an interaction was found between temporal focus and conflict. Specifically, individuals who reported conflict scored higher on past-focus than those who did not report conflict. In Study 3, Israeli-Jews scored higher on past-focus than present- or future-focus, as predicted. When conflict erupts, individuals tend to focus more on their past than any other timeframe. For example, people tend to mentally rehearse information, ruminate about events, and possibly experience feelings of regret in times of conflict (Carr, Schrodt, & Ledbetter, 2012; Johnson, Carr, & Whisman, 2015). Not only do individuals refer to the past and rehearse actual events during conflict, they also revisit imagined interactions that are related to conflict (Allen & Berkos, 2005). Although it is important to note that the notion of conflict for Israelis may be multifaceted and should be studied utilizing multiple methods and measures that are specific to that population, it is the case that in the ongoing conflict between Israelis and Palestinians, both groups have routinely relied on their unique and shared histories, or pasts, to not only understand the conflict but also engage in any possible resolutions (Gutman, 2012).

Since a viable solution to the Middle East conflict between Israeli-Jews and Israeli-Arabs has not been reached, intergroup relationships need further attention. In examining the association between temporal focus and intergroup outcomes, a significant association was found between group trust, past-focus, and future-focus. Higher future-focus resulted in higher trust scores, whereas higher past-focus resulted in lower group trust. However, the correlational method does not allow for the examination of cause-and-effect conclusion that can help decipher whether temporal focus effects trust, trust effects temporal focus, or another unmeasured third variable may be contributing to the association. We cannot state that temporal focus causes people to be more or less trusting, nor can we state that higher trust will result in a particular

temporal focus. To further understand the association between temporal focus and intergroup outcomes, the effect of temporal focus on intergroup outcomes will be examined in Study 4 using an experimental design.

A limitation of the current study is that it only included one group: Israeli-Jews. Thus, the present findings cannot be generalized to all groups and people in Israel. It is also possible that the general public, as opposed to a student population, has different life experiences and outlook on intergroup relations. The general population is certainly at various stages in their lives, which may influence their temporal focus. Future research should include a more representative sample of Israeli-Jews and include Israeli-Arabs. The TFI was designed and tested on a North American population, and although it was translated to Hebrew, the meaning of time may be shaped by differences in Israeli culture's values, norms, preferences, history, and ways of being. Moreover, it is possible that other variables such as the amount of contact or interaction with the other group may influence the relationships between intergroup outcomes and temporal focus. Study 4 will address some of the above limitations and will examine cultural differences in temporal focus, and the effects of temporal focus on well-being and intergroup outcomes. It will expand on these variables and incorporate an experimental design, as well as include both Israeli-Jews and Israeli-Arabs.

#### **Study 4**

Study 3 found that Israelis, specifically Israel-Jews, were more past-focused than present- or future-focused. Future-focus predicted higher and past-focus predicted lower scores on trust above and beyond other factors such as age, conflict, religiousness, implicit person theories, collective self-esteem, and life satisfaction. Given the importance of trust in fostering positive intergroup relations, determining the contextual factors that result in greater trust would be very

valuable towards reconciling the current conflict. The impact that temporal focus, for example, may have on individuals' ability to engage in positive intergroup outcomes may help the process of conflict resolution. The aim of this study is to determine whether thinking about the past or future influences present evaluations of intergroup outcomes. Although temporal focus is an individual difference variable, it may also be possible to manipulate temporal focus, at least temporarily. If so, it may be possible, at minimum, to create situations of greater intergroup trust that could result in more positive intergroup interactions, such as at times of negotiation for peace. In the best-case scenario, it may be possible to repeatedly activate temporal focus in ways that might create more long-lasting intergroup trust and better intergroup relations. The purpose of the current study is to experimentally manipulate temporal focus in order to determine whether it has an effect on intergroup outcomes.

Consistent with Study 3, it is predicted that Israeli-Jews and Israeli-Arab participants will focus more on the past than present or future as a result of the perpetuating conflict and uncertainty in the region. In addition, it is hypothesized that participants in the future-focus condition will score higher on group trust than those in the past-focus condition. Furthermore, it is predicted that participants in the future-focus condition will score higher on group reconciliation than those in the past-focus condition. Given that Study 3 was correlational and that there may be confounding variables, the current study will utilize the experimental method to determine casual connections between variables.

In Study 3, participants who scored higher on past-focus were less likely to attribute outcomes to luck or chance, suggesting that greater perceived internal control may influence outcomes. Thus, it is hypothesized that internal locus of control will mediate the interaction between temporal focus and culture on group outcomes. In contexts where one group may have

more dominance than another group, perceived internal locus of control may be an embedded reality that accompanies intergroup conflict over extended periods of time. Israeli-Jews are a majority in Israel in comparison to Israeli-Arabs, and may perceive their internal control to be higher than Israeli-Arabs, especially when considering the conflict in the region.

## **Method**

### **Participants**

A total of 80 Israeli students (male = 24, female = 56) participated in this study in exchange for course credit. Students were told the study was on the relationship between different aspects of information processing. Forty of the students were Israeli-Jewish and 40 were Israeli-Arab. The Israeli-Jewish sample included 11 males and 29 females, and the Israeli-Arab sample included 13 males and 27 females. The Israeli-Jewish participants were first year psychology students from Tel Aviv-Jaffa Academic College. The Israeli-Arab students were recruited from various higher education institutions and programs in Israel. On average, participants were 24 years of age ( $SD = 2.42$ , range = 20 to 33 years). A total of 50% of the sample declared Hebrew to be their mother tongue and 50% declared Arabic to be their mother tongue. It should be noted that Hebrew is the language of instruction in the institutions sampled and thus all participants were fluent in Hebrew. A total of 7.5% of Israeli-Jews claimed they were religious and the rest not, whereas 60% of the Israeli-Arabs claimed they were religious and the rest not,  $\chi^2(1, N = 40) = 24.65, p < .01$ . A total of 58% of Israeli-Jews and 55% of Israeli-Arabs stated that they are currently experiencing conflict in their lives. Of the participants who reported conflict, 82% of the sample stated that they are experiencing intrapersonal conflict and 18% stated that they are experiencing interpersonal conflict.



## Materials

**Demographics.** Participants completed a short demographics questionnaire, which required them to answer questions related to age, gender, culture, mother tongue, religious status, current conflict, and type of current conflict (Appendix Y).

**Time Manipulation.** Participants were randomly assigned to one of two temporal focus conditions: past-focus and future-focus (Appendix Z). In the past-focus condition, participants were asked to describe a significant event in their past that has shaped and influenced who they are today. In the future-focused condition, participants were asked to think about the future and describe how they see themselves in the future.

**Temporal Focus.** The Temporal Focus Inventory (TFI; Hodara & Vasquez, 2009) contains 15 items that measure past-focus ( $\alpha = .79$ ), present-focus ( $\alpha = .69$ ), and future-focus ( $\alpha = .81$ ).

**Well-Being.** To measure positive well-being, the Satisfaction with Life scale was used (SWLS; Diener, Emmons, Larsen, & Griffin, 1985),  $\alpha = .87$ , see Study 1. The Collective Self-Esteem Scale (CSES; Luhhtanen & Crocker, 1992) was used to measure the importance of one's collective group to his or her own self-concept ( $\alpha = .80$ ).

**Intergroup Outcomes.** In order to measure intergroup conflict, the 12-item scale described in Study 3 was used to measure participants' desire for reconciliation ( $\alpha = .70$ ), empathy (single item), trust ( $r = .18$ ), and identification ( $\alpha = .68$ ) with their ingroup.

**Control.** The Levenson Multidimensional Locus of Control Scale (Levenson, 1973) was used to determine participants' attribution of life events. Cronbach's alpha for the three subscales mainly produced acceptable internal reliabilities: internality ( $\alpha = .72$ ), powerful others subscale ( $\alpha = .62$ ), and chance subscale ( $\alpha = .53$ ).

**Implicit Theories.** The Implicit Theories scale (Chiu, Hong, & Dweck, 1997) was used to measure the extent to which people believed that others can or cannot change their character ( $\alpha = .78$ ).

### **Procedure**

The study was conducted at various academic institutions in Israel between 2012 and 2013. Participants were invited to voluntarily participate in a study on information processing (Appendix AA). Participants completed the study in class at Tel-Aviv Jaffa Academic College whereas those who attended smaller academic institutions around Israel participated in small groups or individually depending on the number of participants available. Upon completion of the consent form, participants were randomly assigned to one of two conditions: past-focus and future-focus. Next, participants completed a series of questionnaires that included a measure of temporal focus as a manipulation check, demographics, collective self-esteem, locus of control, life satisfaction, intergroup conflict, and time manipulation. At the end of the study, participants were thanked for partaking in the study and debriefed. It is important to note that all research materials were translated to Hebrew.

## **Results**

### **Descriptive Statistics**

A total of 50% of Israeli-Jews and 42.5% of Israeli-Arabs claimed they are experiencing intrapersonal conflict, and the remainder stated that they are experiencing interpersonal conflict in both groups.

### **Temporal Focus**

A 2 (temporal focus: past/future) by 2 (culture: Jewish/Arab) independent groups MANOVA was conducted to determine the effect of temporal-focus and culture on intergroup

outcomes. The interaction between temporal-focus and culture was not significant,  $F(2, 156) = .39, p = .68$ . There was no significant main effect for temporal focus,  $F(2, 156) = .28, p = .76$ , or culture,  $F(1, 78) = 2.71, p = .10$ .

### **Variables Related to Temporal Focus**

Past-focus correlated with the chance subscale for locus of control ( $r = -.24, p = .03$ ; Table 10). Participants who scored higher on past-focus were less likely to attribute outcomes to chance and luck. Past-focus also correlated with implicit person theories ( $r = -.45, p < .001, 95\%$  CI  $[-.62, -.24]$ ). Participants who scored higher on past-focus were less likely to believe that people can be changed (i.e., a fixed mindset). Present-focus correlated positively with life satisfaction ( $r = .25, p = .03, 95\%$  CI  $[.03, .56]$ ) and group empathy ( $r = .27, p = .02, 95\%$  CI  $[.03, .49]$ ). Future-focus correlated with collective self-esteem ( $r = .34, p = .01, 95\%$  CI  $[.13, .52]$ ), life satisfaction ( $r = .23, p = .04, 95\%$  CI  $[-.01, .45]$ ), and group reconciliation ( $r = .31, p = .01, 95\%$  CI  $[.10, .49]$ ). Similar to Study 3, there were no correlations between past-focus and either present-focus or future-focus. However, there was a correlation between present-focus and future-focus ( $r = .48, p < .001, 95\%$  CI  $[.28, .64]$ ).

### **Main Analysis**

**Temporal Manipulation.** The 80 participants were randomly assigned to either the past ( $n = 40$ ; Israeli-Jews = 20, Israeli-Arabs = 20) or future ( $n = 40$ ; Israeli-Jews = 20, Israeli-Arabs = 20) conditions. In the past condition, 75% were female and 25% were male,  $X^2(21, N = 80) = 17.14, p = .70, d = .01$ . In the future condition, 65% were female and 35% were male,  $X^2(21, N = 80) = 20.11, p = .58, d = .16$ . In addition, 35% of the participants in the past condition,  $X^2(21, N = 80) = 13.81, p = .88, d = .20$ , and 32.5% of the participants in the future condition,  $X^2(21, N = 80) = 25.05, p = .29, d = .03$ , stated they were religious.

Table 10  
Correlations between Variables

	<i>M</i>	<i>SD</i>		1	2	3	4	5	6	7	8	9	10	11	12	13
1 Past	4.89	1.09	<i>r</i>	-	.00	-.06	-.05	-.02	-.21	-.24	-.45	-.13	-.20	-.16	-.11	.13
			<i>p</i>		.986	.596	.693	.856	.064	.034	<.001	.269	.078	.155	.327	.266
2 Present	4.79	0.89	<i>r</i>		-	.48	.20	-.09	-.16	-.14	.09	.25	.22	.27	.10	.11
			<i>p</i>			<.001	.076	.416	.164	.209	.437	.027	.051	.017	.368	.313
3 Future	4.89	1.15	<i>r</i>			-	.34	-.06	-.16	-.18	.11	.23	.31	.19	.06	.05
			<i>p</i>				.002	.622	.154	.115	.355	.037	.005	.086	.581	.675
4 Collective Self-Esteem	5.03	0.69	<i>r</i>				-	-.42	.03	.13	.22	.33	.09	.25	-.07	.01
			<i>p</i>					<.001	.774	.246	.049	.003	.449	.025	.556	.919
5 LOC Internal	2.91	0.66	<i>r</i>					-	.24	.09	.01	-.08	-.22	-.24	.01	.03
			<i>p</i>						.034	.434	.932	.465	.048	.034	.959	.799
6 LOC Other	3.89	0.62	<i>r</i>						-	.47	.22	.12	-.18	.01	.03	.07
			<i>p</i>							<.001	.049	.310	.120	.968	.809	.515
7 LOC Chance	3.98	0.56	<i>r</i>							-	.35	.16	.09	.02	.17	-.27
			<i>p</i>								.001	.165	.433	0.850	.137	.016
8 Implicit Person Theories	3.00	0.95	<i>r</i>								-	.03	.23	.23	.21	-.30
			<i>p</i>									.801	.044	.042	.067	.006
9 Life Satisfaction	4.88	1.26	<i>r</i>									-	.20	.25	.10	.37
			<i>p</i>										.084	.023	.384	.001
10 Group Reconciliation	3.97	1.07	<i>r</i>										-	.40	.62	-.18
			<i>p</i>											<.001	<.001	.114
11 Group Empathy	5.31	1.16	<i>r</i>											-	.33	.04
			<i>p</i>												.003	.730
12 Group Trust	3.56	1.21	<i>r</i>												-	-.08
			<i>p</i>													.469
13 Group Identification	5.53	0.96	<i>r</i>													-
			<i>p</i>													

Note. LOC = Locus of Control

**Manipulation Check.** An independent samples *t*-test revealed that participants in the past condition ( $M = 5.20, SD = .73$ ) scored higher on the past-focus subscale of the TFI than participants in the future condition ( $M = 4.58, SD = 1.29$ ),  $t(78) = 2.65, p = .01, d = .59$ . In addition, participants in the future condition ( $M = 5.22, SD = 1.06$ ) scored higher on the future-focus subscale of the TFI than participants in the past condition ( $M = 4.56, SD = 1.16$ ),  $t(78) = 2.63, p = .01, d = .59$ .

**The Effects of Time on Intergroup Outcomes.** A 2 (time: past vs. present) x 2 (culture: Israeli-Jewish vs. Israeli-Arab) MANOVA was performed on the four group variables (i.e., reconciliation, empathy, trust, and identification; Table 11). The multivariate interaction between time and culture on the combined group variables was statistically significant,  $\lambda = .85, F(4, 73) = 3.30, p = .01$ . For reconciliation, an interaction emerged,  $F(1, 76) = 13.28, p < .001$  (see Figure 2). A test of the simple main effects revealed that although there is no statistically significant difference in reconciliation between Israeli-Jews who were in the past versus future conditions,  $F(1, 76) = 1.08, p = .30$ , the level of reconciliation for Israeli-Arabs was lower when they were in the past ( $M = 3.21, SD = .42$ ) than the future condition ( $M = 4.48, SD = 1.22$ ),  $F(1, 76) = 16.95, p < .001, d = 1.40$ . Thus, comparing all 4 means, Israeli-Arabs in the past condition scored lower on reconciliation than all other cells of the comparison.

A significant interaction also emerged for group trust,  $F(1, 76) = 4.70, p = .03$  (Figure 3). A test of the simple main effects revealed that Israeli-Arabs ( $M = 4.22, SD = 1.33$ ) scored higher on trust than Israeli-Jews ( $M = 3.35, SD = 1.11$ ) in the future-focus condition but not the past-focus condition,  $F(1, 76) = 5.68, p = .02, d = .71$ . In addition, a test of the simple main effects revealed that Israeli-Arabs scored higher on trust in the future condition ( $M = 4.22, SD = 1.33$ ) in comparison to the past condition ( $M = 3.20, SD = .92$ ),  $F(1, 76) = 7.79, p < .001, d = .89$ . But,

once again, there was no difference between past and future for Israeli-Jews,  $F(1, 76) = 0.07, p = .79$ . Thus, in the case of trust, Israeli-Arabs in the past condition were lower on trust than all other cells.

Table 11

Cultural Differences in Past-Focus and Future-Focus on Group Outcomes

Variable	Israeli-Jews				Israeli-Arabs				<i>p</i>
	Past		Future		Past		Future		
	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>	
Reconciliation	4.26	1.12	3.94	.95	3.21	.42	4.48	1.22	<.001
Empathy	5.30	1.22	5.60	1.14	4.60	.75	5.75	1.21	.09
Trust	3.45	1.23	3.35	1.11	3.20	.92	4.22	1.33	.03
Identification	5.45	.95	5.66	1.15	5.52	.53	5.48	1.14	.57

### Internal Locus of Control

The cultural differences in temporal focus on group outcomes may be mediated by internal locus of control. From a situational perspective, adaptability and flexibility to the environment is positively associated with future-focus (Fingerman & Perlmutter, 1995; Trommsdorff, 1994). High scores on internal locus of control not only predict positive well-being, but also individuals' ability to conceptualize the past and future (Platt & Eisenman, 1968). Lack of control as a result of physical and psychological threat may differ by cultures and temporal focus, thereby influencing intergroup relations.

A mediated moderation occurs when two predictor variables interactively affect a mediator, which in turn influences an outcome variable (Hayes, 2012). A mediated-moderation

analysis was executed in order to determine if internal locus of control mediated the interaction between temporal focus and culture on group outcomes. A regression-based path analysis was executed using PROCESS, a computational tool for probing interactions and conditional indirect effects of a mediated moderation model (Preacher, Rucker, & Hayes, 2007). Bootstrapping is recommended for calculating the confidence intervals (MacKinnon, Lockwood, & Williams, 2004), but the probing of conditional indirect effects is not required for mediated-moderation (Preacher, Rucker, & Hayes, 2007).

In step 1, the interaction between temporal focus and culture on empathy was found to be statistically significant ( $\beta = -.65$ ,  $SE = .28$ ,  $CI = -1.21, -.09$ ,  $p = .02$ ), see Tables 12 and 15. A graph of the interaction between temporal focus and culture on empathy illustrates that Israeli-Arabs scored higher on empathy in the future than past condition (95%  $CI = .50, 1.80$ ; Figure 4). No statistically significant differences were found for empathy, for Israeli-Jews in the past versus future conditions (95%  $CI = -.46, 1.06$ ). In step 2, the bootstrapping analysis revealed that the mediating role of internal control on the interaction between temporal focus and culture on group empathy was statistically significant ( $\beta = .21$ ,  $SE = .16$ , 95%  $CI = .01, .64$ ; Figures 5 and 6). That is, internal control mediated the interaction between temporal focus and culture, which in turn influenced group empathy. The differential effect of time on empathy for Israeli Arabs, but not Jews is statistically significant for those individuals low in internal control (95%  $CI = -.34, -.01$ ), but not for individuals high in internal control (95%  $CI = -.03, .41$ ).

The mediating role of internal control on the relationship between temporal focus and culture was not statistically significant for group reconciliation ( $\beta = .12$ ,  $SE = .11$ , 95%  $CI = -.06, .40$ ), trust ( $\beta = -.04$ ,  $SE = .15$ , 95%  $CI = -.43, .21$ ), and identification ( $\beta = -.02$ ,  $SE = .12$ , 95%  $CI = -.30, .21$ ; see Table 13).

Table 12

## Regression results for Mediated-Moderation

Group Outcome	$\beta$	<i>SE</i>	<i>t</i>	<i>p</i>
Reconciliation				
Internal Control	-.19	.18	-1.06	.29
Time	.48	.22	2.19	.03
Culture	-.19	.23	-.84	.40
Time x Culture	1.47	.45	3.26	.00
Empathy				
Internal Control	-.33	.20	-1.67	.10
Time	.73	.24	3.01	.00
Culture	-.16	.25	-.64	.52
Time x Culture	.64	.50	1.27	.21
Trust				
Internal Control	.06	.21	.27	.79
Time	.46	.26	1.77	.08
Culture	.29	.27	1.08	.28
Time x Culture	1.16	.54	2.15	.03
Identification				
Internal Control	.03	.18	.18	.86
Time	.09	.22	.40	.69
Culture	-.06	.23	-.27	.79
Time x Culture	-.23	.45	-.50	.62

Table 13

Indirect effect of the mediator on the interaction between temporal focus and culture on group outcomes.

Group Outcome	$\beta$	<i>SE</i>	95% C.I.	
			Upper	Lower
Reconciliation	.12	.11	-.06	.40
Empathy	.21	.16	.01	.64
Trust	-.04	.15	-.43	.21
Identification	-.02	.12	-.30	.21

*Note.* Significant results found when 95% confidence interval does not include 0.



## Discussion

Study 4 examined the effects of temporal focus on intergroup conflict. The hypothesis that Israeli Jews and Arabs would focus more on the past than future was not supported. The hypothesis that participants in the future-focus condition would score higher on group trust and reconciliation than those in the past-focus condition was partially supported. There were cultural differences in the effects of time on intergroup outcomes. Specifically, an interaction between temporal focus and culture was evident for group reconciliation and trust. Israeli-Arabs scored lower on group reconciliation and trust when they were focused on the past than the future. The results of this study suggest that although people share the same environment and life experiences, their cultural identities shape how they perceive and relate to one another and how this is influenced by time perspective.

Overall, participants in the future-focus condition scored higher on empathy than those in the past-focus condition. To further understand the impact of time on intergroup outcomes, the mediating role of internal control on the interaction between time and culture on intergroup outcomes was tested. As expected, internal control mediated the interaction between temporal focus and culture on group empathy; however, in the opposite direction. Specifically, Israeli-Arabs scored higher on empathy in the future than past condition, but this effect was due to them being lower in internal control. In other words, Israeli-Arabs who are focused on the future score higher on empathy because they have lower internal control, which may be a result of social conditions cultural norms and beliefs, or a combination of these factors. This suggests that solutions that might move one cultural group towards more positive intergroup relationships, that is, encouraging future-focus, may not work for the group with whom they may be in conflict.

The path to positive group outcomes between conflicting groups is thus complex, and requires careful consideration of temporal thoughts and unique cultural experiences.

Although the experimental manipulation of time yields new and important information about the effects of time and culture on intergroup outcomes, it is important to note the limitations of this measurement. The Hebrew version of the manipulation varied between the past and future conditions<sup>1</sup>. Specifically, participants were to describe past events that influence them in the past condition, whereas participants were asked to think about the future and describe where they see themselves in five years from now. The manipulation check verified that participants in the future-focus conditions were more future-focused than those in the past-focused condition. However, the extent to which participants were thinking about the near or distant future cannot be determined. Temporal construal in years, as opposed to days or weeks, is often categorized as the distant future (Trope & Liberman, 2003). With the increase of temporal distance increases, abstraction also increases (Trope & Liberman, 2010). It is possible that the distant future was primed in participants as is common in construal-level experiments. The distant future is associated with abstract rather than concrete thinking. Abstract thinking distances people from the present or “here and now” and allows for the formulation of alternative outcomes that are different from current realities.

---

<sup>1</sup> It is important to note that the materials for this study were translated from English to Hebrew by the research team in Israel. Although Hebrew is the dominant language in higher education in Israel, and students tend to also have a strong hold of the English language, Israeli-Arab participants declared Arabic to be their mother tongue. Some of the concepts related to time, control, and certainty may be understood differently by Arabic speakers, even if they are fluent in Hebrew. The possibility that intergroup relations are primed by delivering the study in Hebrew may exist; however, all academic materials in Israel are delivered in Hebrew. It is vital that language differences be addressed in future research.

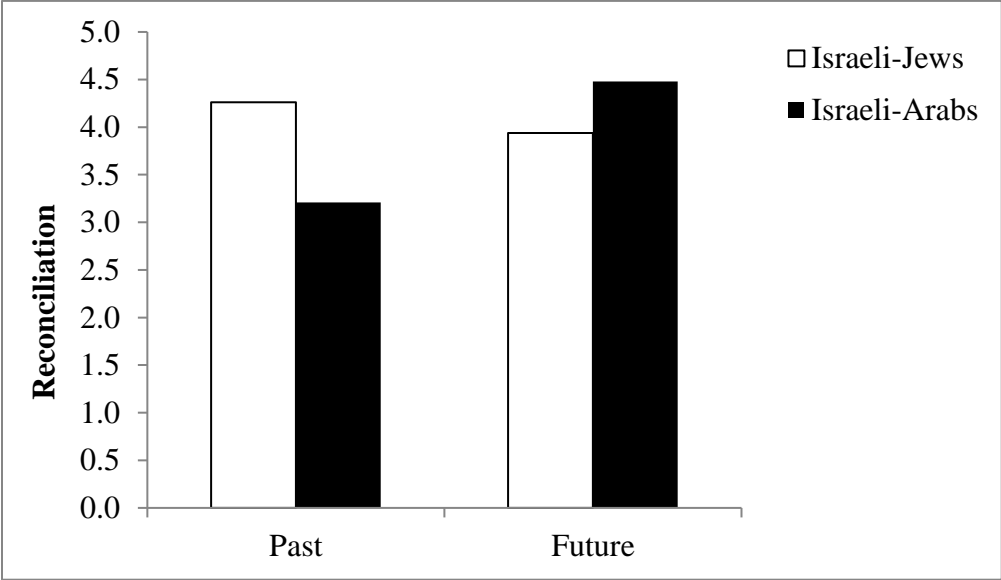


Figure 2. The effects of time and culture on group reconciliation.

