



2015

## The Effect of the Induced Compliance Paradigm on Emotions During Inter-group Conflict

Roi Edelstein  
roiedelstein@mail.tau.ac.il

Yigal Rosen  
yigal\_rosen@harvard.com

Follow this and additional works at: <https://nsuworks.nova.edu/pcs>



Part of the [Peace and Conflict Studies Commons](#), and the [Social Psychology Commons](#)

### Recommended Citation

Edelstein, Roi and Rosen, Yigal (2015) "The Effect of the Induced Compliance Paradigm on Emotions During Inter-group Conflict," *Peace and Conflict Studies*: Vol. 22 : No. 2 , Article 2.

DOI: 10.46743/1082-7307/2015.1283

Available at: <https://nsuworks.nova.edu/pcs/vol22/iss2/2>

This Article is brought to you for free and open access by the Peace & Conflict Studies at NSUWorks. It has been accepted for inclusion in Peace and Conflict Studies by an authorized editor of NSUWorks. For more information, please contact [nsuworks@nova.edu](mailto:nsuworks@nova.edu).

---

# The Effect of the Induced Compliance Paradigm on Emotions During Inter-group Conflict

## Abstract

The existence and intensity of a conflict are dependent in part on the attitudes and emotions of an individual. Previous studies demonstrated the effectiveness of creating cognitive dissonance in order to change attitudes towards out-group members. The current study examines the ability to decrease negative emotions and to increase the empathy in a conflict situation through the induced compliance paradigm. An experiment was performed on 60 Jewish students in Israel regarding the context of the conflict between Jewish and Arab-Israeli citizens in Israel. Some of the participants (n=43) performed an induced-compliance task focused on writing an essay as an Arab-Israeli student about their emotions after reading an authentic case study. Results revealed that after performing the task, cognitive empathy decreased significantly, while hatred levels increased significantly. In general, activities which were hypothesized to decrease negative emotions and increase empathy caused opposite effects. Findings are discussed in the context of this study's hypothesis and in respect to related research in this field. Insights from this study may provide useful recommendations for building experimental frameworks which aim to develop and increase empathy during conflict situations. Future research directions are discussed in the context of emotion regulation in regards to inter-group conflict.

**Keywords:** *Inter-group relations, empathy, affective dissonance, induced compliance, peace education*

## Author Bio(s)

**Roi Edelstein** is a PhD candidate at Tel-Aviv University, the Faculty of Management. He holds an MA in Conflict Resolution (with Honors) from Ben-Gurion University of the Negev, Israel. His research interests include emotion regulation, inter-group relations and empathy. Contact: [roiedelstein@mail.tau.ac.il](mailto:roiedelstein@mail.tau.ac.il)

**Dr. Yigal Rosen** is a Senior Research Scientist at Harvard University. His recent studies focus on advancing online and residential learning technologies practices in higher education. Prior to joining Harvard, Yigal was a Senior Research Scientist at Pearson Education. Yigal previously held academic appointments at the University of Haifa, the Open University of Israel and Ben-Gurion University. In 2009 he received the University of Haifa Faculty of Education's Outstanding Lecturer Award. He obtained his Ph.D. from the University of Haifa, being the youngest recipient of a doctoral degree in the University. Yigal was a post-doctoral fellow at Harvard University Graduate School of Education and at Tel Aviv University School of Education. Yigal is a co-editor of the recently published book, "Handbook of Research on Technology Tools for Real-World Skill Development". Contact: [yigal\\_rosen@harvard.com](mailto:yigal_rosen@harvard.com)

# **The Effect of the Induced Compliance Paradigm on Emotions During Inter-group Conflict**

**Roi Edelstein and Yigal Rosen**

## **Introduction**

Conflicts are an inherent part of human life. However, conflict situations have negative effects on individuals and groups. According to Bar-Tal (2007), intractable conflicts can cause negative consequences on the psychological-social level. These consequences are often expressed in feelings of pressure, suffering, misery, uncertainty, and sometimes even casualty. In intractable conflicts, a socio-psychological repertoire is developed which includes beliefs, attitudes and emotions. This repertoire can affect the conflict's duration and intensity (Bar-Tal). Researchers focused on social relationships between groups found that an individual's negative attitudes toward out-group members can be changed in order to resolve conflicts (e.g., Beauvois & Joule, 1999; Elliot & Devine, 1994; Harmon-Jones & Mills, 1999; Starzyk, Fabrigar, Soryal, & Fanning, 2009).

Based on these conceptualizations and research findings, an individual experiencing a conflict situation wherein negative attitudes exist can be influenced to be more positive when a state of cognitive dissonance is created. A technique used to create this change is called *induced compliance*. In this technique, the individual is asked to express an attitude that reflects the opposite of his or her original attitude. The goal is to create a state of dissonance which can be resolved by attitudinal changes (Festinger & Carlsmith, 1959). As a result, the individual will experience more positive attitudes toward the out-group members in order to reduce the intensity of the conflict. In addition, this technique was found helpful in improving relations between members of different groups.

The purpose of the current study is to examine the effects of the induced compliance task beyond its influence on attitudes, focusing on the efficiency of this technique on affecting emotions, more specifically, to evaluate the effects of the induced

compliance paradigm on cognitive and emotional empathy in a conflict situation. While most previous studies have focused on testing the ability to change attitudes in conflict situations, the current study determines if this technique can be useful in order to change emotions as well. The case study is performed with Jewish students in Israel in the context of the Arab-Israeli conflict.

