Perceived and Actual Similarity as Predictors of Self-Disclosure and Perceived Understanding at Zero Acquaintance

Rebecca A. Martin

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PERCEIVED AND ACTUAL SIMILARITY AS PREDICTORS OF
SELF-DISCLOSURE AND PERCEIVED UNDERSTANDING
AT ZERO ACQUAINTANCE

Rebecca A. Martin

64 Pages

When people interact, there are general guidelines that direct their conversation. When two humans interact for the first time, however, there seem to be different factors at play that either allow for the relationship to continue and grow or that end any further interactions. One of the main factors in beginning relationships is the amount self-disclosure that is occurring between the people. Because social relationships are essential for humans, it is important to examine variables that may affect the amount people disclose when they first meet. This study looks at how perceived and actual similarity predict perceived understanding and self-disclosure in these situations of zero acquaintance. Participants in this study were paired up, completed a structured interaction task, and filled out questionnaires measuring the aforementioned variables. The participant dyads were either told they had similar personalities or were told nothing in this regard to assess the affects of perceived similarity on self-disclosure. Results for both conditions showed that perceived understanding was the only factor examined in this study that significantly affected self-disclosure.
KEYWORDS: Disclosure, Perceived Similarity, Perceived Understanding, Zero Acquaintance
PERCEIVED AND ACTUAL SIMILARITY AS PREDICTORS OF
SELF-DISCLOSURE AND PERCEIVED UNDERSTANDING
AT ZERO ACQUAINTANCE

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A Thesis Submitted in Partial
Fulfillment of the Requirements
for the Degree of

MASTER OF SCIENCE

Department of Psychology

ILLINOIS STATE UNIVERSITY

2016
PERCEIVED AND ACTUAL SIMILARITY AS PREDICTORS OF
SELF-DISCLOSURE AND PERCEIVED UNDERSTANDING
AT ZERO ACQUAINTANCE

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ACKNOWLEDGMENTS

I would like to thank the members of my committee for being so extraordinarily helpful throughout this entire process. In particular, I’d like to thank my committee chair, Jef Kahn, for his patience and dedication to helping me with my project. I couldn’t have done it without you. Thanks are also owed to my family and friends who supported and encouraged me throughout this project.

I’d also like to thank Dr. Sue Sprecher who offered her advice and some helpful opinions during an early stage of my project. Lastly, I owe Lauren DiLorenzo and Agnes Strojewska a huge thanks for all the assistance they offered in collecting data.

Without the assistance and kindness of all of you, this project would never have come to fruition. My sincerest thanks go to each and every one of you.

R.A.M.
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CHAPTER I
THE PROBLEM AND ITS BACKGROUND

Forming social relationships is an inherent desire in humans, and it is important to look at what contributes to the development of successful relationships. One of the many strategies people use to build relationships is self-disclosure (Collins & Miller, 1994). Self-disclosure is defined as the process by which people reveal personal information about themselves to others (Altman & Taylor, 1973; Greene, Derlega, & Matthews, 2006). Self-disclosure can be used in many different ways and for many different reasons. Sharing personal information can be a valuable means of achieving closeness not only in existing relationships but in new ones as well (Taylor, 1979). Collins and Miller found that people like others as a result of having disclosed to them. The closeness and liking associated with self-disclosure are obviously important factors in a relationship, but there are many other factors involved in initial interactions that make people more prone to self-disclose.

When two strangers meet, it is often referred to as a situation of zero acquaintance. Too much self-disclosure in these initial interactions can make the discloser seem inappropriate and maladjusted (Chaikin & Derlega, 1974a). Chaikin and Derlega (1974b) found that compared to individuals who made low-intimacy disclosures, individuals who made high-intimacy disclosures were less liked. Observers were also less
willing to be friends with the individuals who made high-intimacy disclosures. Low-intimacy disclosures, however, do seem to facilitate the advancement of relationships.

Self-disclosures can elicit a wide range of reactions from a listener, which can be difficult to anticipate at times. Although it has not been tested in the literature, one of the reasons people may be inclined to share information about themselves with strangers is because they believe the stranger is similar to himself or herself. This notion is called *perceived similarity*: the degree to which one believes he or she is similar to another person. Perceived similarity is different from actual similarity; *actual similarity* occurs when individuals share similar interpersonal traits (Montoya, Horton, & Kirchner, 2008). Evidence suggests people tend to show a preference for others who are similar, even if the similarity is arbitrary (Jones, Pelham, Carvallo, & Mirenberg, 2004). Thus, when a person perceives another to be similar, that person may engage in greater self-disclosure at their first meeting than if the other person is perceived to be different.

Numerous studies have shown that similarity and attraction are related (Lehr & Geher, 2006; Montoya et al., 2008; Reid, Davis, & Green, 2013), so perhaps people self-disclose to those they believe are similar to themselves in an attempt to build a friendship. The level of similarity may be one of the discriminating factors involved when a person decides with whom they are going to share personal information. As it turns out, other important decisions are influenced by similarity to the self as well (Pelham, Carvallo, & Jones, 2005). After all, becoming friends with someone often affects one’s life in fairly major ways, so it makes sense to choose people who are going to regularly validate one’s worldviews. Therefore, the possibility of rejection due to self-disclosing may be lessened when the other seems similar.
One of the other main reasons people self-disclose is because they want to be heard and validated (Derlega & Grzelak, 1979). Therefore, people must evaluate others on how likely they are to be understanding and empathic. It seems more likely that someone would be understanding if they had similar life experiences, so that may be one criterion for strangers who are candidates for receiving disclosure. This theory is the same one that underlies the use of homogenous group therapy: Strangers come together to share deeply emotional experiences on the premise that the others in the group (who have had similar experiences) will be more understanding and less judgmental than people in general (Yalom, 2005). Similarly, sharing experiences creates opportunities for people to establish relationships. For example, standing in an abnormally long line often leads to people bonding over their frustration or dismay at the situation. The common ground that is established by sharing experiences provides a place for disclosures to be made and understood.

In summary, perceived similarity and perceived understanding might increase one’s willingness to engage in self-disclosure when meeting a stranger. To my knowledge, however, this possibility has not yet been empirically tested. The purpose of the current study is to examine how perceived similarity and perceived understanding affect the amount of self-disclosures between strangers. This study gathered pairs of unacquainted individuals and had them engage in a structured self-disclosure task that is designed to promote relationship closeness. Perceived similarity was manipulated by the researcher and assessed via the comparison of self- and other-ratings of personality and perceived understanding. Self-disclosure was measured using questionnaires.
CHAPTER II

REVIEW OF RELATED LITERATURE

Self-Disclosure

For the purpose of this study, self-disclosure was defined as verbal communication about oneself to another. Self-disclosure can be assessed by measuring the breadth, depth, or duration of information (Collins & Miller, 1994; Greene, Derlega, & Matthews, 2006). Breadth reflects the number of topics that are covered in disclosure; depth indicates how intimate the information is; and duration simply describes the amount of time a disclosure takes (Cozby, 1973). Additionally, one can make distinctions between disclosure and edification. According to Stiles (1992), a disclosure “reveals thoughts, feelings, perceptions, or intentions” whereas edification “states objective information” (p.16). This distinction is somewhat similar to the one made by Morton (1978) between descriptive and evaluative information. Descriptive information is the stereotypical disclosure of personal, private facts about oneself. An example of a descriptive self-disclosure would be telling someone about going on a family vacation as a child. Evaluative information contains subjective feelings or opinions, such as one’s political viewpoints (Morton, 1978). In this way, descriptive information is like edification, and evaluative information is like disclosure. Just as there are multiple ways to distinguish between the different types or features of disclosures, there are also many theories about the purposes and functions of self-disclosure.
Social Penetration Theory

One of the best known theories regarding self-disclosure is social penetration theory, in which gradual increases in the breadth and depth of disclosures facilitate relationship formation (Altman & Taylor, 1973). Social penetration theory is applicable throughout every stage of relationships, but the gradual increases at the beginning are underscored. According to this theory, the process of gradually disclosing pieces of information also occurs much more quickly in the beginning of a relationship than it does further along in the relationship. The gradual, reciprocal exchange of disclosure is also much more structured when relationships are being formed. Once a pair of friends has known each other for long enough, they no longer feel the obligation to reciprocate each and every disclosure in order to further develop their friendship. How intimately topics are disclosed and at what rate the relationship develops are influenced by the costs and benefits of current and future interactions.