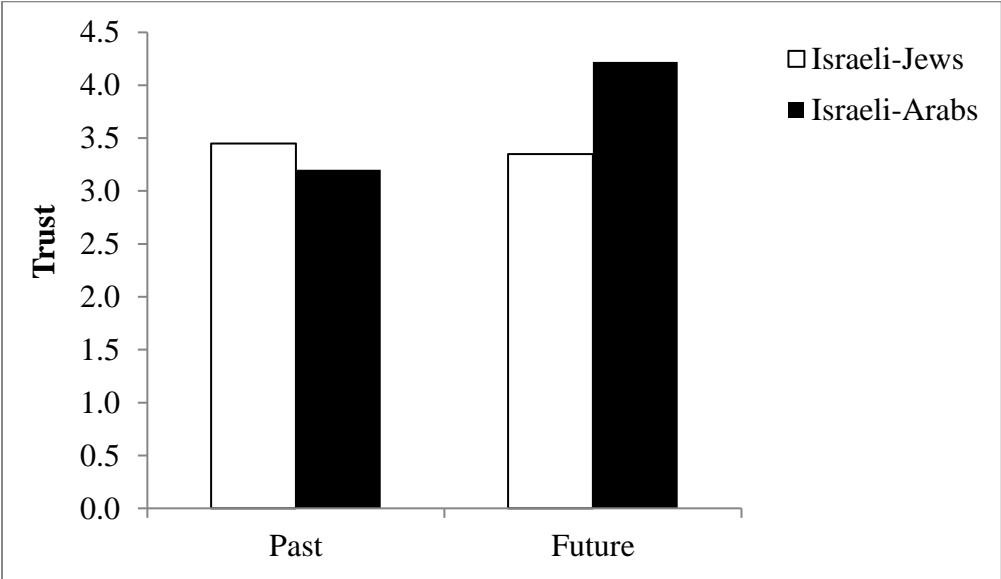
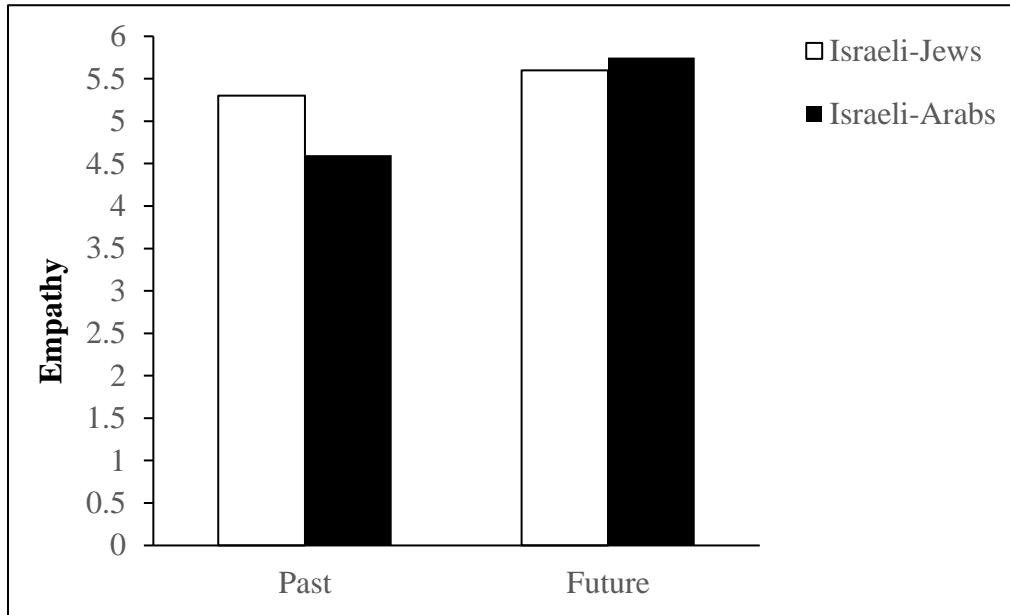
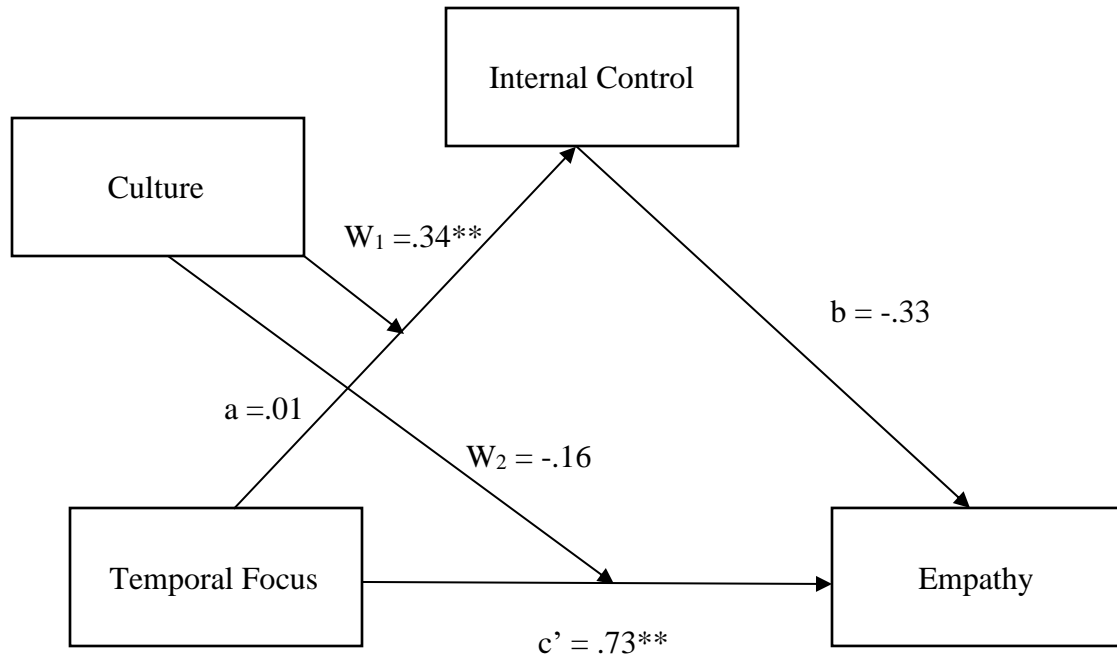


Figure 3. The effects of time and culture on group trust.



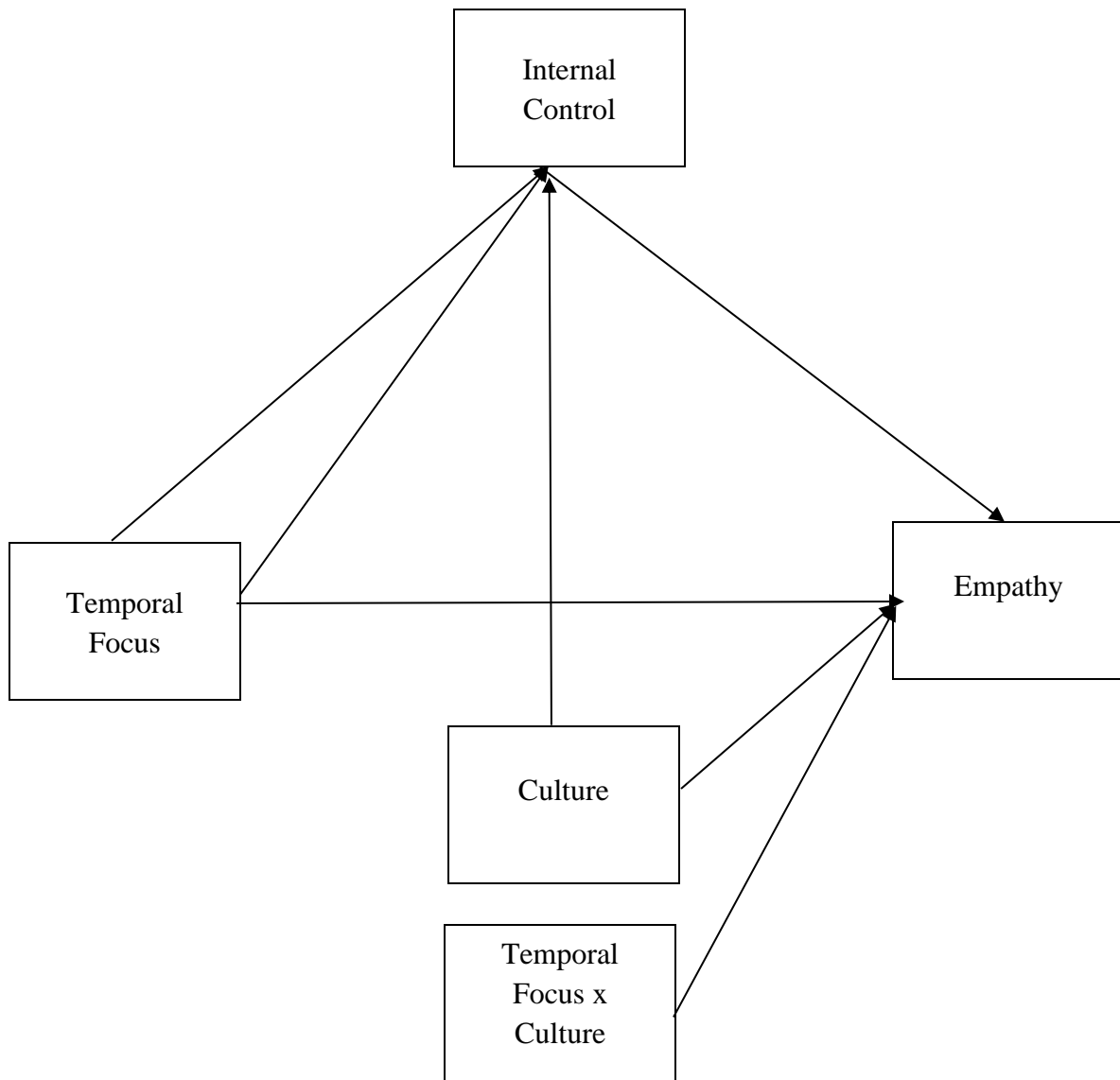
*Figure 4.* Effect of temporal focus and culture on group empathy.

Statistical Diagram



*Figure 5.* The mediating role of internal control on the interaction between temporal focus and culture on group empathy.

Conceptual Diagram



*Figure 6.* The mediating role of internal control on the interaction between temporal focus and culture on group empathy.

## General Discussion

Time is functional because it regulates human experiences externally and internally. Psychological time gives order and weight to important events such as personal histories, interpersonal encounters, achievements, and even death. Individuals cannot control actual or objective time as it continues to tick forwards from sunrise to sundown. However, they can choose which timeframe to focus on in any given moment. There are individual differences in people's tendency to focus on psychological time, and environmental or contextual conditions pull for some temporal foci over others. Facets of subjective time—such as others' perceptions of time, and how it may or may not coincide with one's own perception of time—are also not fully within the control of the individual.

This dissertation examined subjective time or temporal focus from an individual, situational, and cultural perspective. Positive and negative well-being, whether individual or group, was the center of the present investigation utilizing different methods, designs, and populations. Across four studies, temporal focus was examined as an individual difference in two unique cultures, and as a situational and cultural difference variable that shapes intergroup outcomes. Study 1 confirmed the hypothesis that past-focus is primarily related to negative well-being and present-focus is primarily related to positive well-being. Past-focus predicted Uncertainty Avoidance, whereas present-focus predicted Well-Being. The two main factors are constructs with multiple measures. In this North American sample, participants scored higher on past- and future-focus than present-focus, confirming previous findings that people rarely live in the present (Killingsworth & Gilbert, 2010).

The association between temporal focus and well-being may also be impacted by how far or close individuals perceive themselves to be to any given timeframe (Lennings & Burns, 1998).

Construal level theory examines temporal construal, or how near or distant one perceives the future or past, but without truly measuring the present (see Liberman, Trope, McCrea, & Sherman, 2007; Trope & Liberman, 2003; Trope, & Liberman, 2000). The underlying assumption here is that the present does not really exist. As actual time constantly moves forward, every passing minute becomes part of the past. In this regard, there may be a flaw with how the present timeframe is measured and captured. It is possible that individuals have different conceptualizations of the present, how long it remains in cognition, and how it overlaps with the past and future. At the same time, failure to account for the present timeframe is a failure to understand the relationship between present-focus and positive well-being.

The relationship between present-focus and life satisfaction, happiness, self-esteem, self-competence, and self-liking has been replicated across many studies, including the present investigation (Drake, Duncan, Sutherland, Abernethy, & Henry, 2008; Hodara, 2009; Shipp, Edwards, & Lambert, 2009; Tseferidi, Griva, & Anagnostopoulos, 2016; Zimbardo & Boyd, 1999). Promoting a focus on the present seems to be optimal for most; however, it is evident that not all individuals are able to maintain a present-focus at all time. Individuals shift their temporal focus to the past or future, depending on the situation. Experimental evidence on the past timeframe and its relation to well-being, or contextual factors, is lacking in the literature. It is probable that a shift from past-focus to present-focus may help improve well-being, especially in difficult situations that elicit stress and anxiety. An analysis of the association between temporal focus and well-being was conducted, in order to further understand how the variables may be related beyond the benefits between present-focus and well-being.

Two important concepts emerged from this analysis: control and uncertainty. Although uncertainty was related to past-focus, it was unclear whether uncertain situations affect past-



focus or vice versa. Study 2 examined the effects of certainty (i.e., positive, negative, and uncertainty) and control on temporal focus, but the hypothesis that lack of certainty results in greater past-focus was not supported. However, past-focus was related to reported conflict. Specifically, higher reports of conflict were associated with greater past-focus. The focus on the past during conflict may be due to individuals' attempt to "work through" their negative experiences and cope with the hostile situation. However, engaging in repetitive thoughts, or rumination, about the conflict and its associated trauma may result in negative well-being, based on reliving the trauma and keeping it alive in one's mind.

To study the notion of conflict further, a third investigation was conducted in a region where conflict has persisted for decades: Israel. Study 3 assessed whether differences in temporal focus exist in the Middle East. Cultural differences in temporal focus and the impact they have on human cognition, emotion, and behavior shape how subjective time influences groups. There are cultural differences in the preferences of time perspective (Sircova, van Beek, Osin, Milfont, Fieulaine, Kislali-Erginbilgic, & Zimbardo, 2015). For example, many countries show a preference for positive timeframes (i.e., future, present-hedonistic, and balanced time perspective) over the negative ones (i.e., past-negative and present-fatalistic). Understanding temporal focus as a social-psychological construct will enrich our understanding of human experience, especially those situations that positively and negatively impact well-being. A large-scale study on culture and time across 62 countries (e.g., Africa, Asia, Europe, Latin America, North America, and the Middle East) revealed that cultures with a greater future-focus are more individualistic, more benevolent, and less hierarchical than countries low in future-focus (Ashkanasy, Gupta, Mayfield, & Trevor-Roberts, 2004).

In Study 3, the hypothesis that Israelis will score higher on past-focus relative to present- or future-focus was confirmed. It was also hypothesized that past-focus would contribute to poorer intergroup outcomes, namely lower intergroup trust, empathy, identification, and reconciliation. However, past-focus and future-focus predicted only one intergroup outcome: trust. Specifically, lower scores on past-focus and higher scores for future-focus were associated with greater trust. Taking into consideration the Israeli-Palestinian conflict, trust may be the obstacle that blocks both parties from progressing towards an agreeable resolution. Israelis and Palestinians are more likely to accept help from one another if a direct apology is offered and if they scored high on intergroup trust (Halabi, Nadler, & Dovidio, 2013). However, the association between past-focus and future-focus with trust does not determine the causal links that permit for cause-and-effect conclusions. The manipulation of temporal focus to determine its effects on intergroup outcomes may determine how temporal focus can be shifted in order to achieve more positive intergroup outcomes. To further understand the effects of temporal focus on intergroup outcomes, such as trust, a fourth study examined the effects of temporal focus on intergroup outcomes.

Study 4 examined the effects of temporal focus on intergroup outcomes in both Israeli-Jews and Israeli-Arabs. Past-focus and future-focus were experimentally manipulated to test the effects of temporal focus on intergroup relations. Past-focus was expected to result in lower intergroup trust, reconciliation, empathy, and identification than future-focus. Future-focus was expected to result in greater group reconciliation than past-focus. These predictions were not supported, unfortunately. However, interactions were found between temporal focus and culture for group trust and reconciliation. In particular, temporal focus had different effects for Israeli Jews and Israeli Arabs. For group reconciliation, Israeli-Arabs scored lower when focused on the

past compared to the future. In contrast, scores on reconciliation were unaffected by temporal focus for Israeli Jews. For group trust, Israeli-Arabs scored lower on group trust when focused on the past, but once again Israeli-Jews were unaffected by temporal focus. Thus, the intergroup attitudes and emotions of Israeli-Jews were unaffected by temporal focus. In contrast, Israeli-Arabs were less positive when reminded of the past or more positive when thinking about the future. This suggests that political discourse that focuses on the past is unlikely to move these two groups towards reconciliation, since temporal focus in this investigation only affected one group.

It is possible that perceived control may operate at the individual level in a similar way as relative power at the group level. Thus, the impact of reflecting on the past may be different for different groups depending on their relative power. Thus, to further understand the link between culture and intergroup outcomes, the mediational role of internal control on the effect of time and culture on all four group variables was tested. This mediated-moderation analysis was statistically significant for empathy: Israeli-Arabs scored higher on empathy in the future relative to the past condition, but this effect was occurred because of lower levels of internal control. This also suggests that the impact of temporal focus depends on how aspects of the future and past relate to current intergroup conditions. Reminding people of the past, or having them focus on the future, will have different implications, depending on how they see the past and their group's role in the history of intergroup relationships.

Despite these cultural differences, a focus on the past is connected to negative well-being across cultures. There seems to be more of a focus on the past in both North American and Middle Eastern samples than a focus on the future or present. However, it is better for people's well-being to focus on the present, as this predicts positive outcomes such as life satisfaction,

optimism, and happiness. The extent that individuals can shift between timeframes in certain conditions may be dependent on how related they perceive the past, present, and future to be. Whereas past, present, and future are often positively associated in North Americans, this was not the case for Middle-Easterners who showed no statistically significant association between the past and the other two timeframes. Israeli participants saw the past a separate, stand alone, entity from the present and future which they saw as related. The dissociation between the three temporal foci suggests that there is something unique about the past that separates it from experiences of the present and future for Israelis. Further research into how Israelis conceptualize the past and its contribution to their perception, history, and even identity may shape our understanding of how the past may potentially impact their present or future.

Considering the current instability in the region, looking at the effects of the past on intergroup relations provides a small slice of information about how Israelis utilize the past. The inherent uncertainty in the region may lead to a past-focus, which is associated with a host of negative well-being variables, such as stress and depression. A past-focus predicted lower intergroup trust for Israeli-Jews. But, when past-focus and future-focus were manipulated experimentally and examined in two different cultural groups in Israel, the results varied, which underlines the importance of looking at experimental versus correlational studies when seeking to determine casual relationships. In Study 4, Israeli-Arabs scored lower on group trust when they were focused on the past than the future. Furthermore, Israeli-Arabs scored lower on reconciliation when focused on the past than the future. The effect of temporal focus on intergroup outcomes varied by culture despite the shared context, most likely because a shared context does not mean shared experiences or shared interpretations of events.

Residing in similar environments, whether hostile or friendly, may not necessarily result in similar outcomes. This is not entirely surprising since sharing an environment does not mean that groups experience the environment in the same way. In the context of conflict, the groups in conflict are likely to experience the conflict in rather different ways. Israeli-Arabs were lower on intergroup reconciliation and trust when their focus shifted to the past rather than the future. Thus, for both groups, a focus on the future is more promising for better intergroup outcomes. However, this may be particularly true for the Israeli-Arabs. According to Lewin and Lewin (1941), individuals who develop a future temporal focus evaluate adverse situations more positively than those who do not. As a result, they cope better with difficult situations. The importance of focusing on the future, and moving beyond the past, is paramount for any possible reconciliation between Israeli-Jews and Israeli-Arabs.

The mediational analysis may shed some light on why we observed differences between these two groups. In the Israeli context, Israeli-Arabs are a minority group and may perceive that they have less power and control. However, when internal control was introduced as a mediator of the interaction between culture and time on the intergroup variables, it only impacted group empathy. That is, internal control mediated the interaction between temporal focus and culture, which in turn influenced group empathy. The differential impact of time on the two groups on empathy was evident because of lower levels of internal control among the Israeli-Arabs, relative to the Israeli-Jews. Israeli-Arabs scored higher on empathy in the future than the past conditions because their internal control was low. Internal locus of control does not benefit all groups equally, and may even hinder relational outcomes for those who score higher on external locus of control. Exerting personal control in stressful situations like during a conflict is not perceived to be beneficial in collectivistic cultures (Cheng, Cheung, Chio, & Chan, 2013). Cultural

differences in personal control may vary depending on cultural self-construal (Markus & Kitayama, 1999). In collectivistic societies, relinquishing personal control facilitates attainment of communal goals (Yamaguchi, 2001). In Israeli society, Israeli-Jews tend to be individualistic and are expected to value personal control, whereas Israeli-Arabs tend to be more collectivistic and are expected to put less emphasis on personal control (Sagy, Orr, Bar-on, & Awwad, 2001). Thus, in addition to adopting a future-focus, cultural differences in power and orientation may be useful considerations when devising strategies for reducing the animosity between the two sides and bringing them closer together.

Adopting a future temporal focus can serve as a resource for community-building and improving intergroup relations including conflict (Cohen & Insko, 2008; Morselli, 2013). Study 4 illustrated that greater future-focus is associated with positive group outcomes. These findings may be specific to the setting and cultures where Study 4 took place. To better understand whether future-focus results in positive group outcomes, cultural histories and present realities must be considered. It does suggest, however, that groups should shift from a past-focus to a future-focus in order to reduce conflict and improve group relations (Fisher, Ury, & Patton, 2011). A focus on future common goals and cooperation, rather than past transgressions, may result in positive intergroup relations.

### **Limitations and Future Directions**

Temporal focus is an individual difference variable that predicts well-being and varies depending on the situation. The strengths of the present research are its various methods and populations. This program of research included both an experimental and correlational research designs in examining temporal focus, which is was studied as both an individual difference variable and a situational variable. Temporal focus is a predictive variable of positive and

negative well-being, and an independent variable that was manipulated to examine its effect on intergroup relations. Both questionnaires measuring various well-being variables and scenario-based measuring control and uncertainty were used to assess temporal focus, well-being, and intergroup relations. Uncertainty and control were examined through self-report, experimental manipulation, and as a preexisting situational variable. Oftentimes uncertainty and conflict are measured using established scales, and rarely do researchers visit settings where uncertainty and conflict already exist.

Although this research has many meaningful strengths, it is not without limitations. The uncertainty manipulation in Study 2 appears to have been successful, but it may have primed participants with a future-focus. Asking undergraduates to think about their job prospects after graduation requires them to shift their focus to the future. For this reason, the manipulation of control and uncertainty may have not resulted in the predicted past-focus. Another explanation for why study 2 may have yielded non-significant results is that participants may have excluded themselves as members of the student population when threats to economic and financial certainty were presented. The uncertainty manipulation referred to students as a group and not specifically to the participants as individuals who may or may not have been experiencing economic uncertainty. In Study 4, past-focus and future-focus were manipulated in order to determine their effect on intergroup outcomes. However, we did not manipulate present-focus and this may be a helpful extension, as present-focus relates to many positive well-being variables. Lastly, the materials for Studies 3 and 4 were only translated to Hebrew and not Arabic. Although Hebrew is the dominant language in academic institutions, this meant that our Arab participants did not complete the studies in their mother tongue. In addition, using Hebrew may also have made them more aware of intergroup dynamics.

Language and cultural factors may also have contributed to the low alpha scores for some scales (e.g., chance subscale of the multidimensional locus of control scale, Studies 3 and 4). A low alpha may indicate that the scale is not appropriate or relevant for the culture under study. In the future, alternative measures should be used that are more applicable to the population under investigation. The results from scales that produce low alphas should be interpreted cautiously. In addition, the sample sizes used in Studies 3 and 4 are not particularly large and may not allow for an effect to be detected due to reduced power. In Study 1, the findings that past-focus predicted Uncertainty Avoidance and present-focus predicted Well-Being were retained at the .001 alpha cutoff. Likewise, the interaction effects between time and culture on reconciliation in Study 4 was retained at .001 alpha cutoff. In order to successfully replicate the results of studies 3 and 4, larger samples would need to be recruited to avoid the problems associated with underpowered studies (Bakker, van Dijk, & Wicherts, 2012). An appropriately powered replication will decrease the likelihood of false positives, reduce the likelihood of inflated effect size estimates, and increase the likelihood of replication (Anderson, Kelley, & Maxwell, 2017). In addition, testing the TFI in different settings and populations would improve our understanding of how the measure operates, what kind of test-retest reliabilities it produces, and what changes may or may not be evident when the three temporal foci are measured over time.

To better understand the association between temporal-focus and well-being, it may be informative to examine different methods of measurement. For example, individuals can shift their temporal focus, and these fluctuations between timeframes may indicate how individuals respond to specific situations over time. A daily diary study recording significant events and corresponding temporal focus would shed light on these daily fluctuations in temporal focus. For example, Rush and Grouzet (2012) conducted a 14-day daily diary study that examined the



association between temporal focus and well-being. The results revealed that people do fluctuate in their thinking about time, over time. Furthermore, similar associations between psychological well-being and temporal focus were found in previous studies. Specifically, psychological well-being was positively related to present-focus and negatively related to past-focus, but not related to future-focus. These shifts in temporal focus may be functional: people may focus on the future when engaging in planning or seeking motivation, and focus on the past when coping with an unpleasant present. Using this approach, temporal focus could be tracked along with significant life events to study situations that lack certainty and control.

In the future, it may also be beneficial to explore the connection between temporal distance, physical distance, and social distance in the Middle East. Although Israeli-Jews and Israeli-Arabs live in close proximity to each other, one group may feel that the other is less familiar and similar to oneself (i.e., a large social distance). Orienting Israelis towards the future while reducing social distance, or the distinction between self and other, may be the key to improving intergroup relations. As long as both groups adhere to an “us” versus “them” division that facilitates social distance, there may be little improvement in intergroup relations and reconciliation regardless of temporal focus. Utilizing the intergroup contact hypothesis (Allport, 1954), increasing similarity and attraction between groups through cooperation, common goals, and institutional or governmental support may yield positive outcomes that may reduce large social distance. Unpacking the past is paramount for understanding the self and making sense of difficult situations like perpetuating conflict, which may be accompanied by a level of uncertainty and lack of control. However, shifting focus from the past to the present or future may be beneficial for improving well-being and group outcomes in certain conditions.