### **Emotions and Conflict**

Emotions are multifaceted evaluative reactions to stimuli of different kinds. They include biochemical, physiological, affective, cognitive, and behavioral processes (Cacioppo & Gardner, 1999; Ekman & Davidson, 1994; Manstead, Frijda, & Fischer, 2004). Emotions can help us during our life. They represent our internal world and our relationships with the external world. Emotions also help us to function. Nevertheless, negative emotions which are experienced to an extreme can hurt us and our environment. They can lead to maladaptation by eliciting dysfunctional reactions in certain situations, characterized by irrationality and destructiveness. Emotions play a central role in conflicts (Bar-Tal, Halperin, & deRivare, 2007). In conflict situations, "hot" negative emotions (triggering impulsive and hasty reactions) can escalate conflict (Linder, 2006). According to the structural change model (Pruitt & Kim, 2004) emotions and conflict interact in a way that directionally affects the other (a conflict results from negative emotions which in turn escalate these emotions). Negative emotions such as hate and anger create conflict situations and are also responsible for the situations' continuity and escalation (Halperin, Sharvit, & Gross, 2011).

The present research focuses on three negative emotions which have a significant contribution to a conflict and its escalation: anger, fear and hatred. Anger may result from events in which one perceives the other's actions as unfair. Anger can lead to conflict situations and/or a tendency to attack the person who is perceived to have provoked the anger (Roseman, Wiest & Swartz, 1994). Fear is defined by Gray (1989) as emotion which appears in situations where a perceived threat or danger is accrued for one or one's environment or society. Fear is found to be a significant barrier to conflict resolution (Jarymowicz & Bar-Tal, 2006), and may even create extreme offensive reactions in a conflict situation (Linder, 2006). Hatred is an extreme negative emotion which can lead

to violence against the opposing side in the conflict. As an intergroup emotion, hatred was found as the most powerful barrier to peace (Staub, 2005). Sternberg (2003) describes hatred as an emotion that can decrease expectations towards a positive change during a conflict situation. One strategy to deal with a conflict situation is to neutralize negative emotions or to reduce negative emotions while fostering positive emotions such as empathy.

### **Empathy**

Empathy was described by Duncan and Fiske (1977) as an important element in the human personality, essential for inter-personal communication. Empathy has numerous and varied definitions. Some definitions emphasize solely emotional aspects of empathy (Batson, 1991; Eisenberg, 2000; Feshbach, 1978; Mehrabian & Epstein, 1972; Rogers, 1975; Sullivan, 1953). Other scholars focus exclusively on cognitive aspects (Borke, 1973; Clark, 1980; Hoffman, 1977; Hogan, 1969). Some researchers describe empathy as a phenomenon which includes both emotional and cognitive components: emotional skills provide the ability to experience the other's emotions indirectly while cognitive skills contribute to the awareness of thoughts, perceptions and emotions (Hoffman, 2000; Smith, 2006).

In this research we focused on Batson and Ahmad's (2009) multiple definition of empathy which divided the term into four psychological states: (a) imagine-self perspective - imagining how one would think and feel in another's situation or "shoes", (b) imagine-other perspective - imagining how another person thinks or feels given his/her situation, (c) emotion matching - feeling as another person feels, (d) empathic concern - feeling for another person who is in need.

Empathy has advantages in a conflict situation. It helps reduce negative reactions and stereotypes toward out-group members (Johnson, Olivo, Gibson, Reed, & Ashburn-Nardo, 2009); it reduces feelings of fear and threat (Rothman, 1992); and it helps intensify positive attitudes and prosocial activities towards out-group members (White, 1998). According to Halpern and Weinstein (2004), empathy allows us to see out-group members as humans with legitimate goals whom we can trust. In addition, Dovidio et al. (2009) argue that empathy can design reactions in an in-group context; therefore, people

should use empathy in building programs that aim to improve social relations between group members.

### **Cognitive Dissonance**

According to Festinger's (1957) cognitive dissonance theory, an individual seeks to achieve consistency between cognitions (elements of knowledge). However, Festinger found that pairs of cognitions can sometimes be dissonant to one another. This cognitive dissonance causes a psychologically uncomfortable state, which motivates the individual to reduce the dissonance experienced.

An individual can reduce this dissonance by changing his or her cognition of or towards a subject or to avoid information which is likely to increase this dissonance. Researchers in the field of cognitive dissonance have noted that meaningful and important dissonance cognitions can increase the dissonance magnitude and its negative effect (Cooper, 2007; Harmon-Jones, Amodio, & Harmon-Jones, 2009; Starzyk et al., 2009). Some researchers (e.g., Cooper) suggest that situations characterized by dissonance create motivation for authentic cognitive changes. Others (Steele, Spencer, & Lynch, 1993) claim that dissonance feelings which are caused by behaviors that threaten one's moral self-perception lead to one's willingness to change this behavior in order to defend one's self-perception.

### **Affective Dissonance**

Based on the concept of cognitive dissonance investigated by Festinger and others (Cooper & Fazio, 1984; Harmon-Jones & Mills, 1999; Steele et al., 1993), this study introduces a new term, *affective dissonance*, which emphasizes the dissonance between emotions and the expression of emotions. The hypothesis states that dissonance between emotions or the expressions of emotions regarding a meaningful subject can cause a psychologically uncomfortable experience for the individual (similar to that experienced with cognitive dissonance).

Another foundation for this term is the emotional dissonance theory which discusses the dissonance between emotion and emotion expression (Hochschild, 1983). Hochschild and others (Abraham, 1999; Lewig & Dollard, 2003; Rafaeli & Sutton, 1987) focus on emotional dissonance in the context of the workplace – the dissonance between

expected emotions' expression (according to organizational norms) and real emotions which are felt by the individual. This type of dissonance was also described by Glomb and Tews (2004) as emotional labor.

This study defines affective dissonance as a state of inconsistency between emotions – a dissonance between expected emotions and real emotions which is actually experienced by the individual. The goal is to examine if an individual will change his or her emotion while experiencing affective dissonance towards a meaningful subject as a strategy of emotion regulation.

### **Induced Compliance**

According to Harmon-Jones et al. (2009), five experimental paradigms are used to examine dissonance theory: free choice, effort justification, alternative theoretical explanation (self-consistency, self-affirmation), aversive consequences, and induced compliance. Induced compliance is a complex task which aims to create a state of dissonance. A participant is asked to cooperate in the task, acting in a way that contradicts his or her attitudes or beliefs about a specific subject or person through an exchange of roles (Festinger & Carlsmith, 1959). Some researchers (e.g., Cooper & Fazio, 1984), reveal that as a result of participating in an induced compliance task (which creates a state of dissonance), participants have reduced the intensity of cognitive dissonance through a change in their attitudes.