According to this theory, after the initial interaction between two people, an evaluation occurs. This evaluation takes into account the costs and rewards of the situation and is based on social exchange theory (Baxter & Braithwaite, 2008). Social exchange theory is essentially the economic aspect of building relationships. That is, what are the costs and benefits of making disclosures while beginning a relationship, and how can the benefits be maximized (Emerson, 1976)? The benefits or rewards can be interpersonal, personal, or situational. Interpersonal rewards have to do with social relationships and include power, respect, being liked, etc. Personal rewards are subjective and vary according to each individual’s personality. For example, an outgoing and assertive individual probably enjoys being the center of attention, so being a leader
would be personally rewarding. For someone else who is shy and passive, being a leader would probably not be a personal reward. Some personal rewards, however, are more universally rewarding. Receiving social support is an example that is rewarding for many people. *Situational rewards* have to do with the psychological environments. For example, if two students form a relationship to complete a class project, they would experience a situation reward if they completed the project. Any combination of these rewards can be used to evaluate the initial interaction between individuals. Did this person make me feel respected? Did this person like me? Do I feel closer to him or her? All of these are questions one might consider after meeting a new person. In addition, there are costs to the formation of interpersonal relationships. One common cost is experiencing anxiety. Like rewards, these costs are not universal and must be considered during the evaluation. People weigh their subjective costs and rewards to determine whether a relationship is worthwhile to continue.

Along with immediate costs and rewards weighed in the evaluation of the current interaction, social penetration theory states that individuals also estimate the net gains or losses of future interactions with that person (Derlega & Grzelak, 1979). Is there a good probability that future interactions with this person will be fulfilling? An overall picture, or cognitive model, of that other is constructed by the evaluator and becomes another point of consideration during the evaluation. All of these aspects together help a person decide whether he or she wants to continue interacting with someone, but they do not happen in any specific order. In fact, they are reevaluated after each interaction and can be done so in an ongoing fashion. If the evaluation is favorable, the relationship will progress via additional, gradual disclosures (Baxter & Braithwaite, 2008).
Disclosure Decision Model

Disclosures made throughout the relationship-formation process described by social penetration theory will be covered to varying degrees (depth), and the overall number of topics covered in each relationship will also differ (breadth). Reasons for different degrees of breadth and depth are varied, but one theory is that disclosures are made strategically based on social goals (Omarzu, 2000). The social goals of self-disclosure have been integrated into the disclosure decision model (Omarzu, 2000).

The disclosure decision model has three stages: selecting a goal, selecting a target, and weighing costs and benefits. Basic social goals that can be accomplished through self-disclosure are expressions of the self, self-clarification, validation, relationship development, and social control (Derlega & Grzelak, 1979). Expression of the self is a straightforward statement about how one feels. Self-clarification disclosures are those that use beliefs or opinions to show where one stands on a position. Validation is the goal of getting feedback from others that legitimizes one’s self-concept. The goal of relationship development is simple in that disclosure is often used as a vehicle for expressing intimacy and forming closer bonds. Lastly, disclosure can be used to control a situation or even to take advantage of another person (Derlega & Grzelak, 1979).

Selecting a goal is affected by individual differences and preferences such as being anxious or assertive, but selection is also affected by situational cues. For example, a work meeting may be a situational cue that affects one’s goal of self-disclosure by bringing the goal of validation to the forefront. An employee at a meeting may make disclosures to his or her boss to get legitimizing feedback. If a social goal is present in a situation, a corresponding target is then selected.
The second stage of the disclosure decision model involves selecting a target to whom a disclosure can be made. There are times when disclosure targets are very limited. One such example is if someone gets into a car accident; of course he or she is going to disclose to the first paramedic or police officer to arrive at the scene. Most situations, however, do not limit disclosure targets as much, so people must make choices.

Lastly, in the third stage of the disclosure decision model, the costs and benefits of making a self-disclosure are weighed, and other options for achieving the goal are considered. Sometimes social goals can be achieved without making a disclosure about the self, and indeed some situations discourage the use of self-disclosure. As an aside, the disclosure decision model suggests that the higher the benefits of disclosure are, the lower the breadth and the higher the duration will be (Omarzu, 2000). For example, a student who is on a graduate school interview should be more likely to focus his or her disclosure on their academic achievements and research interests (reduced breadth) and will probably talk about them as much as possible (increased duration). Because the number of topics is reduced, the topics that are covered will be covered very thoroughly (increased depth). In the previous example the benefits of disclosure, namely being accepted into graduate school, are high so candidates should be emphasizing specific aspects of themselves that will help them reach that goal.

The third stage of the disclosure decision model is essentially the same as part of the process outlined in social penetration theory. In social penetration theory, current and future interactions are evaluated on the rewards and costs. The third stage of the disclosure decision model, however, focuses on the rewards and costs of the disclosures in the current interaction. Omarzu (2000) specifies the rewards of self-disclosure as social
approval, social control, intimacy, distress relief, and identity clarification. Omarzu also compiled a list of disclosure risks from previous literature when she created the disclosure decision model. The five identified risks are being rejected by the listener; losing integrity, autonomy, or both; losing control or self-efficacy; embarrassing or otherwise offending the listener; and presenting oneself inaccurately (which can lead to the listener forming false judgments). If the rewards outweigh the costs that are evaluated, the disclosure will be made. The relationship will then presumably continue as it does in social penetration theory.

**Reciprocity**

Inherent in the theory of social penetration is the concept of reciprocity. *Reciprocity* is the process of returning an initial disclosure with one’s own disclosure (Berg & Archer, 1980). It is the part of social penetration theory that sustains the emerging relationship. This process is described in the literature as the norm of reciprocity because it is so pervasive in interactions that those who fail to reciprocate disclosures are often viewed negatively. For example, Chaikin and Derlega (1974a) had observers watch an interaction between two women who had never met and then rate how much they liked each of the women. The level of disclosure for each woman was manipulated, and they found that observers most liked the woman who reciprocated the same level of disclosure as she received. Additionally, if a woman received a high-intimacy disclosure and only reciprocated with a superficial disclosure or vice versa, she was liked less. Making a high-intimacy disclosure to a stranger, however, was seen as unusual and inappropriate, even if the initial disclosure was a high-intimacy one. As further evidence of this norm, observers reported wanting the woman less as a friend if
she gave a high-intimacy disclosure after receiving a low-intimacy disclosure than if she matched the level she received. Perhaps high-intimacy disclosures too early in a relationship are more harmful than helpful. Social penetration theory implies that disclosures should start at a superficial level and should progressively get more intimate as the relationship develops. Because intimacy should be reached over time, too much depth in initial reciprocations violates that process. Judging by Chaikin and Derlega’s results, it seems that there are two norms at play: The first is that disclosing too much to a stranger is in itself counternormative and seems to reflect maladjusted behavior. The second is that disclosing at a different level of intimacy from the one that was received is also counternormative and inappropriate.

Another study (Sprecher, Treger, Wondra, Hilaire, & Wallpe, 2013) compared pairs of individuals who were either assigned to a reciprocal disclosure condition or to a non-reciprocal disclosure condition. The pairs in both conditions interacted, completed online surveys, and then interacted a second time. In the reciprocal disclosure condition, pairs went back and forth asking questions and disclosing. In the non-reciprocal disclosure condition, one member of the pair disclosed during the first interaction and the other member disclosed during the second interaction. Results from surveys given to these participants found that pairs who reciprocated disclosures reported more liking, closeness, and similarity than pairs who did not reciprocate. This research indicates that reciprocity plays a major role in relationship development.

Although relationship development between acquainted pairs has been studied in the aforementioned literature, initial self-disclosure decisions are made in situations where the disclosure recipient is an unknown other. This type of encounter is one of zero
acquaintance: a situation involving individuals who have had no opportunities for prior interaction (Albright, Kenny, & Malloy, 1988). These situations are unique in that there are no prior interactions from which a person can be judged, so the entirety of the judgment is made on information that is available in that particular moment. This lack of information has a great bearing on the benefits and risks of social penetration theory; in established relationships, the benefits and risks can be weighed with more certainty based on past interactions and patterns, but in situations of zero acquaintance, those decisions are weighed in a much more arbitrary way.

**Perceived Similarity**

One of the ways that a person chooses to whom they are going to self-disclose may be based on how similar he or she thinks the other is. People tend to like the people, places, and things that are similar to the self (Pelham, Mirenberg, & Jones, 2002). This liking may lead them to self-disclose to become friends with similar people. *Implicit egotism* is the term given to the idea that people are more inclined to like the people, places, and things that are similar to their own self because it confirms their positive self-associations (Pelham, Mirenberg, & Jones, 2002). Jones, Pelham, Carvallo, and Mirenberg (2004) found evidence for this idea when they arbitrarily assigned experiment numbers to participants and then put participants in pairs and found that people were more attracted to their partner if their partner’s experiment number matched their birthday. Another study analyzed census data and found that people were disproportionately likely to live in cities whose name was similar to their own and have jobs with titles similar to their name. For example, Denise was more likely to be a dentist, and Connor was more likely to live in Connecticut (Pelham, Mirenberg, & Jones, 2002).
Implicit egotism assumes that most people hold positive self-images and unconsciously make choices based on what will affirm those self-images. Choosing to disclose to a similar other would not only reinforce someone’s positive self-association, but it could also function as a way to reduce the risk of being rejected by the listener.

