

ABSTRACT

Title of Document: HOW ONE HELPS: PERSONALITY,
THEORETICAL ORIENTATION, AND
HELPING SKILL PREFERENCE

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In order to test the interrelationships among personality, preferred theoretical orientation to counseling, and preferences for various response modes (helping skills) in counseling, undergraduates in peer counseling and basic helping skills courses completed measures of these three constructs. Findings include four significant relationships between personality factors and theoretical orientations, and four significant relationships between theoretical orientation and helping skill preference. Three significant relationships between personality factors and helping skill preference were found, including two replications from an earlier study by the author (Hummel & Gelso, 2007). Identification with and belief in the humanistic/client-centered theoretical orientation was found to be a mediator between emotional stability and preference for direct guidance. Overall, there were modest interrelationships between personality, theoretical orientation, and helping skill preference in beginning helping trainees; but it was suggested that these relationships

may not yet be solidified at this point in their development as helpers.

HOW ONE HELPS: PERSONALITY, THEORETICAL ORIENTATION, AND
HELPING SKILL PREFERENCE

By

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Chapter 1: Introduction

A fundamental part of helping clients in psychotherapy, verbal responses or techniques are means through which a psychotherapist may establish rapport and address clients' concerns. A therapeutic alliance is built from interpersonal skills which can be conveyed through verbal and non-verbal responses (Anderson, 1999). Therapists' responses can have a successful or unsuccessful impact on immediate, intermediate, and long-term outcomes (Sharpley & McNally, 1997). Because of the integral role of verbal responses in psychotherapy, consideration of what contributes to therapists' verbal responses might lead to a greater understanding of how therapy works.

A therapist's choice of a given verbal response depends on a variety of factors, such as client factors, the therapists' intentions, the therapist's theoretical orientation and his or her interpersonal style (Coleman, 2004; Hill, 1992; Hill, Helms, Tichenor, Spiegel, O'Grady & Perry, 1988; Murdock, Banta, Stromseth, Viene, & Brown, 1998; Nagel, Hoffman, & Hill, 1995). Therapists may also prefer the use of some types of verbal responses- or helping skills- over others (Hummel & Gelso, 2007).

The study of helping skill preference might clarify how psychotherapists, and people in other helping roles, respond to clients. Helping skill preference could be related to avoidance of some helping skills and overuse of others. While a clinician would not be expected to use techniques with which they are uncomfortable, being aware of one's preference for some techniques over others might help a clinician

better understand his or her choice of verbal responses. However, helping skill preference is not necessarily related to frequency of helping skill use. For example, a helper may prefer direct guidance, but would not necessarily use direct guidance more frequently than other helping skills in a given session because he or she would recognize that other responses are more appropriate.

According to Hill, Helms, Tichenor, Spiegel, O'Grady & Perry (1988) and Elliott, Barker, Caskey, & Pistrang (1982), some types of responses are perceived by clients and therapists as more helpful than other types of responses. For example, in one study (1988), interpretations were rated by both clients and therapists as quite helpful, and they seldom led to no reaction from clients. In contrast, closed questions were rated as least helpful and often led to no reaction from the client (1988). If a therapist prefers a less helpful skill, or dislikes a skill that can be quite helpful, this might limit his or her effectiveness with clients.

Theoretical orientation could be one factor in helping skill preference. Theoretical orientation guides how a helper interacts with a client and provides a framework for client conceptualization (Coleman, 2004; Nagel et al, 1995; Poznanski & McLennan, 1995; Hill, 1992). Helpers are generally expected to respond to clients with an appropriate, therapeutic response; theoretical orientation might suggest what is considered appropriate and therapeutic. Helpers might be more or less inclined to use certain skills, and this preference may fit into the response style encouraged by their theoretical orientation.

One of the primary factors in the choice of a theoretical orientation is personality (Arthur, 2001). Because of the importance of personality factors in

choosing and maintaining a theoretical orientation, personality factors may account for some variance in helping skill preference. In my undergraduate honors thesis, moderate, significant relationships were found between personality factors and helping skill preferences; these relationships will be reviewed in the literature review (Hummel & Gelso, 2007).

If helping skill preference is related to personality, students might enter training predisposed to learn or avoid certain helping skills. Trainees might not practice their less preferred skills, which would lead to a limited repertoire of skills to use with clients. By being aware of these preferences, instructors and supervisors could prepare for students who favor or avoid different skills. Instructors and supervisors could normalize the idea that trainees might prefer certain helping skills, while also pushing trainees to practice all of the helping skills, not just the trainees' preferred helping skills.

Precursor to Practicum: Helping Skills Training

An undergraduate course in basic helping skills might be the beginning of students' development as a helper. Undergraduate students learning basic helping skills typically practice the course material with fellow students acting as clients; this training method is generally recommended in textbook exercises (Seligman, 2004; Hill, 2004; Young, 2005). In contrast to graduate-level helping skills courses, however, the emphasis in undergraduate courses is not on becoming a professional counselor or therapist; rather, it is on learning and using basic helping skills, learning research and theories about helping, and improving one's ability to be a helper.

As beginning helpers, undergraduate students can have the same problems using basic helping skills that beginning graduate trainees have, such as managing the task of providing the appropriate response at the appropriate time when helping clients. When students learn helping skills, they learn how to use each individual skill and how to effectively determine which of all the possible responses is the better choice for a given client at a given time (Young, 2005). Training programs may teach basic helping skills by using individual skills such as restatements, reflections of feelings, open and closed questions, and minimal encouragers (Sharpley & Guidara, 1993). Undergraduate training might be done in a course that introduces counseling techniques and theory, but does not necessarily have the goal of training therapists. Because there are courses in which basic helping skills are taught to undergraduates, research is needed to explore undergraduate learning and implementation of helping skills (Hill & Kellems, 2002).

The participants in the present study will be undergraduate students in a basic helping skills course, so the more generic term helper is used instead of therapist or counselor, the term helping skill is used instead of verbal response mode or verbal technique, and client is used instead of patient. This terminology is consistent with several helping models and textbooks meant for students (Egan, 2002; Hill, 2004; Young, 2005). (When referring to previous works, I use the terminology chosen by the authors.)

Graduate level helping skills training may occur before students begin practicum and supervision (Hill & Lent, 2006b). Research on basic helping skills training and use may help improve these courses (Hill & Lent, 2006b). There may

also be broader implications from research on basic helping skills training for communication skills training, and for counselor training.

While the goals and methods for undergraduate and graduate courses may differ, the effect of helping skills training for graduate trainees and undergraduate students is comparable: in a meta-analysis of helping skills training methods, Hill & Lent (2006a) found no difference in effect size in training outcomes between undergraduates and graduate students. While I shall not be including graduate students in this study, the variables that will be examined ought to relate to one another in a similar way for graduate and undergraduate students.

In research on helpings skills training, the study of trainee variables allows researchers and training supervisors to consider what method of training is effective for which trainees (Hill & Lent, 2006a). Trainee characteristics such as dominance, sex, conceptual level and positive attitudes have been considered as variables that moderate the effects of training. However, the findings are inconsistent and have not been replicated (Hill & Lent, 2006a). In Hill et al (2008), trainee motivation, grade point average, and empathy predicted individual training outcomes. However, these findings were also not consistent across the outcomes studied. The lack of consistent findings concerning trainee variables predicting outcome suggests that helping skills training is effective overall for a variety of students (Hill & Lent, 2006a; Hill et al, 2008). Nonetheless, studying trainee variables might clarify what influences the process of training and what aspects of training are especially effective for different trainees.

Studying helping trainees may also be a possible approach to gaining more understanding of psychotherapists, especially in learning about helper characteristics that exist before training. In the present study, the personality, theoretical orientation, and helping skill preference of helping skills trainees will be measured and tested for a possible relationship between those three variables. This research could have implications for training in that students, as noted above, may have predispositions that lead them to prefer some helping skills over others before they begin their training (Hummel & Gelso, 2007). Also, this study will replicate earlier tests of the relationship between personality and theoretical orientation, but with a sample of trainees rather than psychotherapists, and with an additional test of the relationship between theoretical orientation and helping skill preference.

Chapter 2: Literature review

To help establish a foundation for the research question and hypotheses, research relevant to helping skill preference, theoretical orientation and personality will be reviewed. The section concerning helping skills will include a review of helping skill classification and training models. Theoretical orientation and factors that influence theoretical orientation choice will then be reviewed. Finally, personality as it relates to helping skill preference will be reviewed.

Helping Skills

Helping skills are verbal and nonverbal communications of a helper in his or her role of assisting a client (Hill, 2004). Because the present study concerns verbal helping skills, nonverbal helping skills- such as maintaining an attentive posture- will not be discussed. The reasons for considering helper verbal responses in a helping skills framework will be explored below.

One way to differentiate verbal responses used by helpers is to categorize responses by grammatical structure (Gelso & Fretz, 2001; Nagel, Hoffman, & Hill, 1995). There are many different classification systems for verbal response modes. Some have more categories of responses than others, but there are six types of responses common to all systems: reflection, question, interpretation, self-disclosure, information, and advice (Gelso & Fretz, 2001). The Hill Counselor Verbal Response Category System-Revised (HCVRCS-R) classifies counselor responses using nine unique categories of response modes: encouragement/approval/ reassurance, reflection/restatement, self-disclosure, interpretation, confrontation, providing

information, seeking information, direct guidance or advice, and unclassifiable (Hill, 1992). In addition to being useful for research on helping skills, the categorization of verbal response modes into types of helping skills can be useful for training beginning helpers.

Helping skills training models may use a system of categorized response modes to teach students about response modes and the helping process (Hill & Lent, 2006b). Depending on the training model, students may also learn about counseling theory, case conceptualization, self-awareness and a facilitative attitude, in addition to learning about verbal technical skills (Hill & Lent, 2006b). Training can have a noticeable influence on helpers' counseling behaviors. Sharpley & McNally (1997) found that trainees further along in their training used more minimal encouragers, restatements, reflections of feelings, open questions, and confrontations than less advanced trainees. Advanced trainees also tend to have higher client-perceived rapport and are more confident than their less advanced counterparts (Sharpley & McNally, 1997).

A helping model might take into account that helping skills could be divided into groups based on conceptual difficulty, and that helping skills might be grouped together by their purpose in the therapy process. Sharpley & McNally (1997) suggested that minimal encouragers, open and closed questions and restatements might be taught first because of their role in establishing rapport between the helper and client. Interpretations, reflections, and confrontations- conceptually more difficult than the first group- might be presented as most useful for deepening the therapy process (1997). Helping models tend to divide helping skills into groups

based on pedagogic reasons and relevance within the counseling process. Some examples of helping models that do this are Egan's Skilled-Helper model, Seligman's BETA model, and Hill & O'Brien's Three Stage model.

Egan's Skilled-Helper model is based on a rational problem-solving approach to helping. It focuses on problem-management, setting goals and solutions, and taking action (Egan, 2002). Seligman (2004), on the other hand, organizes technical and conceptual skills into four categories: background, emotions, thoughts, and actions. Each category represents treatment systems or theoretical orientations that emphasize elements relevant to the category. Also, response modes are presented in the category with which they are most strongly associated. Hill's (2004) model divides the helping process into three stages: exploration, insight and action. In this Three Stage Model, stages are informed by theoretical orientations, which focus on therapeutic concerns relevant to the stage. Helping skills associated with each stage are presented after the theory and research that inform the stage are explained.

The participants in the present study would be most familiar with Hill's Three Stage model. Each stage emphasizes one of the major theoretical orientations. The exploration stage draws from humanistic and client-centered theories, the insight stage draws from psychoanalytic and psychodynamic theories and the action stage draws from cognitive/behavioral theories (Hill, 2004). I shall now review the component helping skills for each stage and define each skill, as described in Hill (2004).

The exploration stage is aimed at hearing the client's story, thoughts and feelings, and establishing the therapeutic relationship. Helping skills associated with

the exploration stage are open questions, restatements and reflections of feelings. An open question asks a client to clarify or explore thoughts or feelings, without limiting the answer to a specific response. "Open questions clearly indicate a willingness on the part of the counselor to explore the client's world in the client's words," (Sharpley & McNally, 1997). In their study on response modes in brief psychotherapy, Hill et al (1988) found that open questions were the third most common response mode used by therapists. Open questions were rated as moderately helpful by therapists, but clients tended to give open questions low helpfulness ratings. Client reactions included high experiencing, feeling challenged, negative reactions such as being scared, and not feeling supported (1988).