Additional evidence regarding the consequences of participation in induced compliance tasks can be found in a study conducted by Rosen (2006, 2008). This study indicated that Arab and Jewish youth who participated in a task that included induced compliance elements are likely to change their negative attitudes in the context of the Israeli-Palestinian conflict.

There are some key shared findings from studies which examine the induced compliance paradigm as a technique to change attitudes (e.g., Beauvois & Joule, 1999; Elliot & Devine, 1994; Festinger, 1957; Harmon-Jones & Mills, 1999; Starzyk et al., 2009), as follows: (a) The importance of the cognitions which are perceived by the subject. Only perceived importance can cause dissonance feelings. An exaggerated perception of importance could impede the flexibility which is needed for attitude

changes. On the other hand, a low amount of perceived importance may allow subjects to resolve the state of dissonance without meaningful and stable change (Starzyk et al.); (b) The feeling of being in a psychologically uncomfortable state which is created by dissonance. Without this feeling one will not have the motivation to change his or her inconsistent cognitions; and (c) The perceived ability of free choice by the subject. In the absence of perceived free choice, one can attribute the inconsistency between cognitions to an external factor and as a result will not feel an uncomfortable psychological state (Draycott & Dabbs, 1998).

The current study focuses on the effects of affective dissonance through the induced compliance technique in the emotional area. In addition, this study examines if induced compliance can cause changes in emotions, just as induced compliance in the cognitive area can change attitudes.

### **Emotion Regulation during Conflict**

Changing emotions can be achieved through emotion regulation, which can help us manage our emotions and feelings in order to avoid their negative effects. Emotion regulation refers to processes that are engaged when individuals try to influence the type or amount of emotion they experience, and how they experience and express these emotions (Gross, 1998). Emotion regulation may be automatic or controlled, conscious or unconscious, and may have its effects at one or more points in the emotion generative process.

According to Gross (1998), there are five main emotion regulation processes: situation selection, situation modification, attention deployment, cognitive change, and response modulation. In addition, research reveals that there are many ways to deal with dissonance situations in the context of emotion regulation, while the reaction to the situation depends on the perceived importance of the situation and the difficulty of expressing the emotion (Draycott & Dabbs, 1998). In the context of conflict resolution, processes of emotion regulation were found successful in increasing prosocial behavior (Gross & Thompson, 2007).

Scholars who study emotions in the workplace (Hochschild, 1983; Holman, Chissick, & Totterdell, 2002) found that an individual in a state of emotional dissonance

can regulate his or her emotions in two main ways: (a) Deep acting – the attempt to change inner emotions in order to create consistency with common norms, by a real and deep internalization of the expected emotions; and (b) Surface acting – changing action in order to express the expected emotions outside without internalizing the related emotions. While both ways lead to the expression of the expected emotions, they differ in the level of the internalization process. For instance, emotion regulation through surface acting was found related to levels of tension, while deep acting was found related to emotional relief (Grandey, 2003).

Researchers who focus on empathic emotional resolution (Eisenberg & Eggum, 2009; Eisenberg & Okun, 1996) emphasize two main processes. One is called *sympathy* which is defined as emotional reaction to the concern situation. This reaction includes emotions like sadness and concern toward the other and a willingness to assist him or her. The other process is *personal distress* which is described as an emotional reaction of disgust which may lead to personal focus as a result of the other negative emotional situation. One is seeking to reduce his or her own negative feelings (e.g., anxiety), without any motivation to help decreasing the other's negative emotions. Personal distress was found in negative correlation with prosocial behavior. Emotion regulation can help lessen personal distress. As a result this process can increase sympathy toward the other and develop prosocial behavior.

### **The Research Question**

In this study, we examined the extent to which empathy and negative emotions (anger, fear, and hatred) change in conflict situations resulting from participation in an induced compliance task in the context of inter-group conflict.

### **Method**

#### **Participants**

This study included 60 Jewish students (50 female, 10 male) between the ages 22 to 40, who volunteered to participate in academic research regarding emotions and conflicts. The call for participation was published in academic institutions and also through e-mails and social networks throughout Israel.

Students who declared that they did not pay for their academic degrees (e.g., due to scholarships) were not chosen to participate in this experiment. The assumption was that these students will not view the subject of the task as significant and meaningful from the beginning and as a result a state of dissonance would not likely be created.

At the beginning of the study, we planned to define a control group of participants who completed a task that did not involve induced compliance elements. However, a low number of participants chose to perform this kind of task (n=17); as a result, there was no possibility to define a control group in this study (see Limitations and Recommendation for Future Research, for further details).

## **Measures and Tools**

### **1. Background questionnaire.**

Participants were asked to note their age, gender, academic institution and their highest academic degree. These variables were measured in case they were found to interact with the other variables.

**2. Negative emotions towards out-group members' questionnaire.** Participants (Jewish-Israeli students) were asked to report to what extent they feel one of the following emotions towards the out-group members (Arab-Israeli students): hatred, fear and anger, using the Likert scale from 1 (*not at all*) to 7 (*very much*). A high score means expressing negative emotions towards the out-group members. Cronbach alpha were 0.79 at the pre-test and 0.84 at the post-test. It is important to mention that there was not a prior assumption of negative emotions towards Arab-Israeli students, only the possibility for the existence of these emotions. Nevertheless, the purpose of this study was to examine if these emotions will change.

### **3. The Empathy Quotient (E.Q) questionnaire.**

An empathy index was used in order to examine the presence of emotional as well as cognitive empathy (Lawrence, Shaw, Baker, Baron-Cohen, & David, 2004). While the original questionnaire includes 60 items, for this study 12 items were chosen due to their relevance in measuring cognitive and emotional empathy. For the six items of cognitive empathy, alpha coefficients were 0.90 at

the pre-test and 0.88 at the post-test. For the other six items measuring emotional empathy, alpha coefficients were lower: 0.68 and 0.60 at the pre-test and at the post-test, respectively.