In the absence of information on which to judge someone, people often assume the other is similar to their own self. This judgment is called assumed similarity and is sometimes also referred to as perceived similarity (Beer & Watson, 2008). In 2000, Watson, Hubbard, and Wiese conducted a study of self-other agreement among pairs of friends, dating couples, and married couples. All measures in this study were given to participants as a self-rating and also as an other-rating used to rate the other member of their dyad. Results of these ratings found that for high-visibility traits such as extraversion, self-other agreement is high. For low-visibility traits such as neuroticism, however, there is more evidence of assumed similarity. Thus, the lack of information present resulted in participants relying more heavily on the assumption that the other member of their dyad is similar to themselves. Along these same lines, Beer and Watson (2010) found that the more information a person was given about a target individual, the higher the self-other agreement between those two people.

Judgments about the similarity of other people are not necessarily always correct. Thus, perceived similarity does not automatically indicate actual similarity. Personality judgments also concern the matters of consensus, self-other agreement, and accuracy. Consensus is the measure of how similar two separate judges’ ratings of one target individual are. Self-other agreement is closest to perceived similarity in that it measures how much one person’s judgment of a target individual agrees with the target
individual’s own self-judgment. Last is accuracy, which looks at the degree to which personality judgments accurately represent real traits of an individual (Funder & West, 1993). To represent how these concepts interact, let us use Susie as an example. If Susie’s mother and her teacher both rate Susie as high in openness, there is consensus. If Susie agrees with her mother’s rating of Susie’s openness, there is self-other agreement. It is important to note that although there may be consensus, self-other agreement, or both, these do not guarantee accuracy. A behavioral observation of Susie might find that she is actually very low on openness as a general construct. This finding would mean that the judgments made by her mother, teacher, and Susie are not accurate. Clearly there is a lot that goes into personality judgments, but in conditions of zero acquaintance people are operating on assumptions based only on what they can readily observe.

**Perceived Understanding**

There are numerous goals of self-disclosure. One significant theme present in most of these goals, however, is to feel understood. Specifically, when people express their feelings or use disclosure in an attempt to be validated, they are looking for an inherent understanding from the other person. Oftentimes, similar experiences play a role in this understanding as well. There are many expressions used in American culture related to understanding someone better through having common life experiences. For example, people often say they understand because they’ve “been there too.” It is also widely accepted that you cannot truly grasp what people are going through unless you “walk a mile in their shoes.” To test the idea that sharing similar life experiences promotes understanding and empathy, Hodges, Kiel, Kramer, Veach, and Villanueva (2010) conducted a study on new mothers. They paired a new mother target with three
other women: one who had never been pregnant or raised a child, one who was currently pregnant, and one who was also a new mother. The new mother target made a video of herself talking about her experience as a new mother of an infant and each of the other three women paired with her watched the video. Results found that women who had the same life experience as the target individual (e.g., were also new mothers) were rated by the new mother targets as having more understanding and empathic concern. The pregnant perceivers were rated as the next highest in terms of understanding and empathic concern, followed by the perceivers who had never been pregnant or raised a child. When the perceivers rated how much they felt they understood and had empathy for the new mother target, their ratings followed the same pattern as the ratings by the new mother targets. The three perceivers were not given any instruction as to whether or not to reveal their status (of new mother, pregnant woman, or never pregnant woman) to their new mother target. When new mother perceivers disclosed their status in their letter, however, they were seen by the new-mother target to be significantly more understanding. When objectively rated, the new mother perceivers included significantly more self-disclosure in their letters than did never-pregnant perceivers. These results seem to suggest that people can help others feel more understood if they have had similar experiences in the past, especially if they explicitly share that similarity with the others.

Eklund, Andersson-Straberg, and Hansen (2009) examined the effects of similar experience on empathy by having participants read vignettes and rate how similar their past experiences were to the vignette and also their feelings of empathy for the subject of the vignette. The participants read about fear of the dark, fear of abandonment, loss of a pet, and loss of a parent. Eklund et al. found a positive correlation between similarity of
participants’ prior life experiences and empathy for the subject of the vignette. Some studies have found sex differences in the amount of empathy resulting from having similar experiences. One example of a study finding sex differences was done by Batson et al. (1996) who found that when rating their level of empathy for a target individual, women who had previously had similar experiences to the target reported more empathy than women who had not had similar experiences. Conversely, men reported less empathy if they did share prior experiences with the target individual than if they did not. These authors hypothesized that perhaps the reduced empathy on the part of the men was due to a sex-role stereotype. This research gives support for the idea that having similar experiences promotes empathy and feelings of understanding in others, which are some of the main goals of self-disclosure.

Effective communication is a crucial component of relationships and a key part of effective communication is conveying understanding. A study by Cahn (1990a) done on married, divorced, and partnered individuals found that, among partnered and married individuals, partners who felt understood were significantly happier than partners who did not feel understood. Additionally, when interviewed, divorced individuals reported a lack of understanding by their previous spouse. Another study (Cahn & Shulman, 1984) asked participants to name feelings that are experienced when they succeed in an attempt to make themselves understood by another. This open-ended question resulted in satisfied being one of the feelings that was highly correlated with feeling understood. When the participants were asked to name feelings that are experienced when they do not succeed in an attempt to make themselves understood by another, dissatisfied was one of the feelings that was highly correlated. These studies seem to suggest that perceived
understanding and relationship satisfaction are related. In fact, Cahn (1984) asserts that communicating in a way that produces perceived understanding facilitates the growth of relationships. In particular, he argues that one of the factors that helps in the initiation and maintenance of relationships is whether or not someone feels understood. Feeling misunderstood also can be one of the factors that leads to termination of a relationship. The consequences of being understood or misunderstood are why Cahn (1990a) argues that it is important to monitor feelings of understanding early in the relationship. This idea relates to the earlier discussion of perceived similarity in that if a person has a similar bank of experiences from which to draw while listening to someone, she or he may be better able to understand and continue the conversation and also the relationship.

The Current Study

Although there has been extensive research in the areas of similar personalities and self-disclosure, it seems that there has been little research done to date that bridges these two lines of research. There has been plenty of research to show that there are links between personality similarity and attraction, although there has been some debate about whether it is actual or perceived similarity that matters (see Montoya, Horton, & Kirchner, 2008, for a review). It seems that perceived similarity has a significant effect on no-interaction, short interaction, and long-interaction relationships. Ample research also supports the links between self-disclosure and liking (see Collins & Miller, 1994, for a review). Evidence has been found for three different liking-disclosure links: People disclose more to those they initially like; people like those who disclose to them; and people like others as a result of having disclosed to them. The strongest effect found was for the relationship between how much a person initially likes another and how much he
or she discloses to that other, although all three relationships were found to be significant (Collins & Miller, 1994).

The purpose of the current study was to bridge these lines of research and look at whether perceived similarity affects the self-disclosure that occurs between two people in a situation of zero acquaintance. I also looked at whether there is an effect of actual similarity on perceived understanding. That is to say, if two people have similar self-ratings of personality, will they feel more understood by each other? Perhaps if people actually are similar, they will have had more similar experiences and will be better able to understand each other. Perceived understanding in itself is related to relationship satisfaction and can be useful for determining whether a relationship should continue or be dissolved (Cahn, 1990a).

This study was conducted on dyads of female participants. In it, I manipulated perceived similarity between them to compare the amount of self-disclosure occurring between those dyads. Male participants were not used in this study because previous research shows gender differences in the amount of empathy men and women show for those with similar experience and those differences could greatly complicate the findings of this study (Batson et al., 1996). Using only women participants also simplified the analyses due to the fact that the majority of the participant pool was female and recruiting enough male dyads would be extremely challenging. Because the current study was conducted on a relatively small sample in a university setting and included only female participants, I was concerned that measuring similarity naturalistically would not produce enough of a difference to analyze. By manipulating the level of perceived similarity of the dyads, I was then able to compare the amount of self-disclosure occurring between
the two groups. Figure 1 follows and it shows that the variables are connected to each
other both directly and indirectly. Each arrow is labeled with the number of the
hypothesis with which it is associated.

**Hypotheses**

1. If perceived similarity is high, self-disclosure will be high (compared to when
perceived similarity is low), because people who are perceived to be highly similar are
viewed as more attractive and understanding than dissimilar individuals.

2. As actual similarity increases, self-disclosure will increase, because people like what is
similar to themselves (Pelham, Mirenberg, & Jones, 2002), and liking another is
significantly related to disclosing to them (Collins & Miller, 1994).

3. When the level of perceived similarity is high between two individuals, there will be
greater perceived understanding. If a person assumes another to be highly similar, that
person will also assume the other will be better able to understand them than most people
would be able to understand them.