A restatement is a paraphrase of the content or meaning of a client's statements. A reflection of feeling is a paraphrase of a client's statements that refers to the client's emotions. Hill et al (1988) found that paraphrases were the second most common response mode used by therapists. Paraphrases tended to be rated by therapists and clients as moderately helpful; clients often felt supported and understood when a helper used this skill (Hill et al, 1988).

The insight stage is aimed at helping clients gain self-understanding and awareness about their problems. The helping skills associated with the insight stage are challenges, interpretations, self-disclosures, and immediacy. A challenge directs a client to discrepancies between his or her thoughts, feelings, or actions or to irrational aspects of his or her thoughts. Hill et al (1988) found that confrontations- similar to challenges- were the second-to-least common response used by therapists. A client is most likely to have a negative response to a confrontation, but would rarely have no

reaction (Hill et al, 1988). While challenges may increase a client's anxiety by pointing out a discrepancy- such as an action that is contradictory with the client's feelings-, they can be helpful for inducing change; thus, interventions in which this skill was used tended to be rated by the therapists as moderately helpful.

An interpretation is a statement that goes beyond what the client said, giving a new perspective or reason for the client's behaviors, thoughts, or emotions. In Hill et al's (1988) study, interpretations were fifth most common, out of eight types of helping skills. Interpretations tended to be rated as quite helpful by therapists and clients; clients reported reactions related to growth and change. Self-disclosure involves the helper mentioning a personal experience from which he or she gained insight that might help the client. Self-disclosure can also be used to explore thoughts, feelings, or to consider potential strategies for action and change. Interventions using this helping skill received the highest client helpfulness and experiencing ratings, although its frequency was the lowest of all (Hill et al, 1988). When the helper discloses immediate feelings about the client or the therapeutic relationship, this can be categorized as immediacy.

The action stage is aimed at promoting client change based on his or her new understanding gained in the insight stage. The helping skills associated with the action stage are giving information, feedback about the client, process advisement, direct guidance, and disclosure of strategies. Giving information is used to share data, opinions, resources, or answers to questions. This type of response was most common in Hill et al (1988), but it tended to be low in client helpfulness ratings and reactions: clients might feel supported but not challenged. Feedback about the client

lets the client know how his or her behaviors impact others. Process advisement is a directive for the client within the helping session, such as trying a role-play. Direct guidance is advice or suggestions given to the client. This helping skill was the third-least-common in Hill et al (1988), and tended to be rated as least helpful by clients. However, as noted by Hill et al (1988), different samples of clients might rate direct guidance as a most helpful response. Disclosure of strategies involves the helper mentioning actions he or she has used to cope with problems.

By considering the client and his or her presenting problem, and the helper's own intentions, a helper might decide which helping skills to use when. In addition to those factors, the therapist's theoretical orientation might influence a helper's use of helping skills. (Strupp, 1955a, 1955b; Murdock, Banta, Stromseth, Viene, & Brown, 1998; Nagel, Hoffman, & Hill, 1995).

Theoretical Orientation

The term theoretical orientation refers to "an organized set of assumptions, which provides a counselor with a theory-based framework for (a) generating hypotheses about a client's experience and behavior, (b) formulating a rationale for specific treatment interventions, and (c) evaluating the ongoing therapeutic process," (Poznanski & McLennan, 1995). Each theoretical orientation guides how clinicians help clients (Coleman 2004; Poznanski & McLennan, 1995). The four most prevalent approaches are cognitive-behavioral, psychodynamic, experiential, and family systems (Poznanski & McLennan, 1999; Coleman, 2004).

Few clinicians use only one theory, so an individual clinician's theoretical orientation is likely to be a combination of multiple theories. Integrated and eclectic

approaches with components from different theories are common (Coleman, 2004; Worthington & Dillon, 2003). According to Norcross, Hedges, and Castle (2001), for psychologists in Division 29 of the American Psychological Association, eclectic/integrated approaches were most common followed by psychoanalytic and psychodynamic, cognitive and behavioral, humanistic and client-centered, and systems/family systems approaches. In comparison to what Norcross, Hedges, and Castle found in 2001, when Sundland & Barker (1962) surveyed members of the American Psychological Association who held a primary or secondary interest in psychotherapy, psychoanalytic theories were found to be the most influential among the participants.

While practitioners may adopt an eclectic approach, this label may refer more to technical skills, rather than philosophy and theory of the person that influence a therapist's approach (Murdock, Banta, Stromseth, Viene, & Brown, 1998). Theoretical orientation does not necessarily relate to efficacy of therapy, but it does have relevance to therapy process research (Wampold, Mondin, Moody, Stich, Benson, & Ahn, 1997).

Theoretical orientation tends to be related to personal philosophy, personality, therapeutic techniques, and intentions (Poznanski & McLennan, 1995; Vasco, Garcia-Marques, & Dryden, 1993; Vasco & Dryden, 1997; Murdock, Banta, Stromseth, Viene, & Brown, 1998; Hill & O'Grady, 1985; Arthur, 2001). However, variation among practitioners within each theoretical orientation might hinder detection of differences between theoretical orientations (Poznanski & McLennan, 1995). Regardless of theoretical orientation, therapists do have some characteristics in

common overall, such as moderate interpersonal affiliation, present-focused time competence, strong self-acceptance, and positive self-regard (Murdock et al, 1998; Tremblay, Herron, & Schultz, 1986).

Clinician responses vary in predictable ways based on theoretical orientation, consistent with the tenets about proper technique espoused by the different theories. That is, theoretical orientation has a strong (but not exclusive) influence on clinicians' practice. (Strupp, 1955a; Poznanski & McLennan, 1995; Hill, 1992; Nagel, Hoffman, & Hill, 1995). In a well-known study done more than a half century ago, Strupp (1955a) found that Rogerian psychologists were more likely than psychoanalytically orientated therapists to use reflective techniques such as silence, restatements and reflections. In contrast, the response modes used by psychoanalytically oriented psychologists were more evenly distributed over the range of possible techniques. They were more likely than Rogerian psychologists to give suggestions or opinions, ask open-ended questions, and to disagree with a client (1955a).

Techniques also vary based on clients' needs, the context of the helping session, the helper's profession, and the experience level of the helper (Strupp, 1955b; Nagel, Hoffman, & Hill, 1995; Poznanski & McLennan, 1995). In terms of the context of a helping session, Nagel et al (1995) found that career counselors used more active, directive techniques than confrontations, whereas helping sessions that occur in personal counseling that is more focused on intrapsychic factors might involve the use of more paraphrases, interpretations, and confrontations. When Strupp (1955b) compared the verbal techniques used by psychiatrists, psychologists and social workers, he found that psychiatrists tended to use more interpretations than

psychologists or social workers, and that social workers tended to offer reassurance more than psychiatrists or psychologists. Also, Strupp (1955b) found that experienced psychiatrists used more interpretations and passive rejections than inexperienced psychiatrists, and the inexperienced psychiatrists tended to use more exploratory responses.

Intentions

Theoretical orientation might influence helping skill use by the creation of a rationale underlying techniques used by a therapist during a session. For example, a therapist who takes an insight-oriented approach to therapy might want to encourage catharsis by offering an interpretation. A therapist's reason for using a given technique is known as an intention (Hill & O'Grady, 1985). Intentions may vary in part due to a therapist's theoretical orientation. In the Hill and O'Grady (1985) study, the psychoanalytic orientation was associated with the intentions of stimulating feelings and insight, the humanistic orientation was associated with the intentions of addressing counselor needs, and the behavioral orientation was associated with the intentions of effecting change, giving reinforcement, and setting limits. The intention associated with the humanistic orientation might at first glance seem somewhat out of place compared to the other theoretical orientations. Hill & O'Grady did clarify this apparent anomaly by noting that recognizing and admitting to personal needs does match humanistic values. Also, other intentions that were considered "humanistic" may have been adopted by therapists in other theoretical orientations (1985).

Epistemology

The appeal of a given theoretical orientation depends on a combination of a therapist's personal philosophies and worldviews (Vasco, Garcia-Marques, & Dryden, 1993). Vasco et al (1993) examined the relationships of psychotherapists' ontologies and epistemologies with their theoretical orientations. Ontology concerns a person's theory of existing; epistemology is one's theory of knowledge (Simpson & Weiner, 2007). The ontological preference assessed was mechanism-organicism. From a mechanist worldview, the universe is static, machine-like, and people are seen as determined, reactive, and isolated from the environment. Knowledge is considered to be an accurate representation of the world. From an organismic worldview, the universe is dynamic, and people are active, developing, and integrated with the environment. Knowledge of the world is considered to be constructed. According to Vasco et al, behaviorists tend to be most mechanistic, followed by psychodynamic practitioners. Humanistic/Existential practitioners were the most organismic; cognitive and systems/ communications practitioners were in the middle.

Epistemological dimensions assessed by Vasco et al (1993) were empiricism, rationalism, and metaphorism. Empiricism values inductive reasoning; beliefs are based on perceptive processes and are tested based on observations. Behaviorists were found to be the most empiricist, followed by cognitive practitioners. Humanistic and psychodynamic practitioners were the least empiricist. The next epistemological dimension, rationalism, values deductive reasoning; beliefs are based on conceptual processes and are tested based on logic. Cognitive practitioners were found to be most rationalist, followed by behaviorists; psychodynamic and humanistic practitioners

were the least rationalist. Metaphorism values analogical reasoning; beliefs are based on symbolic processes and are tested based on generalizability to other experiences (1985). Behaviorists were least metaphorical, and psychodynamic practitioners were most metaphorical (Vasco, Garcia-Marques, & Dryden, 1993).

In a review of 13 studies relating personality, epistemology and theoretical orientation, Arthur (2001) found that cognitive behaviorists/behaviorists tend to focus on the external, rather than internal, world. They value quantitative over qualitative information, and thinking over feeling. Psychodynamic therapists tend to focus on the inner world. Intuition, imagination and theorizing are valued. They are concerned more so with feelings and insight than change (2001).

If there is a mismatch between the epistemological values of a practitioner's theoretical orientation and the practitioner's personal ontology and epistemology, dissonance can occur (Vasco, Garcia-Marques, & Dryden, 1993). Vasco et al found a negative correlation between practitioners' dissonance and satisfaction with theoretical orientation. Also, there was a positive correlation between level of dissonance and the likelihood of a practitioner abandoning his or her career. Selection of eclecticism as a second theoretical orientation was related to a reduction in dissonance (Vasco et al). While personal values and philosophy are given strong consideration in a therapist's choice of theoretical orientation, other factors may influence choice of a dissonant theoretical orientation, such as initial clinical experiences, training, and supervisors (Arthur, 2001; Vasco et al, 1993).

Murdock, Banta, Stromseth, Viene, & Brown (1998) found that theoretical orientation of the professional training one receives is not normally a determinant of a

practitioner's theoretical orientation. Rather, theoretical orientation is influenced more by personal characteristics than by training (Poznanski & McLennan, 2003; Arthur, 2001). Many practitioners choose a theoretical approach that is different from how they were trained (2003). Considering the negative consequences for a practitioner whose theoretical orientation is dissonant from their personal philosophy, it might be worthwhile for trainees who are choosing a theoretical orientation to pay more attention to their own personality and epistemology instead of the theoretical orientation held by supervisors or program faculty. Initially, personality and factors such as training, supervision, and early clinical experience may determine theoretical orientation, but maintenance of a theoretical orientation might be due to exclusively personality (Arthur, 2001; Topolinski, 2007).

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practitioner whose theoretical orientation is dissonant from their personal philosophy, it might be worthwhile for trainees who are choosing a theoretical orientation to pay more attention to their own personality and epistemology instead of the theoretical orientation held by supervisors or program faculty. Initially, personality and factors such as training, supervision, and early clinical experience may determine theoretical orientation, but maintenance of a theoretical orientation might be due to exclusively personality (Arthur, 2001; Topolinski, 2007).