#### **4. Psychologically Uncomfortable questionnaire.**

Content from this questionnaire was used to measure the following three factors:

(a) pre-existing emotions that express uncomfortable emotions (uncomfortableness, guilt, and pressure); (b) pre-existing self-disappointment emotions known as the *Negself index* (Elliot & Devine, 1994); and (c) pre-existing positive emotions (optimism, happiness). These items were also measured by the Likert scale from 1 (*not at all*) to 7 (*very much*). Alfa coefficient of this questionnaire was 0.89.

A factor analysis was designed for the negative emotions variable since it included three emotions – anger, fear and hatred. The analysis for this study was performed using the PCA (Principal Component Analysis) method for the sample of 60 participants. More specifically, the Orthogonal rotation (VARIMAX) was used to create one factor which included the five items expressed by negative emotions. After examining the individual loadings of each item, two items of anger, two items of fear and one item of hatred were combined into one factor (see Appendix Table 1). Together, these items of negative emotions explained 55% of the total variance.

#### **Procedure**

During the experiment, Jewish-Israeli participants were asked to consider whether or not Arab-Israeli students should get scholarships at the expense of the rest of the students in Israel (i.e., Jewish students).

**Phase 1.** Two questionnaires were sent to participants via e-mail: a background questionnaire and an emotion questionnaire, including items on negative emotions as well as empathy.

**Phase 2.** After a period of two to four weeks, participants (excluding those participants in the intended control group) were asked to perform the second task, which included induced compliance in the emotions area. The time gap between the two tasks was specifically designed to prevent participants from remembering their answers in

phase 1, precluding them from filling in identical answers in phase 2 from memory. Similar gaps can be found in previous studies which examine attitude changes as a result of induced compliance (Schumacher & Slep, 2004; Starzyk et al., 2009).

This task was also sent via e-mail. Participants were asked to write a personal essay describing how he or she would feel in one of two situations: (a) as a Jewish student in Israel who will pay higher tuition to enable scholarships awarded to Arab-Israeli students, or (b) as an Arab-Israeli student in Israel who does not receive a scholarship and therefore must pay his or her own tuition (this situation expresses an induced-compliance task).

While participants were instructed to freely choose one of the two situations, they were asked to consider choosing the second situation due to prior assumptions that participants would avoid this situation. The special request was designed to lead participants to choose the task that will create a dissonance situation; at the same time, the instructions gave participants a sense of free choice, which is a critical element in creating a feeling of dissonance.

The instructions' introduction also emphasized the importance of writing the essay as a personal story and describing the emotions of the participants according to the chosen situation. This guidance was found effective in previous research to direct participants in successfully avoiding "cold" and cognitive writing, thus increasing levels of empathy and identification (Batson & Ahmad, 2009; Finlay & Stephan, 2000; Jarymowicz, 1992). For example, Batson and Ahmad found that when a participant is asked to imagine how he or she will feel if in the other's negative situation, he or she develops an understanding which creates the foundation for empathic concern. Similar findings can be found in Finlay and Stephan's research.

After reading the introduction, participants were given two descriptive cases, each of which included a personal story of an Arab-Israeli student who studies in Israel and does not receive a scholarship. The cases describe the difficulties and problems with which student must cope. The first case presents a story of a male student and the second case presents a story of a female student.

Participants who read the cases and chose one of the two situations were asked to write their own essay as mentioned in the instructions' introduction. Upon completion of the essay, they were asked to answer two questionnaires: a psychologically uncomfortable questionnaire and an emotion questionnaire, including items on negative emotions as well as empathy (same questionnaire used in phase 1).

## **Results**

### **Affective Dissonance Experience**

The experience of affective dissonance was measured by the Psychologically Uncomfortable questionnaire after participants completed the induced compliance task. The purpose of the questionnaire was to examine if participating in the experiment led to feelings of affective dissonance among the participants.

**Table 2**

*Means and Standard Deviation of the Variable Psychologically Uncomfortable (n = 42)*

Variables	<i>M</i>	<i>SD</i>
Negself index	2.51	1.17
Negative emotions	2.75	1.34
Positive emotions	4.17	1.28

As seen in table 2, on the one hand, participants reported low levels in the Negself index and low levels of negative emotions. On the other hand, they reported average to high levels of positive emotions (the scale contains the values from 1 to 7).

According to our findings, we conclude that participants who performed the induced compliance task did not significantly experience affective dissonance.

**Effects on Emotions**

A paired samples *t*-test was used in order to compare emotions before and after performing the task among participants who chose to write the essay as Arab-Israeli students (the induced compliance task). This measurement examined the research question regarding the possible changes in emotion levels (negative emotions and empathy) as a result of performing the induced compliance task. Results from the *t*-test are shown in table 3.

**Table 3**

*Comparison between Emotions Levels (negative emotions and empathy) Before and After Performing the Induced Compliance Task (n = 42)*

Emotions scales	Pre-task		Post-task		t (df)
	M (SD)	N	M (SD)	N	
Cognitive empathy	5.02 (1.02)	43	4.82 (1.23)	43	2.29* (42)
Emotional empathy	5.24 (.89)	43	5.06 (.75)	43	1.55 (42)
Negative emotions	2.86 (1.19)	43	3.10 (1.38)	43	-1.59 (42)

\**p* < .05

As seen in table 3, after performing the task, levels of cognitive empathy significantly decreased (from 5.02 to 4.82). In addition, there was a decrease in emotional empathy (from 5.24 to 5.06) and an increase in levels of negative emotions (from 2.86 to 3.10).

Using specific comparison, we found a significant increase in hate levels after performing the task (from 2.39 to 2.95,  $p < .001$ ). It should be noted that before the experiment, levels of empathy among participants who performed the task were relatively high, and their negative emotion levels were relatively low.