4. The more actual similarity there is between two individuals, the more perceived
understanding there will be between those individuals, because two individuals who have
actual similarities to draw from will be better able to convey understanding.

5. As perceived understanding increases, self-disclosure between two individuals will
increase. Because feeling understood is a main goal of self-disclosure, perceived
understanding will facilitate further disclosures.
Figure 1. Depiction of the Direction of Hypotheses.
CHAPTER III

METHOD

Participants

For this study I recruited 172 students from a large university in the Midwest. Participants were recruited from psychology courses that offered extra credit in exchange for participating in research studies. They were compensated for their time with extra credit in a psychology course of their choosing. There were 86 unacquainted pairs of female participants in this study. The mean age of participants was 19.82 ($SD = 2.34$). Sixty-two participants were freshman; 50 participants were sophomores; 45 participants were juniors; 15 were seniors, and 1 participant was in graduate school. One hundred and sixteen participants indicated they were White/Caucasian; 35 participants indicated they were Black/African American; 10 participants responded they were Hispanic/Latino; 10 participants reported mixed ethnicity; and 1 participant chose ‘other’. The majority of participants reported they were heterosexual (162); 8 reported they were bisexual; 1 reported she was homosexual; and one participant chose ‘other’ for sexual orientation. Seventy-nine participants reported that they were single; 17 reported dating someone casually; 73 reported seriously dating someone; and 3 reported living with their significant other.
Measures

**Big Five Inventory**

The Big Five Inventory (BFI; Benet-Martínez & John, 1998) is a 44-item self-report questionnaire designed to measure the Big Five dimensions of personality. The dimensions are agreeableness, conscientiousness, extraversion, neuroticism, and openness to experience. I used the BFI to measure self-reports and other-reports of personality. Each of the 44 items contains a short phrase and is rated on a 5-point Likert scale ranging from 1 (Disagree Strongly) to 5 (Agree Strongly). The internal consistency reliability of scores on the Big Five Inventory is high, with Cronbach alphas ranging from .75-.90 (Benet-Martínez & John, 1998). For the present study, Cronbach alphas were .68 for agreeableness, .77 for conscientiousness, .86 for extraversion, .83 for neuroticism, and .73 for openness on the self-BFI. For the other-BFI in the present study, Cronbach alphas were .82 for agreeableness, .82 for conscientiousness, .88 for extraversion, .79 for neuroticism, and .75 for openness. The BFI correlates highly with Costa and McCrae’s NEO-PI-R ($r = .75$) and with Goldberg’s Big Five scales ($r = .80$; Benet-Martínez & John, 1998). The BFI was scored by summing the items.

**The Perceived Understanding Instrument**

The Perceived Understanding Instrument (PUI; Cahn, 1990b) is a 16-item instrument designed to identify how understood (or misunderstood) one feels after an interaction with another person. I used the PUI to measure the degree to which participants felt understood by their stranger-partner. The items were derived from a study (Cahn & Shulman, 1984) identifying feelings that are characteristic of being understood and feelings that are characteristic of being misunderstood. Each item asks
how much the rater experienced that particular emotion with a 5-point Likert scale ranging from 1 (very little) to 5 (very great). The first eight items represent perceptions of being understood, whereas the final eight items represent perceptions of being misunderstood. I added understood and misunderstood to this instrument as two additional items to check validity, resulting in nine items each representing perceptions of being understood and perceptions of being misunderstood. To obtain a score of overall understanding, the first eight item ratings were summed, and the second eight item ratings were summed. The score of the second eight items was then subtracted from the score of the first eight items. Scores from this instrument have been found to have a test-retest coefficient of .90 and a Cronbach alpha of .89 (Cahn & Shulman, 1984). For the present study, the Cronbach alphas are .90 and .73 for the understood and misunderstood items, respectively.

Self-Disclosure Instrument

I generated questions to measure the level of self-disclosure by the participant; these questions were called the Self-Disclosure Instrument (SDI). The questions ask the participant to rate, on a 5-point Likert scale from 1 (not at all) to 5 (completely), the degree to which they shared personal information with the other participant and also the degree to which they hid personal information from the other participant. The questions are also reworded to gather an other-report of self-disclosure using the same 5-point Likert scale; thus, I have both self-reports and other-reports on the SDI. The self-SDI has a Cronbach alpha of .83, and the other-SDI has a Cronbach alpha of .79 in this study. Refer to Appendix A for the items.
The Relationship Closeness Induction Task

The Relationship Closeness Induction Task (RCIT; Sedikides, Campbell, Reeder, & Elliot, 1999) is a procedure designed to facilitate a reciprocal conversation in the laboratory that as closely as possible imitates natural interactions. This task was used to provide an opportunity for two strangers to self-disclose to each other. The procedure involved three lists of questions that gradually got more personal. Participants were instructed to engage in answering these questions as naturally as possible, and it was suggested that they answer in a back and forth manner. The first list included simple questions about identifying information, such as name and age, whereas the second list got into questions about family and embarrassing moments. The third and final list contained items that ask about a participant’s biggest fears and deeply emotional experiences.

Procedure

Participants in this study signed up via an online system and were asked to not intentionally sign up at the same time as friends. Each timeslot could accommodate up to 4 participants and advised that the study would be run in pairs. Participants received an email reminder of the study the day before their scheduled time with instructions on how to get to the lab. When participants arrived, they were greeted by the researcher and seated together in the main room of the lab. The researcher then asked if any participants already knew each other. Although it happened very rarely, if two participants did know each other, the researcher discreetly checked the random pair assignments to see if those participants were paired together. If so, the pairs were then rearranged to ensure
participants in both pairs were unacquainted. In the event that three participants knew each other, one would be randomly selected to be dismissed and still receive credit, although this situation did not arise.

Each participant then received an informed consent form and was verbally informed of her rights by the researcher. See Appendix B for this form. Before signing the informed consent form, participants were given the opportunity to ask the researcher any remaining questions. Once each participant signed the form and returned it to the researcher, she was given a stapled packet containing a demographics questionnaire and a self-report measure of personality, the Big Five Inventory. Appendix C contains a copy of the demographics questionnaire. The researcher assured participants that responses would be kept private and asked that they did not talk as they completed the packets. Once each participant completed her packet, she returned it to the researcher. When all packets were returned, the researcher stated “Excuse me while I go quickly score your questionnaires. Your scores are important for the next portion of the study, but unfortunately I cannot tell you what your scores are. Please do not talk to each other while I am gone” and exited to a side room of the lab with a manila folder marked ‘Scoring Materials’ for 5 min.

After an interval of 5 min had passed, the researcher returned to the main room with the participants. If the session had 3 or 4 participants, the researcher would then announce “Now I’m going to separate you into pairs for the remainder of the study. I will take two of you to each room so both pairs can interact without interruption. Please follow me.” Participants were asked by first name to follow the researcher into a side room where they were given further instruction. Pairs were randomly assigned to a
condition before the session began. With two pairs, the researcher always brought the control pair back first. Once in the room with the control pair (hereafter referred to as Pair A), the researcher closed the door, handed each pair member a laminated copy of List I of the Relationship Closeness Induction Task, and said:

Now you’re going to interact with each other. You will each get three identical lists of questions. I’d would like you to engage in as natural a conversation as possible using these questions. An easy way to do this would be to take turns asking and answering these questions. There is a time limit on each of the three lists of questions. You should try to finish as many questions as you can from that list within that time limit. You may spend 5 minutes on the first list of questions, 10 minutes on the second list, and 10 minutes on the third list of questions. I will keep time and come back to give you the next list of questions. When this occurs, finish the question you are on and then go on to the next list.

The pair was told to begin and the researcher exited and closed the door while they interacted.

The researcher then returned to the main room. If a session only had 3 participants, the researcher escorted the third participant into the hallway and debriefed her. She was assured she had done nothing wrong, that the pairs were randomly assigned before the study, and that she would still receive full credit for participating. The participant was given a copy of the debriefing form which can be found in Appendix D, was verbally debriefed, and then dismissed. In this situation, the remaining pair was originally always assigned to the control condition which then resulted in an inadequate number of experimental pairs. For that reason, the remaining pair in a session with 3
participants was then randomly assigned to either the control or experimental condition. If in the experimental condition, they were informed that they were kept together in the study because their questionnaire results indicated they had similar personalities. If a session had four participants, the second pair was then escorted to another separate side room to interact. The researcher entered the room with the pair to give them instructions and closed the door behind her. As this pair (hereafter referred to as Pair B) was in the experimental condition, the researcher stated “I have paired the two of you together because the results of the questionnaires you just completed indicate that you are similar” before giving the same instructions as were given to Pair A. When only 1 pair was signed up for a session, a coin was flipped to determine which condition they would be in. If in the experimental condition, the researcher would instead state “According to the questionnaires you just completed, it appears you two are similar to each other.” The researcher kept a timer for each pair and returned to each room after 5 min had elapsed. Pair members returned the first list of the RCIT to the researcher and were each given the second list and instructed to begin.