Personality

In a study concerning the relationship between personality and theoretical orientation, Tremblay, Herron, & Schultz, (1986) found personality traits that psychotherapists tended to have in common, as well as personality traits that differed based on theoretical orientation. Psychodynamic, humanistic, and behaviorist psychotherapists all tended to be focused on the present. Psychodynamic therapists and behaviorists were equally externally-oriented, while humanistic therapists tended to be inner directed (1986). Humanistic therapists were found to be more flexible, sensitive to their own feelings, affirming of self-actualizing values, and expressing feelings in action. Psychodynamic therapists and behaviorists tended to be more limiting on spontaneous expression of emotion than humanistic therapists (1986). Behaviorists tended to be less flexible and accepting of their own feelings. It should be noted that the personality measure used by Tremblay et al (1986) was based on humanistic constructs and ideals for self-actualization, so the results might be biased towards humanistic values.

In 1997, Scandell, Wlazelek, & Scandell, used the Revised NEO Personality Inventory (NEO-PI-R) in a study exploring therapists' personalities and theoretical orientations. They reported a relationship between domains of the Five-Factor Model and different theoretical orientations. The cognitive orientation was related to the Agreeableness domain and the associated facets of Straightforwardness and Altruism. The humanistic orientation was related to the factor Openness to Experience and the facets of Openness to Fantasy and Openness to Action (Scandell et al, 1997).

Poznanski & McLennan (2003) compared characteristics of psychologists in major theoretical orientations. Cognitive-behavioral psychologists tend to be younger and have relatively low emotional expressivity and openness to experience. They are more likely to be committed to a rational and objective basis of belief.

Psychodynamic psychologists, on the other hand, tend to be older and high on emotional expressivity. Experiential psychologists are more likely to be committed to intuition and subjectivity as a basis of belief, and to appreciate the self-exploration aspect of the experiential approach (Poznanski & McLennan, 2003).

There are some contradictory findings concerning the characteristics of psychodynamic psychologists. In the development of a measure of two trans-theoretical dimensions, Rational-Intuitive and Objective-Subjective, Poznanski & McLennan (1999) found that psychodynamic psychologists were on average more committed to intuition than rationalism. However, in their 2003 study, Poznanski & McLennan- using a different measure of the Rational-Intuitive dimension- found that psychodynamic psychologists were more committed to rationalism than intuition.

In an analysis and review of 45 papers, including fourteen empirical investigations, Arthur (2001) found evidence of an association between personality and theoretical orientation. The variety of scales and measures used to relate personality to theoretical orientation prevents a complete consensus concerning which traits determine which theoretical orientation. However, Arthur did find general characteristics associated with each theoretical orientation.

Unlike Poznanski & McLennan (2003) and Murdock et al (1998), Arthur (2001) sometimes distinguished between behaviorists and cognitive/behaviorists, depending on the theoretical orientations included in the studies considered for Arthur's literature review and meta-analysis. Arthur (2001) found that behaviorists tend to describe themselves as being rational and empirical, and prefer concrete, objective data. As therapists, they tend to set limits, look for and reinforce change, and focus on thoughts rather than feelings. Personality traits associated with behaviorists include conventional, inartistic, traditional, stable, practical, assertive, dominant, and extroverted. Personality traits that tend to be consistently absent in behaviorists include anxiety, depression, and emotional instability. Similarly, cognitive-behaviorists tend to be conventional, conforming, and rational.

Psychodynamic therapists tend to be more concerned with internal processes, feelings, and insight (Arthur, 2001). Personality traits associated with this orientation include creativity, introversion, non-conformity, imaginativeness, anxiety, moodiness, and depression. They describe themselves as being passive, impractical, and reactive. Psychodynamic psychotherapists tend to rely on intuition and imagination and avoid unnecessary risks (Arthur, 2001).

Because of the interpersonal nature of counseling activities, Murdock, Banta, Stromseth, Viene, & Brown, (1998) operationalized personality by measuring interpersonal behaviors. Prior research on interpersonal behavior revealed that control and affiliation are two basic dimensions of interpersonal behavior (1998). Interpersonal control was the only dimension found to differ by theoretical orientation. Psychoanalytic therapists scored high on dominance, cognitive/behavioral therapists scored second-highest, and client-centered therapists scored as the least dominant among the three theoretical orientation.

However, Arthur (2001) noted that experienced therapists tend to be more interpersonally similar than different. In the early part of their careers, cognitive-behavioral therapists seem more conventional, orderly, responsible, proper, conscientious, and servile than psychodynamic therapists. With time, however, psychodynamic therapists become interpersonally similar to cognitive-behavioral therapists (Arthur, 2001). This finding fits with earlier work by Fiedler (1950, 1951) in which therapeutic relationships were found to be more similar between psychoanalytic, nondirective and Adlerian expert psychotherapists than between experts and non-experts of the same theoretical orientation.

Summary of findings

Similarities in the findings of Poznanski & McLennan (2003), Scandell, Wlazelek, & Scandell (1997), Murdock, Banta, Stromseth, Viene, & Brown (1998), and Arthur (2001) suggest that there are personality traits associated with each theoretical orientation, but there were some contradictions concerning interpersonal behavior. Overall, cognitive/behaviorists were found to be more rational, agreeable,

concrete, dominant, and extroverted compared to other theoretical orientations. According to Murdock et al (1998), they tended to be less interpersonally controlling than psychoanalysts, but Arthur (2001) found that the two orientations were equivalent in interpersonal control. Personality traits consistently associated with the psychoanalytic orientation include higher emotional expressiveness and creativity. The experiential/humanist orientation was associated with intuitiveness, openness to experience, and passiveness. As the primary factor in theoretical orientation choice, personality appears to be associated with many of the counselor behaviors and characteristics with which each theoretical orientation is associated.

Personality and helping skill preference

Since personality influences theoretical orientation and theoretical orientation influences helping skill use, personality may also be expected to influence helping skill preference or use. Kolchakian (2004) compared students' usage of helping skills at the beginning of a basic helping skills course to their end-of-semester helping skills usage. The personality traits Kolchakian (2004) hypothesized as predictors of helping skill quality and self-efficacy were empathy, narcissism, psychological mindedness, intuition, dominance, and problem-solving orientation. Kolchakian (2004) found that those personality traits did not predict students' ability to learn helping skills.

While the personality traits measured by Kolchakian (2004) did not predict helping skill quality and self-efficacy, Hill (1992) speculated that therapists do use response modes that fit their interpersonal style. For example, a therapist with an open interpersonal style might use more immediate challenging disclosures, while a

therapist with an indirect style might use disclosures about past personal experiences (Hill, 1992). This could suggest that personality influences helping skill preference.

Indeed, in Hummel's (2006) study of undergraduates enrolled in helping skills courses, each of the personality factors in the Five Factor Model (McCrae & Costa, 2004; Goldberg, 1999) was found to be significantly related to preference for one or more helping skills. However, not all helping skills were associated with a personality factor or facet. Neuroticism was negatively correlated with preference ratings for challenges. Extraversion was negatively correlated with preference rankings for information-giving. Openness to Experience was positively correlated with ratings and rankings for reflection of feelings and open questions, and was negatively correlated with rankings for information-giving and direct guidance. Agreeableness was positively correlated with preference for reflection of feelings and open questions and was negatively correlated with preference for self-disclosure and direct guidance. Conscientiousness was positively correlated with preference for reflection of feelings and open questions.

Students learning basic helping skills may note that they especially like or dislike certain skills. Particular personality traits in students may relate to a preference for some helping skills, and to a dislike of others. As with therapists who choose theoretical orientations and responses which are suited to their own personality, so may students prefer certain helping skills due to their personality.

Because there is not an existing empirical consensus on which personality traits would be connected to helping skill preference, a general personality measure is

preferable to testing individual traits. The Five Factor Model has been used in prior research on theoretical orientation and personality, and is still in use (Scandell, Wlazelek, & Scandell, 1997; Arthur, 2001). According to this five factor model, personality traits can generally be described within one of these five dimensions: Neuroticism (N); Extraversion (E); Openness to Experience (O); Agreeableness (A); and Conscientiousness (C) (Costa & McCrae, 1997). The five factor model has been shown to be related to earlier models of individual differences, such as Jungian types, and the Minnesota Multiphasic Personality Inventory (Trull, Useda, Costa, & McCrae, 1995; Schinka et al, 1997). From numerous studies of this model across a range of cultures, there is support for the five-factor model as a universal personality structure (McCrae & Costa, 1997).

Summary of Literature Review

As a theoretical and technical basis from which helpers might work with clients, theoretical orientation might relate to a helper's helping skill preference. However, this relationship has not yet been tested. The link between helping skill preference and theoretical orientation might be based on personality. Personality has been found to be a factor in theoretical orientation choice (Scandell, Wlazelek, & Scandell, 1997; Poznanski & McLennan 2003; Arthur 2001). Through the relationship between personality and theoretical orientation, helping skill preference might be related to personality. However, it is possible that personality might directly relate to helping skill preference (Hummel & Gelso, 2007). The way through which personality might relate to helping skill preference has not yet been tested. Because a variety of personality models have been used in testing the relationship between

theoretical orientation and personality, it might be valuable to use a personality model that has been used in earlier studies (Arthur, 2001).

This study was a modified replication of earlier tests on the relationship between personality and theoretical orientation, and between helping skill preference and personality. In addition to the modified replications, the relationship between theoretical orientation and helping skill preference was tested, and a possible partially mediated relationship between personality, theoretical orientation, and helping skill preference was also tested.

Chapter 3: Statement of the Problem

Based on what has been explored regarding helping skill preference, theoretical orientation, and personality, I will now address how those three variables might be interrelated. It seems likely that there is a relationship between personality and theoretical orientation, between theoretical orientation and helping skill preference, and between helping skill preference and personality. In addition, there may be a partially mediated relationship between personality, theoretical orientation, and helping skill preference. In such a mediation, personality may predict helping skill preference via theoretical orientation, and personality may also directly predict helping skill preference.

Research concerning the relationship between personality and theoretical orientation suggests that different personality factors are related to choice of a theoretical orientation (Arthur, 2001; Poznanski & McLennan, 2003; Scandell, Wlazelek, & Scandell, 1997). Hummel and Gelso (2007) found that five personality factors were related to preference for different helping skills. The relationship between theoretical orientation and helping skill preference has not yet been tested.

The present study was a modified replication and extension of an earlier study by the author (Hummel & Gelso, 2007) on the relationship between helping skill preference and personality. Studying these variables in an undergraduate population presents an opportunity to consider trainee variables that exist prior to formal counselor training. Below, I shall describe three research questions and one

hypothesis that were tested. Following each research question or hypothesis, I will include a brief explanation for the research question or hypothesis.

Research Questions

Research Question 1

What factors within a five factor model of personality account for significant variance in theoretical orientation preference in undergraduate helping skills students?

According to Arthur (2001) and Poznanski and McLennan (1999), personality may be one of the most important factors in theoretical orientation preference. The effects of personality on preference for a theoretical orientation, according to these researchers, may be even stronger than that of training and supervision. Congruent therapists tend to hold theoretical orientations that match their personalities and personal styles (Arthur, 2001).

When Scandell, Wlazelek, & Scandell (1997) used the Five Factor Model to test what personality factors are related to different theoretical orientations, they found that the cognitive/behavioral theoretical orientation was associated with Agreeableness and low Openness to Experience. The psychoanalytic theoretical orientation was associated with Neuroticism, and the humanistic orientation was associated with Openness to Experience. In the present study, personality factors were expected to be related to the participants' theoretical orientation.

Research Question 2

How does preference for humanistic/client-centered, cognitive-behavioral, or psychodynamic/psychoanalytic theoretical orientation predict students' preference among nine helping skills?

Theoretical orientation can provide a basis for what helping skills a counselor uses (Hill 1992; Nagel, Hoffman, & Hill 1995). Clinician responses vary in predictable ways based on theoretical orientation, consistent with the viewpoint inherent in their theoretical orientation on appropriate technique (Coleman 2004; Hill 1992; Nagel et al, 1995). While frequency of use of a particular helping skill may or may not indicate preference, a helper's general preference for techniques may match the techniques that are considered most characteristic of their theoretical orientation. For example, interpretations may be characteristic for a psychodynamic approach to therapy, even if their use is relatively infrequent compared to restatements or reflection of feelings. Thus, theoretical orientation is expected to be related to what helping skills are preferred by helpers, not necessarily frequency of use.