### **Conclusion**

Numerous studies examine the possibilities of resolving conflicts by reducing negative attitudes, and sometimes by attempting to change these negative attitudes to become more positive. One significant method, found to be an effective tool to change attitudes, is the creation of cognitive dissonance which is defined as the lack of consistency between cognitions (elements of knowledge). Dissonance can cause a psychologically uncomfortable state which motivates an individual to seek methods to reduce the dissonance. One paradigm to create dissonance is called *induced compliance*; this is a complex task in which one is asked to act in a way that contradicts his or her attitudes or beliefs about a specific subject or person through an exchange of roles.

Previous studies (e.g., Beauvois & Joul, 1999; Elliot & Devine, 1994; Harmon-Jones & Mills, 1999; Starzyk & Fabrigar, 2009) show that participating in induced compliance tasks leads to positive attitudinal changes toward out-group members, and sometimes even toward out-group members with whom the individual is in a conflict situation (Rosen, 2006, 2008).

In this research, the effect of the induced compliance paradigm was examined regarding the change of emotions toward out-group members in the context of a conflict. Several key negative and positive emotions were evaluated: empathy (emotional and cognitive), anger, fear and hatred. In earlier research, these types of emotions were found to be significant in conflict situations and in the ability to resolve these difficult situations.

Seeking a change in emotions during a conflict, this experiment was designed to include an induced compliance task in order to create affective dissonance – dissonance between real emotions and the expression of expected emotions. Participants were asked to express emotions that counter their initial emotions by writing an essay: Jewish-Israeli students who were paying their own tuition were asked to write how they would feel as an Arab-Israeli student who does not receive a scholarship for his or her academic degree in Israel. In order to help participants write the essay and thus perform the induced compliance task, they were offered case studies describing the personal and emotional situations of an Arab-Israeli student who does not receive a scholarship.

Three main conditions were found to have major effects on the ability to change attitudes as a result of participating in the induced compliance task: (a) levels of perceived importance of the subject by the individual, (b) perceived ability of free choice, and (c) sense of a psychologically uncomfortable state after performing the task (Beauvois & Joul, 1999; Elliot & Devine, 1994; Festinger, 1957; Harmon-Jones & Mills, 1999; Starzyk et al., 2009). In the current study a psychologically uncomfortable state was measured after participants fulfilled the task through a psychologically uncomfortable questionnaire. Although the first two conditions listed were not measured, they were taken into account in the design of the task. The main subject of the task is relevant and important to participants (tuition and scholarship for students). In addition, participants had the ability to choose how to perform the task (free choice).

The aim of the induced compliance task was to create an affective dissonance among the participants. On the one hand, the assumption was that Jewish students would like to receive scholarships and would not want to lose an option of financial aid to out-group members, Arab-Israeli students. On the other hand, these Jewish students were asked to read and write about a contradicting desire, in which they describe the need to provide scholarships to the Arab-Israeli students at the expense of the general population in Israel. The affective dissonance between the genuine emotion and the contradicting emotion that should arise through participating in the induced compliance paradigm was intended to cause a psychologically uncomfortable state.

From the overall participants' sample (N=60), we examined the emotions of participants who chose to write the essay as an Arab-Israeli student, thus performing the

induced compliance task (n=43). According to the results, these participants did not experience affective dissonance: They reported low levels of a psychologically uncomfortable state.

In evaluating the results of the study, a possible explanation for the absence of affective dissonance is the lack of all necessary conditions to create a state of dissonance. The following are reasons for this possibility. Participants did not attribute full importance to the subject, perhaps because they perceived the situation as a case study in the context of an experiment and not as a possible reality in which their tuition would be raised. Although participants were told they had a free ability to choose one of two different conditions of writing, they were asked to consider choosing the second condition in which they would write as an Arab-Israeli student. It is possible that asking for this consideration decreased the perception of free choice among participants. In addition, previous studies that used the induced compliance paradigm (e.g., Rosen, 2006) revealed that there is a possibility that some of the participants wrote their essays at a distance and in a cynical way without truly identifying with feelings they described in the essay. In other words, they performed *surface acting* without internalizing emotions; as a result, a state of affective dissonance was not created.

In contrast to previous studies, the main context of this experiment was the Arab-Israeli conflict, which is defined as intractable conflict (Bar-Tal, 2007, 2013). In addition, participants were asked not only to support out-group members, but to contribute to them at their own expense. There is a possibility that these differences between the current and previous studies can explain the lack of new emotions experienced and the absence of affective dissonance.

According to the results, it is assumed that if a change in emotions took place, it was not caused by a state of affective dissonance. There was not a statistically significant change in levels of emotional empathy or in the levels of negative emotions.

Despite these results, by testing specific changes in emotions after performing the task, we found (a) a significant decrease in levels of cognitive empathy, (b) a significant increase in levels of hatred towards the out-group members, and (c) a tendency (without statistical significance) to express more negative emotions and less positive emotions towards the out-group members after performing the task.

It can be concluded that after performing the induced compliance task which was intended to increase empathy and decrease negative emotions, participants experienced opposite results. In order to explain this unforeseen effect, we examined results from previous studies which used similar techniques to change attitudes towards out-group members. Merritt, Effron and Monin (2010) found that by giving participants the opportunity to express anti-racism declarations before the experiment, they expressed more racism afterwards. The Effron, Cameron, and Monin (2009) study examined the concept of the moral self-licensing, which enables participants to more freely express their racism after the experiment without feelings of anxiety or of self-criticism. This study showed that expressing support for an African-American candidate allowed people to later express preference for white people at the expense of black people in other domains.

Moral self-licensing can decrease motivation for prosocial behavior and also decrease inhibition to immoral behavior. It is possible that participants in this study accepted moral self-licensing after writing as an Arab-Israeli student, and as a result felt less inhibited in expressing negative emotions towards the Arab-Israeli group.