After a further 10 min had elapsed for each pair, the researcher returned to the respective rooms to distribute more questionnaires. The researcher entered and said:

Now I’m going to have you fill out a couple more brief questionnaires. Because the answers to these questionnaires are private, I’m going to separate you into different rooms. The purple questionnaire is about your partner and the white one is about you. Remember, your answers to these questionnaires will not be shared with your partner or anyone else, so please be as honest as possible.
The researcher then asked the participant closest to the door to move to the next room. Each pair member was handed the other-report Big Five Inventory which was printed on purple paper and the Perceived Understanding Instrument which was printed on white paper. Doors were again closed to maintain privacy. Participants were then left for approximately 5 min to complete the questionnaires before the researcher returned to check on their progress. Pair A returned their questionnaires first, was rejoined and given the final list of the RCIT, and told “You should now sit together again and complete the final list of questions. Remember, you will have 10 minutes for this list. Again, I will keep time for you and come back when your time is up.” The researcher then repeated this step with Pair B.

After the 10 min allotted for the final list elapsed, the researcher returned to Pair A and told them “These are the final two questionnaires. Please return to the other small room to ensure privacy. The purple questionnaire is about your partner and the white one is about you. Again, your answers to these questionnaires will not be shared with your partner or anyone else so please be as honest as possible” before distributing the self-report Self-Disclosure Instrument (on white paper) and the other-report Self-Disclosure Instrument (on purple paper). This step was then repeated with Pair B. Participants were given approximately 3-4 min before the researcher returned to the side rooms to ask if they had completed the questionnaires. Once completed, the questionnaires were returned to the researcher and Pair A was brought back to the main room where they were each given a debriefing form, verbally debriefed, and given the opportunity to ask questions before being dismissed. Participants in Pair B were then rejoined in the main room to be debriefed as Pair A was, with the exception that they were told:
Earlier in the study I told you that you were paired together because you had similar personalities, but this is in fact untrue. All pairings in the study were random. This was done to see if participants would interact differently if they believed they were similar. I understand that this could have affected the way you chose to interact and may change whether you would like us to include your data in this study. If you agree to let us use your data still, please sign this second consent form.

They were given a second consent form which can be found in Appendix E. All participants who were given the second consent form chose to sign it.
CHAPTER IV
RESULTS

The purpose of this study was to examine similarity, perceived and actual, as predictors of perceived understanding and self-disclosure. To do this, I first conducted an analysis on whether perceived similarity was successfully manipulated in this study. Descriptive statistics are then provided to examine perceived similarity and the relationship between perceived understanding and self-disclosure. In my primary analyses, I present the path model and analysis used to test my hypotheses.

Preliminary Analyses

Analyses for this study were conducted at the level of the dyad which removes the problem with non-independent data. Detecting a medium effect size at $\alpha = .05$ requires $N = 85$ (Cohen, 1992) and running 86 pairs of participants provided $N = 172$. The study thus had a sample size of 86. An independent samples $t$-test was used to compare how similar participants felt when they were told they and their partner are similar and when they were given no information regarding similarity. This test was done as a manipulation check on perceived similarity to see if it made a difference between the dyads if the researcher informed them they had similar personalities. Perceived similarity was measured using correlations between dimensions on the self-reports and other-reports of
the BFI for both conditions. The self- and other-reports were both completed by the same individual and therefore showed how similar she believed her partner’s personality was to her own. There was a significant difference in the level of perceived similarity reported for pairs in the experimental condition ($M = 5.50, SD = 1.40$) and pairs in the control condition ($M = 4.92, SD = 1.59$); $t(170) = 2.53$, $p = .012$. This finding suggests that pairs in the experimental condition felt significantly more similar than pairs in the control condition and that the manipulation was successful.

Table 1 provides a summary of the descriptive statistics for experimental condition Big Five scores. It seems that participants in the experimental condition believed their partner’s personality was pretty similar to their own, just much less neurotic. $T$-tests were done to compare the means of the self- and other-report scores for each dimension and scores are presented in the table for each condition. In both conditions, neuroticism was the only significant relation between the self- and other-reports.
**Table 1**

*Means and Standard Deviations of Big Five Scores in the Experimental Condition*

<table>
<thead>
<tr>
<th></th>
<th>Self</th>
<th>Other</th>
<th>t values</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>M</td>
<td>SD</td>
<td>M</td>
</tr>
<tr>
<td><strong>Extraversion</strong></td>
<td>28.10</td>
<td>5.88</td>
<td>28.30</td>
</tr>
<tr>
<td><strong>Neuroticism</strong></td>
<td>23.29</td>
<td>5.64</td>
<td>19.12</td>
</tr>
<tr>
<td><strong>Agreeableness</strong></td>
<td>36.66</td>
<td>4.08</td>
<td>37.38</td>
</tr>
<tr>
<td><strong>Conscientiousness</strong></td>
<td>34.64</td>
<td>4.73</td>
<td>35.00</td>
</tr>
<tr>
<td><strong>Openness</strong></td>
<td>33.59</td>
<td>5.58</td>
<td>33.98</td>
</tr>
</tbody>
</table>

*Note.* The mean score reflects an average of all items for that personality dimension, ranging from 8-10 items per dimension. Each item score ranges from 1-5. * indicates significant at p < .001.

Table 2 shows a summary of the BFI descriptive statistics for the control condition. Neuroticism had a much higher mean in the self-reports than the other-reports of participants in the control condition as well.
Table 2

Means and Standard Deviations of Big Five Scores in the Control Condition

<table>
<thead>
<tr>
<th></th>
<th>Self</th>
<th>Other</th>
<th></th>
<th></th>
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</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>$M$</td>
<td>$SD$</td>
<td>$M$</td>
<td>$SD$</td>
<td>$t$ values</td>
</tr>
<tr>
<td>Extraversion</td>
<td>27.96</td>
<td>6.02</td>
<td>27.90</td>
<td>6.21</td>
<td>.07</td>
</tr>
<tr>
<td>Neuroticism</td>
<td>24.64</td>
<td>6.15</td>
<td>18.76</td>
<td>5.04</td>
<td>8.19*</td>
</tr>
<tr>
<td>Agreeableness</td>
<td>36.60</td>
<td>4.45</td>
<td>37.84</td>
<td>4.95</td>
<td>-1.92</td>
</tr>
<tr>
<td>Conscientiousness</td>
<td>34.02</td>
<td>5.39</td>
<td>35.07</td>
<td>5.38</td>
<td>-1.67</td>
</tr>
<tr>
<td>Openness</td>
<td>33.37</td>
<td>5.81</td>
<td>34.32</td>
<td>5.38</td>
<td>-1.52</td>
</tr>
</tbody>
</table>

Note. The mean score reflects an average of all items for that personality dimension, ranging from 8-10 items per dimension. Each item score ranges from 1-5. * indicates significant at $p < .001$.

In the experimental condition, results indicate a significant correlation between the self- and other-reports of Extraversion and Agreeableness. Self-reports of Agreeableness were also significantly correlated with other-reports of Extraversion and Neuroticism. Lastly, self-reports of Openness were significantly correlated with other-reports of Neuroticism.

In the control condition, results show significant correlations between self- and other-reports of Extraversion and Neuroticism only. See Table 3 for a full summary of BFI dimension correlations.
Table 3

Correlations Among BFI Self- and Other-Reports for the Experimental Group (Above Diagonal) and for the Control Group (Below Diagonal)

<table>
<thead>
<tr>
<th></th>
<th>Self</th>
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<tbody>
<tr>
<td></td>
<td>E</td>
<td>A</td>
<td>C</td>
<td>N</td>
<td>O</td>
</tr>
<tr>
<td>Self</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>E</td>
<td>--</td>
<td>.30**</td>
<td>.12</td>
<td>-.10</td>
<td>-.08</td>
</tr>
<tr>
<td>A</td>
<td>.12</td>
<td>--</td>
<td>.12</td>
<td>-.23*</td>
<td>-.33**</td>
</tr>
<tr>
<td>C</td>
<td>.14</td>
<td>.31**</td>
<td>--</td>
<td>-.11</td>
<td>-.07</td>
</tr>
<tr>
<td>N</td>
<td>-.40***</td>
<td>-.29**</td>
<td>-.28**</td>
<td>--</td>
<td>.21</td>
</tr>
<tr>
<td>O</td>
<td>.07</td>
<td>.12</td>
<td>-.03</td>
<td>-.01</td>
<td>--</td>
</tr>
<tr>
<td>Other</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>E</td>
<td>.42***</td>
<td>-.05</td>
<td>.04</td>
<td>-.01</td>
<td>-.13</td>
</tr>
<tr>
<td>A</td>
<td>.08</td>
<td>.08</td>
<td>.05</td>
<td>-.12</td>
<td>.02</td>
</tr>
<tr>
<td>C</td>
<td>.12</td>
<td>.02</td>
<td>.11</td>
<td>-.06</td>
<td>-.05</td>
</tr>
<tr>
<td>N</td>
<td>-.13</td>
<td>-.12</td>
<td>-.03</td>
<td>.21*</td>
<td>.02</td>
</tr>
<tr>
<td>O</td>
<td>.08</td>
<td>-.07</td>
<td>-.14</td>
<td>.20</td>
<td>.19</td>
</tr>
</tbody>
</table>