Research Question 3

Are there significant relationships among personality factors and students' preferences for nine different helping skills?

Besides being linked to helping skill preference indirectly through theoretical orientation, personality is likely to be directly related to helping skill preference. Because helpers may integrate multiple theories, testing how personality relates to helping skill preference could clarify what determines a helper's approach to therapy.

Below are some of the significant relationships that were found by Hummel and Gelso (2007):

1. Openness to experience was negatively related to helper preference for direct guidance.
2. Openness to experience was positively related to helper preference for reflection of feeling.
3. Openness to experience was positively related to helper preference for open questions.
4. Agreeableness was positively related to helper preference for reflection of feeling.
5. Agreeableness was positively related to helper preference for open questions.
6. Agreeableness was negatively related to helper preference for self-disclosure.
7. Conscientiousness was positively related to helper preference for reflection of feeling.
8. Conscientiousness was positively related to helper preference for open questions.

An example of a possible relationship between a personality factor, theoretical orientation, and helping skill preference could be found with relationship between Openness to Experience and preference for reflection of feelings and open questions (Hummel & Gelso, 2007). Openness to Experience, a personality factor positively associated with the humanistic theoretical orientation, was found to be positively

related to preference for reflection of feelings and open questions (Scandell, Wlazelek, & Scandell, 1997; Hummel & Gelso, 2007). Both skills are informed in Hill (2004) by the humanistic/client-centered theoretical orientation. If humanist/client-centered therapists tend to be more open to experience, openness to experience might be expected to be related to higher preference for skills informed by humanistic/client-centered theory, as well as lower preference for cognitive-behaviorally-informed skills such as information-giving and direct guidance.

Because Hill's (2004) stages are each based on a theoretical orientation, some helping skill preference could be explained by preference for that stage or theoretical orientation. However, if helping skill preference varies within a stage, personality might directly account for some of the variation of helping skill preference, rather than contributing to helping skill preference solely via theoretical orientation. Because of this possibility, the relationship between personality and helping skill preference may involve more than preference for a particular stage or theoretical orientation.

The relationships found between agreeableness and preference for reflection of feeling and open questions provide an example of possible discrepancies between helping skill preference as related to stage or theoretical orientation and helping skill preference as related to personality. In Hummel and Gelso (2007), agreeableness was found to be positively correlated with preference for reflections of feelings, open questions and negatively with self-disclosure. Though reflections of feelings and open questions are considered exploration skills by Hill (2004), and the stage is informed by the humanistic/person-centered theoretical orientations, agreeableness was

previously found to be associated with the cognitive/behavioral orientation. Because the skills are related to different theoretical orientations, and agreeableness has only been found to be associated with the cognitive/behavioral theoretical orientation, personality might also directly influence preference for these skills, rather than only influencing them through theoretical orientation (Scandell, Wlazelek, & Scandell, 1997).

Conscientiousness, a personality factor not yet found to be associated with any one theoretical orientation, was positively correlated with preference for reflections of feelings and open questions (Hummel & Gelso, 2007). Testing the relationship between conscientiousness and helping skill preference, along with theoretical orientation, should clarify how conscientiousness relates to helping skill preference.

The three research questions concern the individual relationships between personality, theoretical orientation and helping skill preference. The interrelationships between all three variables are also of interest. Therefore, a model that involves all three variables is suggested in Hypothesis 1.

Hypothesis 1

There is a partially mediated relationship between personality, theoretical orientation, and helping skill preference, such that the relation of personality to helping skills preferences is expected to be both (a) direct and (b) mediated by theoretical orientation.

The hypothesis above dictates that personality will account for variance in theoretical orientation and helping skill preference; theoretical orientation will account for variance in helping skill preference; and the relation of personality to

helping skills will be mediated by theoretical orientation. As indicated in Research Question 2, personality may relate directly to helping skill preference. Thus, Hypothesis 1 a partially mediated model. The helping skill preferences that are congruent with the theoretically informed skills of a given stage and the personality factors associated with each theoretical orientation would be explained through a mediated model. Significant relationships between personality factors and helping skill preferences that are not congruent with the personality-theoretical orientation pathway would be accounted for in a partially mediated model.

Theoretical orientation and personality are two possible factors that may relate to helping skill preference. Other factors, such as experience level and a helper's profession, may also relate to helping skill preference (Fiedler, 1950; 1951; Strupp, 1955b). When testing the relationships between personality, theoretical and helping skill preference, a design in which the participants practice as helpers in a consistent setting and have consistent helping experience might foster control for other potential variables that may contribute to helping skill preference. In the present study, all participants were undergraduates in a peer counseling or introduction to helping skills class, so the level of training and experience among the participants should be similar.

Chapter 4: Method

Participants

There was a pool of 232 potential participants. One hundred fifty seven were enrolled in basic helping skills courses in the Spring and Summer I 2008 semesters, and 75 in peer counseling courses in the Spring 2008 semester. Instructors generally awarded extra credit to students for participation in the study. However, one peer counseling course of 25 students was not set up to award extra credit for participation, which seemed to limit the response from that class. One hundred eleven students completed the first set of measures, and of those 111, eighty completed the second set of measures.

Eighty-nine participants were female; twenty-two were male. Participants' ages ranged from 18 to 36; the mean age was 21.8. Ninety participants were seniors; twelve were juniors; five were sophomores, and one was a freshman. Four participants did not report a class year, ethnicity, nor plans after graduation. Fourteen participants identified as African American, 8 as Asian, 70 as Caucasian, 8 as Hispanic, 4 as biracial, and 3 as Middle Eastern or Arab. Twenty-two participants reported plans to pursue graduate training in a helping profession (such as counseling, social work, clinical/counseling psychology). Eighteen reported plans to enter a helping profession after graduating from college. Thirty-two reported plans to pursue graduate school in non-helping related academic/professional areas. Twenty-seven reported plans to work in non-helping related professions after graduation, and 8 were unsure of their plans. Eighty-three participants were psychology majors. Other majors

represented included criminology, economics, communications, dietetics, health, math, and chemistry.

Measures

Helping skill preference

Two different measures of helping skill preference were employed in the present study: a modified version of a helping skill preference measure (Hummel & Gelso, 2007), and an ipsative measure that forced a choice between definitions of each skill. The measures of helping skill preference can be found in Appendix A.

The helping skill preference measure used by the author in a previous study (2006) was based on the Helping Skill Self-Efficacy section of the Counselor Activity Self-Efficacy Scale (CASES; Lent, Hill, & Hoffman, 2003). The Helping Skill Self-Efficacy Scale is a 15-item rating measure based on helping skills from the helping model described in Hill (2004), with rating choices ranging from 0 (No Confidence at all) to 9 (Complete Confidence). Scores from the CASES are related to the Counseling Self-Estimate Inventory, a measure of counselor self-efficacy. The internal consistency for the CASES for Exploration Skills was .81; Insight Skills = .85; and Action Skills = .78. The test-retest reliability for the CASES for Exploration Skills was .71; Insight Skills = .85; and Action Skills = .78 (Lent et al 2003).

In the initial adaptation of the helping skill preference measure, the measure's wording was changed to reflect helping skill preference rather than self-efficacy, and descriptions of the helping skills were re-worded to remove implications of stages in the Three Stage model (Hummel & Gelso, 2007). For the Helping Skill Preference measure, the rating choices ranged from 0 (Very Weak Preference) to 9 (Very Strong

Preference). Each helping skill has a definition listed next to it in the rating measure. In addition to the rating scale, a second part was written in which participants were asked to rank the helping skills in order of preference. A list of the helping skills in alphabetical order and their definitions was provided for participants on a separate page. These data were collected in Hummel and Gelso (2007). Significant relationships between helping skill preference and personality factors were found, providing initial support for the measure's construct validity regarding helping skill preference.

The selection of helping skills that were measured reflects the common categories of helping skills in classification systems, and the helping skills that students in helping skills courses learn and practice. Those skills are intentional silence, open question, restatement, reflection of feeling, challenge, interpretation, self-disclosure, giving information, and direct guidance.

For the present study, the helping skill preference measure was revised to address flaws that became apparent in the first study. One flaw in the prior study was that the full range of ratings in the scale was not used by the participants for each helping skill; the ranges for the helping skill preference ratings from that study are presented in Table 1. In six out of nine items on the measure used in Hummel and Gelso (2007), the lowest rating choice was not used, and sometimes not even the second or third lowest rating choices were used. In an effort to make the intervals between preference ratings of each skill equivalent so that intervals between ratings would have similar meaning across skills, the minimum rating choice (Very Weak Preference) was changed from 0 to 1 in order to encourage similar use of the range of

Table 1. Helping Skill Preference Ratings: Range, Mean, and Standard Deviations
(Hummel & Gelso, 2007)

| Helping Skill | Min | Max | Mean | SD |
|---------------------|-----|-----|------|------|
| Challenges | 0 | 9 | 5.01 | 2.11 |
| Direct guidance | 0 | 9 | 5.74 | 2.08 |
| Information-giving | 1 | 9 | 5.57 | 1.87 |
| Intentional Silence | 0 | 8 | 3.14 | 2.25 |
| Interpretations | 2 | 9 | 5.70 | 1.80 |
| Open Questions | 3 | 9 | 7.35 | 1.39 |
| Reflections | 2 | 9 | 6.32 | 1.83 |
| Restatements | 1 | 9 | 5.73 | 1.94 |
| Self Disclosure | 1 | 9 | 5.15 | 2.09 |

Note: Helping skill preference variables were rated on a 10-point scale ranging from 0 (weak preference) to 9 (strong preference).

the rating scale for each of the skills. In the present study, the full rating scale was used for all but one of the items (see Table 2). Dawes (2008) found that making a minor re-adjustment to a Likert scale will not prevent meaningful comparability between the two scales. The descriptive statistics of the helping skill preference rankings are in Appendix B.

Another change made to the helping skill preference measure was the revision of the definition for self-disclosure to include all types of self-disclosure, as the first version of the measure had been limited to self-disclosure for exploration or insight.

Further changes were made to clarify the instructions and format in order to reduce confusion about how to complete the second part of the measure, in which the participants are asked to rank the helping skills in order of preference. Also, an ipsative measure was added to see how ratings and rankings compared to forced choices between descriptions of each helping skill. The format of the measures was based on Goates-Jones and Hill's (2008) measure of helping stage preference. The measures of helping skill preference can be found in Appendix A. Correlations between helping skill preference ratings, rankings and ipsative scores are presented in Appendix C.

The test-retest reliability for helping skill preference ratings and rankings were generally higher than those for the ipsative measure (see Table 3). Because the mediation test required the use of an interval scale, and the main analyses were each tests of the four steps of a mediation analysis as described by Baron & Kenny (1986), the rating scale was used for all main analyses.

Table 2. Helping Skill Preference Ratings: Range, Mean, and Standard Deviations

| Helping Skill | Min | Max | Mean | SD |
|---------------------|-----|-----|------|------|
| Challenges | 1 | 9 | 5.37 | 1.89 |
| Direct guidance | 1 | 9 | 5.68 | 1.87 |
| Information-giving | 1 | 9 | 5.73 | 1.69 |
| Intentional Silence | 1 | 9 | 4.06 | 2.10 |
| Interpretations | 1 | 9 | 6.16 | 1.83 |
| Open Questions | 1 | 9 | 7.61 | 1.33 |
| Reflections | 2 | 9 | 6.79 | 1.56 |
| Restatements | 1 | 9 | 6.26 | 1.71 |
| Self Disclosure | 1 | 9 | 5.06 | 1.96 |

Note: Helping skill preference variables were rated on a 9-point scale ranging from 1 (very weak preference) to 9 (very strong preference).

Table 3. Test-retest reliability of helping skill preference ratings

| Helping skill | Ratings | Rankings | Ipsative |
|---------------------|---------|----------|----------|
| Challenges | 0.75 | 0.69 | 0.46 |
| Direct guidance | 0.64 | 0.63 | 0.45 |
| Information-giving | 0.65 | 0.48 | 0.40 |
| Intentional Silence | 0.71 | 0.75 | 0.52 |
| Interpretations | 0.71 | 0.58 | 0.33 |
| Open Questions | 0.37 | 0.69 | 0.36 |
| Reflections | 0.39 | 0.57 | 0.32 |
| Restatements | 0.57 | 0.78 | 0.40 |
| Self Disclosure | 0.57 | 0.73 | 0.43 |

Note: Helping skill preference ratings were on a 9-point scale ranging from 1 (very weak preference) to 9 (very strong preference).