## References

- Abramson, L. Y., Seligman, M. E., & Teasdale, J. D. (1978). Learned helplessness in humans: Critique and reformulation. *Journal of Abnormal Psychology, 87*(1), 49-74.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0021-843X.87.1.49>
- Abu-Nimer, M. (2003). *Nonviolence and Peace Building in Islam: Theory and Practice*.  
Gainesville, FL: University Press of Florida.
- Ackermann, A. (1994). Reconciliation as a peace-building process in post-war Europe: The Franco-German case. *Peace & Change, 19*, 229–250.
- Ackermann, A. (2009). Reconciliation as a Peace-building Process in Postwar Europe. *Peace & Change, 19*, 229-250. Doi: 10.1111/j.1468-0130.1994.tb00609.x.
- Adams, J., & Nettle, D. (2009). Time perspective, personality and smoking, body mass, and physical activity: An empirical study. *British Journal of Health Psychology, 14*(1), 83-105.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1348/135910708X299664>
- Addis, D. R., Hach, S., & Tippett, L. J. (2016). Do strategic processes contribute to the specificity of future simulation in depression? *British Journal of Clinical Psychology, 55*(2), 167-186. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/bjc.12103>
- Allemand, M., Hill, P. L., & Lehmann, R. (2015). Divorce and personality development across middle adulthood. *Personal Relationships, 22*(1), 122-137.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/pere.12067>
- Allemand, M., Zimprich, D., & Hertzog, C. (2007). Cross-sectional age differences and longitudinal age changes of personality in middle adulthood and old age. *Journal of Personality, 75*(2), 323-358. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/j.1467-6494.2006.00441.x>

- Allen, T. H., & Berkos, K. M. (2005). Ruminating about symbolic conflict through imagined interactions. *Imagination, Cognition and Personality*, 25(4), 307-320.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2190/F760-0671-2402-K65N>
- Allport, G. W. (1954). *The nature of prejudice* Addison-Wesley, Oxford. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/615267598?accountid=15182>
- Anagnostopoulos, F., & Griva, F. (2012). Exploring time perspective in Greek young adults: Validation of the zimbaro time perspective inventory and relationships with mental health indicators. *Social Indicators Research*, 106(1), 41-59.  
doi:<http://dx.doi.org/10.1007/s11205-011-9792-y>
- Andersen, S. M., & Lyon, J. E. (1987). Anticipating undesired outcomes: The role of outcome certainty in the onset of depressive affect. *Journal of Experimental Social Psychology*, 23(5), 428-443. doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/0022-1031\(87\)90039-4](http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/0022-1031(87)90039-4)
- Anderson, S. F., Kelley, K., & Maxwell, S. E. (2017). Sample-size planning for more accurate statistical power: A method adjusting sample effect sizes for publication bias and uncertainty. *Psychological Science*, 28(11), 1547-1562.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0956797617723724>
- Andrighetto, L., Halabi, S., & Nadler, A. (2017). Fostering trust and forgiveness through the acknowledgment of others' past victimization. *Journal of Social and Political Psychology*, 5(2), 651-664. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.5964/jspp.v5i2.728>

- Aron, A., Aron, E. N., & Smollan, D. (1992). Inclusion of other in the self scale and the structure of interpersonal closeness. *Journal of Personality and Social Psychology*, 63(4), 596-612.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.63.4.596>
- Ashforth, B. E., & Mael, F. (1989). Social identity theory and the organization. *The Academy of Management Review*, 14(1), 20-39.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2307/258189>
- Ashkanasy, N., Gupta, V., Mayfield, M., & Trevor-Roberts, E. (2004). Future orientation. In R. House, P. Changes, M. Javidan, P. Dorfman, & W. Gupta (Eds.), *Culture, leadership, and organizations: The GLOBE study of 62 societies* (pp. 282-342). Thousand Oaks, CA: SAGE.
- Åström E., Wiberg B., Sircova A., Wiberg M., & Carelli M.G. (2014). Insights into features of anxiety through multiple aspects of psychological time. *Journal of Intergroup Psychology Therapeutics*, 2(3), 1-7. doi:10.7243/2054-4723-2-3.
- Atak, H., Syed, M., & Çok, F. (2017). Tamamlanma ?htiyac? ölçe?I-k?sa formu'nun türk üniversite ö?rencilerinde psikometrik özelliklerinin ?ncelenmesi. *Nöropsikiyatri Arşivi*, 54(2), 175-182. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.5152/npa.2017.12707>
- Atkinson, J. W. (1964). *An introduction to motivation* Van Nostrand, Oxford. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/615433022?accountid=15182>
- Auerbach, Y. (2016). Lack of trust as a barrier to reconciliation in the israeli-palestinian conflict: Attitudes of israeli (jewish) elite members toward reconciliation with the palestinians. In I. Alon, & D. Bar-Tal (Eds.), *The role of trust in conflict resolution: The israeli-palestinian case and beyond; the role of trust in conflict resolution: The israeli-palestinian case and*

- beyond* (pp. 241-257, Chapter xxvi, 345 Pages) Springer International Publishing, Cham.  
doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-3-319-43355-4\\_13](http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-3-319-43355-4_13) Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1910785222?accountid=15182>
- Ayalon, A., & Sagy, S. (2011). Acculturation attitudes and perceptions of collective narratives: The case of israeli arab youth. *Youth & Society*, 43(3), 819-844.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0044118X11411150>
- Bakker, M., van Dijk, A., & Wicherts, J. M. (2012). The rules of the game called psychological science. *Perspectives on Psychological Science*, 7(6), 543-554.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/1745691612459060>
- Bal, M., & van den Bos. K. (2012). Blaming for a better future: Future orientation and associated intolerance of personal uncertainty lead to harsher reactions toward innocent victims. *Personality and Social Psychology Bulletin*, 38(7), 835-844.  
doi:<http://dx.doi.org/10.1177/0146167212442970>
- Balcielis, E., Cole, S., Chelberg, M. B., & Alicke, M. (2013). Searching out the ideal: Awareness of ideal body standards predicts lower global self-esteem in women. *Self and Identity*, 12(1), 99-113.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/15298868.2011.639549>
- Bar-Tal, D. (2000). From intractable conflict through conflict resolution to reconciliation: Psychological analysis. *Political Psychology*, 21(2), 351-365.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/0162-895X.00192>
- Bar-Tal, D. (2009). Reconciliation as a foundation of culture of peace. In J. de Rivera (Ed.), *Handbook on building cultures of peace; handbook on building cultures of peace* (pp. 363-

377, Chapter xviii, 407 Pages) Springer Science + Business Media, New York, NY.  
doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-0-387-09575-2\\_25](http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-0-387-09575-2_25) Retrieved  
from [http://ezproxy.library.yorku.ca/login?url=https://search-proquest-  
com.ezproxy.library.yorku.ca/docview/621632000?accountid=15182](http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/621632000?accountid=15182)

Bar-Tal, D. (2010). Culture of conflict: Evolvement, institutionalization, and consequences. In R. Schwarzer, & P. A. Frensch (Eds.), *Personality, human development, and culture: International perspectives on psychological science, vol 2; personality, human development, and culture: International perspectives on psychological science, vol 2* (pp. 183-198, Chapter xvi, 309 Pages) Psychology Press, New York, NY. Retrieved from [http://ezproxy.library.yorku.ca/login?url=https://search-proquest-  
com.ezproxy.library.yorku.ca/docview/755394763?accountid=15182](http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/755394763?accountid=15182)

Bar-Tal, D. (2013). *Intractable conflicts: Socio-psychological foundations and dynamics* Cambridge University Press, New York, NY. Retrieved from [http://ezproxy.library.yorku.ca/login?url=https://search-proquest-  
com.ezproxy.library.yorku.ca/docview/1348796003?accountid=15182](http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1348796003?accountid=15182)

Barber, L. K., Munz, D. C., Bagsby, P. G., & Grawitch, M. J. (2009). When does time perspective matter? self-control as a moderator between time perspective and academic achievement. *Personality and Individual Differences, 46*(2), 250-253.  
doi:<http://dx.doi.org/10.1016/j.paid.2008.10.007>

Basri, C. (2002) Jewish refugees from arab countries: An examination of legal rights—A case study of the human rights violations of Iraqi Jews. *The Fordham International Law Journal, 26*, 656-720.

- Batcho, K. I. (1995). Nostalgia: A psychological perspective. *Perceptual and Motor Skills*, 80(1), 131-143. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2466/pms.1995.80.1.131>
- Baum, A. (1990). Stress, intrusive imagery, and chronic distress. *Health Psychology*, 9(6), 653-675. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0278-6133.9.6.653>
- Baumeister, R. F., Schmeichel, B. J., & Vohs, K. D. (2007). Self-regulation and the executive function: The self as controlling agent. In A. W. Kruglanski, & E. T. Higgins (Eds.), *2nd ed.; social psychology: Handbook of basic principles (2nd ed.)* (2nd ed. ed., pp. 516-539, Chapter xiii, 1010 Pages) Guilford Press, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/621812757?accountid=15182>
- Baumeister, R. F., & Vohs, K. D. (2007). Self-regulation, ego depletion, and motivation. *Social and Personality Psychology Compass*, 1(1), 115-128. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/j.1751-9004.2007.00001.x>
- Beck, A. T., & Steer, R. A. (1984). Internal consistencies of the original and revised beck depression inventory. *Journal of Clinical Psychology*, 40(6), 1365-1367. doi:3.0.CO;2-D" TARGET="\_blank">[http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/1097-4679\(198411\)40:6<1365::AID-JCLP2270400615>3.0.CO;2-D](http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/1097-4679(198411)40:6<1365::AID-JCLP2270400615>3.0.CO;2-D)
- Beck, A.T., Steer, R.A., & Brown, G.K. (1996). *Manual for the Beck Depression Inventory-II*. San Antonio, TX: Psychological Corporation. Belda, C. M. (1999). *Individualism vs. collectivism in the working models of hispanic-american adolescents: How cultures of origin and cultures of residence interact* (Order No. AAM9918113). Available from PsycINFO. (619436185; 1999-95014-260). Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619436185?accountid=15182>

Berry, J. W. (1997). Immigration, acculturation, and adaptation. *Applied Psychology: An International Review*, 46(1), 5-34.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/026999497378467>

Berry, J. W. (1998). Acculturation and health: Theory and research. In S. S. Kazarian, & D. R. Evans (Eds.), *Cultural clinical psychology: Theory, research, and practice; cultural clinical psychology: Theory, research, and practice* (pp. 39-57, Chapter xii, 410 Pages) Oxford University Press, New York, NY. Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619350530?accountid=15182>

Berry, J.W., Kim, U., Minde, T., & Mok, D. (1987). Comparative studies of acculturative stress. *International Migration Review*, 21, 491-511.

Berry, J. W., & Sam, D. L. (2013). Accommodating cultural diversity and achieving equity: An introduction to psychological dimensions of multiculturalism. *European Psychologist*, 18(3), 151-157. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1027/1016-9040/a000167>

Binder, C. C. (2018). Redistribution and the individualism–collectivism dimension of culture. *Social Indicators Research*, doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s11205-018-1964-6>

Birth, K. (2006). Past times: Temporal structuring of history and memory. *Ethos*, 34(2), 192-210. doi:<http://dx.doi.org/10.1525/eth.2006.34.2.192>



- Bolotova, A. K., & Hachaturova, M. R. (2013). The role of time perspective in coping behavior. *Psychology in Russia: State of the Art*, 6(3), 120-131.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.11621/pir.2013.0311>
- Boniwell, I. (2009). Perspectives on time. In S. J. Lopez, & C. R. Snyder (Eds.), *2nd ed.; oxford handbook of positive psychology (2nd ed.)* (2nd ed. ed., pp. 295-302, Chapter xxxi, 709 Pages) Oxford University Press, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/621912077?accountid=15182>
- Botvinick, M. M., Braver, T. S., Barch, D. M., Carter, C. S., & Cohen, J. D. (2001). Conflict monitoring and cognitive control. *Psychological Review*, 108(3), 624-652.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0033-295X.108.3.624>
- Boniwell, I., & Zimbardo, P. G. (2004). Balancing time perspective in pursuit of optimal functioning. In P. A. Linley, & S. Joseph (Eds.), *Positive psychology in practice; positive psychology in practice* (pp. 165-178, Chapter xxii, 770 Pages) John Wiley & Sons Inc, Hoboken, NJ. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/620586671?accountid=15182>
- Boyle, J. P. (2015). *Intergroup reconciliation in post-conflict contexts: The juxtaposition of national identification and empathy* (Order No. AAI3626183). Available from PsycINFO. (1676368645; 2015-99081-042). Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1676368645?accountid=15182>

- Bradbury, J. (2012). Narrative possibilities of the past for the future: Nostalgia and hope. *Peace and Conflict: Journal of Peace Psychology, 18*(3), 341-350.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/a0029069>
- Branscombe, N. R., & Wann, D. L. (1994). Collective self-esteem consequences of outgroup derogation when a valued social identity is on trial. *European Journal of Social Psychology, 24*(6), 641-657.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/ejsp.2420240603f>
- Breesch-Grommen, R. (1975). Time perspective in adulthood and old age: Theoretical and empirical contributions. *Nederlands Tijdschrift Voor Gerontologie, 6*(2), 90-105. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/616259070?accountid=15182>
- Brems, C., & Lloyd, P. (1995). Validation of the MMPI—2 low self-esteem content scale. *Journal of Personality Assessment, 65*(3), 550-556.  
doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1207/s15327752jpa6503\\_13](http://dx.doi.org.ezproxy.library.yorku.ca/10.1207/s15327752jpa6503_13)
- Brewer, M. B., & Silver, M. D. (2000). Group distinctiveness, social identification, and collective mobilization. In S. Stryker, T. J. Owens & R. W. White (Eds.), *Self, identity, and social movements; self, identity, and social movements* (pp. 153-171, Chapter x, 370 Pages) University of Minnesota Press, Minneapolis, MN. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619471249?accountid=15182>
- Broomhall, A. G., Phillips, W. J., Hine, D. W., & Loi, N. M. (2017). Upward counterfactual thinking and depression: A meta-analysis. *Clinical Psychology Review, 55*, 56-73.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.cpr.2017.04.010>

- Brown, A. D., Dorfman, M. L., Marmar, C. R., & Bryant, R. A. (2012). The impact of perceived self-efficacy on mental time travel and social problem solving. *Consciousness and Cognition: An International Journal*, 21(1), 299-306.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.concog.2011.09.023>
- Brülde, B. (2007). Happiness theories of the good life. *Journal of Happiness Studies: An Interdisciplinary Forum on Subjective Well-being*, 8(1), 15-49.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s10902-006-9003-8>
- Busseri, M. A., Sadava, S. W., & Decourville, N. (2007). A hybrid model for research on subjective well-being: Examining common- and component-specific sources of variance in life satisfaction, positive affect, and negative affect. *Social Indicators Research*, 83(3), 413-445. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s11205-006-9028-8>
- Cacioppo, J. T., & Petty, R. E. (1982). The need for cognition. *Journal of Personality and Social Psychology*, 42(1), 116-131. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.42.1.116>
- Campbell, J. (2000). The dangerous present: Bridging past and future (a fictional account of two moments in a group). *Group Analysis*, 33(2), 179-191.  
doi:<http://dx.doi.org/10.1177/05333160022077263>
- Carr, K., Schrodtt, P., & Ledbetter, A. M. (2012). Rumination, conflict intensity, and perceived resolvability as predictors of motivation and likelihood of continuing serial arguments. *Western Journal of Communication*, 76(5), 480-502.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/10570314.2012.689086>

- Carver, C. S., Scheier, M. F., & Segerstrom, S. C. (2010). Optimism. *Clinical Psychology Review, 30*(7), 879-889.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.cpr.2010.01.006>
- Cehajic, S., Brown, R., & Castano, E. (2008). Forgive and forget? antecedents and consequences of intergroup forgiveness in bosnia and herzegovina. *Political Psychology, 29*(3), 351-367.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/j.1467-9221.2008.00634.x>
- Chang, E. C., & Sanna, L. J. (2001). Optimism, pessimism, and positive and negative affectivity in middle-aged adults: A test of a cognitive-affective model of psychological adjustment. *Psychology and Aging, 16*(3), 524-531.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0882-7974.16.3.524>
- Chen, F. F., & West, S. G. (2008). Measuring individualism and collectivism: The importance of considering differential components, reference groups, and measurement invariance. *Journal of Research in Personality, 42*(2), 259-294.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.jrp.2007.05.006>
- Cheng, C., Cheung, S. F., Chio, J. H., & Chan, M. S. (2013). Cultural meaning of perceived control: A meta-analysis of locus of control and psychological symptoms across 18 cultural regions. *Psychological Bulletin, 139*(1), 152-188.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/a0028596>
- Cheung, W., Wildschut, T., Sedikides, C., Hepper, E. G., Arndt, J., & Vingerhoets, A. J. J. M. (2013). Back to the future: Nostalgia increases optimism. *Personality and Social Psychology Bulletin, 39*(11), 1484-1496.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0146167213499187>

- Chiu, C., Hong, Y., & Dweck, C. S. (1997). Lay dispositionism and implicit theories of personality. *Journal of Personality and Social Psychology*, 73(1), 19-30.  
doi:<http://dx.doi.org/10.1037/0022-3514.73.1.19>
- Cohen, T. R. (2008). *The effects of empathy on intergroup conflict and aggression: Examining the dual roles of empathy in fostering positive and negative intergroup relations* (Order No. AAI3304253). Available from PsycINFO. (621749231; 2008-99200-018). Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/621749231?accountid=15182>
- Cohen, T. R., & Insko, C. A. (2008). War and peace: Possible approaches to reducing intergroup conflict. *Perspectives on Psychological Science*, 3(2), 87-93.  
doi:<http://dx.doi.org/10.1111/j.1745-6916.2008.00066.x>
- Cohen, S., Kamarck, T., & Mermelstein, R. (1983). A global measure of perceived stress. *Journal of Health and Social Behavior*, 24(4), 385-396.  
doi:<http://dx.doi.org/10.2307/2136404>
- Coleman, P. G. (1999). Creating a life story: The task of reconciliation. *The Gerontologist*, 39, 133-139.
- Colman, W. (2008). On being, knowing and having a self. *The Journal of Analytical Psychology*, 53(3), 351-366. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/j.1468-5922.2008.00731.x>
- Conway, M. A. (1996). Autobiographical memory. In E. L. Bjork, & R. A. Bjork (Eds.), *Memory; memory* (pp. 165-194, Chapter xxii, 586 Pages) Academic Press, San Diego, CA.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/B978-012102570-0/50008-2>

Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/618878873?accountid=15182>

Conway, M. A. (2008). Exploring episodic memory. In E. Dere, A. Easton, L. Nadel & J. P.

Huston (Eds.), *Handbook of episodic memory; handbook of episodic memory* (pp. 19-29, Chapter xiii, 615 Pages) Elsevier, Amsterdam.

doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/S1569-7339\(08\)00202-6](http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/S1569-7339(08)00202-6) Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1611623867?accountid=15182>

Cooke, P. J., Melchert, T. P., & Connor, K. (2016). Measuring well-being: A review of instruments. *The Counseling Psychologist, 44*(5), 730-757.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0011000016633507>

Cooper, H., Okamura, L., & McNeil, P. (1995). Situation and personality correlates of psychological well-being social activity and personal control. *Journal of Research in Personality, 29*(4), 395-417.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1006/jrpe.1995.1023>

Crocker, J., & Luhtanen, R. (1990). Collective self-esteem and ingroup bias. *Journal of Personality and Social Psychology, 58*(1), 60-67.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.58.1.60>

D'Argembeau, A., & Van, d. L. (2004). Phenomenal characteristics associated with projecting oneself back into the past and forward into the future: Influence of valence and temporal distance. *Consciousness and Cognition: An International Journal, 13*(4), 844-858.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.concog.2004.07.007>

- Davis, M. H. (1983). Measuring individual differences in empathy: Evidence for a multidimensional approach. *Journal of Personality and Social Psychology*, 44(1), 113-126.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.44.1.113>
- De Cremer, D., & Oosterwegel, A. (1999). Collective self-esteem, personal self-esteem, and collective efficacy in in-group and outgroup evaluations. *Current Psychology: A Journal for Diverse Perspectives on Diverse Psychological Issues*, 18(4), 326-339.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s12144-999-1007-1>
- De Dreu, Carsten K. W., Greer, L. L., Handgra, M. J. J., Shalvi, S., Van Kleef, G. A., Baas, M., Feith, S. W. W. (2010). The neuropeptide oxytocin regulates parochial altruism intergroup conflict among humans. *Science*, 328(5984), 1408-1411.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1126/science.1189047>
- de Ridder, Denise T. D., Lensvelt-Mulders, G., Finkenauer, C., Stok, F. M., & Baumeister, R. F. (2012). Taking stock of self-control: A meta-analysis of how trait self-control relates to a wide range of behaviors. *Personality and Social Psychology Review*, 16(1), 76-99.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/1088868311418749>
- Devitt, A. L., & Addis, D. R. (2016). Bidirectional interactions between memory and imagination. In K. Michaelian, S. B. Klein & K. K. Szpunar (Eds.), *Seeing the future: Theoretical perspectives on future-oriented mental time travel; seeing the future: Theoretical perspectives on future-oriented mental time travel* (pp. 93-115, Chapter viii, 449 Pages) Oxford University Press, New York, NY.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1093/acprof:oso/9780190241537.003.0005>  
Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1845628905?accountid=15182>

- Deaux, K. (1996). Social identification. In E. T. Higgins, & A. W. Kruglanski (Eds.), *Social psychology: Handbook of basic principles; social psychology: Handbook of basic principles* (pp. 777-798, Chapter x, 948 Pages) Guilford Press, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619020553?accountid=15182>
- DeGenova, M. K. (1993). Reflections of the past: New variables affecting life satisfaction in later life. *Educational Gerontology, 19*(3), 191-201.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/0360127930190301>
- Deutsch, M., & Krauss, R. M. (1960). The effect of threat upon interpersonal bargaining. *The Journal of Abnormal and Social Psychology, 61*(2), 181-189.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/h0042589>
- DiStefano, C., Zhu, M., & Mindrila, D. (2009). Understanding and Using Factor Scores: Considerations for the Applied Researcher. *Practical Assessment, Research & Evaluation, 14*, 1-11.
- Diener, E. (1984). Subjective well-being. *Psychological Bulletin, 95*(3), 542-575.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0033-2909.95.3.542>
- Diener, E. (2009). Subjective well-being. In E. Diener (Ed.), *The science of well-being: The collected works of ed diener; the science of well-being: The collected works of ed diener* (pp. 11-58, Chapter xi, 271 Pages) Springer Science + Business Media, New York, NY.  
doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-90-481-2350-6\\_2](http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-90-481-2350-6_2) Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/622031321?accountid=15182>



Diener, E., & Diener, M. (1995). Cross-cultural correlates of life satisfaction and self-esteem. *Journal of Personality and Social Psychology*, 68(4), 653-663.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.68.4.653>

Diener, E., Emmons, R. A., Larsen, R. J., & Griffin, S. (1985). The satisfaction with life scale. *Journal of Personality Assessment*, 49(1), 71-75.

doi:[http://dx.doi.org/10.1207/s15327752jpa4901\\_13](http://dx.doi.org/10.1207/s15327752jpa4901_13)

Diener, E., & Lucas, R. E. (1999). Personality and subjective well-being. In D. Kahneman, E. Diener & N. Schwarz (Eds.), *Well-being: The foundations of hedonic psychology; well-being: The foundations of hedonic psychology* (pp. 213-229, Chapter xii, 593 Pages)

Russell Sage Foundation, New York, NY. Retrieved from

[http://ezproxy.library.yorku.ca/login?url=https://search-proquest-](http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619395558?accountid=15182)

[com.ezproxy.library.yorku.ca/docview/619395558?accountid=15182](http://ezproxy.library.yorku.ca/docview/619395558?accountid=15182)

Diener, E., & Seligman, M. E. P. (2009). Beyond money: Toward an economy of well-being. In E. Diener (Ed.), *The science of well-being: The collected works of ed diener; the science of well-being: The collected works of ed diener* (pp. 201-265, Chapter xi, 271 Pages) Springer Science + Business Media, New York, NY.

doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-90-481-2350-6\\_9](http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-90-481-2350-6_9) Retrieved

from [http://ezproxy.library.yorku.ca/login?url=https://search-proquest-](http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/622028113?accountid=15182)

[com.ezproxy.library.yorku.ca/docview/622028113?accountid=15182](http://ezproxy.library.yorku.ca/docview/622028113?accountid=15182)

Diener, E., Suh, E. M., Lucas, R. E., & Smith, H. L. (1999). Subjective well-being: Three decades of progress. *Psychological Bulletin*, 125(2), 276-302.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0033-2909.125.2.276>

- Dirks, K. T., & Ferrin, D. L. (2001). The role of trust in organizational settings. *Organization Science*, 12(4), 450-467.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1287/orsc.12.4.450.10640>
- Djarallah, S., & Chorfi, M. S. (2012). The relationship between posttraumatic stress disorder and time perspective. *Arab Journal of Psychiatry*, 23(1), 80-86. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/1151702128?accountid=15182>
- Dovidio, J. F., Gaertner, S. L., Ditlmann, R. K., & West, T. V. (2012). Intergroup relations in post-conflict contexts: How the past influences the present (and future). In K. J. Jonas, & T. A. Morton (Eds.), *Restoring civil societies: The psychology of intervention and engagement following crisis; restoring civil societies: The psychology of intervention and engagement following crisis* (pp. 135-155, Chapter xx, 303 Pages) Wiley-Blackwell.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/9781118347683.ch8> Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1327071585?accountid=15182>
- Drake, L., Duncan, E., Sutherland, F., Abernethy, C., & Henry, C. (2008). Time perspective and correlates of wellbeing. *Time & Society*, 17(1), 47-61.  
doi:<http://dx.doi.org/10.1177/0961463X07086304>
- Dubow, E., Boxer, P., Huesmann, L., Landau, S., Dvir, S., Shikaki, K., & Ginges, J. (2012). Cumulative effects of exposure to violence on posttraumatic stress in palestinian and israeli youth. *Journal of Clinical Child and Adolescent Psychology*, 41(6), 837-844.  
doi:<http://dx.doi.org/10.1080/15374416.2012.675571>

- Dunkel, C. S., & Weber, J. L. (2010). Using three levels of personality to predict time perspective. *Current Psychology: A Journal for Diverse Perspectives on Diverse Psychological Issues*, 29(2), 95-103.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s12144-010-9074-x>
- Edwards, J. A., & Weary, G. (1998). Antecedents of causal uncertainty and perceived control: A prospective study. *European Journal of Personality*, 12(2), 135-148. doi:3.0.CO;2-Y" TARGET="\_blank">[http://dx.doi.org/10.1002/\(SICI\)1099-0984\(199803/04\)12:2<135::AID-PER301>3.0.CO;2-Y](http://dx.doi.org/10.1002/(SICI)1099-0984(199803/04)12:2<135::AID-PER301>3.0.CO;2-Y)
- Elangovan, A. R., & Shapiro, D. L. (1998). Betrayal of trust in organizations. *The Academy of Management Review*, 23(3), 547-566.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2307/259294>
- Elliott, I., & Coker, S. (2008). Independent self-construal, self-reflection, and self-rumination: A path model for predicting happiness. *Australian Journal of Psychology*, 60(3), 127-134.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/00049530701447368>
- Elliot, A. J., Thrash, T. M., & Murayama, K. (2011). A longitudinal analysis of self-regulation and well-being: Avoidance personal goals, avoidance coping, stress generation, and subjective well-being. *Journal of Personality*, 79(3), 643-674.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/j.1467-6494.2011.00694.x>
- Epstude, K., & Roese, N. J. (2008). The functional theory of counterfactual thinking. *Personality and Social Psychology Review*, 12(2), 168-192.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/1088868308316091>
- Esses, V. M., Haddock, G., & Zanna, M. P. (1993). Values, stereotypes, and emotions as determinants of intergroup attitudes. In D. M. Mackie, & D. L. Hamilton (Eds.), *Affect*,

- cognition, and stereotyping: Interactive processes in group perception; affect, cognition, and stereotyping: Interactive processes in group perception* (pp. 137-166, Chapter xiv, 389 Pages) Academic Press, San Diego, CA. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/618386842?accountid=15182>
- Even-Tzur, E. (2016). "The road to the village": Israeli social unconscious and the palestinian nakba. *International Journal of Applied Psychoanalytic Studies*, 13(4), 305-322. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/aps.1478>
- Ezzati, A., Jiang, J., Katz, M. J., Sliwinski, M. J., Zimmerman, M. E., & Lipton, R. B. (2014). Validation of the perceived stress scale in a community sample of older adults. *International Journal of Geriatric Psychiatry*, 29(6), 645-652. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/gps.4049>
- Fingerman, K. L., & Perlmutter, M. (1995). Future time perspective and life events across adulthood. *Journal of General Psychology*, 122(1), 95-111. doi:<http://dx.doi.org/10.1080/00221309.1995.9921225>
- Fisher, R., Ury, W., & Patton, B. (2011). *Getting to yes: Negotiating agreement without giving in* (3rd ed., rev. ed.). New York: Penguin.
- Fleeson, W. (2001). Toward a structure- and process-integrated view of personality: Traits as density distributions of states. *Journal of Personality and Social Psychology*, 80(6), 1011-1027. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.80.6.1011>
- Folkman, S., Lazarus, R. S., Dunkel-Schetter, C., DeLongis, A., & Gruen, R. J. (1986). Dynamics of a stressful encounter: Cognitive appraisal, coping, and encounter outcomes.