Note. E = Extraversion, A = Agreeableness, C = Conscientiousness, N = Neuroticism, and O = Openness. *** indicates significant at p < .001. ** indicates significant at p < .01. * indicates significant at p < .05.
Next, it is important to look at correlations between scores on the PUI and scores on the self- and other-reports of the SDI. These correlations show whether self-disclosure increases with perceived understanding. Table 4 presents descriptive statistics and correlations for the experimental condition. Table 5 provides the same information for the control condition. In the experimental condition, the correlation between the PUI and the

<table>
<thead>
<tr>
<th></th>
<th>Self</th>
<th>Other</th>
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<tbody>
<tr>
<td></td>
<td>E</td>
<td>A</td>
</tr>
<tr>
<td><strong>E</strong></td>
<td>.47***</td>
<td>.09</td>
</tr>
<tr>
<td><strong>A</strong></td>
<td>.28*</td>
<td>.23*</td>
</tr>
<tr>
<td><strong>C</strong></td>
<td>.21</td>
<td>.11</td>
</tr>
<tr>
<td><strong>N</strong></td>
<td>-.05</td>
<td>-.03</td>
</tr>
<tr>
<td><strong>O</strong></td>
<td>-.05</td>
<td>-.15</td>
</tr>
</tbody>
</table>

**Note.** E = Extraversion, A = Agreeableness, C = Conscientiousness, N = Neuroticism, and O = Openness. *** indicates significant at p < .001. ** indicates significant at p < .01. * indicates significant at p < .05.
self-report SDI was the only significant relation. In the control condition, the relation between the PUI and the self-report SDI was significant. Lastly, there was no evidence that self-report SDI scores were significantly correlated with other-report SDI scores in either condition.

Table 4

*Descriptive Statistics and Correlations for the PUI and SDI in the Experimental Condition*

<table>
<thead>
<tr>
<th>SDI</th>
<th>PUI</th>
<th>Self</th>
<th>Other</th>
</tr>
</thead>
<tbody>
<tr>
<td>PUI</td>
<td>--</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Self SDI</td>
<td>.22*</td>
<td>--</td>
<td></td>
</tr>
<tr>
<td>Other SDI</td>
<td>.05</td>
<td>.12</td>
<td>--</td>
</tr>
</tbody>
</table>

\[\begin{array}{ccc}
M & 3.15 & 5.90 & 5.66 \\
SD & .70 & .90 & .95 \\
\end{array}\]


* indicates significant at p < 0.05
Although the PUI had a higher mean in the experimental condition than it did in the control condition, this difference was not statistically significant, $t(170) = 1.80, p = .07$. The difference between the self-report SDI in the experimental and control conditions was not significant, $t(170) = 1.83, p = .07$. The other-report SDI means were not significantly different between the experimental and control conditions, $t(170) = .42, p = .68$.

**Primary Analyses**

The intention of this study was to examine how different factors play a role in the amount of self-disclosure that occurs in initial interactions. Because of research conducted by Pelham, Mirenberg, and Jones (2002) and Collins and Miller (1994) on the links between liking and similarity and liking and disclosure, respectively, I hypothesized
that if perceived similarity is high, self-disclosure will be high (compared to when perceived similarity is low). Following the logic and research behind the idea of homogenous group therapy (Yalom, 2005), I hypothesized that when perceived similarity is high, there will be greater perceived understanding. I also hypothesized that as actual similarity increases, self-disclosure will increase. Based on Hodges and colleagues’ (2010) research about perceived understanding, I hypothesized that the more actual similarity there is between two individuals, the more perceived understanding there will be between them. Lastly, I hypothesized that as perceived understanding increases between two people, self-disclosures between them will also increase.

Actual similarity was determined by using differences in BFI self-reports and other-reports. The differences in Big Five profiles between stranger-pairs were computed using Cronbach and Gleser’s (1953) approach of computing \( D^2 \), \( D'^2 \), and \( D''^2 \) values that reflect these differences. According to these authors, trait profiles can differ by shape, scatter, and elevation. Differences in shape refer to the rank ordering of the dimension scores of the Big Five. Scatter refers to differences in the variability of the dimension scores. Lastly, elevation differences are differences in the average level of dimension scores. \( D^2 \), \( D'^2 \), and \( D''^2 \) are the indices created by Cronbach and Gleser to quantify the differences in shape, scatter, and elevation between profiles. \( D^2 \) accounts for all three differences by using the sum of squared distances between self- and other-reports of dimension scores. \( D'^2 \) accounts for shape and scatter by calculating \( D^2 \) after centering each profile around its mean. \( D''^2 \) only accounts for shape by calculating \( D^2 \) after standardizing the profiles.
Actual similarity is represented by profile differences in self-reports between Partner A and Partner B and was found using $D''^2$ because it takes the most information into account. Therefore, Partner A and Partner B have the same score for actual similarity, with higher scores indicating greater differences (see Cronbach & Gleser, 1953, for more info). Analyses for actual similarity were conducted at the level of the dyad. Perceived similarity was examined using correlations between BFI dimension scores taken from the self- and other-reports in the control and experimental groups. Participants were either in the control condition or the experimental condition and were coded using 0 or a 1, respectively. The intercorrelations among variables are shown in Table 6. In this table, perceived understanding was measured using mean scores from the PUI. Disclosure was measured by using an average score from the self-report SDI.

Table 6

*Intercorrelations Among Variables*

<table>
<thead>
<tr>
<th></th>
<th>Perceived understanding</th>
<th>Disclosure</th>
<th>Perceived similarity</th>
<th>Actual similarity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Perceived understanding</td>
<td>--</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Disclosure</td>
<td>.40*</td>
<td>--</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Perceived similarity</td>
<td>.18</td>
<td>.13</td>
<td>--</td>
<td></td>
</tr>
<tr>
<td>Actual similarity</td>
<td>-.15</td>
<td>-.03</td>
<td>-.13</td>
<td>--</td>
</tr>
</tbody>
</table>

*Note.* * indicates significant at p < 0.001

A path analysis was used to test hypotheses using the variables of perceived similarity, actual similarity, perceived understanding, and disclosure. Perceived understanding was measured using mean scores from the PUI. Disclosure was measured
by using an average score from the self-report SDI. A path analysis uses regression coefficients to show the magnitude of hypothesized connections between variables. These connections are depicted in a path diagram. In this type of analysis, the effects of variables on each other can be direct or indirect. If a variable has a direct effect on another, it is represented by an arrow in the diagram from one to the other whereas an indirect effect is represented by a string of arrows between variables. Each arrow represents a path that is then labeled with a coefficient and shows the significance of the relationship between those variables. Figure 2 shows the standardized path coefficients estimated using LISREL for the proposed theoretical model.

![Path diagram](image)

*Figure 2. Standardized Path Coefficients Estimated by LISREL. * indicates significant at p < .01.*

The $R^2$ value for perceived understanding was .05, and the $R^2$ value for disclosure was .17. For the portion of the model predicting disclosure, all three path coefficients had the expected sign, but only one of the three coefficients was significant. Specifically, perceived understanding had a highly significant positive relationship with disclosure. This finding was consistent with my hypothesis. There was no evidence that the path coefficients for perceived similarity and actual similarity were significant. This result provides support for Hypothesis 5, but Hypotheses 1 and 2 were not supported.
For the portion of the model predicting perceived understanding, one path coefficient had the expected sign and the other did not. Neither of the path coefficients predicting perceived understanding was significant.

**Additional Analyses**

Another path analysis was used to test the hypotheses using a different measurement of perceived similarity. In the original model, perceived similarity was measured using the condition variable. In the new path analysis, the similarity check question at the end of the SDI was used as a measure of perceived similarity. Figure 3 shows the standardized path coefficients estimated using LISREL for the new theoretical model.