Preferences for helping skills within a stage of the Hill (2004) model seem to be related, although not always highly (see Appendix D). Preferences for helping skills between different stages of the model are generally not related, or are negatively related (see Appendix D).

Personality Measure

Based on the results of Hummel and Gelso (2007) and prior studies testing the relationship between theoretical orientation and personality, a measure of the Five Factor Model of personality was used (Arthur, 2001; Poznanski & McLennan 2003; Scandell, Wlazelek, & Scandell 1997). The five factor model is highly correlated with the Minnesota Multiphasic Personality Inventory Psychopathology Five (Trull, Useda, Costa, & McCrae, 1995). The measure for the five factor model was from the International Personality Item Pool (IPIP). The IPIP is designed to encourage personality measurement development internationally, and provide researchers with access to personality scales (Goldberg, 1999). The items used in the IPIP are in the format of short verbal phrases. According to Goldberg et al (2006), compact verbal phrases are more readily translated to other languages than adjective-based items, and are less open to varying interpretation by respondents. The IPIP five factor personality measures have been validated in a variety of forms (Donnellan, Oswald, Baird, & Lucas, 2006; Gucza, & Goldberg, 2007). The 50-item five factor model form used in the present study was found by Buchanan, Johnson, & Goldberg, (2005) to predict relevant self-reported behaviors and demographic variables. Hummel and Gelso (2007) used the IPIP to measure 5 personality factors as well as 6 facets per factor; this measure was 240 items. In the present study, only 5 personality factors

were tested, and additional measures of helping skill preference and theoretical orientation were given, so reducing the personality measure from 240 to 50 items was expected to reduce participant wear without causing a drop in the reliability of the personality measure.

When corrected for unreliability, the correlations between the five domains of the IPIP scales and the corresponding five factors in Costa and McCrae's NEO-PI-R range from .85 to .92, with a mean of .90. There are 50 items in the IPIP five factor measure being used (Goldberg, 1999). The reliability information of the IPIP version of the Five Factor Model is presented in Table 4. The personality measure can be found in Appendix B.

Theoretical orientation measure

Theoretical orientation was measured by a one item question that asked participants to rate their level of belief in and identification with psychoanalytic/psychodynamic, humanistic/client-centered, cognitive/behavioral theoretical orientation, and an "other" category in which a theoretical orientation could be written in. The single-item measure is similar to the single-item theoretical orientation measure used by Hill & O'Grady (1985), with a slight change in wording to make the measure applicable to undergraduate trainees. The measure can be found in Appendix C.

Table 4. Internal reliability of IPIP Five Factor Measure

| 10-Item IPIP Scales | Cronbach's alphas from | |
|---------------------|------------------------|------------------|
| | Goldberg (1999) | in present study |
| Neuroticism | 0.86 | 0.86 |
| Extraversion | 0.86 | 0.87 |
| Openness | 0.82 | 0.80 |
| Agreeableness | 0.77 | 0.79 |
| Conscientiousness | 0.81 | 0.82 |

Multi-item measures such as Worthington & Dillon (2003) and Coleman (2004) were considered. Both measures were developed and validated for professional psychotherapists, so the contents include advanced clinical theory, technique and vocabulary, which would not be applicable for beginning trainees. Because the measures were not intended for beginning trainees, it was uncertain how valid the results would be. The participants were, however, taught theories, research, and techniques from the psychoanalytic/psychodynamic, humanistic/client-centered, cognitive/behavioral perspectives. The task of choosing a theoretical orientation with which they identify was part of a required assignment at the end of their training. Thus, a single-item measure assessing identification and belief in a theoretical orientation seemed most appropriate considering their training experience.

Test-retest reliability for the theoretical orientation measure is presented in Table 5. The test-retest reliability of belief in and adherence to the cognitive-behavioral theoretical orientation was only .58. This reliability could be lower than the others because cognitive-behavioral theory and technique are taught last in the participants' training, so the trainees could be less sure about what cognitive-behavioral theory means and if the approach matches their personal preferences.

Demographics questionnaire

The demographics questionnaire asked participants to report their age, gender, college class, race/ethnicity, major, and plans after graduation. The race and ethnicity item is based on the classification system used by the U.S. Census Bureau. The demographics questionnaire can be found in Appendix D.

Table 5. Test-retest reliability of theoretical orientation measure

| | Test-retest |
|----------------------------|-------------|
| Theoretical orientation | reliability |
| Psychodynamic | 0.72 |
| Humanistic/client-centered | 0.74 |
| Cognitive-behavioral | 0.58 |

Procedure

The teachers of basic helping skills and peer counseling courses at the University of Maryland, College Park were contacted by the investigator in order to get permission to ask their students to participate in the study. After receiving permission, I presented my study to each class and asked the students to be participants. I explained that participation involved completing the measures on their own time and returning the measures the next week in class.

The experiment was presented shortly before the end of the semester, after the students completed all of the laboratory sessions in which they practice the helping skills. Extra credit for the course was offered in all but one class to the students as compensation for participating, at the discretion of the instructors. In cases in which extra credit was not an option, the choice between candy or a health snack was offered as a token of appreciation for participating. Also, while the study was not designed to benefit the participants personally, participation included reviewing helping skills and theoretical orientation, both of which were relevant to their coursework. Students signed informed consent forms that were kept separate from their responses to the measures.

The participants were each given a packet that included the helping skill preference measures, the personality measure, theoretical orientation measure, the demographics questionnaire, and a pen. The two helping skill preference measures and personality measures were assembled in six different orders. The demographics measure was last because responses to the other measures would not influence participants' demographics information. Moreover, responses to the demographics

measure could influence responses to the other measures due to stereotype priming effects (Blair & Banaji, 1996; Kawakami & Dovidio, 2001). For example, a participant primed to consider gender or race might have answered the personality measure differently than a participant without such priming. The theoretical orientation measure was printed on the front side of the demographics questionnaire to keep the length of the packet of measures as short as possible. Answers for all of the measures were written directly on the questionnaires. The measures were collected one week after being handed out.

After the packets were collected, the participants were asked one week later to fill out the helping skill preference and theoretical orientation measures again, in order to gain test-retest reliability data about the measures. In classes where extra credit was given to participants, students received 0.5 points extra credit for doing the initial set of measures, and 0.5 points for completing the helping skill preference and theoretical orientation measures again, a total of one extra credit point.

Chapter 5: Results

Before presenting the results for the three research questions and hypothesis, I will first describe the analyses used and then present descriptive statistics of the main variables. Pearson Product-Moment correlations were used to test research questions 1 - 3. Research question 1 involved testing 15 correlations; the alpha level was set at .05. Research question 2 involved testing 27 correlations; the alpha was set at .01. Research question 3 involved testing 45 correlations; the alpha level was set at .01. Hypothesis 1 involved a mediation analysis using simultaneous multiple regression; the alpha level was set at .05. The alpha level for research question 1 was less strict than that of research questions 2 and 3 because it involved fewer correlations than 2 and 3. The .05 level did not present a strong risk for Type I error for research question 1, and alpha set at .01 would have increased the risk of Type II error. Research questions 2 and 3 involved testing more correlations than in research question 1, increasing the risk for Type I error. Because hypothesis 1 required that four criteria be met in order to even test the hypothesis, the alpha level was set at .05 to minimize risk from Type II error.

For hypothesis 1, four steps for testing mediation as described by Baron and Kenny (1986) were followed. These steps require that a predictor (personality factor), mediator (theoretical orientation), and criterion (helping skill preference) are each related to the other in order to warrant testing mediation. The first step requires that a personality factor correlates with the preference rating for a helping skill. The second step requires that the same personality factor as tested in the first step relates to a

theoretical orientation. The third step requires that the theoretical orientation tested in the second step predicts the helping skill preference rating tested in the first step. The mediator and criterion are likely to be correlated because they both relate to the predictor, so the third step requires that the mediator correlate with the criterion independent of the predictor (Kenny, 2008). The final step requires that the relationship between the predictor (a given personality factor) and the criterion (helping skill preference) must be zero when theoretical orientation is controlled for.

Baron and Kenny (1986) proposed using the Sobel test as a formal test of whether the drop to zero in the fourth step is significant. However, Preacher and Hayes (2004) noted that, in practice, the conceptual criterion of the fourth step- the relationship between the predictor and criterion equals zero when controlled for the mediator- is used in place of a formal significance test. According to Preacher and Hayes, this conceptual method has a greater risk of Type 1 error and lower statistical power in most situations than the Sobel test. Preacher and Hayes argued for using the Sobel test in order to reduce Type 1 error. Another advantage of the Sobel test is that can test for partial mediation. If the relationship between the predictor and outcome controlling for the mediator is not zero but still significantly lower than the same relationship without controlling for the mediator, this is evidence for partial mediation.

To address low statistical power in situations with small samples or non-normal distributions, Preacher and Hayes proposed a procedure involving bootstrapping that produces a confidence interval of indirect effect. The procedure works by taking a large number of samples from the data set, with replacement, and

computing the indirect effect in each sample. Those indirect effects are sorted from to high, and a confidence interval is created from the distribution of indirect effects. If the indirect effect is not zero, the confidence interval range will not include zero. Because a small sample and non-normal distributions were concerns in the present study, the confidence intervals from the bootstrapping estimate for indirect effect will be presented in addition to the results of the Sobel test. The alpha level used to test hypothesis 1 was .05, and the confidence interval was 95%.

Descriptive statistics

The kurtosis of the distributions of the helping skill preference ratings indicated that all variables besides preference for open questions had mesokurtic distributions, meaning they had normal peakedness (see Table 6). The distribution for preference ratings of open questions was leptokurtic, meaning that it had higher than normal peakedness in the middle of the distribution, and longer, thinner tails at the ends of the distribution.

The skewness of the distributions of the helping skill preference ratings indicated a negatively skewed distribution for open questions, restatements, reflection of feelings, interpretations, and information-giving (see Table 6). A negatively skewed distribution has more high scores than in a normal distribution, and the mean is lower than the median, which is lower than the mode. Other variables with significantly negatively skewed distributions were emotional stability, agreeableness, humanistic/person-centered theoretical orientation. Preference for intentional silence was positively skewed. The descriptive statistics of the personality factors, theoretical orientations, and helping skill preferences are presented in Table 6.

Table 6. Descriptive statistics of main variables

| Variable | Mean | SD | Skewness | | Kurtosis | |
|----------------------------|------|------|-----------|------|-----------|------|
| | | | Statistic | SE | Statistic | SE |
| Restatement | 6.26 | 1.70 | -0.62 | 0.23 | 0.05 | 0.46 |
| Open question | 7.62 | 1.33 | -1.93 | 0.23 | 5.94 | 0.46 |
| Reflection | 6.77 | 1.56 | -0.88 | 0.23 | 0.72 | 0.46 |
| Self Disclosure | 5.07 | 1.97 | 0.07 | 0.23 | -0.85 | 0.46 |
| Intentional Silence | 4.06 | 2.10 | 0.58 | 0.23 | -0.49 | 0.46 |
| Challenge | 5.38 | 1.89 | -0.22 | 0.23 | -0.91 | 0.46 |
| Interpretation | 6.16 | 1.83 | -0.64 | 0.23 | -0.23 | 0.46 |
| Information giving | 5.73 | 1.69 | -0.49 | 0.23 | -0.08 | 0.46 |
| Direct guidance | 5.68 | 1.88 | -0.42 | 0.23 | -0.36 | 0.46 |
| Emotional Stability | 3.50 | 0.70 | -0.55 | 0.23 | 0.25 | 0.46 |
| Extraversion | 3.56 | 0.70 | -0.30 | 0.23 | -0.45 | 0.46 |
| Openness to Experience | 3.79 | 0.64 | -0.19 | 0.23 | -0.67 | 0.46 |
| Agreeableness | 3.71 | 0.54 | -0.86 | 0.23 | 0.48 | 0.46 |
| Conscientiousness | 3.62 | 0.61 | -0.13 | 0.23 | -0.14 | 0.46 |
| Psychodynamic | 3.11 | 1.12 | -0.06 | 0.23 | -0.77 | 0.46 |
| Cognitive/behavioral | 4.02 | 0.78 | -0.40 | 0.23 | -0.35 | 0.46 |
| Humanistic/person centered | 3.79 | 1.03 | -0.80 | 0.23 | 0.11 | 0.46 |

Note: Helping skill preference variables were rated on a 9-point scale ranging from 1 (very weak preference) to 9 (very strong preference). Personality variables were rated on a 5-point scale ranging from 1 (very inaccurate) to 5 (very accurate), and theoretical orientation was rated on a 5-point scale ranging from 1 (low) to 5 (high).