*Journal of Personality and Social Psychology*, 50(5), 992-1003.

doi:<http://dx.doi.org/10.1037/0022-3514.50.5.992>

Förster, J., Higgins, E. T., & Idson, L. C. (1998). Approach and avoidance strength during goal attainment: Regulatory focus and the "goal looms larger" effect. *Journal of Personality and Social Psychology*, 75(5), 1115-1131.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.75.5.1115>

Friedman, W. J. (2005). Developmental and cognitive perspectives on humans' sense of the times of past and future events. *Learning and Motivation*, 36(2), 145-158.

doi:<http://dx.doi.org/10.1016/j.lmot.2005.02.005>

Furler, K., Gomez, V., & Grob, A. (2013). Personality similarity and life satisfaction in couples. *Journal of Research in Personality*, 47(4), 369-375.

doi:<http://dx.doi.org/10.1016/j.jrp.2013.03.002>

Fuxman, S. (2013). *Learning the past, interpreting the present, shaping the future: Israeli adolescents' narratives of the israeli-palestinian conflict* (Order No. AAI3535040).

Available from PsycINFO. (1449311428; 2013-99200-547). Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1449311428?accountid=15182>

Galinsky, A. D., Gilin, D., & Maddux, W. W. (2011). Using both your head and your heart: The role of perspective taking and empathy in resolving social conflict. In J. P. Forgas, A. W. Kruglanski & K. D. Williams (Eds.), *The psychology of social conflict and aggression; the psychology of social conflict and aggression* (pp. 103-118, Chapter xvi, 326 Pages)

Psychology Press, New York, NY. Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/900622510?accountid=15182>

Gardner Feldman, L. (1999). The principle and practice of 'reconciliation' in German foreign policy: Relations with France, Israel, Poland and the Czech Republic. *International Affairs*, 75, 333–356.

Gerbi, D. (2011). Reconciliation with qaddafi: An offer refused. *Jung Journal: Culture & Psyche*, 5(2), 43-70.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1525/jung.2011.5.2.43>

Gilovich, T., & Medvec, V. H. (1995). Some counterfactual determinants of satisfaction and regret. In N. J. Roese, & J. M. Olson (Eds.), *What might have been: The social psychology of counterfactual thinking; what might have been: The social psychology of counterfactual thinking* (pp. 259-282, Chapter xi, 408 Pages) Lawrence Erlbaum Associates, Inc, Hillsdale, NJ. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/618783487?accountid=15182>

Glaesmer, H., Rief, W., Martin, A., Mewes, R., Brähler, E., Zenger, M., & Hinz, A. (2012). Psychometric properties and population-based norms of the life orientation test revised (LOT-R). *British Journal of Health Psychology*, 17(2), 432-445.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/j.2044-8287.2011.02046.x>

Gomez, V., Grob, A., & Orth, U. (2013). The adaptive power of the present: Perceptions of past, present, and future life satisfaction across the life span. *Journal of Research in Personality*, 47(5), 626-633. doi:<http://dx.doi.org/10.1016/j.jrp.2013.06.001>

- Graves, T. D. (1967). Acculturation, access, and alcohol in a tri-ethnic community. *American Anthropologist*, 69(3-4), 306-321.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1525/aa.1967.69.3-4.02a00030>
- Griffin, E., & Wildbur, D. (2016). Effects of time-perspective on well-being, success, and mental health of undergraduates, British Psychological Society's Annual Conference 2016: Research Poster.
- Gutman, Y. (2012). *Past before future memory activism in israel-palestine* (Order No. AAI3495822). Available from PsycINFO. (1284064879; 2012-99230-494). Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1284064879?accountid=15182>
- Györkös, C., Becker, J., Massoudi, K., Antonietti, J., Pocnet, C., de Bruin, G. P., & Rossier, J. (2013). Comparing the horizontal and vertical individualism and collectivism scale and the auckland individualism and collectivism scale in two cultures: Switzerland and south africa. *Cross-Cultural Research: The Journal of Comparative Social Science*, 47(3), 310-331. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/1069397112470371>
- Halabi, S., Nadler, A., & Dovidio, J. F. (2013). Positive responses to intergroup assistance: The roles of apology and trust. *Group Processes & Intergroup Relations*, 16(4), 395-411.  
doi:<http://dx.doi.org/10.1177/1368430212453863>
- Hameiri, B., & Nadler, A. (2017). Looking backward to move forward: Effects of acknowledgment of victimhood on readiness to compromise for peace in the protracted Israeli–Palestinian conflict. *Personality and Social Psychology Bulletin*, 43(4), 555-569.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0146167216689064>

- Hammen, C. (2006). Stress generation in depression: Reflections on origins, research, and future directions. *Journal of Clinical Psychology, 62*(9), 1065-1082.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/jclp.20293>
- Hardisty, D. J., & Pfeffer, J. (2017). Intertemporal uncertainty avoidance: When the future is uncertain, people prefer the present, and when the present is uncertain, people prefer the future. *Management Science, 63*(2), 519-527.  
doi:<http://dx.doi.org/10.1287/mnsc.2015.2349>
- Haselhuhn, M. P., Schweitzer, M. E., Kray, L. J., & Kennedy, J. A. (2017). Perceptions of high integrity can persist after deception: How implicit beliefs moderate trust erosion. *Journal of Business Ethics, 145*(1), 215-225.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s10551-017-3649-5>
- Hayes, A. F. (2012). PROCESS: A versatile computational tool for observed variable mediation, moderation, and conditional process modeling. Retrieved from  
<http://www.afhayes.com/public/process2012.pdf>
- Hayes, S. C., Strosahl, K. D., & Wilson, K. G. (2012). *Acceptance and commitment therapy: The process and practice of mindful change* (2nd ed. ed.) Guilford Press, New York, NY.  
Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/923956961?accountid=15182>
- Hayner, P.B. (1999). In pursuit of justice and reconciliation: Contributions of truth telling. In C. J. Arnson (Ed.), *Comparative peace processes in Latin America* (pp. 363–383). Stanford: Stanford University Press.
- Hazlett, A., Molden, D. C., & Sackett, A. M. (2011). Hoping for the best or preparing for the worst? regulatory focus and preferences for optimism and pessimism in predicting personal



outcomes. *Social Cognition*, 29(1), 74-96.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1521/soco.2011.29.1.74>

Henderson, M. D., & Trope, Y. (2009). The effects of abstraction on integrative agreements: When seeing the forest helps avoid getting tangled in the trees. *Social Cognition*, 27(3), 402-417. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1521/soco.2009.27.3.402>

Hibbing, M. V., Hayes, M., & Deol, R. (2017). Nostalgia isn't what it used to be: Partisan polarization in views on the past. *Social Science Quarterly*, 98(1), 230-243. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/ssqu.12298>

Higgins, E. T. (1987). Self-discrepancy: A theory relating self and affect. *Psychological Review*, 94(3), 319-340. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0033-295X.94.3.319>

Higgins, E. T. (1997). Beyond pleasure and pain. *American Psychologist*, 52(12), 1280-1300. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0003-066X.52.12.1280>

Higgins, E. T. (1998). From expectancies to worldviews: Regulatory focus in socialization and cognition. In J. M. Darley, & J. Cooper (Eds.), *Attribution and social interaction: The legacy of Edward E. Jones; attribution and social interaction: The legacy of Edward E. Jones* (pp. 243-309, Chapter xxxviii, 550 Pages) American Psychological Association, Washington, DC. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/10286-005>  
Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619350940?accountid=15182>

Higgins, E. T., Friedman, R. S., Harlow, R. E., Idson, L. C., Ayduk, O. N., & Taylor, A. (2001). Achievement orientations from subjective histories of success: Promotion pride versus

prevention pride. *European Journal of Social Psychology*, 31(1), 3-23.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/ejsp.27>

Hodara, O. A. (2006). *Narrowed interpersonal worlds: Gender differences in affiliation-focus and dominance-focus*. Unpublished master's thesis, Wilfrid Laurier University, Waterloo, Ontario, Canada.

Hodara, O.A. (2013). *Time to let go: The temporal experience of grudge-holding*. Unpublished manuscript.

Hodara, O.A. & Vasquez, N. A. (2009, February). *To Dream of Tomorrow, Reminisce of Yesterday, or Savor Today: Construction of the Temporal Focus Inventory (TFI)*. Poster presented at the 10th Annual Meeting of the Society for Personality and Social Psychology, Tampa, FL.

Hofmann, W., Luhmann, M., Fisher, R. R., Vohs, K. D., & Baumeister, R. F. (2014). Yes, but are they happy? effects of trait self-control on affective well-being and life satisfaction. *Journal of Personality*, 82(4), 265-277.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/jopy.12050>

Hofstede, G. (1991). *Cultures and organizations: Software of the mind*. London: McGraw-Hill.

Hogg, M. A. (2007). Uncertainty-identity theory. In M. P. Zanna (Ed.), *Advances in experimental social psychology, vol 39; advances in experimental social psychology, vol 39* (pp. 69-126, Chapter x, 429 Pages) Elsevier Academic Press, San Diego, CA.

doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/S0065-2601\(06\)39002-8](http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/S0065-2601(06)39002-8) Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/621987041?accountid=15182>

- Hogg, M. A., & Abrams, D. (1988). *Social identifications: A social psychology of intergroup relations and group processes* Taylor & Frances/Routledge, Florence, KY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/617505159?accountid=15182>
- Hogg, M. A., & Terry, D. J. (2000). Social identity and self-categorization processes in organizational contexts. *The Academy of Management Review*, 25(1), 121-140. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2307/259266>
- Holman, E. A. (2015). Time perspective and social relations: A stress and coping perspective. In M. Stolarski, N. Fieulaine & W. van Beek (Eds.), *Time perspective theory; review, research and application: Essays in honor of philip G. zimbaro; time perspective theory; review, research and application: Essays in honor of philip G. zimbaro* (pp. 419-436, Chapter xxvi, 551 Pages) Springer International Publishing, Cham. doi:[http://dx.doi.org/10.1007/978-3-319-07368-2\\_27](http://dx.doi.org/10.1007/978-3-319-07368-2_27) Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/1660462608?accountid=15182>
- Holman, E. A., & Silver, R. C. (1998). Getting "stuck" in the past: Temporal orientation and coping with trauma. *Journal of Personality and Social Psychology*, 74(5), 1146-1163. doi:<http://dx.doi.org/10.1037/0022-3514.74.5.1146>
- Holman, E. A., & Silver, R. C. (2005). Future-oriented thinking and adjustment in a nationwide longitudinal study following the september 11th terrorist attacks. *Motivation and Emotion*, 29(4), 389-410. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s11031-006-9018-9>

- Holman, E. A., Silver, R. C., Mogle, J. A., & Scott, S. B. (2016). Adversity, time, and well-being: A longitudinal analysis of time perspective in adulthood. *Psychology and Aging, 31*(6), 640-651. doi:<http://dx.doi.org/10.1037/pag0000115>
- Hong, Y. (1994). *Predicting trait versus process inferences: The role of implicit theories*. Available from PsycINFO. (619230905; 1997-72856-001). Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619230905?accountid=15182>
- Hong, Y., Chiu, C., Dweck, C. S., & Sacks, R. (1997). Implicit theories and evaluative processes in person cognition. *Journal of Experimental Social Psychology, 33*(3), 296-323. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1006/jesp.1996.1324>
- Hovey, J. D. (2000). Acculturative stress, depression, and suicidal ideation among central american immigrants. *Suicide and Life-Threatening Behavior, 30*(2), 125-139. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619485463?accountid=15182>
- Howlett, J. R., & Paulus, M. P. (2013). Decision-making dysfunctions of counterfactuals in depression: Who might I have been? *Frontiers in Psychiatry, 4*, 13. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.3389/fpsy.2013.00143>
- Irani, G. E. (1999). Islamic Mediation Techniques for Middle East Conflicts. *Middle East Review of International Affairs, 3*. Retrieved from <http://meria.idc.ac.il/journal/1999/issue2/jv3n2a1.html>.
- Isenberg, C. (2008). *An examination of regret as expressed in the life reflections of older adults: Predictors of regret intensity and frequency, and association with well-being* (Order No. AAINR37733). Available from PsycINFO. (621754803; 2008-99200-215). Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/621754803?accountid=15182>

Jackson, J. W. (2002). Reactions to social dilemmas are influenced by group identification motives. In S. P. Shohov (Ed.), *Advances in psychology research, vol. 16; advances in psychology research, vol. 16* (pp. 167-183, Chapter vi, 202 Pages) Nova Science Publishers, Hauppauge, NY. Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619993622?accountid=15182>

Jackson, J. J., Thoemmes, F., Jonkmann, K., Lüdtké, O., & Trautwein, U. (2012). Military training and personality trait development: Does the military make the man, or does the man make the military? *Psychological Science, 23*(3), 270-277.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0956797611423545>

Jackson, J. W., & Smith, E. R. (1999). Conceptualizing social identity: A new framework and evidence for the impact of different dimensions. *Personality and Social Psychology Bulletin, 25*(1), 120-135.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0146167299025001010>

Janoff-Bulman, R. (1992). *Shattered assumptions: Towards a new psychology of trauma* Free Press, New York, NY. Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/618214695?accountid=15182>

James, W. (1950). *The principles of psychology* Dover Publications, Oxford. Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/615206830?accountid=15182>

- Jehn, K. A., & Mannix, E. A. (2001). The dynamic nature of conflict: A longitudinal study of intragroup conflict and group performance. *Academy of Management Journal*, 44(2), 238-251. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2307/3069453>
- Johnson, D. P., Carr, F. A., & Whisman, M. A. (2015). Inter-parental conflict and rumination. *International Journal of Cognitive Therapy*, 8(1), 1-10. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1521/ijct.2015.8.1.1>
- Johnson, M. K., & Sherman, S. J. (1990). Constructing and reconstructing the past and the future in the present. In E. T. Higgins, & R. M. Sorrentino (Eds.), *Handbook of motivation and cognition: Foundations of social behavior, vol. 2; handbook of motivation and cognition: Foundations of social behavior, vol. 2* (pp. 482-526, Chapter xviii, 621 Pages) Guilford Press, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/617868021?accountid=15182>
- Jokisaari, M. (2003). Regret appraisals, age, and subjective well-being. *Journal of Research in Personality*, 37(6), 487-503. doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/S0092-6566\(03\)00033-3](http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/S0092-6566(03)00033-3)
- Jokisaari, M. (2004). Regrets and subjective well-being: A life course approach. *Journal of Adult Development*, 11(4), 281-288. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1023/B:JADE.0000044531.11605.d5>
- Jones, N. M., Garfin, D. R., Holman, E. A., & Silver, R. C. (2016). Media use and exposure to graphic content in the week following the boston marathon bombings. *American Journal of Community Psychology*, 58(1-2), 47-59. doi:<http://dx.doi.org/10.1002/ajcp.12073>

- Joseph, S., & Diduca, D. (2007). The dimensions of religiosity scale: 20-item self-report measure of religious preoccupation, guidance, conviction, and emotional involvement. *Mental Health, Religion & Culture, 10*(6), 603-608.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/13674670601050295>
- Joshanloo, M. (2016). Revisiting the empirical distinction between hedonic and eudaimonic aspects of well-being using exploratory structural equation modeling. *Journal of Happiness Studies: An Interdisciplinary Forum on Subjective Well-being, 17*(5), 2023-2036.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s10902-015-9683-z>
- Juhl, J., Routledge, C., Arndt, J., Sedikides, C., & Wildschut, T. (2010). Fighting the future with the past: Nostalgia buffers existential threat. *Journal of Research in Personality, 44*(3), 309-314. doi:<http://dx.doi.org/10.1016/j.jrp.2010.02.006>
- Kahneman, D., & Riis, J. (2005). Living, and thinking about it: Two perspectives on life. *The science of well-being; the science of well-being* (pp. 285-304, Chapter xiii, 546 Pages) Oxford University Press, New York, NY.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1093/acprof:oso/9780198567523.003.001>  
1 Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/621150207?accountid=15182>
- Karremans, J. C., Regalia, C., Paleari, F. G., Fincham, F. D., Cui, M., Takada, N., Uskul, A. K. (2011). Maintaining harmony across the globe: The cross-cultural association between closeness and interpersonal forgiveness. *Social Psychological and Personality Science, 2*(5), 443-451. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/1948550610396957>
- Kelman, H. C. (2004). The nature of international conflict: A social-psychological perspective. In H. J. Langholtz, & C. E. Stout (Eds.), *The psychology of diplomacy; the psychology of*

- diplomacy* (pp. 59-77, Chapter viii, 276 Pages) Praeger Publishers/Greenwood Publishing Group, Westport, CT. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/620415983?accountid=15182>
- Kiecolt-Glaser, J., & Glaser, R. (1999). Psychoneuroimmunology and immunotoxicology: Implications for carcinogenesis. *Psychosomatic Medicine*, *61*(3), 271-272. doi:<http://dx.doi.org/10.1097/00006842-199905000-00003>
- Killingsworth, M. A., & Gilbert, D. T. (2010). A wandering mind is an unhappy mind. *Science*, *330*, 932. doi:10.1126/science.1192439
- Kim, K. J., Conger, R. D., Elder, G. H., Jr., & Lorenz, F. O. (2003). Reciprocal influences between stressful life events and adolescent internalizing and externalizing problems. *Child Development*, *74*(1), 127-143. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/1467-8624.00525>
- Kinnier, R.T., & Metha, A.T. (1989). Regrets and priorities at three stages of life. *Counseling & Values*, *33*, 182-193.
- Korem, A., & Horenczyk, G. (2015). Perceptions of social strategies in intercultural relations: The case of ethiopian immigrants in israel. *International Journal of Intercultural Relations*, *49*, 13-24. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.ijintrel.2015.06.008>
- Kramer, R. M. (1999). Trust and distrust in organizations: Emerging perspectives, enduring questions. *Annual Review of Psychology*, *50*, 569-598. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1146/annurev.psych.50.1.569>



- Kruglanski, A. W., & Webster, D. M. (1996). Motivated closing of the mind: "seizing" and "freezing." *Psychological Review*, *103*(2), 263-283. doi:<http://dx.doi.org/10.1037/0033-295X.103.2.263>
- Lachman, M. E., & Weaver, S. L. (1998). The sense of control as a moderator of social class differences in health and well-being. *Journal of Personality and Social Psychology*, *74*(3), 763-773. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.74.3.763>
- Lagoutina, Y. (2017). Perfectionism and time perspectives: An inquiry into the association between perfectionism subtypes and categorical time perspectives. *Time & Society*, *26*(3), 286-304. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0961463X15577280>
- Laureiro-Martinez, D., Trujillo, C. A., & Unda, J. (2017). Time perspective and age: A review of age associated differences. *Frontiers in Psychology*, *8*, 8. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.3389/fpsyg.2017.00101>
- Lavender, A., & Watkins, E. (2004). Rumination and future thinking in depression. *British Journal of Clinical Psychology*, *43*(2), 129-142. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1348/014466504323088015>
- Lavi, T., & Solomon, Z. (2005). Palestinian youth of the intifada: PTSD and future orientation. *Journal of the American Academy of Child & Adolescent Psychiatry*, *44*(11), 1176-1183. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1097/01.chi.0000177325.47629.4c>
- Lederach, J. P. (1997). Building peace: Sustainable reconciliation in divided societies. Washington, DC: United States Institute of Peace Press.
- Lench, H. C. (2011). Personality and health outcomes: Making positive expectations a reality. *Journal of Happiness Studies*, *12*(3), 493-507. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s10902-010-9212-z>

- Lennings, C. J. (2002). Perceptions of time in adolescents and young adults: The use of the time line. *Journal of Applied Health Behaviour, 4*(1-2), 46-51. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/620039138?accountid=15182>
- Lennings, C. J., & Burns, A. M. (1998). Time perspective: Temporal extension, time estimation, and impulsivity. *The Journal of Psychology: Interdisciplinary and Applied, 132*(4), 367-380. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/00223989809599271>
- Lepore, S. J., & Greenberg, M. A. (2002). Mending broken hearts: Effects of expressive writing on mood, cognitive processing, social adjustment and health following a relationship breakup. *Psychology & Health, 17*(5), 547-560. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/08870440290025768>
- Levenson, H. (1973). Multidimensional locus of control in psychiatric patients. *Journal of Consulting and Clinical Psychology, 41*(3), 397-404. doi:<http://dx.doi.org/10.1037/h0035357>
- Levine, H. B. (1997). Psychic reality and historical truth. In C. K. Prozan (Ed.), *Construction and reconstruction of memory: Dilemmas of childhood sexual abuse; construction and reconstruction of memory: Dilemmas of childhood sexual abuse* (pp. 3-19, Chapter xx, 236 Pages) Jason Aronson, Lanham, MD. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619146465?accountid=15182>
- Levy, S. R., Stroessner, S. J., & Dweck, C. S. (1998). Stereotype formation and endorsement: The role of implicit theories. *Journal of Personality and Social Psychology, 74*(6), 1421-1436. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.74.6.1421>

Lewin, K. (1935). Psycho-sociological problems of a minority group. *Character & Personality; A Quarterly for Psychodiagnostic & Allied Studies*, 3, 175-187.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/j.1467-6494.1935.tb01996.x>

Lewin, K. (1942). Time perspective and morale. *Civilian morale; civilian morale* (pp. 48-70)

Houghton Mifflin, Oxford. Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/615123271?accountid=15182>

Lewin, K. (1948). *Resolving social conflicts; selected papers on group dynamics* Harper,

Oxford. Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/615172647?accountid=15182>

Lewin, G., & Lewin, K. (1941). Democracy and the schools. *Understanding the Child*, 10, 1-7.

Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/615103496?accountid=15182>

Li, F., & Aksoy, L. (2007). Dimensionality of individualism-collectivism and measurement equivalence of triandis and gelfand's scale. *Journal of Business and Psychology*, 21(3),

313-329. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s10869-006-9031-8>

Liberman, N., & Trope, Y. (2008). The psychology of transcending the here and now. *Science*, 322(5905), 1201-1205.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1126/science.1161958>

Liberman, N., Trope, Y., McCrea, S. M., & Sherman, S. J. (2007). The effect of level of

construal on the temporal distance of activity enactment. *Journal of Experimental Social*

*Psychology*, 43(1), 143-149.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.jesp.2005.12.009>

Linton, M. J., Dieppe, P., Medina-Lara, A., Watson, L., & Crathorne, L. (2016). Review of 99 self-report measures for assessing well-being in adults: Exploring dimensions of well-being and developments over time. *British Medical Journal Open*, 6, e010641.