![Figure 3. Additional Standardized Path Coefficients Estimated by LISREL. * indicates significant at p < .05. ** indicates significant at p < .001.](image)

The $R^2$ value for perceived understanding was .29, and the $R^2$ value for disclosure was .24. The path analysis conducted using the SDI similarity check question as a measure of perceived similarity showed significant paths between perceived similarity and disclosure; perceived similarity and perceived understanding; and perceived understanding and disclosure. These new findings provide support for Hypotheses 1, 3,
and 5. Neither path coefficient from actual similarity was significant. This finding provides no evidence to support Hypotheses 2 or 4.
CHAPTER V
DISCUSSION

Summary of the Research Problem, Hypotheses, and Findings

The purpose of this study was to determine how different factors affect the amount of self-disclosure that occurs between strangers during their first interaction. During an initial interaction, many factors come together to determine whether a relationship will continue to grow or will be terminated. This study examined just a few of these factors, specifically, perceived similarity, actual similarity, and perceived understanding in relation to self-disclosure. Previous research (Derlega & Grzelak, 1979; Hodges et al., 2010) has focused on each area individually but, to this author’s knowledge, never on these factors in combination with one another. Because social relationships are vital to humans, it is important to look at what makes the difference between those that flourish and those that flounder.

To look at the differences between initial interactions that lead to a relationship forming and those that do not, I first had to be sure that there was in fact a difference between the control and experimental groups in this study. To check for this difference between groups, I conducted a manipulation check as part of my preliminary analyses to verify that the dyads who were initially told they had similar personalities felt
significantly more similar than the dyads who were not told anything about their similarities. The analysis performed showed that dyads who were told by the researcher that they had similar personalities reported feeling significantly more similar than dyads in the control condition who were not told anything about their similarities. The manipulation was therefore successful. I also calculated the correlations between the Perceived Understanding Instrument and the Self-Disclosure Instrument to examine whether or not a higher level of understanding was related to a higher level of self-disclosure. In both the experimental and control conditions, the correlations were significant between the PUI and the self-report SDI. This finding means that feeling highly understood was related to making more or perhaps deeper self-disclosures in these interactions.

The first hypothesis stated that as perceived similarity increases, so too will the amount of self-disclosure. This hypothesis was grounded in previous research findings that people prefer others who share similarity to the self, even if the similarity is arbitrary (Jones, Pelham, Carvallo, & Mirenberg, 2004; Pelham, Mirenberg, & Jones, 2002) and that people disclose more to those they initially like (Collins & Miller, 1994). The present study compared whether pairs who were told they were similar before their first interaction engaged in more self-disclosure than pairs who were given no information about similarity. Results showed that there was no significant difference in the amount of self-disclosure that was self-reported on the SDI by participants in the experimental condition and participants in the control condition. This finding provides no support for the idea that people disclose more to those that they perceive to be similar to themselves. There is the potential that participants in this study in both groups felt some underlying
expectation that they should answer all the questions even if they would not in a more natural setting. When perceived similarity was measured using a general question about how similar partners felt, however, results showed a significant correlation between perceived similarity and disclosure. This finding seems to support the idea that participants are creating a general model of their partner as outlined in Social Penetration Theory to compare similarity rather than comparing based on specific personality dimensions. Perhaps future studies could use a less structured self-disclosure task or one with instructions that allow for more flexibility in the interaction.

Hypothesis 2 speculated that as actual similarity increases, self-disclosure will increase. This hypothesis is based on the same research as the first hypothesis. It also takes into account research by Hodges et al. (2010) who found that women who had actual similarity to a target woman in terms of specific life experiences were objectively rated as disclosing more information than women who did not have the same life experiences. This study’s findings did not support the previous literature. Although the relationship between actual similarity and self-disclosure was in the hypothesized direction, it was not significant. It seems likely that the structured self-disclosure task and the time constraints could have prevented the women in this study from learning about ways in which her partner was similar to her. Even with the amount of effort that goes into attempting to make structured laboratory interactions closely imitate natural interactions, there are of course inherent issues and roadblocks that come up. For example, women in this study were advised to ask a list of questions back and forth to each other and were aware that they only had a short amount of time to try to complete each list. The back-and-forth nature of the conversation does imitate natural conversation
in many ways, but it also limits conversational tangents that may have occurred in a natural setting and led to the discovery of similarities. Additionally, the instructions included with the RCIT direct the dyads to try to get through as many questions on each list as they can in the time limit. It is very possible that this contributed to shorter, more shallow answers for the sake of time and discouraged the discussion of actual similarities between women.

The third hypothesis in this study stated that the more perceived similarity there is between two individuals, the more perceived understanding there will be. In the aforementioned Hodges et al. (2010) study, the women who were similar to the targets were perceived as being more understanding and as having more empathic concern according to their self-reports and reports by the target women. These findings held true even when the women did not disclose the similarity explicitly, suggesting that perhaps perceiving similarities between oneself and another even without confirmation is enough to increase the perceived understanding. The findings of the current study were not consistent with this hypothesis. Although the relationship was in the correct direction, it was not a significant one. This finding may be limited by the sample of young female students from the same university in that they all have a certain level of obvious similarity. To show some support to that idea, several significant correlations between extraversion and agreeableness were found between the self- and other-report BFI scores in the experimental condition, thus suggesting assumed similarity. There were also significant correlations between self- and other-report BFI scores in the control condition. These correlations suggest that the individuals completing the BFI found their partners similar to themselves in some ways. Hypothesis 3 was also supported by the path model
using the SDI similarity check question to measure perceived similarity rather than participant condition.

Hypothesis 4 stated that the more actual similarity there is between two individuals, the more perceived understanding there will be between them. This hypothesis comes from studies such as the one conducted by Eklund et al. (2009). These authors found that the more similar the participants’ experience to that of a target subject’s experience was, the more empathy participants had for that target subject. In the current study, however, personality is measured and compared instead of past experiences. The findings from the current study were inconsistent with previous research in that the relation between actual similarity and perceived understanding was not significant. Reasons for this inconsistency could be that Eklund et al. (2009) had participants read about intense experiences of a target subject and then rate their level of empathy whereas the current study had participants interacting face to face about topics that were much less intense, relatively speaking. This study also measured perceived understanding which, although closely related to empathy, is not the same concept. The RCIT is meant to elicit self-disclosures, but many questions on the lists still allow for responses that remain shallow. For example, the lists get progressively more personal from the first to the third and the third list includes a question asking what one the participants’ biggest fears is. Whereas this question could be answered with some profound fear, it could also be answered with something like ‘spiders’ if the participant was scared of them and also felt unwilling to get too deep with their partner.

The final hypothesis of this study was that as perceived understanding increased, self-disclosure would increase. According to Derlega and Grzelak (1979), one main
reason people disclose is to be understood and validated. Omarzu (2000) also names validation as one of the primary social goals of self-disclosure. This study supports previous research (Batson et al., 1996; Eklund, Andersson-Straberg, & Hansen, 2009; Hodges et al., 2010) and found that perceived understanding and self-disclosure are highly correlated. Because the current study used a correlation to look at the relationship between perceived understanding and self-disclosure, it is unfortunately impossible to tell which one leads to the other. It is possible that perceived understanding is a necessary precursor for self-disclosure, but it is impossible to say that with any certainty with regards to the findings of this study. The current study differs from previous research because it looks at self-disclosure and perceived understanding in situations of zero acquaintance rather than existing relationships (Cahn, 1990a).

**Limitations and Recommendations for Future Research**

One major limitation of this study was the sample. The sample was almost entirely young, female students at a Midwestern university with the exception of one older graduate student from the university. The majority of the participants were White/Caucasian and heterosexual. According to Batson et al. (1996), men and women differ in their level of empathy for those with similar experiences, so including men could have altered the results. Same-sex dyads may have had opposite reactions when discovering they shared similar experiences as they did in the Batson et al. (1996) study. Mixed-sex dyads would be an important group to get data from to generalize findings further and future research should aim to collect this information. A diverse sample would be more representative of interactions that occur naturally outside the laboratory.
Research should aim to get a more representative sample so results can be generalized outside of just females in universities.

Another limitation of this study is that participants interacted via a structured self-disclosure task. The method was used to as closely as possible imitate the way relationships naturally develop, but it caters to college students in its wording and has a time limit which is not characteristic of most real interactions. Another version of this study without these limitations might allow for participants to gather for the study and have the researcher instruct them to talk amongst themselves while he or she completes some other task. This type of study would not have the limitation of a structured task and would instead allow conversations and relationships to develop more naturally. Although there would likely be a time limit in place for the participants to interact, it would not be explicitly stated to them and would thus be more comparable to a real life interaction. It should be noted, however, that a study that allows participants to interact naturally would have less experimental control than the current study. Perhaps it would be better to video record interactions in the laboratory to measure disclosure in order to maintain a higher level of control than in a natural environment.

Ideally, other research in this area would be conducted to examine initial interactions outside of the laboratory to capture a more realistic view of the development. Perhaps behavioral observations could be used to look objectively at self-disclosure in relationship development. Unfortunately, these types of studies would require significantly more time and resources to capture enough interactions and gather enough data to be useful.
Strengths of this study include that it is the first of the author’s knowledge to examine the ways that similarity and perceived understanding combine to influence self-disclosure in interactions. The proposed model is one drawn from the research on similarity-understanding and understanding-disclosure links and in that way is innovative. The current study was also able to add to research on theories of perceived understanding and disclosure.