Correlations between the theoretical orientations are presented in Table 7. The cognitive/behavioral theoretical orientation was found to be negatively related to the psychodynamic/psychoanalytic theoretical orientation, $r = .31, p < .01$.

Research Questions

Research Question 1

What factors within a five factor model of personality account for significant variance in theoretical orientation preference in undergraduate helping skills students?

As may be seen in Table 8, there were significant correlations between three personality factors and two theoretical orientations. Conscientiousness was negatively correlated with belief and identification with the psychodynamic/psychoanalytic theoretical orientation, $r = -0.24, p < .05$. Emotional Stability ($r = .24, p < .05$) and Agreeableness ($r = .43, p < .01$) were positively correlated with belief and identification with the humanistic/person-centered theoretical orientation. No personality factors were significantly related to preference for the cognitive-behavioral orientation.

Research Question 2

How does preference for humanistic/client-centered, cognitive-behavioral, or psychodynamic/psychoanalytic theoretical orientation predict students' preference among nine helping skills?

Table 7. Correlations between personality factors and theoretical orientations

| | Humanistic/client- | | |
|----------------------|--------------------|----------|----------------------|
| | Psychodynamic | centered | Cognitive/Behavioral |
| Psychodynamic | | | |
| Humanistic/client- | | | |
| centered | -0.149 | | |
| Cognitive/Behavioral | -.31** | 0.05 | |

Note: ** $p < .01$.

Table 8. Correlations between personality factors and theoretical orientations

| Personality factor | Theoretical orientation | | |
|------------------------|----------------------------------|-------------------------------|----------------------|
| | Psychodynamic/ psychoanalytic | Humanistic/client centered | Cognitive/Behavioral |
| Emotional Stability | -0.16 | .24* | -0.01 |
| Extraversion | -0.03 | 0.13 | 0.07 |
| Openness to Experience | 0.06 | 0.19 | -0.10 |
| Agreeableness | -0.17 | .43** | 0.04 |
| Conscientiousness | -.24* | .21* | 0.01 |

Note: Personality variables were rated on a 5-point scale ranging from 1 (very inaccurate) to 5 (very accurate), and theoretical orientation was rated on a 5-point scale ranging from 1 (low) to 5 (high). ** $p < .01$. * $p < .05$.

Two theoretical orientations were found to be significantly correlated with preference for 4 different helping skills. Belief and identification with the humanistic/person-centered theoretical orientation was positively correlated with preference for restatements ($r = 0.25, p < .01$) and reflection of feelings ($r = 0.23, p < .01$), whereas this orientation was negatively correlated with preference for direct guidance, $r = -0.37, p < .01$.

Belief and identification with the cognitive/behavioral theoretical orientation was positively correlated with preference for information-giving ($r = 0.41, p < .01$) and direct guidance ($r = 0.34, p < .01$). The psychodynamic/psychoanalytic theoretical orientation was not related to preference for any of the helping skills tested. Correlations between theoretical orientation and helping skill preference are presented in Table 9.

Research Question 3

What factors, if any, within a five factor model of personality account for significant variance in students' preference of nine types of helping skills?

Two personality factors were related to preference for four different helping skills. There were two replications of findings from Hummel and Gelso (2007). These will be explored in further detail in the Discussion.

Openness to Experience was positively correlated with preference for challenges ($r = .34, p < .01$) and preference for interpretations, $r = .34, p < .01$.

Agreeableness was positively correlated with preference for reflection of feelings ($r =$

Table 9. Correlations between theoretical orientations and helping skill preferences

| Helping skill | Theoretical orientation | | |
|------------------------|----------------------------------|--------------------------------|----------------------|
| | Psychodynamic/ psychoanalytic | Humanistic/person- centered | Cognitive/behavioral |
| Restatement | -0.05 | .25** | 0.02 |
| Open question | -.21* | 0.08 | 0.02 |
| Reflection | -0.14 | .23* | 0.13 |
| Self Disclosure | -0.16 | 0.03 | 0.15 |
| Intentional Silence | 0.17 | 0.06 | -0.06 |
| Challenge | 0.03 | -0.07 | -0.01 |
| Interpretation | 0.12 | 0.01 | 0.15 |
| Information giving | -0.09 | -0.10 | .41** |
| Direct guidance | 0.01 | -.37** | .34** |

Note: Theoretical orientation was rated on a 5-point scale ranging from 1 (low) to 5 (high), and helping skill preference variables were rated on a 9-point scale ranging from 1 (very weak preference) to 9 (very strong preference). ** $p < .01$. * $p < .05$.

.28, $p < .01$) and with preference for open questions, $r = .32$, $p < .01$. Both of those relationships are replications of findings from Hummel and Gelso (2007).

Correlations between personality factors and helping skill preferences are presented in Table 10.

Hypothesis 1

There is a partially mediated relationship between personality, theoretical orientation, and helping skill preference, such that the relation of personality to helping skills preferences is expected to be both (a) direct and (b) mediated by theoretical orientation.

As described at the beginning of the present chapter, certain relationship patterns must accrue in order to test for mediation. There were two different sets of relationships between personality factors, theoretical orientations, and helping skill preferences that met the criteria for a mediation test, out of 135 possible sets. These sets of relationships were:

1. Emotional stability, humanistic/person-centered theoretical orientation, and reflection of feelings
2. Emotional stability, humanistic/person-centered theoretical orientation, and direct guidance

The relationship between emotional stability and preference for direct guidance was zero when controlled for ratings of belief in and identification with humanistic/person centered theoretical orientation $t = -1.20$, $p > .05$. The Sobel test indicates that this relationship was significantly lower than the relationship between

Table 10. Correlations between personality factors and helping skill preferences

| Helping skill | Theoretical orientation | | | | |
|---------------------|-------------------------|---------------|------------------------|---------------|-------------------|
| | Emotional Stability | Extra-version | Openness to Experience | Agreeableness | Conscientiousness |
| Restatement | -0.03 | -0.04 | 0.13 | 0.24* | 0.09 |
| Open question | 0.17 | 0.14 | 0.03 | 0.32** | 0.21* |
| Reflection | 0.23* | 0.20* | 0.08 | 0.28** | 0.09 |
| Self Disclosure | 0.07 | 0.03 | -0.12 | 0.09 | 0.03 |
| Intentional Silence | 0.10 | -0.02 | 0.07 | 0.12 | 0.00 |
| Challenge | 0.07 | 0.18 | 0.34** | -0.04 | 0.09 |
| Interpretation | 0.07 | 0.14 | 0.21* | -0.01 | -0.09 |
| Information giving | -0.03 | -0.03 | -0.08 | 0.11 | 0.17 |
| Direct guidance | -0.20* | 0.00 | -0.02 | -0.07 | -0.02 |

Note: Helping skill preference variables were rated on a 9-point scale ranging from 1

(very weak preference) to 9 (very strong preference). ** $p < .01$. * $p < .05$.

emotional stability and preference for direct guidance when not controlled for humanistic/person-centered theoretical orientation, $t = -3.72, p < .001$.

The confidence intervals from the bootstrapping procedure to test for indirect effect indicated that the indirect effect of ratings of belief in and identification with the humanistic/person-centered theoretical orientation was not zero in the relationship between emotional stability and preference for direct guidance. The lower level 95% confidence interval was $-.046$ and the upper level 95% confidence interval was $-.033$.

Based on these results, mediation was significant in the relationship between emotional stability, humanistic/person-centered theoretical orientation, and preference for direct guidance. The relationship between emotional stability and preference for direct guidance when controlled for humanistic/person-centered theoretical orientation was zero, so the relationship was fully, not partially, mediated. The regression coefficients and results from the Sobel test are presented in Table 11, and the relationship is illustrated in Figure 1.

The relationship between emotional stability, humanistic/person-centered theoretical orientation, and reflection of feelings was significant in steps 1 and 2 of the mediation test. In the third step, the p -value was $.052$ for the relationship between the humanistic/client-centered theoretical orientation and reflection of feelings, controlled for emotional stability. The relationship between emotional stability and reflection of feelings, controlled for the humanistic/client-centered theoretical orientation was significant, $t = -1.20, p < .05$. The 95% confidence interval from the bootstrapped test for indirect effect was $-.02$ and $.29$. In this case, if the indirect effect

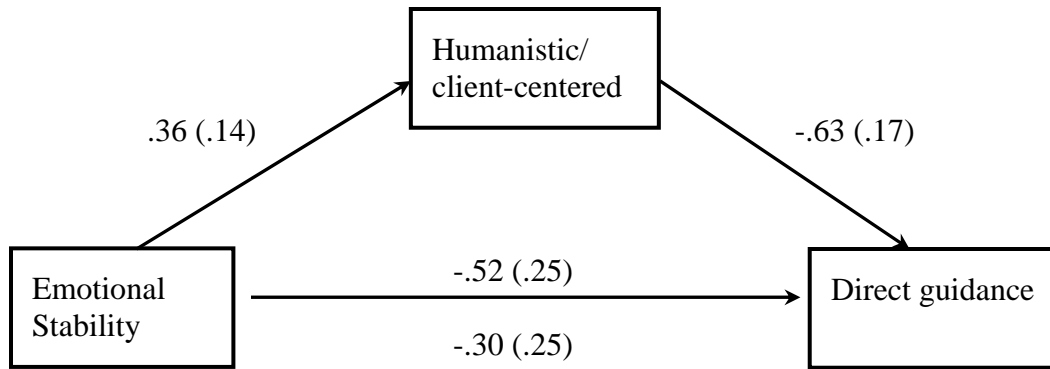
Table 11. Direct and total effects between emotional stability, humanistic/person-centered theoretical orientation, and direct guidance

| | Regression coefficient | SE | <i>t</i> | <i>p</i> |
|---------|------------------------|------|----------|----------|
| b(YX) | -0.52 | 0.25 | -2.05 | 0.04 |
| b(MX) | 0.36 | 0.14 | 2.62 | 0.01 |
| b(YM.X) | -0.63 | 0.17 | -3.72 | 0.00 |
| b(YX.M) | -0.30 | 0.25 | -1.20 | 0.23 |

Note: X=Emotional Stability, M= humanistic/person-centered theoretical orientation,

Y = direct guidance

Figure 1. Mediation between emotional stability, humanistic/person-centered theoretical orientation, and direct guidance



Note: Regression coefficients are given with standard errors in parentheses. -.52 (.25) is the coefficient from emotional stability to direct guidance; -.30 (.25) is the coefficient from emotional stability to direct guidance when controlling for humanistic/client-centered theoretical orientation.

of the humanistic/client-centered theoretical orientation had been significant, there would have been evidence for partial mediation. The regression coefficients and Sobel test results from this analysis are presented in Table 12. Because mediation, but not partial mediation, was evidenced, Hypothesis 1 was only partially supported.

Table 12. Direct and total effects between emotional stability, humanistic/person-centered theoretical orientation, and reflection of feelings

| | Regression coefficient | SE | <i>t</i> | <i>p</i> |
|---------|------------------------|------|----------|----------|
| b(YX) | 0.52 | 0.21 | 2.51 | 0.014 |
| b(MX) | 0.36 | 0.14 | 2.62 | 0.010 |
| b(YM.X) | 0.28 | 0.14 | 1.96 | 0.052 |
| b(YX.M) | 0.42 | 0.21 | 1.99 | 0.049 |

Note: X=Emotional Stability, M= humanistic/person-centered theoretical orientation,

Y = Reflection of feelings

Chapter 6: Discussion

Summary of findings

The overall findings will first be summarized, followed by a discussion of the results as they relate to each research question. There were three significant relationships found between personality factors and theoretical orientations, out of fifteen possible relationships. The humanistic/client-centered theoretical orientation was most readily predicted by personality, displaying significant positive relationships with emotional stability, agreeableness, and conscientiousness. There were four significant relationships found between theoretical orientations and helping skill preference, out of 27 possible such relationships. Three significant relationships were found between personality and helping skill preference, out of 36 possible relationships. Two of the relationships found were replications from Hummel and Gelso (2007).