Lockwood, P., Jordan, C. H., & Kunda, Z. (2002). Motivation by positive or negative role models: Regulatory focus determines who will best inspire us. *Journal of Personality and Social Psychology*, 83(4), 854-864. doi:<http://dx.doi.org/10.1037/0022-3514.83.4.854>

Lucas, R. E., & Donnellan, M. B. (2011). Personality development across the life span: Longitudinal analyses with a national sample from germany. *Journal of Personality and Social Psychology*, 101(4), 847-861.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/a0024298>

Luhtanen, R., & Crocker, J. (1992). A collective self-esteem scale: Self-evaluation of one's social identity. *Personality and Social Psychology Bulletin*, 18(3), 302-318.

doi:<http://dx.doi.org/10.1177/0146167292183006>

Lui, P. P., & Rollock, D. (2017). Greater than the sum of its parts: Development of a measure of collectivism among Asians. *Cultural Diversity and Ethnic Minority Psychology*. Advanced online first publication. Doi: 10.1037/cdp0000163

Lyubomirsky, S., & Lepper, H. S. (1999). A measure of subjective happiness: Preliminary reliability and construct validation. *Social Indicators Research*, 46(2), 137-155.

doi:<http://dx.doi.org/10.1023/A:1006824100041>

- Lyubomirsky, S., & Nolen-Hoeksema, S. (1995). Effects of self-focused rumination on negative thinking and interpersonal problem solving. *Journal of Personality and Social Psychology*, 69(1), 176-190. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.69.1.176>
- MacKinnon, D. P., Lockwood, C. M., & Williams, J. (2004). Confidence limits for the indirect effect: Distribution of the product and resampling methods. *Multivariate Behavioral Research*, 39(1), 99-128. doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1207/s15327906mbr3901\\_4](http://dx.doi.org.ezproxy.library.yorku.ca/10.1207/s15327906mbr3901_4)
- Mael, F. A., & Tetrick, L. E. (1992). Identifying organizational identification. *Educational and Psychological Measurement*, 52(4), 813-824. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0013164492052004002>
- Mahjoub, A., Leyens, J., Yzerbyt, V., & di Giacomo, J. (1989). War stress and coping modes: Representations of self-identity and time perspective among palestinian children. *International Journal of Mental Health*, 18(2), 44-62. doi:<http://dx.doi.org/10.1080/00207411.1989.11449123>
- Malouf, E. T., Schaefer, K. E., Witt, E. A., Moore, K. E., Stuewig, J., & Tangney, J. P. (2014). The brief self-control scale predicts jail inmates' recidivism, substance dependence, and post-release adjustment. *Personality and Social Psychology Bulletin*, 40(3), 334-347. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0146167213511666>
- Mandel, D. R., Hilton, D. J., & Catellani P. *The psychology of counterfactual thinking; the psychology of counterfactual thinking* (pp. 165-182, Chapter xii, 251 Pages) Routledge, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/620964081?accountid=15182>

- Manczak, E. M., Zapata-Gietl, C., & McAdams, D. P. (2014). Regulatory focus in the life story: Prevention and promotion as expressed in three layers of personality. *Journal of Personality and Social Psychology, 106*(1), 169-181.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/a0034951>  
doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1207/S15327957PSPR0703\\_04](http://dx.doi.org.ezproxy.library.yorku.ca/10.1207/S15327957PSPR0703_04)
- Markman, K. D., & Miller, A. K. (2006). Depression, control, and counterfactual thinking: Functional for whom? *Journal of Social and Clinical Psychology, 25*(2), 210-227.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1521/jscp.2006.25.2.210>
- Markus, H. R., & Kitayama, S. (1999). Culture and the self: Implications for cognition, emotion, and motivation. In R. F. Baumeister (Ed.), *The self in social psychology* (pp. 339–371). New York, NY: Psychology Press.
- Martin, L. S., Oades, L. G., & Caputi, P. (2014). Intentional personality change coaching: A randomised controlled trial of participant selected personality facet change using the five-factor model of personality. *International Coaching Psychology Review, 9*(2), 196-209.  
Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1634754637?accountid=15182>
- Martin-Allan, J., & Leeson, P. (2016). *Personality change coaching: A four-year follow-up study* (Unpublished honours thesis). University of Wollongong, Wollongong, Australia.
- Mattei, D., & Schaefer, C. E. (2004). An investigation of validity of the subjective happiness scale. *Psychological Reports, 94*(1), 288-290.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2466/PR0.94.1.288-290>
- McCullough, M. E., Luna, L. R., Berry, J. W., Tabak, B. A., & Bono, G. (2010). On the form and function of forgiving: Modeling the time-forgiveness relationship and testing the

valuable relationships hypothesis. *Emotion*, 10(3), 358-376.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/a0019349>

McFarland, C., & Alvaro, C. (2000). The impact of motivation on temporal comparisons: Coping with traumatic events by perceiving personal growth. *Journal of Personality and Social Psychology*, 79(3), 327-343. doi:<http://dx.doi.org/10.1037/0022-3514.79.3.327>

McGrath, J. E., & Tschan, F. (2004). *Temporal matters in social psychology: Examining the role of time in the lives of groups and individuals* American Psychological Association, Washington, DC. doi:<http://dx.doi.org/10.1037/10659-000> Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/620219752?accountid=15182>

McGregor, I., Gailliot, M. T., Vasquez, N. A., & Nash, K. A. (2007). Ideological and personal zeal reactions to threat among people with high self-esteem: Motivated promotion focus. *Personality and Social Psychology Bulletin*, 33(11), 1587-1599. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0146167207306280>

McLaughlin, K. A., Borkovec, T. D., & Sibrava, N. J. (2007). The effects of worry and rumination on affect states and cognitive activity. *Behavior Therapy*, 38(1), 23-38. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.beth.2006.03.003>

Medvec, V. H., & Savitsky, K. (1997). When doing better means feeling worse: The effects of categorical cutoff points on counterfactual thinking and satisfaction. *Journal of Personality and Social Psychology*, 72(6), 1284-1296. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.72.6.1284>

- Metzger, U., & Parasuraman, R. (2005). Automation in future air traffic management: Effects of decision aid reliability on controller performance and mental workload. *Human Factors*, 47(1), 35-49. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1518/0018720053653802>
- Michael, T., Halligan, S. L., Clark, D. M., & Ehlers, A. (2007). Rumination in posttraumatic stress disorder. *Depression and Anxiety*, 24(5), 307-317.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/da.20228>
- Miller, P. A., & Eisenberg, N. (1988). The relation of empathy to aggressive and externalizing/antisocial behavior. *Psychological Bulletin*, 103(3), 324-344.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0033-2909.103.3.324>
- Minkov, M., & Hofstede, G. (2012). Hofstede's fifth dimension: New evidence from the world values survey. *Journal of Cross-Cultural Psychology*, 43(1), 3-14.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0022022110388567>
- Miranda, R., Wheeler, A., Polanco-Roman, L., & Marroquín, B. (2017). The future-oriented repetitive thought (FoRT) scale: A measure of repetitive thinking about the future. *Journal of Affective Disorders*, 207, 336-345.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.jad.2016.09.055>
- Morselli, D. (2013). The olive tree effect: Future time perspective when the future is uncertain. *Culture & Psychology*, 19(3), 305-322. doi:<http://dx.doi.org/10.1177/1354067X13489319>
- Mosak, H. H., & LeFevre, C. (1976). The resolution of "intrapersonal conflict.". *Journal of Individual Psychology*, 32(1), 19-26. Retrieved from  
<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/616300431?accountid=15182>



- Moskowitz, D. S., & Zuroff, D. C. (2004). Flux, pulse, and spin: Dynamic additions to the personality lexicon. *Journal of Personality and Social Psychology*, 86(6), 880-893.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.86.6.880>
- Muro, A., Castellà, J., Sotoca, C., Estaún, S., Valero, S., & Gomà-i-Freixanet, M. (2015). To what extent is personality associated with time perspective? *Anales De Psicología*, 31(2), 488-493. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.6018/analesps.31.2.172391>
- Mushtaq, F., Bland, A. R., & Schaefer, A. (2011). Uncertainty and cognitive control. *Frontiers in Psychology*, 2, 14.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.3389/fpsyg.2011.00249>
- Nadler, A., & Liviatan, I. (2004). Inter-group reconciliation processes in Israel: Theoretical analysis and empirical findings. In N. R. Branscombe & B. Doosje (Eds.), *Collective guilt: International perspectives* (pp. 216-235). New York: Cambridge University Press.
- Neisser, U. (1976). *Cognition and reality: Principles and implications of cognitive psychology*. W H Freeman/Times Books/ Henry Holt & Co, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/619975246?accountid=15182>
- Newcomb, T. M. (1947). Autistic hostility and social reality. *Human Relations*, 1, 69-86.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/001872674700100105>
- Niederland, W. G. (1981). The survivor syndrome: Further observations and dimensions. *Journal of the American Psychoanalytic Association*, 29(2), 413-425.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/000306518102900207>
- Nisbet, E. K., Zelenski, J. M., & Murphy, S. A. (2011). Happiness is in our nature: Exploring nature relatedness as a contributor to subjective well-being. *Journal of Happiness Studies*:

*An Interdisciplinary Forum on Subjective Well-being*, 12(2), 303-322.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s10902-010-9197-7>

Nolen-Hoeksema, S. (1991). Responses to depression and their effects on the duration of depressive episodes. *Journal of Abnormal Psychology*, 100(4), 569-582.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0021-843X.100.4.569>

Nolen-Hoeksema, S., & Watkins, E. R. (2011). A heuristic for developing transdiagnostic models of psychopathology: Explaining multifinality and divergent trajectories.

*Perspectives on Psychological Science*, 6(6), 589-609.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/1745691611419672>

Nolen-Hoeksema, S., Wisco, B. E., & Lyubomirsky, S. (2008). Rethinking rumination.

*Perspectives on Psychological Science*, 3(5), 400-424.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/j.1745-6924.2008.00088.x>

Noor, M., Brown, R., Gonzalez, R., Manzi, J., & Lewis, C. A. (2008). On positive psychological outcomes: What helps groups with a history of conflict to forgive and reconcile with each other? *Personality and Social Psychology Bulletin*, 34(6), 819-832.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0146167208315555>

O'Connor, B. P., Crawford, M. R., & Holder, M. D. (2015). An item response theory analysis of the subjective happiness scale. *Social Indicators Research*, 124(1), 249-258.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s11205-014-0773-9>

Oettingen, G. (1997). Culture and future thought. *Culture & Psychology*, 3(3), 353-381.

doi:<http://dx.doi.org/10.1177/1354067X9733008>

Ogihara, Y. (2017). Temporal changes in individualism and their ramification in japan: Rising individualism and conflicts with persisting collectivism. *Frontiers in Psychology*, 8, 12.

Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/1929451286?accountid=15182>

Oishi, S., Diener, E. F., Lucas, R. E., & Suh, E. M. (1999). Cross-cultural variations in predictors of life satisfaction: Perspectives from needs and values. *Personality and Social Psychology Bulletin*, 25(8), 980-990.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/01461672992511006>

Orkibi, H. (2015). Psychometric properties of the hebrew short version of the zimbaro time perspective inventory. *Evaluation & the Health Professions*, 38(2), 219-245.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0163278714531601>

Ouyang, Y., Zhu, Y., Fan, W., Tan, Q., & Zhong, Y. (2015). People higher in self-control do not necessarily experience more happiness: Regulatory focus also affects subjective well-being. *Personality and Individual Differences*, 86, 406-411.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.paid.2015.06.044>

Paixao, M. P., Abreu, M. V., & Lens, W. (2012). Motivation, future time perspective, and vocational planning behavior. In D. A. Leontiev (Ed.), *Motivation, consciousness and self-regulation; motivation, consciousness and self-regulation* (pp. 41-63, Chapter xi, 286

Pages) Nova Science Publishers, Hauppauge, NY. Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1551029685?accountid=15182>

Papastamatelou, J., Unger, A., Giotakos, O., & Athanasiadou, F. (2015). Is time perspective a predictor of anxiety and perceived stress? some preliminary results from greece.

*Psychological Studies*, 60(4), 468-477. doi:<http://dx.doi.org/10.1007/s12646-015-0342-6>

- Paradise, A. W., & Kernis, M. H. (2002). Self-esteem and psychological well-being: Implications of fragile self-esteem. *Journal of Social and Clinical Psychology, 21*(4), 345-361. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1521/jscp.21.4.345.22598>
- Pattershall, J., Eidelman, S., & Beike, D. R. (2012). Regulatory focus and affective recall. *Motivation and Emotion, 36*(3), 396-403. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s11031-011-9255-4>
- Peled, M., & Moretti, M. M. (2010). Ruminating on rumination: Are rumination on anger and sadness differentially related to aggression and depressed mood? *Journal of Psychopathology and Behavioral Assessment, 32*(1), 108-117. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s10862-009-9136-2>
- Peterson, C., Park, N., & Seligman, M. E. P. (2005). Orientations to happiness and life satisfaction: The full life versus the empty life. *Journal of Happiness Studies: An Interdisciplinary Forum on Subjective Well-being, 6*(1), 25-41. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s10902-004-1278-z>
- Pettigrew, T. F. (1998). Intergroup contact theory. *Annual Review of Psychology, 49*, 65-85. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1146/annurev.psych.49.1.65>
- Phinney, J. S. (1990). Ethnic identity in adolescents and adults: Review of research. *Psychological Bulletin, 108*(3), 499-514. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0033-2909.108.3.499>
- Piedmont, R. L. (2001). Cracking the plaster cast: Big five personality change during intensive outpatient counseling. *Journal of Research in Personality, 35*(4), 500-520. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1006/jrpe.2001.2326>

- Platt, J. J., & Eisenman, R. (1968). Internal-external control of reinforcement, time perspective, adjustment, and anxiety. *Journal of General Psychology*, 79(1), 121-128.  
doi:<http://dx.doi.org/10.1080/00221309.1968.9710459>
- Preacher, K. J., Rucker, D. D., & Hayes, A. F. (2007). Addressing moderated mediation hypotheses: Theory, methods, and prescriptions. *Multivariate Behavioral Research*, 42(1), 185-227. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/00273170701341316>
- Prokopčáková, A., & Ruiselová, Z. (2008). Counterfactual thinking as related to anxiety and self-esteem. *Studia Psychologica*, 50(4), 429-435. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/621835133?accountid=15182>
- Psaltis, C., Franc, R., Smeekes, A., Ioannou, M., & Žeželj, I. (2017). Social representations of the past in post-conflict societies: Adherence to official historical narratives and distrust through heightened threats. In C. Psaltis, M. Carretero & S. Čehajić-Clancy (Eds.), *History education and conflict transformation: Social psychological theories, history teaching and reconciliation; history education and conflict transformation: Social psychological theories, history teaching and reconciliation* (pp. 97-122, Chapter xx, 384 Pages) Palgrave Macmillan, New York, NY. doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-3-319-54681-0\\_4](http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-3-319-54681-0_4) Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1964614197?accountid=15182>
- Pu, J., Hou, H., & Ma, R. (2017). The mediating effects of self-esteem and trait anxiety mediate on the impact of locus of control on subjective well-being. *Current Psychology: A Journal for Diverse Perspectives on Diverse Psychological Issues*, 36(1), 167-173.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/s12144-015-9397-8>

- Rabinovich, A., & Morton, T. A. (2012). Ghosts of the past and dreams of the future: The impact of temporal focus on responses to contextual ingroup devaluation. *Personality and Social Psychology Bulletin*, 38(3), 397-410. doi:<http://dx.doi.org/10.1177/0146167211427307>
- Rasmussen, K. W., & Berntsen, D. (2014). "I can see clearly now": The effect of cue imageability on mental time travel. *Memory & Cognition*, 42(7), 1063-1075. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.3758/s13421-014-0414-1>
- Rasmussen, K. W., & Berntsen, D. (2018). Deficits in remembering the past and imagining the future in patients with prefrontal lesions. *Journal of Neuropsychology*, 12(1), 78-100. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/jnp.12108>
- Redfield R., Linton R., Herskovits M. J. (1936). Memorandum for the study of acculturation. *American Anthropologist*, 38(1), 149–152.
- Revelle, W. (2007). Experimental approaches to the study of personality. In R. W. Robins, R. C. Fraley & R. F. Krueger (Eds.), *Handbook of research methods in personality psychology; handbook of research methods in personality psychology* (pp. 37-61, Chapter xiii, 719 Pages) Guilford Press, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/621821907?accountid=15182>
- Richter, A. W., West, M. A., Van Dick, R., & Dawson, J. F. (2006). Boundary spanners' identification, intergroup contact, and effective intergroup relations. *Academy of Management Journal*, 49(6), 1252-1269. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.5465/AMJ.2006.23478720>
- Roccas, S., Horenczyk, G., & Schwartz, S. H. (2000). Acculturation discrepancies and well-being: The moderating role of conformity. *European Journal of Social Psychology*, 30(3),

323-334. doi:3.0.CO;2-5"

TARGET="\_blank">[http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/\(SICI\)1099-0992\(200005/06\)30:3<323::AID-EJSP992>3.0.CO;2-5](http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/(SICI)1099-0992(200005/06)30:3<323::AID-EJSP992>3.0.CO;2-5)

Roese, N. J. (1997). Counterfactual thinking. *Psychological Bulletin*, *121*(1), 133-148.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0033-2909.121.1.133>

Roets, A., & Van Hiel, A. (2011). Item selection and validation of a brief, 15-item version of the need for closure scale. *Personality and Individual Differences*, *50*(1), 90-94.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.paid.2010.09.004>

Rohner, R. P. (1984). Toward a conception of culture for cross-cultural psychology. *Journal of Cross-Cultural Psychology*, *15*(2), 111-138.

doi:<http://dx.doi.org/10.1177/0022002184015002002>

Rosenberg, M. (1965). *Society and the adolescent self-image*. Princeton, NJ: Princeton University Press.

Rothbaum, F., Weisz, J. R., & Snyder, S. S. (1982). Changing the world and changing the self: A two-process model of perceived control. *Journal of Personality and Social Psychology*, *42*(1), 5-37. doi:<http://dx.doi.org/10.1037/0022-3514.42.1.5>

Rotter, J. B. (1954). The importance of theory in clinical psychology. *Social learning and clinical psychology; social learning and clinical psychology* (pp. 3-17, Chapter ix, 466 Pages) Prentice-Hall, Inc, Englewood Cliffs, NJ.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/10788-001> Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest->

[com.ezproxy.library.yorku.ca/docview/620785010?accountid=15182](http://com.ezproxy.library.yorku.ca/docview/620785010?accountid=15182)

- Rotter, J. B. (1966). Generalized expectancies for internal versus external control of reinforcement. *Psychological Monographs: General and Applied*, 80(1), 1-28.  
doi:<http://dx.doi.org/10.1037/h0092976>
- Rotter, J. B., Seeman, M. & Liverant, S. Internal versus external control of reinforcement: A major variable in behavior theory. In N. F. Washburne (Ed.), *Decisions, values, and groups*, (Vol. 2) London: Pergamon Press, 1962.
- Rousseau, C., Fort, G. G. D., & Corin, E. (2002). Time perspective in children living in a situation of armed conflict. In F. J. C. Azima, & N. Grizenko (Eds.), *Immigrant and refugee children and their families: Clinical, research, and training issues; immigrant and refugee children and their families: Clinical, research, and training issues* (pp. 113-132, Chapter xvii, 238 Pages) International Universities Press, Inc, Madison, CT. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619773687?accountid=15182>
- Rousseau, D.M., Sitkin, S.B., Burt, R.S. and Camerer, C. (1998) Not So Different after All: A Cross-Discipline View of Trust. *Academy of Management Review*, 23, 393-404.  
<http://dx.doi.org/10.5465/AMR.1998.926617>
- Routledge, C., Arndt, J., Sedikides, C., & Wildschut, T. (2008). A blast from the past: The terror management function of nostalgia. *Journal of Experimental Social Psychology*, 44(1), 132-140. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.jesp.2006.11.001>
- Routledge, C., Juhl, J., Abeyta, A., & Roylance, C. (2014). Using the past to promote a peaceful future: Nostalgia proneness mitigates existential threat induced nationalistic self-sacrifice. *Social Psychology*, 45(5), 339-346. doi:<http://dx.doi.org/10.1027/1864-9335/a000172>



- Rush, J., & Grouzet, F. M. E. (2012). It is about time: Daily relationships between temporal perspective and well-being. *The Journal of Positive Psychology, 7*(5), 427-442.  
doi:<http://dx.doi.org/10.1080/17439760.2012.713504>
- Ryckman, N. A., Addis, D. R., Latham, A. J., & Lambert, A. J. (2018). Forget about the future: Effects of thought suppression on memory for imaginary emotional episodes. *Cognition and Emotion, 32*(1), 200-206.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/02699931.2016.1276049>
- Ryff, C. D. (1989). Happiness is everything, or is it? explorations on the meaning of psychological well-being. *Journal of Personality and Social Psychology, 57*(6), 1069-1081. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.57.6.1069>
- Ryff, C. D. (1991). Possible selves in adulthood and old age: A tale of shifting horizons. *Psychology and Aging, 6*(2), 286-295. doi:<http://dx.doi.org/10.1037/0882-7974.6.2.286>
- Ryff, C. D., & Singer, B. (1998). The contours of positive human health. *Psychological Inquiry, 9*(1), 1-28. doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1207/s15327965pli0901\\_1](http://dx.doi.org.ezproxy.library.yorku.ca/10.1207/s15327965pli0901_1)
- Sagrignano, M. D., Trope, Y., & Liberman, N. (2002). Time-dependent gambling: Odds now, money later. *Journal of Experimental Psychology: General, 131*(3), 364-376.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0096-3445.131.3.364>
- Sagy, S., Adwan, S., & Kaplan, A. (2002). Interpretations of the past and expectations for the future among israeli and palestinian youth. *American Journal of Orthopsychiatry, 72*(1), 26-38. doi:<http://dx.doi.org/10.1037/0002-9432.72.1.26>
- Sagy, S., Orr, E., Bar-on, D., & Awwad, E. (2001). Individualism and collectivism in two conflicted societies: Comparing israeli-jewish and palestinian-arab high school students.

*Youth & Society*, 33(1), 3-30.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0044118X01033001001>

Sanna, L. J. (1999). Mental simulations, affect, and subjective confidence: Timing is everything.

*Psychological Science*, 10(4), 339-345.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/1467-9280.00165>

Sanna, L. J. (2000). Mental simulation, affect, and personality: A conceptual framework. *Current*

*Directions in Psychological Science*, 9(5), 168-173.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/1467-8721.00086>

Sanna, L. J., Stocker, S. L., & Clarke, J. A. (2003). Rumination, imagination, and personality:

Specters of the past and future in the present. In E. C. Chang, & L. J. Sanna (Eds.), *Virtue,*

*vice, and personality: The complexity of behavior; virtue, vice, and personality: The*

*complexity of behavior* (pp. 105-124, Chapter xxvi, 189 Pages) American Psychological

Association, Washington, DC.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/10614-007> Retrieved from

[http://ezproxy.library.yorku.ca/login?url=https://search-proquest-](http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/620130899?accountid=15182)

[com.ezproxy.library.yorku.ca/docview/620130899?accountid=15182](http://ezproxy.library.yorku.ca/docview/620130899?accountid=15182)

Savary, J., Kleiman, T., Hassin, R. R., & Dhar, R. (2015). Positive consequences of conflict on

decision making: When a conflict mindset facilitates choice. *Journal of Experimental*

*Psychology: General*, 144(1), 1-6.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/a0038551>

Scheier, M. F., & Carver, C. S. (1992). Effects of optimism on psychological and physical well-

being: Theoretical overview and empirical update. *Cognitive Therapy and Research*, 16(2),

201-228. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/BF01173489>

- Scheier, M. F., Carver, C. S., & Bridges, M. W. (1994). Distinguishing optimism from neuroticism (and trait anxiety, self-mastery, and self-esteem): A reevaluation of the life orientation test. *Journal of Personality and Social Psychology*, *67*(6), 1063-1078.  
doi:<http://dx.doi.org/10.1037/0022-3514.67.6.1063>
- Scheier, M. F., Carver, C. S., & Bridges, M. W. (2001). Optimism, pessimism, and psychological well-being. In E. C. Chang (Ed.), *Optimism & pessimism: Implications for theory, research, and practice; optimism & pessimism: Implications for theory, research, and practice* (pp. 189-216, Chapter xxi, 395 Pages) American Psychological Association, Washington, DC. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/10385-009>  
Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619545763?accountid=15182>
- Scheier, M. F., Weintraub, J. K., & Carver, C. S. (1986). Coping with stress: Divergent strategies of optimists and pessimists. *Journal of Personality and Social Psychology*, *51*(6), 1257-1264. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.51.6.1257>
- Schimmack, U., & Diener, E. (2003). Predictive validity of explicit and implicit self-esteem for subjective well being. *Journal of Research in Personality*, *37*(2), 100-106.  
doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/S0092-6566\(02\)00532-9](http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/S0092-6566(02)00532-9)
- Schultheiss, O. C., Jones, N. M., Davis, A. Q., & Kley, C. (2008). The role of implicit motivation in hot and cold goal pursuit: Effects on goal progress, goal rumination, and emotional well-being. *Journal of Research in Personality*, *42*(4), 971-987.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.jrp.2007.12.009>
- Schwarz, N., & Clore, G. L. (1983). Mood, misattribution, and judgments of well-being: Informative and directive functions of affective states. *Journal of Personality and Social*

*Psychology*, 45(3), 513-523. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.45.3.513>

Seginer, R. (1988). Social milieu and future orientation: The case of kibbutz vs. urban adolescents. *International Journal of Behavioral Development*, 11(2), 247-273. doi:<http://dx.doi.org/10.1177/016502548801100207>

Seginer, R. (2005). Adolescent future orientation: Intergenerational transmission and intertwining tactics in cultural and family settings. In W. Friedlmeier, P. Chakkarath & B. Schwarz (Eds.), *Culture and human development: The importance of cross-cultural research for the social sciences; culture and human development: The importance of cross-cultural research for the social sciences* (pp. 231-251, Chapter xvi, 355 Pages) Psychology Press/Erlbaum (UK) Taylor & Francis, Hove. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/620836017?accountid=15182>

Seginer, R. (2008). Future orientation in times of threat and challenge: How resilient adolescents construct their future. *International Journal of Behavioral Development*, 32(4), 272-282. doi:<http://dx.doi.org/10.1177/0165025408090970>

Seginer, R., & Halabi, H. (1991). Cross-cultural variations of adolescents' future orientation: The case of israeli druze versus israeli arab and jewish male. *Journal of Cross-Cultural Psychology*, 22(2), 224-237. doi:<http://dx.doi.org/10.1177/0022022191222004>

Seginer, R., & Lilach, E. (2004). How adolescents construct their future: The effect of loneliness on future orientation. *Journal of Adolescence*, 27(6), 625-643. doi:<http://dx.doi.org/10.1016/j.adolescence.2004.05.003>