Implications

The findings of this study have interesting implications for relationships that are forming. Of all the factors hypothesized in this study to have a relation with the amount of self-disclosure in initial interactions, only perceived understanding was significant. This finding seems to support Cahn’s (1990a) assertion that it is important to monitor whether one feels understood early on in a relationship if it is to be successful. Even though it is still unclear whether perceived understanding leads to self-disclosure or if it is the other way around, it is clear that they are significantly correlated and important for a relationship to continue.

Another implication of this study is that similarity does not seem to be as important to understanding as I previously thought. In American culture it is commonly accepted that in order to really understand another, one must have had similar experiences or “walked a mile in their shoes.” It appears through the findings of this study that such a statement is not very accurate during a brief encounter at zero-acquaintance. Similarity, perceived or actual, was not significantly related to understanding. Thus, a person does not need to walk a few feet in another’s shoes during
a brief interaction. It is more important that they are able to convey their understanding of what it is like for the other to be walking in those shoes instead.
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APPENDIX A

SELF-DISCLOSURE INSTRUMENT

Directions: You have just interacted with another participant in the study. Please use the following scale to answer the given questions:

(1) = not at all -----(2)-----(3)----- (4) = somewhat -----(5)-----(6)----- (7) = a great deal

Self-report questions:

How much did you tell your partner about yourself when discussing the given topics? _____

How much personal or intimate information did you share with your partner about the topics discussed? _____

How honest and open were your responses to your partner about the topics you discussed? _____

Other-report questions:

How much did your partner tell you about herself when discussing the given topics? _____

How much personal or intimate information did your partner share with you about the topics discussed? _____

How honest and open was your partner in her responses about the topics you discussed? _____

How close do you feel to your partner with whom you are working on this study? _____

How similar do you feel to your partner with whom you are working on this study? _____
APPENDIX B

INFORMED CONSENT FORM

Department of Psychology, Illinois State University

Informed Consent Form

Principal Investigator: Dr. Jeffrey Kahn

Please read this document carefully. Sign your name below only if you agree to participate and you fully understand your rights. Your signature is required for participation. For this project, you must be 18 years of age to participate. If you desire a copy of this consent form, you may request one, and we will provide it.

The policy of the Department of Psychology is that all research participation in the Department is voluntary, and you have the right to withdraw at any time, without prejudice, should you object to the nature of the research. Your responses are confidential. Any report of the data collected will be in summary form without identifying individuals. You are entitled to ask questions and to receive an explanation after your participation. You will earn credit or extra credit for research participation simply by coming to this appointment; you are free to withdraw your participation at any time without penalty. Alternative means of earning credit may be available; please consult your instructor or class syllabus.

Description of the Study: This is a one-session research study in which you will complete questionnaires and interact with a partner. Your participation in this research will take approximately 60 minutes.

Purpose of the Study: The purpose of this study is to gather information about how people interact with unfamiliar others. We are interested in the overall responses of all of the people who participate in this study, not the responses of any one participant.

Possible Risks: You will be asked to provide personal information about yourself. Data will only be accessed by the research team.

Possible Benefits: You will receive credit or extra credit simply by virtue of coming to your appointment. When your participation is complete, you will be given an
opportunity to learn about this research, which may be useful to you in your course or in understanding yourself and others.

Confidentiality: Your name will not appear anywhere on the data. The code number placed on the questionnaires will not be used to attempt to identify you by name. All data will be kept secure, in accord with the standards of the University, Federal regulations, and the American Psychological Association.

Opportunities to Question: If you have questions about this research project, you may contact Dr. Jeffrey Kahn, Department of Psychology, (309) 438-7939. If you have questions about your rights as a participant, you may contact the Research Ethics & Compliance Office at (309) 438-2529.

Opportunities to Withdraw at Will: If you decide now or at any point to withdraw this consent or stop participating, you are free to do so at no penalty to yourself.

Opportunities to be Informed of Results: In all likelihood, the results will be fully available at some time during the Fall 2015 semester. If you wish to be told the results of this research, please contact Becky Martin (ramarti@ilstu.edu) or Dr. Jeffrey Kahn (jhkahn@ilstu.edu).

________________________________________________________________________

I agree to participate in this research.

_________________________________________  ______________
Signature of Participant    Date
APPENDIX C

DEMOGRAPHICS QUESTIONNAIRE

1. What is your gender?
   a. Woman
   b. Man
   c. Other (e.g., transgender, gender queer), please specify _________

2. What is your year in school?
   a. Freshman
   b. Sophomore
   c. Junior
   d. Senior
   e. Graduate Student—Master’s
   f. Graduate Student—Doctorate
   g. Other (please specify) _________

3. What is your age? _________

4. What is your ethnic background?
   a. White/Caucasian
   b. Black/African American
   c. Hispanic/Latino
   d. Asian American/Pacific Islander
   e. Middle Eastern/North African
   f. Mixed Ethnicity
   g. Prefer not to answer
   h. Other (please specify) _________

5. Which, if any, religious group do you identify with?
   a. Atheist
   b. I don’t identify with any religious group
   c. Christian
   d. Islam
   e. Hinduism
   f. Buddhism
   g. Chinese Folk Religion
   h. Judaism
   i. Other: ________________________
6. What is your sexual orientation?
   a. Heterosexual/Straight
   b. Homosexual/Gay/Lesbian
   c. Bisexual
   d. Pansexual
   e. Other (please specify) 

7. What is your mother’s or stepmother’s highest level of education?
   a. Some high school, but no degree
   b. High School degree
   c. Two years college
   d. Four years college (Bachelor’s degree)
   e. Graduate Degree (Master’s degree or higher)

8. What is your father’s or stepfather’s highest level of education?
   a. Some high school, but no degree
   b. High School degree
   c. Two years college
   d. Four years college (Bachelor’s degree)
   e. Graduate Degree (Master’s degree or higher)

9. Who do you currently live with?
   a. Alone
   b. Parents
   c. Roommate(s) in residence hall
   d. Roommate(s) in apartment/house
   e. Romantic partner in apartment/house

10. What is your relationship status?
    a. Single
    b. Dating someone casually
    c. Dating someone seriously
    d. Living with significant other
    e. Married
    f. Divorced
    g. Separated
    h. Widowed
    i. Other (please specify) 

11. What is your education status?
    a. Some high school
    b. Graduated high school or equivalent (GED)
    c. Enrolled at a community college
    d. Enrolled at a university
    e. Associates degree or 2 year certificate
    f. Bachelor’s degree
g. Graduate degree
Other (please specify) __________
APPENDIX D

DEBRIEFING FORM

Debriefing Handout

The purpose of the tasks you just completed was to learn more about how people develop relationships with strangers. The first questionnaires that you filled out measure aspects of personality that might be known only by the self or perhaps by others as well, such as friends. The other questionnaires that you filled out measure how similar you think your partner is to you and how well you think they understand you.

The purpose of doing this study is to find out how people interact with others who are similar versus dissimilar. We suspect that judgments about other people affect what kind of personal information and how much personal information to share with them. Research in this area has implications for how interpersonal relationships develop. Your participation has been very helpful to us, and we thank you for participating.

If you have any questions or experienced any problems with the study you can talk with Dr. Jeffrey Kahn (jhkahn@ilstu.edu, 309-438-7939). Although we hope this was not the case, we understand that some participants might have experienced some distress as a result of participating in this study. If this has been the case, please consider making an appointment to meet with someone from Student Counseling Services by calling (309) 438-3655 or stopping by room 320 of the Student Services Building.

In this study it is critical that future participants do not know anything about the study until after they have participated in it. This is necessary in order to prevent people from responding in a biased manner. Therefore, it is extremely important that you keep information about your experience today to yourself. We hope that you will respect the integrity of this research study by keeping the details of this study private.
APPENDIX E
SECOND CONSENT FORM

Before you interacted with your partner, you might have been told that you were being paired up with someone who is similar to you. In fact, all pairings were random. Nevertheless, some participants were told that they would be paired with a similar partner so we could see how perceptions of similarity affect people’s disclosure of personal information.

We are aware that our statement about your partner might have influenced how you chose to interact with this partner. Some participants may wish to reconsider whether we are able to use their data in our analysis. We therefore would like to ask your permission to use your data in our study. Remember, no identifying information exists on any of the research questionnaires, and your name cannot be associated with your data. If you choose not to give us permission, your questionnaires will be discarded and you will still receive credit for the study.

If you agree to let us use your questionnaires in our research study, please sign below:

____________________________________________ ______ ________________
Signature               Today’s date