Personality and theoretical orientation

Personality was modestly related to belief in and identification with theoretical orientation for undergraduate basic helping skills students. Conscientiousness was negatively correlated with the psychodynamic/psychoanalytic theoretical orientation. Emotional stability and agreeableness were positively correlated with the humanistic/person-centered theoretical. The chance that three out of 15 correlation tests would be significant at the .05 level is between .01 and .05. Thus, it is not probable that obtaining three significant results out of 15 was due to chance alone, but there is still the possibility that one or more of the three significant

statistics might have occurred by chance (Sakoda, Cohen, & Beall, 1954). Because the relationships found were unlikely to be due to chance alone, the possible implications of the findings will be discussed.

The highest test-retest reliability of a theoretical orientation was only .74, which was for the humanistic/client-centered theoretical orientation. For the cognitive/behavioral theoretical orientation, test-retest reliability was not particularly strong at .58. These reliabilities suggest that theoretical orientation was not particularly stable for the trainees. It is possible that if theoretical orientation choice is not solidified before formal graduate training in counseling, then the relationship between personality and theoretical orientation may not yet be realized. The pattern of findings about personality-theoretical orientation relationships for more experienced trainees and therapists will be discussed subsequently.

However, there were some small signs of perhaps an early relationship between personality and theoretical orientation. For example, the relationship between agreeableness and humanistic/client-centered had a medium effect size. Also, undergraduate trainees' emotional stability and conscientiousness was found to predict the humanistic/client-centered theoretical orientation. In fact, humanistic/client-centered was the only orientation predicted by three personality factors: conscientiousness was negatively related to the psychodynamic/psychoanalytic orientation, and the cognitive/behavioral orientation was not predicted by any personality factors.

It is possible that a reflective stance and ideas such as Rogers' (1957) necessary and sufficient conditions especially resonated with students who were more

agreeable, emotionally stable, and conscientious. (The humanistic/client-centered approach as taught did not emphasize existential, Gestalt or other experiential approaches.) However, this humanistic/client-centered approach was taught first, so the students had more practice and familiarity with the techniques and theories of this approach, and some humanistic/client-centered theories and techniques, such as empathy, attending and listening, and reflective responses, were taught as foundations for helping in general, regardless of theoretical orientation. So, it is also possible, at least to some extent, that aspects of the humanistic/client-centered approach have been adopted by other theoretical orientations (Hamer, 1995), and the humanistic/client-centered theoretical orientation might be predicted simply by personality factors that predict interest in helping.

The findings in this study about the relationships between personality and theoretical orientation among beginning trainees were dissimilar to findings concerning these same relationships among professional therapists. Undergraduates' conscientiousness was modestly negatively related to the psychodynamic/psychoanalytic theoretical orientation, but previous studies about personality and theoretical orientation did not report any relationships between conscientiousness and psychotherapists' theoretical orientation (Scandell, Wlazelek, & Scandell, 1997; Arthur, 2001; Poznanski & McLennan, 2003). In fact, Arthur (2001) reported that therapists of the psychodynamic/psychoanalytic orientation were inclined to avoid unnecessary risks. It seems that avoiding unnecessary risks would be characteristic of conscientiousness, and therefore perhaps of the psychodynamic/psychoanalytic orientation. However, undergraduates who identified

as psychodynamic/psychoanalytic were less likely to be conscientious.

Also, no relationships had previously been found between professional therapists' humanistic/client-centered orientation and emotional stability (Poznanski & McLennan, 2003; Arthur, 2001; Scandell, Wlazelek, & Scandell, 1997).

Agreeableness had been found by Scandell, Wlazelek, and Scandell to be positively related to the cognitive/behavioral orientation, but this orientation was not found to be predicted by any personality factor among the undergraduate trainees in the present study. Personal characteristics such as personality- which have been found to be a primary influence on theoretical orientation choice over the long-term for professional therapists (Poznanski & McLennan, 2003; Arthur, 2001)- may not be as strongly related to theoretical orientation before graduate training.

The modest relationship between personality and theoretical orientation could also be related to the helping model that trainees were taught and how they conceptualize theoretical orientation within that model. While theoretical orientations are taught in the Hill (2004) model, an integrated approach is emphasized over any one theoretical orientation. The model itself is an integration of humanistic/client-centered, psychodynamic/psychoanalytic, and cognitive/behavioral theoretical orientations (2004). The students might consider each orientation as one part of the integrated model, without considering a theoretical orientation as an entire and complete approach to therapy. Trainees in this model may even conceptualize theoretical orientation choice as a helping stage preference, with the expectation that they would still use all three stages/theoretical orientations as helpers. This could make it unlikely that students would be inclined to distinguish between each

orientation presented within the model. If the students' theoretical orientations were not very differentiated, then there would not be particularly strong relationships between theoretical orientation and personality.

Theoretical orientation and helping skill preference

The four relationships found between trainees' personalities and theoretical orientations were not similar to previous findings on professional therapists' personalities and theoretical orientations. However, the relationships between trainees' theoretical orientations and helping skill preferences were somewhat similar to relationships between theoretical orientations and commonly favored verbal response modes among professional psychotherapists. The chance that four out of 27 correlation tests would be significant at the .01 level is less than .001. Thus, it is not probable that obtaining four significant results out of 27 was due to chance alone (Sakoda, Cohen, & Beall, 1954).

In the present study, the humanistic/client-centered theoretical orientation was positively related to preference for restatement. Early on, Strupp (1955a) found that Rogerian therapists were more likely to use reflective techniques than were psychoanalytic therapists. Since then, other studies have also found that humanistic/client-centered therapists use a greater proportion of reflective responses compared to other theoretical orientations (Hill, Thames, & Rardin, 1979; Stiles, Shapiro, & Firth-Collins, 1988; Stiles & Shapiro, 1989). Thus, the long-known connection between reflective responses and a humanistic/client-centered approach could form early on in helper training and development.

The humanistic/client-centered theoretical orientation was also negatively

related to preference for direct guidance, and the cognitive/behavioral theoretical orientation was moderately positively related to preference for direct guidance and information giving. These helping skill preferences make sense given that previous research that has found humanistic/client-centered therapists use fewer information-giving and direct guidance-type responses, and cognitive/behavioral therapists use more information-giving and direct guidance responses compared to other types of therapists (Hill, Thames, & Rardin, 1979; Stiles and Shapiro, 1989). The negative relationship found between preference for direct guidance and the humanistic/client-centered theoretical orientation makes sense given the non-directive approach common to the humanistic/client-centered theoretical orientation. In contrast, a directive approach is characteristic of the cognitive/behavioral theoretical orientation, so helpers who identify with the cognitive/behavioral theoretical orientation would prefer directive skills such as information-giving and direct guidance.

It is interesting that the humanistic/client-centered and cognitive/behavioral approaches were associated with helping skill preferences, while the psychodynamic orientation was not. Perhaps beginning trainees conceptualize the humanistic/client-centered and cognitive/behavioral theoretical orientations based on how techniques relate to the tenets of the therapy; students may even define the two orientations by differences in technique. The psychodynamic/psychoanalytic approach might be conceptualized with more of an emphasis on dynamic theories and case conceptualization, and is perhaps less defined by technique than the other two theoretical orientations.

Personality and helping skill preference

The three significant relationships found between personality and helping skill preference will now be explored. Agreeableness was found to predict preference for open questions and for reflection of feelings; these relationships between agreeableness and open questions and reflections of feelings were replications from Hummel and Gelso (2007). Also, openness to experience was found to predict preference for challenges. The chance that three out of 36 correlation tests would be significant at the .01 level is between .001 and .01. Because it is not probable that obtaining three significant results out of 36 was due to chance alone, the possible implications of these relationships will be discussed (Sakoda, Cohen, & Beall, 1954).

The personality factor agreeableness has been found to include characteristics of trust, straightforwardness, altruism, cooperation, modesty and sympathy (Goldberg, 2006; Costa & McCrae, 1997). Hummel and Gelso (2007) found that cooperation and altruism predicted a helper's preference for reflection of feelings and open questions. Cooperation might be related to the collaborative approach involved with using nondirective responses such as reflections, and with using open-ended questions that request clarification or more detailed exploration. Altruism, which had a slightly stronger relationship to reflection of feeling than to open questions in Hummel and Gelso (2007), might reflect that a helper's preference for techniques that focus on the client's experience, rather than on the helper's own opinion or advice. Focusing on a client's feelings might be especially appealing to a trainee who is sympathetic, an aspect of agreeableness. Indeed, Hummel and Gelso (2007) found that sympathy was positively related to preference for reflection of feelings.

Preference to directly indicate a need for clarification or to prompt the client to talk more could relate to straightforwardness, another facet of agreeableness.

Straightforwardness (coded as morality by Goldberg, 1999), has been found to predict preference for open questions (Hummel & Gelso, 2007). Agreeable helpers might prefer to focus on the client's experience, and especially emotion, and openly request more information; thus, agreeableness is related to helpers' preference skills that reflect those tendencies: reflection of feelings and open questions.

Openness to experience was found to be associated with preference for challenges. The relationship between undergraduate trainees' openness to experience and preference for challenges could be due to the creativity and insight required for challenges, which involve highlighting discrepancies between thoughts, feelings, and/or behaviors. The openness to experience factor includes facets such as imagination, artistic interests, and intellect (Goldberg, 1999). These characteristics might lend themselves well to finding patterns within the client's experience, and conceptualizing how seemingly disparate client thoughts, feelings or behaviors might actually relate. An imaginative, creative helper might especially enjoy the intellectual aspects of challenges.

Personality, theoretical orientation and helping skill preference

In addition to bivariate correlation tests in research questions 1 through 3, a partially mediated model between personality, theoretical orientation, and helping skill preference was also tested. The hypothesis predicted that personality would predict helping skill preference directly and via theoretical orientation. Out of two relationships that met the criteria (see Baron & Kenny, 1986) for a mediation test, one

example of mediation was found to be significant,. Emotional stability was negatively related to preference for direct guidance through the humanistic/client-centered theoretical orientation. The preference for direct guidance might not be due to as much emotionally stable characteristics as it is due to identification with the humanistic/client centered theoretical orientation, which is predicted by emotional stability. As noted in the Results chapter, the alpha level set for the correlation test between helping skill preference and personality was more strict than the alpha level set for the mediation test, so the relationship between direct guidance and emotional stability was not considered significant as a result for research question 3, but met the significance requirements to be included in the mediation test.

Because there was only one instance of mediation out of two possible mediated relationships, theoretical orientation was not supported as a consistent mediator between helping skill preference and personality for undergraduate helping skills trainees. This could be because, simply stated, theoretical orientation is not a mediator between personality and helping skill preference for helpers or therapists. Another possibility is that undergraduates' conceptualization of theoretical orientation and helping skill preference is still unfolding and not yet clearly formed. Thus, as implied earlier, relationships between personality, theoretical orientation and helping skill preference might not be particularly strong if the constructs themselves are not yet solidified.

In addition to personality and theoretical orientation, another possible influence on the undergraduates' helping skill preference could have been experience level. Strupp (1955b) found that experienced therapists favored some verbal

techniques that inexperienced therapists did not. Fiedler (1950, 1951) also found that experienced therapists of different orientations had more similar therapeutic relationships than experts and non-experts of a similar theoretical orientation. The experience level of the trainees may have resulted in the trainees preferring skills in consistently different ways than professional therapists, which could explain some of the differences between previous findings about predictors- such as theoretical orientation- of professional therapists' verbal techniques and predictors of trainees' helping skill preferences.

Limitations

Limitations of the present study include concerns about measurement of constructs, the statistical analyses used, the sample used, the nature of how theoretical orientation was taught to the participants, and comparisons to Hummel and Gelso (2007). The measurement issues will be addressed first, followed by the statistical issues, the concerns about the sample and the theoretical orientation instruction, and finally how the present study compares to Hummel and Gelso (2007).