Seginer, R., Trommsdorff, G., & Essau, C. (1993). Adolescent control beliefs: Cross-cultural variations of primary and secondary orientations. *International Journal of Behavioral Development, 16*(2), 243-260. doi:<http://dx.doi.org/10.1177/016502549301600208>

Shechtman, Z., & Basheer, O. (2005). Normative beliefs supporting aggression of arab children in an intergroup conflict. *Aggressive Behavior, 31*(4), 324-335. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/ab.20069>

Shipp, A. J., Edwards, J. R., & Lambert, L. S. (2009). Conceptualization and measurement of temporal focus: The subjective experience of the past, present, and future. *Organizational Behavior and Human Decision Processes, 110*(1), 1-22. doi:<http://dx.doi.org/10.1016/j.obhdp.2009.05.001>

Sillars, A., & Parry, D. (1982). Stress, cognition, and communication in interpersonal conflicts. *Communication Research, 9*(2), 201-226. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/009365082009002002>

Sircova, A., van, d. V., Osin, E., Milfont, T. L., Fieulaine, N., Kislali-Erginbilgic, A., & Zimbardo, P. G. (2015). Time perspective profiles of cultures. In M. Stolarski, N. Fieulaine & W. van Beek (Eds.), *Time perspective theory; review, research and application: Essays in honor of philip G. zimbardo; time perspective theory; review, research and application: Essays in honor of philip G. zimbardo* (pp. 169-187, Chapter xxvi, 551 Pages) Springer International Publishing, Cham. doi:[http://dx.doi.org/10.1007/978-3-319-07368-2\\_11](http://dx.doi.org/10.1007/978-3-319-07368-2_11)

Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/1660461914?accountid=15182>

- Smeekes, A. (2015). National nostalgia: A group-based emotion that benefits the in-group but hampers intergroup relations. *International Journal of Intercultural Relations*, 49, 54-67.  
doi:<http://dx.doi.org/10.1016/j.ijintrel.2015.07.001>
- Smeekes, A., & Verkuyten, M. (2015). The presence of the past: Identity continuity and group dynamics. *European Review of Social Psychology*, 26(1), 162-202.  
doi:<http://dx.doi.org/10.1080/10463283.2015.1112653>
- Sorrentino, R. M., & Roney, C. J. R. (2000). *The uncertain mind: Individual differences in facing the unknown* Psychology Press, New York, NY. Retrieved from  
<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619492991?accountid=15182>
- Specht, J., Egloff, B., & Schmukle, S. C. (2011). The benefits of believing in chance or fate: External locus of control as a protective factor for coping with the death of a spouse. *Social Psychological and Personality Science*, 2(2), 132-137.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/1948550610384635>
- Spielberger, C. D. (1989). *State-Trait Anxiety Inventory: A comprehensive bibliography*. Palo Alto, CA: Consulting Psychologists Press.
- Steger, M. F. (2016). Hedonia, eudaimonia, and meaning: Me versus us; fleeting versus enduring. In J. Vittersø (Ed.), *Handbook of eudaimonic well-being; handbook of eudaimonic well-being* (pp. 175-182, Chapter xv, 569 Pages) Springer International Publishing, Cham. doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-3-319-42445-3\\_11](http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-3-319-42445-3_11) Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1957284926?accountid=15182>

- Stephan, W. G., & Finlay, K. (1999). The role of empathy in improving intergroup relations. *Journal of Social Issues, 55*(4), 729-743.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/0022-4537.00144>
- Still, H. (1972). *Of time, tides, and inner clocks: Taking advantage of the natural rhythms of life to be in tune emotionally and physically.* Stackpole Books.
- Strack, F., & Bless, H. (1994). Memory for nonoccurrences: Metacognitive and presuppositional strategies. *Journal of Memory and Language, 33*(2), 203-217.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1006/jmla.1994.1010>
- Straub, J. (1993). Collective memory and collective past as constituents of culture: An action-theoretical and culture-psychological perspective. *Schweizerische Zeitschrift Für Psychologie / Revue Suisse De Psychologie, 52*(2), 114-121. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/618432429?accountid=15182>
- Strelan, P., Karremans, J. C., & Krieg, J. (2017). What determines forgiveness in close relationships? the role of post-transgression trust. *British Journal of Social Psychology, 56*(1), 161-180. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/bjso.12173>
- Sugiyama, S. (1994). An analysis of the relationship between the general perceived control and the time perspective in junior high school students. *Japanese Journal of Educational Psychology, 42*(4), 415-420.  
doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.5926/jjep1953.42.4\\_415](http://dx.doi.org.ezproxy.library.yorku.ca/10.5926/jjep1953.42.4_415)
- Suh, E., Diener, E., Oishi, S., & Triandis, H. C. (1998). The shifting basis of life satisfaction judgments across cultures: Emotions versus norms. *Journal of Personality and Social*

*Psychology*, 74(2), 482-493. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.74.2.482>

Swann, W. B., Jr., Rentfrow, P. J., & Guinn, J. S. (2003). Self-verification: The search for coherence. In M. R. Leary, & J. P. Tangney (Eds.), *Handbook of self and identity; handbook of self and identity* (pp. 367-383, Chapter xv, 703 Pages) Guilford Press, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/620038200?accountid=15182>

Sweeney, P. D., Anderson, K., & Bailey, S. (1986). Attributional style in depression: A meta-analytic review. *Journal of Personality and Social Psychology*, 50(5), 974-991. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.50.5.974>

Sweeney, P. D., Shaeffer, D. E., & Golin, S. (1982). Pleasant events, unpleasant events, and depression. *Journal of Personality and Social Psychology*, 43(1), 136-144. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.43.1.136>

Tabachnick, B. G., & Fidell, L. S. (2013). *Using Multivariate Statistics* (6th ed.). Boston, MA: Pearson.

Taber, B. J. (2013). Time perspective and career decision-making difficulties in adults. *Journal of Career Assessment*, 21(2), 200-209.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/1069072712466722>

Tafarodi, R. W., Marshall, T. C., & Milne, A. B. (2003). Self-esteem and memory. *Journal of Personality and Social Psychology*, 84(1), 29-45.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.84.1.29>



- Tafarodi, R. W., & Milne, A. B. (2002). Decomposing global self-esteem. *Journal of Personality, 70*(4), 443-483. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/1467-6494.05017>
- Tafarodi, R. W., & Swann, W. B. (2001). Two-dimensional self-esteem: Theory and measurement. *Personality and Individual Differences, 31*(5), 653-673. doi:[http://dx.doi.org/10.1016/S0191-8869\(00\)00169-0](http://dx.doi.org/10.1016/S0191-8869(00)00169-0)
- Tait, R., & Silver, R. C. (1989). Coming to terms with major negative life events. In J. S. Uleman, & J. A. Bargh (Eds.), *Unintended thought; unintended thought* (pp. 351-382, Chapter xxvi, 481 Pages) Guilford Press, New York, NY.
- Tajfel, H., & Turner, J. C. (1979). An integrative theory of intergroup conflict. In W. G. Austin & S. Worchel (Eds.), *The social psychology of inter-group relations* (pp. 33-47). Monterey, CA: Brooks/Cole.
- Tangney, J. P., Baumeister, R. F., & Boone, A. L. (2004). High self-control predicts good adjustment, less pathology, better grades, and interpersonal success. *Journal of Personality, 72*(2), 271-322. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1111/j.0022-3506.2004.00263.x>
- Tluczek, A., Henriques, J. B., & Brown, R. L. (2009). Support for the reliability and validity of a six-item state anxiety scale derived from the state-trait anxiety inventory. *Journal of Nursing Measurement, 17*(1), 19-28. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1891/1061-3749.17.1.19>
- Todorova, G., Bear, J. B., & Weingart, L. R. (2014). Can conflict be energizing? A study of task conflict, positive emotions, and job satisfaction. *Journal of Applied Psychology, 99*(3), 451-467. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/a0035134>

- Torges, C. M., Stewart, A. J., & Miner-Rubino, K. (2005). Personality after the prime of life: Men and women coming to terms with regrets. *Journal of Research in Personality, 39*(1), 148-165. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.jrp.2004.09.005>
- Trapnell, P. D., & Campbell, J. D. (1999). Private self-consciousness and the five-factor model of personality: Distinguishing rumination from reflection. *Journal of Personality and Social Psychology, 76*(2), 284-304. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.76.2.284>
- Triandis, H. C. (1995). The self and social behavior in differing cultural contexts. In N. R. Goldberger, & J. B. Veroff (Eds.), *The culture and psychology reader; the culture and psychology reader* (pp. 326-365, Chapter ix, 833 Pages) New York University Press, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/618773553?accountid=15182>
- Triandis, H. C. (2002). Motivation to work in cross-cultural perspective. In J. M. Brett, & F. Drasgow (Eds.), *The psychology of work: Theoretically based empirical research; the psychology of work: Theoretically based empirical research* (pp. 101-117, Chapter xv, 338 Pages) Lawrence Erlbaum Associates Publishers, Mahwah, NJ. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/619755795?accountid=15182>
- Trommsdorff, G. (1994). Future time perspective and control orientation: Social conditions and consequences. In Z. Zaleski (Ed.), *Psychology of future orientation; psychology of future orientation* (pp. 39-62, 232 Pages) Wydawnictwo Towarzystwa Naukowego Katolickiego Uniwersytetu Lubelskiego, 20-616 Lublin. Retrieved from

<http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/618561809?accountid=15182>

Trommsdorff, G., & Iwawaki, S. (1989). Students' perceptions of socialisation and gender role in japan and germany. *International Journal of Behavioral Development*, 12(4), 485-493.  
doi:<http://dx.doi.org/10.1177/016502548901200405>

Trope, Y., & Liberman, N. (2000). Temporal construal and time-dependent changes in preference. *Journal of Personality and Social Psychology*, 79(6), 876-889.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-3514.79.6.876>

Trope, Y., & Liberman, N. (2003). Temporal construal. *Psychological Review*, 110(3), 403-421.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0033-295X.110.3.403>

Trope, Y., & Liberman, N. (2010). Construal-level theory of psychological distance. *Psychological Review*, 117, 440-463. doi:10.1037/a0018963.

Trope, Y., & Liberman, N. (2012). Construal level theory. In P. A. M. Van Lange, A. W. Kruglanski & E. T. Higgins (Eds.), *Handbook of theories of social psychology (vol. 1); handbook of theories of social psychology (vol. 1)* (pp. 118-134, Chapter xx, 562 Pages) Sage Publications Ltd, Thousand Oaks, CA.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.4135/9781446249215.n7> Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1015241445?accountid=15182>

Tseferidi, S.-I., F. Griva, and F. Anagnostopoulos. 2017. Time to get happy: associations of time perspective with indicators of well-being. *Psychology, Health & Medicine*, 22(5): 618–624. doi:10.1080/13548506.2016.1226508

- Turner, J. T. (1985). Factors influencing the development of the hostage identification syndrome. *Political Psychology, 6*(4), 705-711.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2307/3791024>
- Turner, J. C., Hogg, M. A., Oakes, P. J., Reicher, S. D., & Wetherell, M. S. (1987). *Rediscovering the social group: A self-categorization theory* Basil Blackwell, Cambridge, MA. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/617354964?accountid=15182>
- Turner, J. C., Oakes, P. J., Haslam, S. A., & McGarty, C. (1994). Self and collective: Cognition and social context. *Personality and Social Psychology Bulletin, 20*(5), 454-463.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0146167294205002>
- UNICEF. (2002). *The State of The World's Children 2002*. Retrieved on 26 May 2018 from <https://www.unicef.org/sowc02/pdf/sowc2002-eng-full.pdf>
- VandenBos, G. R. (Ed.). (2006). *APA Dictionary of Psychology*. Washington, DC, US: American Psychological Association.
- Vaughan, G. M., Tajfel, H., & Williams, J. (1981). Bias in reward allocation in an intergroup and an interpersonal context. *Social Psychology Quarterly, 44*(1), 37-42.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2307/3033861>
- Volkema, R. J., & Bergmann, T. J. (1989). Interpersonal conflict at work: An analysis of behavioral responses. *Human Relations, 42*(9), 757-770.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/001872678904200901>
- Vollhardt, J. R., Mazur, L. B., & Lemahieu, M. (2014). Acknowledgment after mass violence: Effects on psychological well-being and intergroup relations. *Group Processes &*

*Intergroup Relations*, 17(3), 306-323.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/1368430213517270>

Wagoner, B., & Bresc , I. (2016). Conflict and memory: The past in the present. *Peace and Conflict: Journal of Peace Psychology*, 22(1), 3-4.

doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/pac0000147>

Walser, R. D., & Hayes, S. C. (2006). Acceptance and commitment therapy in the treatment of posttraumatic stress disorder: Theoretical and applied issues. In V. M. Follette, & J. I. Ruzek (Eds.), *2nd ed.; cognitive-behavioral therapies for trauma (2nd ed.)* (2nd ed. ed., pp. 146-172, Chapter xxiv, 472 Pages) Guilford Press, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/621104506?accountid=15182>

Wang, Q., Hou, Y., Tang, H., & Wiprovnick A. (2011). Travelling backwards and forwards in time: culture and gender in the episodic specificity of past and future events. *Memory*, 19(1), 103-109. doi:10.1080/09658211.2010.537279

Ward, C. (2008). Thinking outside the berry boxes: New perspectives on identity, acculturation and intercultural relations. *International Journal of Intercultural Relations*, 32(2), 105-114. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.ijintrel.2007.11.002>

Watkins, E. R. (2008). Constructive and unconstructive repetitive thought. *Psychological Bulletin*, 134(2), 163-206. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0033-2909.134.2.163>

Weary, G., & Edwards, J. A. (1994). Individual differences in causal uncertainty. *Journal of Personality and Social Psychology*, 67(2), 308-318. doi:<http://dx.doi.org/10.1037/0022-3514.67.2.308>

- Weary, G., Tobin, S. J., & Edwards, J. A. (2010). The causal uncertainty model revisited. In R. M. Arkin, K. C. Oleson & P. J. Carroll (Eds.), *Handbook of the uncertain self; handbook of the uncertain self* (pp. 78-100, Chapter xviii, 747 Pages) Psychology Press, New York, NY. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/622121317?accountid=15182>
- Werth, L., & Förster, J. (2002). Implicit person theories influence memory judgments: The circumstances under which metacognitive knowledge is used. *European Journal of Social Psychology*, 32(3), 353-362. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1002/ejsp.95>
- Williams, J. M. (2006). Capture and rumination, functional avoidance, and executive control (CaRFAX): Three processes that underlie overgeneral memory. *Cognition and Emotion*, 20(3-4), 548-568. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1080/02699930500450465>
- Williams, J. M., Ellis, N. C., Tyers, C., Healy, H., Rose, G., & MacLeod, A. K. (1996). The specificity of autobiographical memory and imageability of the future. *Memory & Cognition*, 24(1), 116-125. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.3758/BF03197278>
- Wirtz, D., & Scollon, C. N. (2012). Culture, visual perspective, and the effect of material success on perceived life quality. *Journal of Cross-Cultural Psychology*, 43(3), 367-372. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0022022111432292>
- Wong, P. T., & Watt, L. M. (1991). What types of reminiscence are associated with successful aging? *Psychology and Aging*, 6(2), 272-279. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0882-7974.6.2.272>

- Wrosch, C., Bauer, I., & Scheier, M. F. (2005). Regret and quality of life across the adult life span: The influence of disengagement and available future goals. *Psychology and Aging, 20*(4), 657-670. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0882-7974.20.4.657>
- Wrosch, C., & Heckhausen, J. (2002). Perceived control of life regrets: Good for young and bad for old adults. *Psychology and Aging, 17*(2), 340-350.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0882-7974.17.2.340>
- Worchel, S. (2005). Culture's role in conflict and conflict management: Some suggestions, many questions. *International Journal of Intercultural Relations, 29*(6), 739-757.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.ijintrel.2005.08.011>
- van Beek, W., Berghuis, H., Kerkhof, A., & Beekman, A. (2011). Time perspective, personality and psychopathology: Zimbardo's time perspective inventory in psychiatry. *Time & Society, 20*(3), 364-374.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0961463X10373960>
- van der Kolk, B. A., & van der Hart, O. (1989). Pierre Janet and the breakdown of adaptation in psychological trauma. *The American Journal of Psychiatry, 146*(12), 1530-1540.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1176/ajp.146.12.1530>
- VandenBos, G. R. (Ed.). (2007). *APA Dictionary of Psychology*. Washington, DC, US: American Psychological Association.
- Vaughan, G. M., Tajfel, H., & Williams, J. (1981). Bias in reward allocation in an intergroup and an interpersonal context. *Social Psychology Quarterly, 44*(1), 37-42.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.2307/3033861>
- Yamaguchi, S. (2001). Culture and control orientations. In D. Matsumoto (Ed.), *The handbook of culture and psychology* (pp. 223–243). New York, NY: Oxford University.

- Yang, Q., Zhao, Y., Guan, L., & Huang, X. (2017). Implicit attitudes toward the self over time in chinese undergraduates. *Frontiers in Psychology, 8*, 10.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.3389/fpsyg.2017.01914>
- Yoon, Y., Sarial-Abi, G., & Gürhan-Canli, Z. (2012). Effect of regulatory focus on selective information processing. *Journal of Consumer Research, 39*(1), 93-110.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1086/661935>
- Ysseldyk, R., Matheson, K., & Anisman, H. (2007). Rumination: Bridging a gap between forgivingness, vengefulness, and psychological health. *Personality and Individual Differences, 42*(8), 1573-1584.  
doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1016/j.paid.2006.10.032>
- Yuchtman-Yaar, E., & Alkalay, Y. (2016). The role of trust in the resolution of the israeli-palestinian conflict. In I. Alon, & D. Bar-Tal (Eds.), *The role of trust in conflict resolution: The israeli-palestinian case and beyond; the role of trust in conflict resolution: The israeli-palestinian case and beyond* (pp. 149-167, Chapter xxvi, 345 Pages) Springer International Publishing, Cham. doi:[http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-3-319-43355-4\\_9](http://dx.doi.org.ezproxy.library.yorku.ca/10.1007/978-3-319-43355-4_9) Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search-proquest-com.ezproxy.library.yorku.ca/docview/1910786442?accountid=15182>
- Yufit, R. I., & Benzie, B. (1973). Assessing suicidal potential by time perspective. *Life-Threatening Behavior, 3*(4), 270-282. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com/docview/615951025?accountid=15182>



- Yuki, M., Maddux, W. W., Brewer, M. B., & Takemura, K. (2005). Cross-cultural differences in relationship- and group-based trust. *Personality and Social Psychology Bulletin*, *31*(1), 48-62. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1177/0146167204271305>
- Zaleski, Z. (1994). Personal future in hope and anxiety perspective. In Z. Zaleski (Ed.), *Psychology of future orientation; psychology of future orientation* (pp. 173-194, 232 Pages) Wydawnictwo Towarzystwa Naukowego Katolickiego Uniwersytetu Lubelskiego, 20-616 Lublin. Retrieved from <http://ezproxy.library.yorku.ca/login?url=https://search.proquest.com>
- Zhang, J. W., Howell, R. T., & Stolarski, M. (2013). Comparing three methods to measure a balanced time perspective: The relationship between a balanced time perspective and subjective well-being. *Journal of Happiness Studies*, *14*(1), 169-184. doi:<http://dx.doi.org/10.1007/s10902-012-9322-x>
- Zimbardo, P. G., & Boyd, J. N. (1999). Putting time in perspective: A valid, reliable individual-differences metric. *Journal of Personality and Social Psychology*, *77*(6), 1271-1288. doi:<http://dx.doi.org/10.1037/0022-3514.77.6.1271>
- Zimbardo P.G., Boyd J. N. (2015) Putting Time in Perspective: A Valid, Reliable Individual-Differences Metric. In: Stolarski M., Fieulaine N., van Beek W. (eds) Time Perspective Theory; Review, Research and Application. Springer, Cham. doi: [http://org/10.1007/978-3-319-07368-2\\_2](http://org/10.1007/978-3-319-07368-2_2)
- Zuckerman, M., Eysenck, S. B., & Eysenck, H. J. (1978). Sensation seeking in England and America: Cross-cultural, age, and sex comparisons. *Journal of Consulting and Clinical Psychology*, *46*(1), 139-149. doi:<http://dx.doi.org.ezproxy.library.yorku.ca/10.1037/0022-006X.46.1.139>

## Appendix A

### Temporal Focus Inventory (TFI)

#### **Instructions:**

Listed below are questions about how you think of yourself in time. Please use the scale below to indicate how much you agree with each statement.

1	2	3	4	5	6	7
Strongly Disagree						Strongly Agree

1. \_\_\_\_\_ I can't escape my feelings about the past and how it has shaped who I am today.
2. \_\_\_\_\_ I tend to focus on life lesson that I learn in the here and now.
3. \_\_\_\_\_ When I dream, I dream of tomorrow.
4. \_\_\_\_\_ The past shapes my understanding of myself.
5. \_\_\_\_\_ I can't help but think about the now and how it influences who I am.
6. \_\_\_\_\_ I enjoy thinking about the future and how things may be.
7. \_\_\_\_\_ I am who I am because of my past experiences.
8. \_\_\_\_\_ Current events greatly influence my thoughts, feelings, and actions.
9. \_\_\_\_\_ When I get some time to think, I tend to focus on future events and relationships.
10. \_\_\_\_\_ I tend to reflect on life lessons that I have learned in the past.
11. \_\_\_\_\_ I enjoy experiencing life as it unfolds at this particular moment in time.
12. \_\_\_\_\_ I catch myself dreaming about the future and what my life would be like.
13. \_\_\_\_\_ Past events greatly influence my thoughts, feelings, and actions.
14. \_\_\_\_\_ The present shapes my understanding of myself.
15. \_\_\_\_\_ Future events greatly influence my thoughts, feelings, and actions.

## Appendix B

### Satisfaction with Life Scale (SWLS)

**Instructions:**

Below are five statements that you may agree or disagree with. Using the 1 - 7 scale below, indicate your agreement with each item by placing the appropriate number on the line preceding that item. Please be open and honest in your responding.

1	2	3	4	5	6	7
Strongly Disagree	Disagree	Slightly Disagree	Neutral	Slightly Agree	Agree	Strongly Agree

1. \_\_\_\_ In most ways my life is close to my ideal.
2. \_\_\_\_ The conditions of my life are excellent.
3. \_\_\_\_ I am satisfied with my life.
4. \_\_\_\_ So far, I have gotten the important things I want in life.
5. \_\_\_\_ If I could live my life over, I would change almost nothing.



## Appendix D

### Beck Depression Inventory (BDI)

1.
  - 0 I do not feel sad.
  - 1 I feel sad
  - 2 I am sad all the time and I can't snap out of it.
  - 3 I am so sad and unhappy that I can't stand it.
2.
  - 0 I am not particularly discouraged about the future.
  - 1 I feel discouraged about the future.
  - 2 I feel I have nothing to look forward to.
  - 3 I feel the future is hopeless and that things cannot improve.
3.
  - 0 I do not feel like a failure.
  - 1 I feel I have failed more than the average person.
  - 2 As I look back on my life, all I can see is a lot of failures.
  - 3 I feel I am a complete failure as a person.
4.
  - 0 I get as much satisfaction out of things as I used to.
  - 1 I don't enjoy things the way I used to.
  - 2 I don't get real satisfaction out of anything anymore.
  - 3 I am dissatisfied or bored with everything.
5.
  - 0 I don't feel particularly guilty
  - 1 I feel guilty a good part of the time.
  - 2 I feel quite guilty most of the time.
  - 3 I feel guilty all of the time.
6.
  - 0 I don't feel I am being punished.
  - 1 I feel I may be punished.
  - 2 I expect to be punished.
  - 3 I feel I am being punished.
7.
  - 0 I don't feel disappointed in myself.
  - 1 I am disappointed in myself.
  - 2 I am disgusted with myself.
  - 3 I hate myself.
8.
  - 0 I don't feel I am any worse than anybody else.
  - 1 I am critical of myself for my weaknesses or mistakes.
  - 2 I blame myself all the time for my faults.
  - 3 I blame myself for everything bad that happens.

9.  
0 I don't have any thoughts of killing myself.  
1 I have thoughts of killing myself, but I would not carry them out.  
2 I would like to kill myself.  
3 I would kill myself if I had the chance.
10.  
0 I don't cry any more than usual.  
1 I cry more now than I used to.  
2 I cry all the time now.  
3 I used to be able to cry, but now I can't cry even though I want to.
11.  
0 I am no more irritated by things than I ever was.  
1 I am slightly more irritated now than usual.  
2 I am quite annoyed or irritated a good deal of the time.  
3 I feel irritated all the time.
12.  
0 I have not lost interest in other people.  
1 I am less interested in other people than I used to be.  
2 I have lost most of my interest in other people.  
3 I have lost all of my interest in other people.
13.  
0 I make decisions about as well as I ever could.  
1 I put off making decisions more than I used to.  
2 I have greater difficulty in making decisions more than I used to.  
3 I can't make decisions at all anymore.
14.  
0 I don't feel that I look any worse than I used to.  
1 I am worried that I am looking old or unattractive.  
2 I feel there are permanent changes in my appearance that make me look unattractive  
3 I believe that I look ugly.
15.  
0 I can work about as well as before.  
1 It takes an extra effort to get started at doing something.  
2 I have to push myself very hard to do anything.  
3 I can't do any work at all.
16.  
0 I can sleep as well as usual.  
1 I don't sleep as well as I used to.  
2 I wake up 1-2 hours earlier than usual and find it hard to get back to sleep.  
3 I wake up several hours earlier than I used to and cannot get back to sleep.
17.  
0 I don't get more tired than usual.  
1 I get tired more easily than I used to.  
2 I get tired from doing almost anything.  
3 I am too tired to do anything.

- 18.
- 0 My appetite is no worse than usual.
  - 1 My appetite is not as good as it used to be.
  - 2 My appetite is much worse now.
  - 3 I have no appetite at all anymore.
- 19.
- 0 I haven't lost much weight, if any, lately.
  - 1 I have lost more than five pounds.
  - 2 I have lost more than ten pounds.
  - 3 I have lost more than fifteen pounds.
- 20.
- 0 I am no more worried about my health than usual.
  - 1 I am worried about physical problems like aches, pains, upset stomach, or constipation.
  - 2 I am very worried about physical problems and it's hard to think of much else.
  - 3 I am so worried about my physical problems that I cannot think of anything else.
- 21.
- 0 I have not noticed any recent change in my interest in sex.
  - 1 I am less interested in sex than I used to be.
  - 2 I have almost no interest in sex.
  - 3 I have lost interest in sex completely.