Cognitive components such as reading and writing are common in perspective-taking assignments where participants are asked to imitate another person as accurately as possible (Chartrand & Bargh, 1999; Davis, 1983; Epley, Savitsky, & Gilovich, 2002). Recent research emphasizes the differences between perspective-taking and empathy as different modes of imagining others' experiences (Gilin, Maddux, Carpenter, & Galinsky, 2013). While perspective-taking often increases empathy and facilitates the development of personal relations (e.g., Davis, 1983; Messick, 1995), the Epley, Caruso and Bazerman (2006) study found that in some cases perspective-taking leads people to behave in an egocentric way, decreasing prosocial behavior.

In the current study, the negative influence that caused participants to focus on themselves can be interpreted through the possible negative consequences of the perspective-taking process. As a result, participants later expressed lower levels of empathy towards out-group members.

The study conducted by Pruitt and Kim (2004) examined the structural-change model in which a mutual influence exists between negative emotions and a conflict

situation, whereby each part influences the other in a circular way. In the current experiment, participants' emotions increased after the task; this can be perceived as an expression of the conflict. In other words, performing the task increased negative emotions which escalated the conflict further and thus led to an additional increase in negative emotions.

Batson, Fultz and Schoenrade (1987) emphasized the differences between two types of empathic reaction to another person in need; personal distress and feeling empathy. They described personal distress as including negative emotions like feeling upset, disturbed and distressed, while feelings of empathy include sympathy and warmth. They argued carefully that each reaction can lead to a different type of prosocial motivation: "Distress leads to egoistic motivation and empathy leads to altruistic motivation" (Batson, Fultz & Schoenrade, 1987, p.36). It may be suggested that our experiment conditions led participants to experience personal distress, which increased egoistic perception and decreased prosocial motivation as levels of empathy. Finally, another explanation for these results may be related to the interactive effects of ideology and emotions on political policy support in the context of an intractable conflict. Pliskin, Bar-Tal, Sheppes, and Halperin (2014) found that similar emotional processes produce different results for people with varying ideologies.

### **Limitations and Recommendations for Future Research**

1. The current study focused on a relatively limited sample according to the number of participants and its character. Future research should consider examining the other side of the conflict by seeking Arab-Israeli participants and testing the effect of the induced compliance paradigm on their emotions toward Jewish students in Israel.
2. As mentioned above, a control group could not be defined due to the low number of participants who chose to write a regular essay. As a result, a comparison was not made between the two groups. However, due to lack of empirical research in the field, it is necessary to conduct small-scale studies in order to inform a more comprehensive approach. In future studies, it is recommended to recruit a significantly larger number of participants in order to overcome this challenge.

3. In order to create a perception of free choice, participants had the opportunity to choose the experimental condition. The participants' choice of experience situation (with its advantages that were mentioned above) caused lack of random assignment, which can lead to systematic bias and weaken the validation of the experimental aspect of the study.
4. Based on the lack of affective dissonance among participants in this study, future research may include more emotional components in the induced compliance task, such as writing the essay after a frontal meeting with an out-group member. This may help avoid the negative effects of the perspective-taking process and focus on the emotional aspects of the research.
5. According to previous studies, the emphasis of mutual interests, thoughts and characters of both groups may help change emotions in a positive way. Batson, Lisher, Cook, and Sawyer (2005) found that similarity is also an important perception to increase empathy for strangers: "Even if similarity is not the key source assumed by perceived similarity explanations, it may serve as a moderator of an empathic response to strangers" (p.20).

### **Research Contribution**

Previous research found that attitudes change among participants in conflict situations after performing an induced compliance task. The current study examined a possible extension of the induced compliance effect on emotions. A research experiment was designed in order to measure the influence of affective dissonance, which is supposed to increase after performing an induced compliance task on emotions toward out-group members. Unfortunately affective dissonance was not successfully established among participants; therefore, the influence of affective dissonance on emotions during a conflict situation was not examined.

However, results from this research may contribute to planning future research in the field of emotion regulation in conflict situations and to understanding process of negative influence on emotions:

1. Our findings supply insights which help build a more accurate foundation in order to create a situation where affective dissonance is present in future experiments.

2. This study reinforced previous research which found that under certain conditions, activities which are supposed to bring individuals or groups closer in a conflict situation can sometimes cause opposite outcomes whereby negative emotions to the out-group members become more extreme.

## References

- Abraham, R. (1999). Negative affectivity: Moderator confound in emotional Dissonance-outcome relationships? *The Journal of Psychology, 133*(1), 61-72.
- Bar-Tal, D. (2007). Sociopsychological foundations of intractable conflicts. *American Behavioral Scientist, 50*(11), 1430–1453.
- Bar-Tal, D. (2013). *Intractable conflicts: Socio-psychological foundations and dynamics*. Cambridge: Cambridge University Press.
- Bar-Tal, D., & Halperin, E., & deRivare, J. (2007). Collective emotions in conflict: Societal implication. *Journal of Social Issues, 63*, 441-460.
- Batson, C. D. (1991). *The altruism question: Toward a social-psychological answer*. Hillsdale, NJ: Lawrence Erlbaum Associates.
- Batson, C. D., & Ahmad, N. Y. (2009). Using empathy to improve intergroup attitudes and relations. *Social issues and policy review, 3*(1), 141-177.
- Batson, C. D., Fultz, J., & Schoenrade, P. A. (1987). Distress and empathy: Two qualitatively distinct vicarious emotions with different motivational consequences. *Journal of Personality, 55*, 19-39.
- Batson, C. D., Lisher, D.A., Cook, J., & Sawyer, S. (2005). Similarity and Nurturance: Two Possible Sources of Empathy for Strangers. *Basic and Applied Social psychology, 27* (1), 15-25.
- Beauvois, J. L., & Joule, R. V. (1999). A radical point of view on dissonance theory. In E. Harmon-Jones & J. Mills (Eds.), *Cognitive dissonance: Progress on a pivotal theory in social psychology* (pp. 43–70). Washington, DC: American Psychological Association.
- Borke, H. (1973). The development of empathy in Chinese and American children between three and six years of age: A cross-cultural study. *Developmental Psychology, 9*, 102-108.
- Cacioppo, J. T., & Gardner, W. L. (1999). Emotion. *Annual Review of Psychology, 50*, 191-214.