## Appendix E

### Life Orientation Test Revised (LOT-R)

#### **Instructions:**

Please be as honest and accurate as you can throughout. Try not to let your response to one statement influence your responses to other statements. There are no "correct" or "incorrect" answers. Answer according to your own feelings, rather than how you think "most people" would answer.

1	2	3	4	5
I agree a lot				I disagree a lot

1. In uncertain times, I usually expect the best.
2. It's easy for me to relax.
3. If something can go wrong for me, it will.
4. I'm always optimistic about my future.
5. I enjoy my friends a lot.
6. It's important for me to keep busy.
7. I hardly ever expect things to go my way.
8. I don't get upset too easily.
9. I rarely count on good things happening to me.
10. Overall, I expect more good things to happen to me than bad.



## Appendix F

### Perceived Stress Scale (PSS)

#### **Instructions:**

The questions in this scale ask you about your feelings and thoughts during the last month. In each case, please indicate with a check how often you felt or thought a certain way.

1	2	3	4	5
Never	Almost	Sometimes	Fairly often	Very often

1. In the last month, how often have you been upset because of something that happened unexpectedly?
2. In the last month, how often have you felt that you were unable to control the important things in your life?
3. In the last month, how often have you felt nervous and “stressed”?
4. In the last month, how often have you felt confident about your ability to handle your personal problems?
5. In the last month, how often have you felt that things were going your way?
6. In the last month, how often have you found that you could not cope with all the things that you had to do?
7. In the last month, how often have you been able to control irritations in your life?
8. In the last month, how often have you felt that you were on top of things?
9. In the last month how often have you been angered because of things that were outside of your control?
10. In the last month, how often have you felt difficulties were piling up so high that you could not overcome them?

## Appendix G

### The Brief Self-Control Scale

**Instructions:** Please use the response scale provided to rate each of the 13 statements.

1	2	3	4	5
Not at All				Very Much

1. I am good at resisting temptation.
2. I have a hard time breaking bad habit.
3. I am lazy.
4. I say inappropriate things.
5. I do certain things that are bad for me, if they are fun.
6. I wish I had more self-discipline.
7. Pleasure and fun sometimes keep me from getting work done.
8. I have trouble concentrating.
9. I am able to work effectively toward long-term goals.
10. Sometimes I can't stop myself from doing something, even if I know it is wrong.
11. I often act without thinking through all the alternatives.
12. I refuse things that are bad for me.
13. People would say that I have iron self-discipline.

Appendix H  
Prevention/Promotion Scale

**Instructions:**

Using the scale below, please write the appropriate number in the blank beside each item.

1	2	3	4	5	6	7	8	9
Not at all true of me								Very true of me

1. In general, I am focused on preventing negative events in my life.
2. I am anxious that I will fall short of my responsibilities and obligations.
3. I frequently imagine how I will achieve my hopes and aspirations.
4. I often think about the person I am afraid I might become in the future.
5. I often think about the person I would ideally like to be in the future.
6. I typically focus on the success I hope to achieve in the future.
7. I often worry that I will fail to accomplish my academic goals.
8. I often think about how I will achieve academic success.
9. I often imagine myself experiencing bad things that I fear might happen to me.
10. I frequently think about how I can prevent failures in my life.
11. I am more oriented toward preventing losses than I am toward achieving gains.
12. My major goal in school right now is to achieve my academic ambitions.
13. My major goal in school right now is to avoid becoming an academic failure.
14. I see myself as someone who is primarily striving to reach my “ideal self” to fulfill my hopes, wishes, and aspirations.
15. I see myself as someone who is primarily striving to become the self I “ought” to be to fulfill my duties, responsibilities, and obligations.
16. In general, I am focused on achieving positive outcomes in my life.
17. I often imagine myself experiencing good things that I hope will happen to me.
18. Overall, I am more oriented toward achieving success than preventing failure.

## Appendix I

### Rosenberg Self-Esteem (RSE)

#### **Instructions:**

Below is a list of statements dealing with your general feelings about yourself. If you strongly agree, circle SA. If you agree with the statement, circle A. If you disagree, circle D. If you strongly disagree, circle SD.

- |   |         |        |        |         |
|---|---------|--------|--------|---------|
| 1. On the whole, I am satisfied with myself.                                  | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |
| 2. At times, I think I am no good at all.                                     | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |
| 3. I feel that I have a number of good qualities.                             | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |
| 4. I am able to do things as well as most other people.                       | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |
| 5. I feel I do not have much to be proud of.                                  | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |
| 6.*I certainly feel useless at times.   | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |
| 7. I feel that I'm a person of worth, at least on an equal plane with others. | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |
| 8. I wish I could have more respect for myself.                               | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |
| 9. All in all, I am inclined to feel that I am a failure.                     | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |
| 10. I take a positive attitude toward myself.                                 | SA<br>1 | A<br>2 | D<br>3 | SD<br>4 |

## Appendix J

### Revised Self-Liking/Self-Competence (SLSC-R)

**Instructions:**

Listed below are 16 statements. You are to circle that number that describes how much you agree with each statement using the scale below.

1	2	3	4	5	6	7
Strongly Disagree			Neutral			Strongly Agree

1. I tend to devalue myself.
2. I am highly effective at the things I do.
3. I am very comfortable with myself.
4. I am almost always able to accomplish what I try for.
5. I am secure in my sense of self-worth.
6. It is sometimes unpleasant for me to think about myself.
7. I have a negative attitude towards myself.
8. At times, I find it difficult to achieve the things that are important to me.
9. I feel great about who I am.
10. I sometimes deal poorly with challenges.
11. I never doubt my personal worth.
12. I perform very well at many things.
13. I sometimes fail to fulfill my goals.
14. I am never talented.
15. I do not have enough respect for myself.
16. I wish I was more skillful in my activities.

## Appendix K

### Informed Consent

#### **INFORMED CONSENT FORM: THE SELF IN TIME** **RESEARCHER(S): Oshrat A. Hodara & Dr. Michaela Hynie**

##### **INFORMATION**

You are invited to participate in a research study being conducted by Oshrat A. Hodara of the psychology department at York University. The main purpose of this study is to examine people's perceptions of themselves over time. The study consists of filling out a series of questionnaires online. You will be asked to answer questions about your thoughts, values, and beliefs as they relate to perceptions of time. The study will take approximately 30 minutes to complete.

##### **COMPENSATION**

For participation, you will receive research credit(s) towards your course.

##### **RISKS & BENEFITS**

As a participant in this study, you will contribute to the development of knowledge concerning how people think about past, present, and future events. You will also gain exposure to methods that researchers use to study how people imagine time related events and thus enhance your understanding of psychological research processes. Should you experience discomfort at any point, you can discontinue your participation without any penalty (i.e., you will still be awarded your research credit). In addition, you can contact York University's Counselling and Development Centre at (416) 736-5297 or visit them at N110 Bennett Centre for Student Services.

##### **VOLUNTARY PARTICIPATION**

Your participation in this study is voluntary; you may decline to participate without penalty. If you decide to participate, you may withdraw from the study at any time without penalty. If you withdraw from the study before your questionnaire is handed in, the questionnaire will be returned to you or destroyed. Note also that you have the right to omit any question or procedure you choose.

##### **CONFIDENTIALITY**

All of your responses will remain confidential to the fullest extent permissible by law. That is, the questionnaire will be stored in a locked room within the psychology department and will be accessed only by the researchers (Oshrat A. Hodara & Dr. Michaela Hynie). Your responses will also be kept completely anonymous: there will be no identifying information on the questionnaire and consent forms will be handled separately from the questionnaires. All data will be destroyed seven years after the completion of the study, in accordance with American Psychological Association guidelines.

##### **CONTACT**

If you have questions at any time about the study or the procedures, please feel free to contact Oshrat A. Hodara by email at [oshrat@yorku.ca](mailto:oshrat@yorku.ca) or Dr. Michaela Hynie at [mhynie@yorku.ca](mailto:mhynie@yorku.ca). This research has been reviewed and approved by the Human Participants Research Committee (HPRC); York University's Ethics Review Board and conforms to the standards of the Canadian Tri-Council Research Ethics guidelines. If you have any questions about this process, or about your rights as a participant in this study, please contact Ms. Alison Collins-Mrakas, Manager, Research Ethics, 277 York Lanes, York University (telephone 416-736-5914 or e-mail [acollins@yorku.ca](mailto:acollins@yorku.ca))

##### **CONSENT**

I, (participant's name) \_\_\_\_\_ consent to participate in *The Self in Time* conducted by Oshrat A. Hodara and Dr. Michaela Hynie.

**Participants' signature:** \_\_\_\_\_ **Date:** \_\_\_\_\_

**Investigator's signature:** \_\_\_\_\_ **Date:** \_\_\_\_\_

## Appendix L

### Demographics Questionnaire

1. Age: \_\_\_\_\_
2. Gender: Male/Female
3. Your Ethnic/Racial Background: North American, Jewish-Israeli, Arab-Israeli
4. Where were you born (city/region, country)?
5. How long have you lived in Canada?
6. Are you a Canadian citizen? y/n
7. Do you identify more with (a) your Canadian identity or (b) country of birth identity?
8. In English your first language? y/n  
If no, how long have you been speaking English?
9. What language do you speak at home?
10. Do you consider yourself a religious person? y/n  
If so, what religion are you affiliated with?
11. Did you immigrate to Canada? y/n  
How long ago did you immigrate to Canada?
12. Did your parents immigrate to Canada? y/n  
How long ago did your parents immigrate to Canada?
13. Did your grandparents immigrate to Canada?
14. Are you experiencing conflict in your life currently?
15. If so, what type of conflict are you experiencing? Within yourself/between yourself and one other person/ between a group you belong to and another group?



## Appendix M

### Uncertainty and Personal Control Manipulations

#### **Instructions:**

Please read the following short article and answer the questions that follow.

#### **Uncertainty and Control Conditions Scenario:**

Ottawa's Minister of State for Finance, Ted Menzies, spoke in an interview with CBC journalist, Suzzane Jung, about the big world plunge in financial markets and its impact on Canada's uncertain infrastructure. According to Menzies, the financial turmoil around the work and neighboring countries, especially the United States, may or may not impact the Canadian economy. Financial officials are unsure how impacted Canadians are by the decisions and economic choices that other countries make. Don Black, a retired British Columbia politician stated that "there is no telling how the economic situation will unfold and be handled." There is great uncertainty about how many people will be working during and after the financial plunge. In addition, there are 60,000 jobs in question now then in July 2009. These unclear indicators suggest employment and economic uncertainty. There is ambiguity as to where Canada's net debts and deficit will be placed relative to the G7 (top seven economies in the world) countries (top seven economies in the world). There are doubts about where our economy will be in terms of job and security of fiscal position. In light of the recent economic downfall, future employment opportunities for students graduating in the next five years are unclear. Future employers may or may not maintain the number of job opportunities. Furthermore, institutions may or may not secure growth

opportunities, upward mobility, benefits, and financial incentives for employees. As a result, recent graduates are expected to encounter great uncertainty in obtaining and securing a job. The average hiring rate of recent graduates may or may not rise or fall in upcoming years. These factors directly affect students' financial confidence, which includes the ability to pay off student loans and establish young families. It is unclear whether graduates will be able to make their first major financial investments, such as the purchase of a home or a car. Economists are unclear about whether this recent economic downfall is a glitch or not, and whether the economy will return to stable and normal conditions. However, experts believe that you as an individual can control how the economic situation impacts you. Certain actions like earning a degree, obtaining employability skills, and gaining relative work experiences will help you control how much the world economy impacts you.

**Uncertainty and No Control Conditions Scenario:**

Ottawa's Minister of State for Finance, Ted Menzies, spoke in an interview with CBC journalist, Suzzane Jung, about the big world plunge in financial markets and its impact on Canada's uncertain infrastructure. According to Menzies, the financial turmoil around the world and neighboring countries, especially the United States, may or may not impact the Canadian economy. Financial officials are unsure how impacted Canadians are by the decisions and economic choices that other countries make. Don Black, a retired British Columbia politician stated that "there is no telling how the economic situation will unfold and be handled." There is great uncertainty about how many people will be working during and

after the financial plunge. In addition, there are 60,000 jobs in question now then in July 2009. These unclear indicators suggest employment and economic uncertainty. There is ambiguity as to where Canada's net debts and deficit will be placed relative to the G7 (top seven economies in the world) countries. There are doubts about where our economy will be in terms of job and security of fiscal position. In light of the recent economic downfall, future employment opportunities for students graduating in the next five years are unclear. Future employers may or may not maintain the number of job opportunities. Furthermore, institutions may or may not secure growth opportunities, upward mobility, benefits, and financial incentives for employees. As a result, recent graduates are expected to encounter great uncertainty in obtaining and securing a job. The average hiring rate of recent graduates may or may not rise or fall in upcoming years. These factors directly affect students' financial confidence, which includes the ability to pay off student loans and establish young families. It is unclear whether graduates will be able to make their first major financial investments, such as the purchase of a home or a car. Economists are unclear about whether this recent economic downfall is a glitch or not, and whether the economy will return to stable and normal conditions. Experts believe that you as an individual cannot control how the economic situation impacts you. No actions like earning a degree, obtaining employability skills, or gaining relative work experiences can help you control how much the world economy impacts you.

### **Positive Certainty and Control Conditions Scenario:**

Ottawa's Minister of State for Finance, Ted Menzies, spoke in an interview with CBC journalist, Suzzane Jung, about the big world plunge in financial markets and its impact on Canada's strong infrastructure. According to Menzies, the financial turmoil around the work and neighboring countries, especially the United States, does not greatly impact the Canadian economy as many think. We are only slightly impacted by the decisions and economic choices that other countries make through trade agreements, exports, and imports. Don Black, a retired British Columbia politician stated that "it is not the crisis that counts but how you handle the crisis." In fact, approximately 7,000 people are now working over previous months prior to the financial plunge. In addition, there are 60,000 more jobs now than in July 2009. These positive indicators suggest employment and economic growth. It is fact that Canada has the lowest net debts and lowest deficit among the G7 (top seven economies in the world) countries. Our economy is protected because we put in place the policies that ensure increase in jobs and security of a good fiscal position. In spite of the recent economic downfall, future employment opportunities for students graduating in the next five years are certain and positive. Future employers will ensure that the number of job opportunities remain high. Furthermore, many institutions are securing growth opportunities, upward mobility, benefits, and financial incentives for employees. As a result, recent graduates are expected to encounter great ease in obtaining and securing a job. The average hiring rate of recent graduates is expected to rise in upcoming years. These positive factors directly affect students' financial

confidence, which includes the ability to pay off student loans and establish young families. In addition, graduates are expected to find their first major financial investments, such as the purchase of a home or a car, to be a more rewarding endeavor than ever before. Economists are clear that this recent economic downfall is nothing but a glitch that has already returned to stable and normal conditions. Experts believe that you as an individual can control how the economic situation impacts you. Certain actions like earning a degree, obtaining employability skills, and gaining relative work experiences will help you control how much the world economy impacts you.

**Positive Certainty and No Control Conditions Scenario:**

Ottawa's Minister of State for Finance, Ted Menzies, spoke in an interview with CBC journalist, Suzzane Jung, about the big world plunge in financial markets and its impact on Canada's strong infrastructure. According to Menzies, the financial turmoil around the work and neighboring countries, especially the United States, does not greatly impact the Canadian economy as many think. We are only slightly impacted by the decisions and economic choices that other countries make through trade agreements, exports, and imports. Don Black, a retired British Columbia politician stated that "it is not the crisis that counts but how you handle the crisis." In fact, approximately 7,000 people are now working over previous months prior to the financial plunge. In addition, there are 60,000 more jobs now than in July 2009. These positive indicators suggest employment and economic growth. It is fact that Canada has the lowest net debts and lowest deficit among the G7 (top seven economies in the world) countries. Our economy

is protected because we put in place the policies that ensure increase in jobs and security of a good fiscal position. In spite of the recent economic downfall, future employment opportunities for students graduating in the next five years are certain and positive. Future employers will ensure that the number of job opportunities remain high. Furthermore, many institutions are securing growth opportunities, upward mobility, benefits, and financial incentives for employees. As a result, recent graduates are expected to encounter great ease in obtaining and securing a job. The average hiring rate of recent graduates is expected to rise in upcoming years. These positive factors directly affect students' financial confidence, which includes the ability to pay off student loans and establish young families. In addition, graduates are expected to find their first major financial investments, such as the purchase of a home or a car, to be a more rewarding endeavor than ever before. Economists are clear that this recent economic downfall is nothing but a glitch that has already returned to stable and normal conditions. However, experts believe that you as an individual cannot control how the economic situation impacts you. No actions like earning a degree, obtaining employability skills, or gaining relative work experiences can help you control how much the world economy impacts you.

**Negative Certainty and Control Conditions Scenario:**

Ottawa's Minister of State for Finance, Ted Menzies, spoke in an interview with CBC journalist, Suzzane Jung, about the big world plunge in financial markets and its impact on Canada's crumbling infrastructure. According to Menzies, the financial turmoil around the work and neighboring countries, especially the

United States, greatly impacts the Canadian economy. We are impacted by the decisions and economic choices that other countries make through trade agreements, exports, and imports. Don Black, a retired British Columbia politician stated that “the way the crisis is handled can impact individuals gravely.” In fact, approximately 7,000 people are now not working over previous months prior to the financial plunge. There are 60,000 less jobs now than in July 2009. These negative indicators suggest employment and economic decline. It is fact that Canada has one of the highest net debts and highest deficits among the G7 (top seven economies in the world) countries. Our economy is not protected because we do not put in place the policies that secure jobs and a good fiscal position. In light of the recent economic downfall, future employment opportunities for students graduating in the next five years are certain but negative. Future employers will restrict the number of job opportunities offered in organizations across the country. Furthermore, many institutions are reducing opportunities of growth, upward mobility, benefits, and financial incentives. As a result, recent graduates are expected to encounter hardships in obtaining and securing jobs. The average hiring rate of recent graduates is expected to decrease in upcoming years. These negative factors directly impact students’ ability to secure financial confidence, which includes the ability to pay off student loans and establish young families. In addition, graduates may find their first major financial investments, such as purchasing a home or a car, to be a more challenging endeavor than ever before. Economists are clear that this economic downfall is more than just a glitch in the system, and that the economy will not

return to its stable and normal conditions soon. Experts believe that you as an individual can control how the economic situation impacts you. Certain actions like earning a degree, obtaining employability skills, and gaining relative work experiences will help you control how much the world economy impacts you.

**Negative Certainty and No Control Conditions Scenario:**

Ottawa's Minister of State for Finance, Ted Menzies, spoke in an interview with CBC journalist, Suzzane Jung, about the big world plunge in financial markets and its impact on Canada's crumbling infrastructure. According to Menzies, the financial turmoil around the work and neighboring countries, especially the United States, greatly impacts the Canadian economy. We are impacted by the decisions and economic choices that other countries make through trade agreements, exports, and imports. Don Black, a retired British Columbia politician stated that "the way the crisis is handled can impact individuals gravely." In fact, approximately 7,000 people are now not working over previous months prior to the financial plunge. There are 60,000 less jobs now than in July 2009. These negative indicators suggest employment and economic decline. It is fact that Canada has one of the highest net debts and highest deficits among the G7 (top seven economies in the world) countries. Our economy is not protected because we do not put in place the policies that secure jobs and a good fiscal position. In light of the recent economic downfall, future employment opportunities for students graduating in the next five years are certain but negative. Future employers will restrict the number of job opportunities offered in organizations across the country. Furthermore, many institutions are reducing



opportunities of growth, upward mobility, benefits, and financial incentives. As a result, recent graduates are expected to encounter hardships in obtaining and securing jobs. The average hiring rate of recent graduates is expected to decrease in upcoming years. These negative factors directly impact students' ability to secure financial confidence, which includes the ability to pay off student loans and establish young families. In addition, graduates may find their first major financial investments, such as purchasing a home or a car, to be a more challenging endeavor than ever before. Economists are clear that this economic downfall is more than just a glitch in the system, and that the economy will not return to its stable and normal conditions soon. However, experts believe that you as an individual cannot control how the economic situation impacts you. No actions like earning a degree, obtaining employability skills, or gaining relative work experiences can help you control how much the world economy impacts you.

**Follow-Up Questionnaire:**

1. Do you believe Canada's economic situation is certain or uncertain?
2. Do you believe that Canada's economic situation is positive or negative?
3. What are your thoughts about the current economy and how it impacts students?
4. What do you plan on doing after you graduate?
5. Do you feel certain in your ability to secure a job upon graduation?
6. What will you do if you don't get a job?
7. Will you purchase a home or a car within the first five years after graduation?
8. Will your future plans change after reading this short article?

## Appendix N

### Uncertainty and Control Manipulation Checks

#### **Instructions:**

Please answer the following questions based on the short article you read at the beginning of the study.

1. According to the article, how certain is Canada's economic situation?

1	2	3	4	5	6
Very Uncertain	Somewhat Uncertain	Slightly Uncertain	Slightly Certain	Somewhat Certain	Very Certain

2. According to the article, how positive or negative is Canada's economic situation?

1	2	3	4	5	6
Very Negative	Somewhat Negative	Slightly Negative	Slightly Positive	Somewhat Positive	Very Positive

3. What is the likelihood that graduates will find jobs after graduation?

1	2	3	4	5	6
Very Unlikely	Somewhat Unlikely	Slightly Unlikely	Slightly Likely	Somewhat Likely	Very Likely

4. How easy will it be for graduates to afford assets like a car or home after graduation?

1	2	3	4	5	6
Very Hard	Somewhat Hard	Slightly Hard	Slightly Easy	Somewhat Easy	Very Easy

5. Canada's economy is:

a. Good                      b. bad                      c. uncertain

#### Personal Control Manipulation Check

1. Do you believe you have control over what happens in your life?    Y    N

## Appendix O

### State Trait Anxiety Inventory (STAI)

**Instructions:**

Read each statement and select the appropriate response to indicate how you feel right now, that is, at this very moment. There are no right or wrong answers. Do not spend too much time on any one statement but give the answer which seems to describe your present feelings best.

	1 Not at all	2 A little	3 Somewhat	4 Very Much So
1. I feel calm	1	2	3	4
2. I feel secure	1	2	3	4
3. I feel tense	1	2	3	4
4. I feel strained	1	2	3	4
5. I feel at ease	1	2	3	4
6. I feel upset	1	2	3	4
7. I am presently worrying over possible misfortunes	1	2	3	4
8. I feel satisfied	1	2	3	4
9. I feel frightened	1	2	3	4
10. I feel uncomfortable	1	2	3	4
11. I feel self confident	1	2	3	4
12. I feel nervous	1	2	3	4
13. I feel jittery	1	2	3	4
14. I feel indecisive	1	2	3	4
15. I am relaxed	1	2	3	4
16. I feel content	1	2	3	4
17. I am worried	1	2	3	4
18. I feel confused	1	2	3	4
19. I feel steady	1	2	3	4
20. I feel pleasant	1	2	3	4

## Appendix P

### Informed Consent

#### **INFORMED CONSENT FORM: THE SELF IN TIME** **RESEARCHER(S): Oshrat A. Hodara & Dr. Michaela Hynie**

##### **INFORMATION**

You are invited to participate in a research study being conducted by Oshrat A. Hodara of the psychology department at York University. The main purpose of this study is to examine people's perceptions of themselves over time. The study consists of filling out a series of questionnaires online. You will be asked to answer questions about your thoughts, values, and beliefs as they relate to perceptions of time. The study will take approximately 30 minutes to complete.

##### **COMPENSATION**

For participation, you will receive research credit(s) towards your course.

##### **RISKS & BENEFITS**

As a participant in this study, you will contribute to the development of knowledge concerning how people think about past, present, and future events. You will also gain exposure to methods that researchers use to study how people imagine time related events and thus enhance your understanding of psychological research processes. Should you experience discomfort at any point, you can discontinue your participation without any penalty (i.e., you will still be awarded your research credit). In addition, you can contact York University's Counselling and Development Centre at (416) 736-5297 or visit them at N110 Bennett Centre for Student Services.

##### **VOLUNTARY PARTICIPATION**

Your participation in this study is voluntary; you may decline to participate without penalty. If you decide to participate, you may withdraw from the study at any time without penalty. If you withdraw from the study before your questionnaire is handed in, the questionnaire will be returned to you or destroyed. Note also that you have the right to omit any question or procedure you choose.

##### **CONFIDENTIALITY**

All of your responses will remain confidential to the fullest extent permissible by law. That is, the questionnaire will be stored in a locked room within the psychology department and will be accessed only by the researchers (Oshrat A. Hodara & Dr. Michaela Hynie). Your responses will also be kept completely anonymous: there will be no identifying information on the questionnaire and consent forms will be handled separately from the questionnaires. All data will be destroyed seven years after the completion of the study, in accordance with American Psychological Association guidelines.

##### **CONTACT**

If you have questions at any time about the study or the procedures, please feel free to contact Oshrat A. Hodara by email at [oshrat@yorku.ca](mailto:oshrat@yorku.ca) or Dr. Michaela Hynie at [mhynie@yorku.ca](mailto:mhynie@yorku.ca). This research has been reviewed and approved by the Human Participants Research Committee (HPRC); York University's Ethics Review Board and conforms to the standards of the Canadian Tri-Council Research Ethics guidelines. If you have any questions about this process, or about your rights as a participant in this study, please contact Ms. Alison Collins-Mrakas, Manager, Research Ethics, 277 York Lanes, York University (telephone 416-736-5914 or e-mail [acollins@yorku.ca](mailto:acollins@yorku.ca))

##### **CONSENT**

I, (participant's name) \_\_\_\_\_ consent to participate in  
*The Self in Time* conducted by Oshrat A. Hodara and Dr. Michaela Hynie.

**Participants' signature:** \_\_\_\_\_ **Date:** \_\_\_\_\_

**Investigator's signature:** \_\_\_\_\_ **Date:** \_\_\_\_\_

Appendix Q  
Demographics Questionnaire

שאלון דמוגרפי:

גיל: \_\_\_\_\_

מין: זכר / נקבה

מהי שפת האם שלך? עברית / ערבית / אחר: \_\_\_\_\_

האם אתה מחשיב עצמך כאדם דתי? כן / לא

אם כן, לאיזו דת אתה משתייך? \_\_\_\_\_

האם אתה חווה כרגע קונפליקט בחיידך? כן / לא

אם כן, איזה סוג של קונפליקט אתה חווה?