- Chartrand, T. L., & Bargh, J. A. (1999). The chameleon effect: The perception-behavior link and social interaction. *Journal of Personality and Social Psychology*, 76, 893-910.
- Clark, K. B. (1980). Empathy: A neglected topic in psychological research. *American Psychologist*, 35, 187-190.
- Cooper, J. (2007). *Cognitive dissonance: Fifty years of a classic theory*. CA: Sage Publications.
- Cooper, J. & Fazio, R. (1984). A new look at dissonance theory. In L. Berkowitz (Ed.), *Advances in experimental social psychology* (Vol. 17, pp. 229-266). San Diego, CA: Academic.
- Davis, M. H. (1983). The effects of dispositional empathy on emotional reactions and helping: A multidimensional approach. *Journal of Personality*, 51, 167-184.
- Dovidio, J. F., Johnson, J. D., Gaertner, S. L., Pearson, A. R., Saguy, T., & Ashburn-Nardo, L. (2009). Empathy and intergroup relations. In M. Mikulincer & P.R., Shaver (Eds.). *Prosocial motives, emotions, and behavior*. Washington, DC: American Psychological Association.
- Draycott, S. & Dabbs, A. (1998). Cognitive dissonance 2: A theoretical grounding of motivational interviewing. *British Journal of Clinical Psychology*, 37(3), 355-364.
- Duncan, S., Jr., & Fiske, D. W. (1977). *Face-to-face interaction: Research, methods and theory*. Hillsdale, NJ: Lawrence Erlbaum Associates.
- Effron, D. A., Cameron, J.S., & Monin, B. (2009). Endorsing Obama licenses favoring Whites. *Journal of Experimental Social Psychology*, 45, 590-593.
- Eisenberg, N. (2000). Emotion, regulation, and moral development. *Annual Review of Psychology*, 51, 665-697.
- Eisenberg, N., & Eggum, N. D. (2009). Empathic responding: sympathy and personal distress. In J. Decety & W. Ickes (Eds.), *The social neuroscience of empathy* (pp. 71-79). MA: MIT Press.
- Eisenberg, N., & Okun, M. (1996). The relations of dispositional regulation and Emotionality to elders' empathy-related responding and affect while volunteering. *Journal of Personality*, 64, 157-183.
- Ekman, P., & Davidson, R. J. (Eds.), (1994). *The nature of emotion: Fundamental question*. New York: Oxford University Press.
- Elliot, A. J., & Devine, P. G. (1994). On the motivational nature of cognitive dissonance: Dissonance as psychological discomfort. *Journal of Personality and Social Psychology*, 67(3), 382-394.
- Epley, N., Savitsky, K., & Gilovich, T. (2002). Empathy neglect: Reconciling the spotlight effect and the correspondence bias. *Journal of Personality and Social Psychology*, 83, 300-312.

- Epley, N., Caruso, E. M., & Bazerman, M. H. (2006). When perspective taking increases taking: reactive egoism. *Journal of Personality and Social Psychology*, *91*(5), 872-889.
- Feshbach, N. D. (1978). Studies on empathic behavior in children. In B. Maher (Ed.), *Progress in experimental personality research* (pp. 1-47). New York, NY: Academic.
- Festinger, L. (1957). *A theory of cognitive dissonance*. Stanford, CA: Stanford University Press.
- Festinger, L., & Carlsmith, J. M. (1959). Cognitive consequences of forced compliance. *Journal of Abnormal and Social Psychology*, *58*, 203-211.
- Finlay, K. A., & Stephan, W. G. (2000). Improving intergroup relations: The effects of empathy on racial attitudes. *Journal of Applied Social Psychology*, *30*, 1720-1737.
- Gilin, D., Maddux, W.W., Carpenter, J., & Galinsky A.D. (2013). When you use your head and when you use your heart: The differential value of perspective-taking versus empathy in competitive interactions. *Personality and social psychology bulletin*, *39* (1), 3-16.
- Glomb, T. M., & Tews, M. J. (2004). Emotional Labour: A Conceptualization and Scale Development. *Journal of Vocational Behaviour*, *64*, 1-23.
- Grandey, A. (2003). When “the show must go on”: Surface acting and deep acting as determinants of emotional exhaustion and peer-rated service delivery. *Academy of Management Journal*, *46*(1), 86-96.
- Gray, J. A. (1989). *The psychology of fear and stress* (2<sup>nd</sup> ed.). Cambridge, UK: Cambridge University Press.
- Gross, J. J. (1998). The emerging field of emotion regulation: An integrative review. *Review of General Psychology*, *2*, 271-99.
- Gross, J. J., & Thompson, R. A. (2007). Emotion regulation: Conceptual foundations. In J. J. Gross (Ed.), *Handbook of emotion regulation* (pp. 3-24). New York: Guilford Press.
- Halperin, E., Sharvit, K., & Gross, J. J. (2011). Emotion and emotion regulation in intergroup conflict: An appraisal based framework. In D. Bar-Tal (Ed.), *Intergroup conflicts and their resolution: Social psychological perspectives*. New York: Psychology Press.
- Halpern, J., & Weinstein, H. M. (2004). Rehumanizing the other: Empathy and reconciliation. *Human Rights Quarterly*, *26*(3), 561-583.
- Harmon-Jones, E., & Mills, J. (1999). *Cognitive Dissonance: progress on a pivotal theory in social psychology*. Washington, DC: American Psychology Association.
- Harmon-Jones, E., Amodio, M. D., & Harmon-Jones, C. (2009). Action-based