א. עם עצמך

ב. בין עצמך לאדם אחר.

1. Age: \_\_\_\_\_
2. Gender: Male/Female
3. What is your mother tongue? Hebrew / Arabic / Other: \_\_\_\_\_
4. Do you consider yourself a religious person? y/n
5. Are you experiencing conflict in your life currently?
6. If so, what type of conflict are you experiencing?
  - a. Within yourself
  - b. between yourself and one other person

## Appendix R

### Temporal Focus Inventory (TFI) -Hebrew

שלפניך את המספר המתאים לפי הסקאלה שלהלן, כך שישקף את עמדותיך בצורה הכנה ביותר. להלן היגדים לגבי האופן שבו הנך תופס את עצמך בזמן. אנא ציין ליד כל אחד מההיגדים שלפניך את המספר המתאים לפי הסקאלה שלהלן, כך שישקף את עמדותיך בצורה הכנה ביותר.

7	6	5	4	3	2	1
מסכים במידה רבה	מסכים	מסכים במקצת	ניטרלי	לא מסכים במקצת	לא מסכים	לא מסכים כלל

איני יכול לברוח מרגשותיי לגבי העבר והאופן שבו הם עיצבו את מי שאני היום. \_\_\_\_\_

אני נוטה להתמקד בחיי בלקחים שלמדתי מ'הכאן והעכשיו'. \_\_\_\_\_

כשאני חולם, אני חולם על מחר. \_\_\_\_\_

העבר מעצב את ההבנה שלי לגבי עצמי. \_\_\_\_\_

איני יכול להימנע מלחשוב על 'הכאן והעכשיו' וכיצד זה משפיע על מי שאני. \_\_\_\_\_

אני נהנה לחשוב על העתיד ואיך דברים יכולים להיות. \_\_\_\_\_

אני מי שאני בגלל חוויות העבר שלי. \_\_\_\_\_

אירועים עכשוויים משפיעים במידה רבה על מחשבותיי, רגשותיי ופעולותיי. \_\_\_\_\_

כשיש לי קצת זמן לחשוב, אני נוטה להתמקד באירועים וביחסים עתידיים. \_\_\_\_\_

אני נוטה להרהר בלקחים מהחיים שלמדתי בעבר. \_\_\_\_\_

אני נהנה לחוות את החיים בעודם מתגוללים ברגע המסוים הזה. \_\_\_\_\_

אני תופס את עצמי חולם על העתיד וכיצד ייראו חיי. \_\_\_\_\_

אירועי עבר משפיעים במידה רבה על מחשבותיי, רגשותיי ופעולותיי. \_\_\_\_\_

ההווה מעצב את ההבנה שלי לגבי עצמי. \_\_\_\_\_

אירועים עתידיים משפיעים במידה רבה על מחשבותיי, רגשותיי ופעולותיי. \_\_\_\_\_

## Appendix S

### Collective Self-Esteem (Scale Revised)

שלך. אנא קרא כל היגד בעיון והשב לפי הסקאלה שלפניך. אנא ציין עד כמה אתה מסכים עם כל אחד מההיגדים שלפניך, בהתאם לקבוצת השיוך התרבותי שלך. אנא קרא כל היגד בעיון והשב לפי הסקאלה שלפניך.

7	6	5	4	3	2	1
מסכים במידה רבה	מסכים	מסכים במידה מועטה	ניטרלי	לא מסכים במידה מועטה	לא מסכים	לא מסכים כלל

- אני חבר ראוי בקבוצת השיוך התרבותי שלי. \_\_\_\_\_
- אני מתחרט שאני משתייך לקבוצת השיוך התרבותי שלי לעתים קרובות. \_\_\_\_\_
- באופן כללי, קבוצת השיוך התרבותי שלי נחשבת טובה בעיני אחרים. \_\_\_\_\_
- באופן כללי, חברי קבוצת השיוך התרבותי שלי לא יכולים לעשות כמעט דבר עם האופן שבו אני מרגיש לגבי עצמי. \_\_\_\_\_
- אני מרגיש שאין לי הרבה להציע לקבוצת השיוך התרבותי שלי. \_\_\_\_\_
- באופן כללי, אני שמח להיות חבר בקבוצת השיוך התרבותי שלי. \_\_\_\_\_
- רוב האנשים מחשיבים את קבוצת השיוך התרבותי שלי, בממוצע, כלא יעילה בהשוואה לקבוצות שיוך תרבותי אחרות. \_\_\_\_\_
- קבוצת השיוך התרבותי שלי היא בבואה חשובה למי שאני. \_\_\_\_\_
- אני שותף פעיל בקבוצת השיוך התרבותי שלי. \_\_\_\_\_
- ככלל, אני מרגיש לעתים קרובות שחברות בקבוצת השיוך התרבותי שלי אינה משתלמת. \_\_\_\_\_
- באופן כללי, אחרים מכבדים את קבוצת השיוך התרבותי שלי. \_\_\_\_\_
- קבוצת השיוך התרבותי שלי אינה חשובה לתחושה של איזה סוג של אדם אני. \_\_\_\_\_
- אני מרגיש לעתים קרובות שאני חבר חסר תועלת בקבוצת השיוך התרבותי שלי. \_\_\_\_\_
- אני מרגיש טוב לגבי קבוצת השיוך התרבותי שלי. \_\_\_\_\_
- באופן כללי, אחרים חושבים שקבוצת השיוך התרבותי שלי היא חסרת ערך. \_\_\_\_\_
- ככלל, קבוצת השיוך התרבותי שלי היא חלק חשוב מהדימוי העצמי שלי. \_\_\_\_\_



**Instructions:**

Please consider your membership in your cultural group and respond to the following statements on the basis of how you feel about your cultural group and your membership in your cultural group. Please read each statement carefully and respond by using the following scale.

1	2	3	4	5	6	7
Strongly Disagree	Disagree	Somewhat Disagree	Neutral	Somewhat Agree	Agree	Strongly Agree

1. I am a worthy member of the cultural group I belong to.
2. I often regret that I belong to the cultural group I do.
3. Overall, my cultural group is considered good by others.
4. Overall, my cultural group membership has very little to do with how I feel about myself.
5. I feel I don't have much to offer to the cultural group I belong to.
6. In general, I'm glad to be a member of the cultural group I belong to.
7. Most people consider my cultural group, on the average, to be more ineffective than other cultural groups.
8. The cultural group I belong to is an important reflection of who I am.
9. I am a cooperative participant in the cultural group I belong to.
10. Overall, I often feel that membership in the cultural group is not worthwhile.
11. In general, others respect the cultural group that I am a member of.
12. The cultural group I belong to is unimportant to my sense of what kind of a person I am.
13. I often feel I'm a useless member of my cultural group.
14. I feel good about the cultural group I belong to.
15. In general, others think that the cultural group I am a member of is unworthy.
16. In general, belonging to my cultural group is an important part of my self-image.

## Appendix T

### Satisfaction with Life Scale (SWLS) – Hebrew

אנא ציין עד כמה אתה מסכים עם כל אחד מההיגדים הבאים בהתאם לסקאלה שלפניך.

7	6	5	4	3	2	1
מסכים במידה רבה	מסכים	מסכים במידה מועטה	ניטרלי	לא מסכים במידה מועטה	לא מסכים	לא מסכים כלל

ברוב התחומים חיי קרובים לאידיאל שלי. \_\_\_\_\_

תנאי חיי מצוינים. \_\_\_\_\_

אני שבע רצון מהחיים שלי. \_\_\_\_\_

עד כה השגתי את הדברים החשובים שאני רוצה בחיי. \_\_\_\_\_

אילו יכולתי לחיות את חיי שוב, לא הייתי משנה כמעט דבר. \_\_\_\_\_

## Appendix U

### Levenson Multidimensional Locus of Control Inventory

#### **Instructions:**

Please rate your level of agreement with each of the statement below using the rating scale provided.

1	2	3	4	5	6
Very Strongly Agree	Agree	Mostly Agree	Mostly Disagree	Disagree	Very Strongly Disagree

1. Whether or not I get to be a leader depends mostly on my ability.
2. To a great extent my life is controlled by accidental happenings.
3. I feel like what happens in my life is mostly determined by powerful people.
4. Whether or not I get into a car accident depends mostly on how good a driver I am.
5. When I make plans, I am almost certain to make them work.
6. Of ten there is no chance of protecting my personal interests form bad luck happenings.
7. When I get what I want, it is usually because I'm lucky.
8. Although I might have good ability, I will not be given leadership responsibility without appealing to those positions of power.
9. How many friends I have depends on how nice a person I am.
10. I have often found that what is going to happen will happen.
11. My life is chiefly controlled by powerful others.
12. Whether or not I get into a car accident is mostly a matter of luck.
13. People like myself have very little chance of protecting our personal interests when they conflict with those of strong pressure groups.

14. It's not always wise for me to plan too far ahead because many things turn out to be a matter of good or bad fortune.
15. Getting what I want requires pleasing those people above me.
16. Whether or not I get to be a leader depends on whether I'm lucky enough to be in the right place at the right time.
17. If important people were to decide they didn't like me, I probably wouldn't make many friends.
18. I can pretty much determine what will happen in my life.
19. I am usually able to protect my personal interests.
20. Whether or not I get into a car accident depends mostly on the other driver.
21. When I get what I want, it's usually because I worked hard for it.
22. In order to have my plans work, I make sure that they fit in with the desires of people who have power over me.
23. My life is determined by my own actions.
24. It's chiefly a matter of fate whether or not I have a few friends or many friends.

## Appendix V

### Measure of Implicit Person Theories

**Instructions:**

Please rate your level of agreement with each of the statement below using the rating scale provided.

1	2	3	4	5	6
Very Strongly Agree	Agree	Mostly Agree	Mostly Disagree	Disagree	Very Strongly Disagree

1. The kind of person someone is something very basic about them and it can't be changed very much.
2. People can do things differently, but the important parts of who they are can't really be changed.
3. Everyone is a certain kind of person and there is not much that can be done to really change that.

## Appendix W

### Intergroup Outcomes

#### נוסח עבור נבדקים יהודים:

לפניך היגדים המבקשים לבחון את עמדותיך בנושאים שונים. אנא ציין ליד כל אחד מהם באיזו מידה אתה מסכים לפי הסקאלה שלהלן. אנא השב בכנות אשר תשקף את עמדתך האישית.

7	6	5	4	3	2	1
מסכים במידה רבה	מסכים	מסכים במקצת	ניטרלי	לא מסכים במקצת	לא מסכים	לא מסכים כלל

\_\_\_\_\_ אני חש עוינות כלפי הקבוצה הערבית בשל יחסה לקבוצה היהודית.

\_\_\_\_\_ אינני אופטימי לגבי עתיד היחסים בין יהודים וערבים בישראל.

\_\_\_\_\_ כאשר אני רואה אם ערבייה המבכה את בנה שנהרג אני שותף לצערה.

\_\_\_\_\_ אני מאמין שהקונפליקט היהודי-ערבי הוא פתיר.

\_\_\_\_\_ אני מרגיש שאינני מסוגל לסלוח לערבים על מה שהתרחש בעבר.

\_\_\_\_\_ הייתי שמח לפגוש יותר ערבים בני גילי ולהכירם מקרוב.

\_\_\_\_\_ אינני מאמין בכוונות הטובות של הערבים כלפי היהודים.

\_\_\_\_\_ אני מאמין להבטחותיהם של מנהיגים ערביים.

\_\_\_\_\_ אני מזדהה עם האוכלוסייה היהודית בישראל.

\_\_\_\_\_ כשאני מדבר על יהודים, אני בדרך כלל אומר "אנחנו" ולא "הם".

\_\_\_\_\_ כשמישהו משבח את היהודים, ההרגשה היא כאילו נתנו לי מחמאה באופן אישי.

\_\_\_\_\_ אני מרגיש קשר עמוק כלפי היהודים בישראל.

### נוסח עבור נבדקים ערבים:

לפניך היגדים המבקשים לבחון את עמדותיך בנושאים שונים. אנא ציין ליד כל אחד מהם באיזו מידה אתה מסכים לפי הסקאלה שלהלן. אנא השב בכנות אשר תשקף את עמדתך האישית.

7	6	5	4	3	2	1
מסכים במידה רבה	מסכים	מסכים במקצת	ניטרלי	לא מסכים במקצת	לא מסכים	לא מסכים כלל

אני חש עוינות כלפי הקבוצה היהודית בשל יחסה לקבוצה הערבית בישראל. \_\_\_\_\_

אינני אופטימי לגבי עתיד היחסים בין יהודים וערבים בישראל. \_\_\_\_\_

כאשר אני רואה אם יהודיה המבכה את בנה שנהרג אני שותף לצערה. \_\_\_\_\_

אני מאמין שהקונפליקט היהודי-ערבי הוא פתיר. \_\_\_\_\_

אני מרגיש שאינני מסוגל לסלוח ליהודים על מה שהתרחש בעבר. \_\_\_\_\_

הייתי שמח לפגוש יותר יהודים בני גילי ולהכירם מקרוב. \_\_\_\_\_

אינני מאמין בכוונות הטובות של היהודים כלפי הערבים. \_\_\_\_\_

אני מאמין להבטחותיהם של מנהיגים יהודיים. \_\_\_\_\_

אני מזדהה עם המגזר הערבי בישראל. \_\_\_\_\_

כשאני מדבר על ערבים ישראלים, אני בדרך כלל אומר "אנחנו" ולא "הם". \_\_\_\_\_

כשמישהו משבח את הערבים בישראל, ההרגשה היא כאילו נתנו לי מחמאה באופן אישי. \_\_\_\_\_

אני מרגיש קשר עמוק כלפי הערבים בישראל. \_\_\_\_\_

**Instructions:**

Below are 12 statements that you may agree or disagree with. Using the 1 - 7 scale below, indicate your agreement with each item by placing the appropriate number on the line preceding that item. Please be open and honest in your responding.

1	2	3	4	5	6	7
Strongly Disagree	Disagree	Slightly Disagree	Neutral	Slightly Agree	Agree	Strongly Agree

1. \_\_\_\_ I feel hostility towards the Arab/Jewish group due to its attitude to the Arab/Jewish group in Israel.
2. \_\_\_\_ I am not optimistic with respect to the future of Jewish-Arab relationship.
3. \_\_\_\_ When I see an Arab/Jewish mother that mourns the death of her son that was killed, I share her sorrow.
4. \_\_\_\_ I believe that the Jewish-Arab conflict can be resolved.
5. \_\_\_\_ I feel that I cannot forgive the Arabs/Jews for what has happened in the past.
6. \_\_\_\_ I would be glad to meet more Arabs/Jews that are my age and get to know them better.
7. \_\_\_\_ I do not believe the good intentions of the Arabs/Jews towards the Jews/Arabs.
8. \_\_\_\_ I believe the promises of Arab/Jewish leaders.
9. \_\_\_\_ I identify with the Jewish/Arab sector in Israel.
10. \_\_\_\_ When I speak about Israeli Jews/Arabs, I usually say "we" and not "them".
11. \_\_\_\_ When someone speak highly of Israeli Jews/Arabs, I feel like I was personally complemented.
12. \_\_\_\_ I feel a deep connection to Israeli Jews/Arabs.



## Appendix X

שלום רב,

שמי נירית ואני סטודנטית שנה ג' במכללה האקדמית תל אביב-יפו בפקולטה למדעי התנהגות.

אני מודה לך על הקדשה מזמנך והשתתפותך במחקר.

מטרת המחקר היא לבחון את השפעת עיבודי המידע השונים על הבנת המציאות.

הנך מתבקש/ת לקרוא בעיון את ההוראות ולענות על השאלות.

זמן מילוי השאלונים הינו כחצי שעה.

במידה והנך נתקל/ת בבעיה כלשהי הנך מוזמן/ת לשאול.

השאלונים ימולאו בעלום שם. הנתונים שיתקבלו מהמחקר הם לצרכי מחקר זה בלבד ולא יעשה בהם שימוש נוסף.

אינך חייב לענות על כל השאלות. במידה ותרגיש אי נוחות הנך רשאי להפסיק את מילוי השאלון בכל שלב.

הבנה טובה יותר של דרכי עיבוד מידע בקרב בני אדם. היתרונות למשתתפים או לאחרים כתוצאה מהמחקר:

ייתכן ותתעורר הרגשת אי נוחות בשל שיתוף הסיכונים הידועים / אי נוחות, שניתן לחזותם למשתתף במחקר:

בחויות אישיות.

נבדק יקר, אינך מקבל את מלוא האינפורמציה על המחקר, ומידע מלא יישלח אליך בסיום הרצת המחקר. כמו כן, בתום

המחקר ניתן לקבל פרטים נוספים בועדת האתיקה של המכללה האקדמית של תל אביב יפו ע"י טופס ה-

DEBRIEFING.

niritdiamant@gmail.com בנוסף ניתן לפנות אליי במייל

למען שמירה על פרטיותך אבקשך לשלוח את השאלון במעטפה האטומה והמבוילת המצורפת.

במידה והשאלונים ימולאו בנוכחותי, יאספו השאלונים ויוכנסו למעטפה אטומה. התחייבותי היא לפתוח את המעטפה

רק לאחר הצטברות של לפחות 10 שאלונים.

מילוי שאלון זה מבטא את הסכמתי להשתתפות במחקר. הפסקת מילוי השאלון בכל שלב תחשב כביטוי לכך שחזרתי בי

כל שימוש בפרטים שמלאתי. מהסכמתי להשתתף, ובמקרה זה לא יעשה

Greetings,

My name is Nirit and I am a third-year student in the behavioural sciences faculty at the Tel Aviv-Jaffa College. I thank you in advance for dedicating your time and choosing to participate in this study. The purpose of this study is to test the relationship between different aspects of information processing to the understanding of reality.

Please read each question and answer the questions provided. The completion of the questionnaire package should take approximately 30 minutes. Should you encounter a problem while completing the questionnaire, please do not hesitate to ask for assistance.

The questionnaire will be completed anonymously. The data collected will serve the purposed of this research only and no other purpose. You are not required to answer all the questions. Should you feel uncomfortable answering any of the questions, you are permitted to not answer and stop your participation at any time.

The benefits to individuals who choose to participate in the study: a better understanding of information processing in human behaviour, and contribution to the knowledge of others. The known risks: discomfort answering some questions and possible negative understanding of their personal experiences.

Dear participant, you are not receiving complete information about this research. The full information about the study will be given to you upon completion of the research. You will be given contact information to receive more feedback about the study. In addition, you will receive the contact information to the ethical board of the Tel Aviv-Jaffa College. This information will also be included in your debriefing form. You can also contact me via email at [niritdiamant@gmail.com](mailto:niritdiamant@gmail.com). To secure your confidentiality, I ask that you seal your questionnaire in the stamped and addressed envelope. If you choose to complete the questionnaire in person

today, it will be collected and immediately placed in a sealed envelope. I am required to open the questionnaires only after collecting at least 10 sealed envelopes with questionnaires.

The completion of this questionnaire is indicative of your agreement to participate in the study. Stopping your participation at any stage is indicative of your request to withdraw your participation and any information that you provided.

## Appendix Y

### Demographics Questionnaire

שאלון דמוגרפי:

גיל: \_\_\_\_\_

מין: זכר / נקבה

מהי שפת האם שלך? עברית / ערבית / אחר: \_\_\_\_\_

האם אתה מחשיב עצמך כאדם דתי? כן / לא

אם כן, לאיזו דת אתה משתייך? \_\_\_\_\_

האם אתה חווה כרגע קונפליקט בחיידך? כן / לא

אם כן, איזה סוג של קונפליקט אתה חווה?

א. עם עצמך

ב. בין עצמך לאדם אחר.

1. Age: \_\_\_\_\_
2. Gender: Male/Female
3. What is your mother tongue? Hebrew / Arabic / Other: \_\_\_\_\_
4. Do you consider yourself a religious person? y/n
5. Are you experiencing conflict in your life currently?
6. If so, what type of conflict are you experiencing?
  - a. Within yourself
  - b. between yourself and one other person

Appendix Z

Temporal Focus Manipulation

**א. מניפולציה עבור נבדקים בתנאי "עבר":**

תארי אירוע/מקרה משמעותי שאירע בעברך ואשר עיצב/השפיע על מי שהנך היום :

---

---

---

---

**ב. מניפולציה עבור נבדקים בתנאי "עתיד":**

חשוב/חשבי על עתידך. תארי במספר משפטים היכן את/ה רואה את עצמך בעוד

5 שנים :

---

---

---

---

A. Describe a significant event that occurred in your past that shaped and influenced who you are today:

---

---

---

B. Think about your future. Describe in a few sentences where you see yourself in the next five years:

---

---

---

## Appendix AA

שלום רב,

שמי נירית ואני סטודנטית שנה ג' במכללה האקדמית תל אביב-יפו בפקולטה למדעי התנהגות.

אני מודה לך על הקדשה מזמנך והשתתפותך במחקר.

מטרת המחקר היא לבחון את השפעת עיבודי המידע השונים על הבנת המציאות.

הנך מתבקש/ת לקרוא בעיון את ההוראות ולענות על השאלות.

זמן מילוי השאלונים הינו כחצי שעה.

במידה והנך נתקל/ת בבעיה כלשהי הנך מוזמן/ת לשאול.

השאלונים ימולאו בעלום שם. הנתונים שיתקבלו מהמחקר הם לצרכי מחקר זה בלבד ולא יעשה בהם שימוש נוסף.

אינך חייב לענות על כל השאלות. במידה ותרגיש אי נוחות הנך רשאי להפסיק את מילוי השאלון בכל שלב.

הבנה טובה יותר של דרכי עיבוד מידע בקרב בני אדם. היתרונות למשתתפים או לאחרים כתוצאה מהמחקר:

ייתכן ותתעורר הרגשת אי נוחות בשל שיתוף הסיכונים הידועים / אי נוחות, שניתן לחזותם למשתתף במחקר:

בחוויות אישיות.

נבדק יקר, אינך מקבל את מלוא האינפורמציה על המחקר, ומידע מלא יישלח אליך בסיום הרצת המחקר. כמו כן, בתום

המחקר ניתן לקבל פרטים נוספים בועדת האתיקה של המכללה האקדמית של תל אביב יפו ע"י טופס ה-

DEBRIEFING.

niritdiamant@gmail.com בנוסף ניתן לפנות אליי במייל

למען שמירה על פרטיותך אבקשך לשלוח את השאלון במעטפה האטומה והמבוילת המצורפת.

במידה והשאלונים ימולאו בנוכחותי, יאספו השאלונים ויוכנסו למעטפה אטומה. התחייבותי היא לפתוח את המעטפה

רק לאחר הצטברות של לפחות 10 שאלונים.

מילוי שאלון זה מבטא את הסכמתי להשתתפות במחקר. הפסקת מילוי השאלון בכל שלב תחשב כביטוי לכך שחזרתי בי

כל שימוש בפרטים שמלאתי. מהסכמתי להשתתף, ובמקרה זה לא יעשה

Greetings,

My name is Nirit and I am a third-year student in the behavioural sciences faculty at the Tel Aviv-Jaffa College. I thank you in advance for dedicating your time and choosing to participate in this study. The purpose of this study is to test the relationship between different aspects of information processing to the understanding of reality.

Please read each question and answer the questions provided. The completion of the questionnaire package should take approximately 30 minutes. Should you encounter a problem while completing the questionnaire, please do not hesitate to ask for assistance.

The questionnaire will be completed anonymously. The data collected will serve the purposed of this research only and no other purpose. You are not required to answer all the questions. Should you feel uncomfortable answering any of the questions, you are permitted to not answer and stop your participation at any time.

The benefits to individuals who choose to participate in the study: a better understanding of information processing in human behaviour, and contribution to the knowledge of others. The known risks: discomfort answering some questions and possible negative understanding of their personal experiences.

Dear participant, you are not receiving complete information about this research. The full information about the study will be given to you upon completion of the research. You will be given contact information to receive more feedback about the study. In addition, you will receive the contact information to the ethical board of the Tel Aviv-Jaffa College. This information will also be included in your debriefing form. You can also contact me via email at [niritdiamant@gmail.com](mailto:niritdiamant@gmail.com). To secure your confidentiality, I ask that you seal your questionnaire



in the stamped and addressed envelope. If you choose to complete the questionnaire in person today, it will be collected and immediately placed in a sealed envelope. I am required to open the questionnaires only after collecting at least 10 sealed envelopes with questionnaires.

The completion of this questionnaire is indicative of your agreement to participate in the study. Stopping your participation at any stage is indicative of your request to withdraw your participation and any information that you provided.

Appendix AB  
Order of Materials

Study 1

1. Study description and consent
2. Demographics (gender)
3. Temporal Focus Inventory (TFI)
4. Optimism/Pessimism
5. Self-Esteem
6. Self-Liking/Self-Competence
7. Self-Control
8. Need for Closure
9. Regulatory Focus
10. Life Satisfaction
11. Locus of Control
12. Perceived Stress
13. Happiness
14. Depression
15. Thank you and debrief

Study 2

1. Study description and consent
2. Demographics (age, gender, ethnicity, race, religion, language, and citizenship)
3. Self-reported conflict
4. Uncertainty and control manipulation
5. Temporal Focus Inventory (TFI)
6. Implicit Person Theories
7. Religiosity
8. Life Satisfaction
9. Depression
10. State-Anxiety
11. Uncertainty manipulation checks
12. Control manipulation check
13. Thank you and debrief

Study 3

1. Study description and consent
2. Demographics (age, gender, mother tongue, religious status, conflict, type of conflict)
3. Temporal Focus Inventory (TFI)
4. Collective Self-Esteem
5. Multidimensional Locus of Control

6. Implicit Person Theories
7. Life Satisfaction
8. Group Outcomes
9. Thank you and debrief

#### Study 4

1. Study description and consent
2. Demographics (age, gender, mother tongue, religious status, conflict, conflict type)
3. Time manipulation
4. Culture
5. Collective Self-Esteem
6. Multidimensional Locus of Control
7. Implicit Person Theories
8. Life Satisfaction
9. Group Outcomes
10. Temporal Focus Inventory (TFI)
11. Thank you and debrief