- model of dissonance: A review, integration, and expansion of conceptions of cognitive conflict. *Advances in Experimental Social Psychology*, 41, 119-168.
- Hochschild, A. R. (1983). *The managed heart: Commercialization of human feeling*. Berkeley, CA: University of California Press.
- Hoffman, M. L. (1977). Empathy, its development and pro-social implications. In H. E. Howe, Jr. (Ed.), *Nebraska Symposium on Motivation* (Vol. 25, pp. 169-217). Lincoln: University of Nebraska Press.
- Hoffman, M. L. (2000). *Empathy and moral development: Implications for caring and justice*. New York: Cambridge University Press.
- Hogan, R. (1969). Development of an empathy scale. *Journal of Consulting and Clinical Psychology*, 33, 307-316.
- Holman, D., Chissick, C., & Totterdell, P. (2002). The effects of performance monitoring on emotional labor and well-being in call centers. *Motivation and Emotion*, 26, 57-82.
- Jarymowicz, M. (1992). Self, we, and other(s): Schemata, distinctiveness, and altruism. In P. M. Oliner, S. P. Oliner, L. Baron, L. A. Blum, D. L. Krebs & M. Z. Smolenska (Eds.), *Embracing the other: Philosophical, psychological, and historical perspectives on altruism* (pp. 194-212). New York: New York University Press.
- Jarymowicz, M., & Bar-Tal, D. (2006). The dominance of fear over hope in the life of individuals and collectives. *European Journal of Social Psychology*, 36, 367-392.
- Johnson, J. D., Olivo, N., Gibson, N., Reed, W., & Ashburn-Nardo, L. (2009). Priming media stereotypes reduces support for social welfare policies: The mediating role of empathy. *Personality and Social Psychology Bulletin*, 35(4), 463-476.
- Lawrence, E. J., Shaw, P., Baker, D., Baron-Cohen, S., & David, A. S. (2004). Measuring empathy: Reliability and validity of the empathy quotient. *Psychological Medicine*, 34, 911-924.
- Lewig, K. A., & Dollard, M. F. (2003). Emotional dissonance, emotional exhaustion and job satisfaction in call centers. *European Journal of Work and Organizational Psychology*, 12(4), 366-392.
- Linder, E. G. (2006). Emotion and conflict. In M. Deutsch, P. T. Coleman, & E. C. Marcus (Eds.), *The Handbook of Conflict Resolution* (pp. 268-290). San Francisco, CA: Jossey-Bass.
- Manstead, A. S. R., Frijda, N. H., & Fischer, A. H. (Eds.), (2004). *Feelings and emotions. The Amsterdam Symposium*. Cambridge: Cambridge University Press.
- Mehrabian, A., & Epstein, N. (1972). A measure of emotional empathy, *Journal of*

- Personality*, 40, 525-543.
- Merritt, A. M., Effron, D.A., & Monin, B. (2010). Moral self-licensing: When being good frees us to be bad. *Social and Personality Psychology Compass*, 4, 344-357.
- Messick, D. M. (1995). Equality, fairness, and social conflict. *Social Justice Research*, 8, 153-173.
- Pliskin, R., Bar-Tal, D., Sheppes, G., & Halperin, E. (2014). Are lefties more emotion-driven than rightists? The interactive influence of ideology and emotions on support for policies. *Personality and Social Psychology Bulletin*, 40 (12), 1681-1697.
- Pruitt, D. G., & Kim, S. H. (2004). *Social conflict: Escalation, stalemate and settlement* (3<sup>rd</sup> ed.). NY: McGraw-Hill.
- Rafaeli, A., & Sutton, R. I. (1987). The expression of emotion as part of the work role. *Academy of Management Review*, 12(1), 23-37.
- Rogers, C. R. (1975). Empathic: An unappreciated way of being. *The Counseling Psychologist*, 5(2), 2-10.
- Roseman, I. J., Wiest, C., & Swartz, T. S. (1994). Phenomenology, behaviors, and goals differentiate discrete emotions. *Journal of Personality and Social Psychology*, 67(2), 206-221.
- Rosen, Y. (2006). The effects of peace education programs on changing central versus peripheral attitudes and beliefs. Unpublished doctoral dissertation. University of Haifa.
- Rosen, Y. (March, 2008). *Assessing long-term effects of educational programs*. Paper presented at the American Educational Research Association Annual Meeting, New York, NY.
- Rothman, J. (1992). *From Confrontation to Cooperation: Resolving ethnic and regional conflict*. London: Sage Publications.
- Schumacher, J., & Slep, A. (2004). Attitudes and dating aggression: A cognitive dissonance approach. *Behavioral Science*, 5, 231-243.
- Smith, A. (2006). Cognitive empathy and emotional empathy in human behavior and evolution. *The Psychological Record*, 56(1), 3-21.
- Starzyk, K. B., Fabrigar, L. R., Soryal, A. S., & Fanning, J. J (2009). A painful reminder: The role of level and salience of attitude importance in cognitive dissonance. *Personality and Social Psychology Bulletin*, 35(1), 126-137.
- Staub, E. (2005). The origins and evolution of hate, with notes on prevention. In R. J. Sternberg (Ed.), *The Psychology of Hate* (pp. 51-66). Washington, DC: American Psychological Association.

- Steele, C. M., Spencer, S. J., & Lynch, M. (1993). Self-image resilience and dissonance: The role of affirmational resources. *Journal of Personality and Social Psychology*, 64, 885-896.
- Sternberg, R. J. (2003). A duplex theory of hate: Development and application to terrorism, massacres and genocide. *Review of General Psychology*, 7(3), 299-328.
- Sullivan, H. S. (1953). *The Interpersonal Theory of Psychiatry*. New York: Norton.
- White, R. K. (1998). American acts of force: Results and misperceptions. *Peace and Conflict: Journal of Peace Psychology*, 4(2), 93-128.

Appendix Table 1

*Factor Analysis with VERIMAX Rotation for Negative Emotions Questionnaire (N= 60)*

Measure/item number	Content	Factor Loadings
Anger item 2	"I am not angry at Arab-Israeli students"	.82
Hatred	"Sometimes I feel hatred toward Arab-Israeli students"	.81
Fear item 2	"I am not afraid of Arab-Israeli students"	.76
Anger item 1	"Sometimes I am angry at Arab-Israeli students"	.65
Fear item 1	"When I see Arab-Israeli students I am afraid"	.63
		Cumulative variance %55