The measure of helping skill preference did not include all of the helping skills in Hill (2004), because not all skills were taught in all peer counseling and helping skills classes; thus, the measure only included skills with which all trainees were familiar. Also, because of time constraints in the training courses, and in order to maximize research participation, the measures were completed outside of class, without a controlled environment. All of the measures used were entirely self-report paper-and-pencil measures. It would be helpful to find a way to measure helping skill preference as it relates to helping behavior and use that to inform measurement of the

construct. Perhaps helpers could be asked to rate their favorite interventions in an observed session or series of sessions.

The theoretical orientation measure used only a single item per theoretical orientation, which presents measurement and statistical issues. The format was chosen because existing multiple item measures were not appropriate for beginning trainees, and Hill and O'Grady successfully used a similar single item measure to assess theoretical orientation. Nonetheless, only test-retest reliability was established, because the single item format prevented the assessment of internal consistency. The lack of an internal consistency estimate presented a problem in testing theoretical orientation as a mediator. Frazier, Tix, and Barron (2004) proposed that in order for mediation to be appropriately tested, the mediator must have high internal consistency ($\alpha > .90$). By not having internal consistency for theoretical orientation, the mediation test did not meet the standards proposed by Frazier, Tix, and Barron (2004).

Another statistical concern was that the alpha level for research questions 2 and 3 was set at .01 in order to reduce risk for Type II error. However, one finding in research question 3- the relationship between conscientiousness and open questions- was a replication from Hummel and Gelso (2007), but was not considered significant because the p-value was .019. It is possible that in the effort to reduce Type I error, excluding this finding was a Type II error. To address the low power in research questions 2 and 3, more data using the same measures and procedures are currently being gathered. The increase in power from having more subjects will also be helpful in the mediation analyses.

The sample of undergraduate peer counseling and helping skills trainees had

advantages and disadvantages. First, the peer counseling and helping skills courses are taught in different departments and have some different course requirements. The helping skills courses generally have a more prominent research component than do the peer counseling courses. Helping skills trainees also have more opportunity to practice helping skills in laboratory groups because the course is scheduled for one hour per week more than the peer counseling course. Using an undergraduate helping trainee sample is a unique way of exploring trainee variables before graduate training. However, the results might not be generalizable to graduate helping trainees because the undergraduate trainees do not all continue on to professional training.

Because the helping skills course fulfills a departmental course requirement, the sample of helping trainees inherently includes trainees with little or no interest in helping beyond taking the course. However, the students who sign up for the course do have other options for filling their course requirements. The helping skills course is generally more difficult to enroll in than other course options because student interest is higher than the number of seats in the class. Because the course is much harder to enroll in than other options, it is likely that most helping skills students have some personal, if not professional, interest in helping.

The trainees' knowledge of theoretical orientation and helping skills are generally limited to what they have learned in one course. Also, theoretical orientations are presented as part of an integrated model (Hill, 2004). In this context, the students may not conceptualize theoretical orientations as separate treatment approaches, but rather as parts of an overall approach to helping.

Some replicated findings from Hummel and Gelso (2007) have been

discussed, but there were differences in the measures used in that study compared to the present study. The personality measure in Hummel and Gelso (2007) had 240 items and used a set of items from the International Personality Item Pool that were meant to measure six facets within each of the five personality factors, as well as each factor itself. The personality measure in the present study had 50 items because only five personality factors were variables of interest. This change resulted in a substantial reduction in the likelihood of Type I error from testing thirty-five personality facets and factors (six facets for each of the five factors), and from testing all of the personality facets and factors against theoretical orientation, a variable that was not tested in Hummel and Gelso (2007). Regardless of the rationale and benefits of these deviations from Hummel and Gelso (2007), the present study is not an exact replication of Hummel and Gelso (2007); it would be better viewed as a modified and extended replication.

Future directions

There are several future directions in the area of helping skill preference research. First, the current data collection is not only useful for the mediation analysis, but could also generate a large enough sample to allow for a factor analysis of helping skill preference ratings. Second, in addition to addressing the current limitations in helping skill preference measurement, self-reported helping skill preference could be compared to helping self-efficacy, helping behavior and trainee outcomes. Perhaps trainee efficacy as a helper or plans to pursue a helping profession are related to helping skill preference. Studying the relationship between helping skill preference and helper behavior would give more insight into what helping skill

preference means as a construct, and what the behavioral implications are for helping skill preference. Third, the interrelationships between personality, theoretical orientation, and helping skill preference in graduate trainees and experienced clinicians could be tested. Future research might compare clinicians' interrelationships between personality, theoretical orientation and helping skill preference to trainees', and investigate how these interrelationships change over the course of training and professional practice. Finally, future research might test how individual variation from normal relationships between personality, theoretical orientation and helping skill preference relate to a helper's satisfaction and efficacy. Vasco, Gracia-Marques, and Dryden (1993) found that a mismatch between therapists' personal values and theoretical orientation was related to likelihood of a practitioner abandoning his or her career, so it is possible that mismatch between personality, theoretical orientation, and helping skill preference could lead to similar dissatisfaction in helping.

Implications from the present study

That relationships were found between personality, theoretical orientation and helping skill preference suggest that beginning trainees vary on theoretical orientation choice and helping skill preference: the standard deviations for theoretical orientations ranged from .78 to 1.12 (on a 5 point scale), and from 1.33 to 2.10 for helping skill preference (on a 9 point scale). Although the students are in the same training program and are similar in age, the students did not leave their beginning training with the same inclinations towards a theoretical orientation or helping skill preference. This variability in theoretical orientation and helping skill preference

could be predicted modestly by personality. The variability in students' helping skill preference was also predicted by their theoretical orientation.

The connection between personality and helping skill preference tended to be modest, but significant and even replicated relationships between personality factors and helping skill preference were found in undergraduate helping skills trainees.

Connections between agreeableness and preference for restatements and open questions were replicated from Hummel and Gelso (2007). It is possible that agreeable characteristics such as tender-mindedness or sympathy might inform why agreeableness is related to preference for reflections of feelings, and characteristics such as straightforwardness or modesty inform preference for open questions.

Based on the present study and earlier studies on personality, theoretical orientation, and clinicians' verbal techniques, undergraduate helping skills trainees have early signs of connections between their personalities, theoretical orientations, and helping skill preferences, but these connections may not always be strong or consistent as clinicians' connections between personality, theoretical orientation and helping skill preference.

Appendices

Appendix A

Helping Skill Preference Measures

HSPI

General Instructions: The following questionnaire consists of two parts. Each part asks about your helping skill preference as a helper. Consider your preference for each skill in general, regardless of the client or of frequency of use in a session. I am looking for your honest, candid responses; there are no right or wrong answers to the following questions.

Part I. Please rate your level of preference as a helper for each skill. Using a dark pen or pencil, please circle the number that best reflects your response to each question.

| | Weak preference | 1 | 2 | 3 | 4 | Neutral | 5 | 6 | 7 | 8 | Strong preference | 9 |
|--|-----------------|---|---|---|---|---------|---|---|---|---|-------------------|---|
| 1. Restatements (repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear). | | | | | | | | | | | | |
| 2. Open questions (ask questions that help clients to examine or clarify their thoughts or feelings). | | | | | | | | | | | | |
| 3. Reflection of feelings (repeat or rephrase the client's statements with an emphasis on his or her feelings). | | | | | | | | | | | | |
| 4. Self-disclosures (reveal personal information about your history, credentials, or feelings, or disclose present or past experiences). | | | | | | | | | | | | |
| 5. Intentional silence (use silence to allow clients to get in touch with their thoughts or feelings). | | | | | | | | | | | | |
| 6. Challenges (point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change). | | | | | | | | | | | | |
| 7. Interpretations (make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings). | | | | | | | | | | | | |
| 8. Information-giving (teach or provide the client with data, opinions, facts, resources, or answers to questions). | | | | | | | | | | | | |
| 9. Direct guidance (give the client suggestions, directives, or advice that may imply actions for the client to take). | | | | | | | | | | | | |

General Instructions: Consider your preference for each skill in general, regardless of the client or of frequency of use. I am looking for your honest, candid responses; there are no right or wrong answers to the following questions.

Part II. Please write the helping skills in order of your preference as a helper in the column on the right.

Challenges: point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change.

Direct guidance: give the client suggestions, directives, or advice that may imply actions for the client to take.

Information-giving: teach or provide the client with data, opinions, facts, resources, or answers to questions.

Intentional silence: use silence to allow clients to get in touch with their thoughts or feelings.

Interpretations: make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings.

Open questions: ask questions that help clients to examine or clarify their thoughts or feelings.

Reflection of feelings: repeat or rephrase the client's statements with an emphasis on his or her feelings.

Restatements: repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear.

Self-Disclosure: reveal personal information about your history, credentials, or feelings, or disclose present or past experiences in which you gained some personal insight.

As a helper, the order of your preference of helping skills is:

| | |
|------------------------|----------|
| Most preferred | 1. _____ |
| | 2. _____ |
| | 3. _____ |
| | 4. _____ |
| | 5. _____ |
| | 6. _____ |
| | 7. _____ |
| | 8. _____ |
| Least preferred | 9. _____ |

Please circle your answer for each item.

When I am helping a client with a personal problem or concern, I would prefer to...

| Item | A | B |
|------|--|--|
| 1 | Reveal personal information about your history, credentials, or feelings, or disclose present or past experiences in which you gained some personal insight. | Use silence to allow clients to get in touch with their thoughts or feelings. |
| 2 | Ask questions that help clients to examine or clarify their thoughts or feelings | Repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear. |
| 3 | Repeat or rephrase the client's statements with an emphasis on his or her feelings. | Give the client suggestions, directives, or advice that may imply actions for the client to take. |
| 4 | Give the client suggestions, directives, or advice that may imply actions for the client to take. | Make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings. |
| 5 | Make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings. | Ask questions that help clients to examine or clarify their thoughts or feelings |
| 6 | Point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change. | Use silence to allow clients to get in touch with their thoughts or feelings. |
| 7 | Give the client suggestions, directives, or advice that may imply actions for the client to take. | Use silence to allow clients to get in touch with their thoughts or feelings. |
| 8 | Make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings. | Repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear. |
| 9 | Teach or provide the client with data, opinions, facts, resources, or answers to questions. | Make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings. |

Please circle your answer for each item.

When I am helping a client with a personal problem or concern, I would prefer to...

| Item | A | B |
|------|--|--|
| 10 | Point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change. | Give the client suggestions, directives, or advice that may imply actions for the client to take. |
| 11 | Repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear. | Teach or provide the client with data, opinions, facts, resources, or answers to questions. |
| 12 | Repeat or rephrase the client's statements with an emphasis on his or her feelings. | Repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear. |
| 13 | Make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings. | Repeat or rephrase the client's statements with an emphasis on his or her feelings. |
| 14 | Make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings. | Reveal personal information about your history, credentials, or feelings, or disclose present or past experiences in which you gained some personal insight. |
| 15 | Ask questions that help clients to examine or clarify their thoughts or feelings | Repeat or rephrase the client's statements with an emphasis on his or her feelings. |
| 16 | Give the client suggestions, directives, or advice that may imply actions for the client to take. | Ask questions that help clients to examine or clarify their thoughts or feelings |
| 17 | Reveal personal information about your history, credentials, or feelings, or disclose present or past experiences in which you gained some personal insight. | Give the client suggestions, directives, or advice that may imply actions for the client to take. |
| 18 | Point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change. | Teach or provide the client with data, opinions, facts, resources, or answers to questions. |

Please circle your answer for each item.

When I am helping a client with a personal problem or concern, I would prefer to...

| Item | A | B |
|------|---|--|
| 19 | Use silence to allow clients to get in touch with their thoughts or feelings. | Repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear. |
| 20 | Use silence to allow clients to get in touch with their thoughts or feelings. | Ask questions that help clients to examine or clarify their thoughts or feelings |
| 21 | Point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change. | Make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings. |
| 22 | Give the client suggestions, directives, or advice that may imply actions for the client to take. | Teach or provide the client with data, opinions, facts, resources, or answers to questions. |
| 23 | Repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear. | Reveal personal information about your history, credentials, or feelings, or disclose present or past experiences in which you gained some personal insight. |
| 24 | Use silence to allow clients to get in touch with their thoughts or feelings. | Repeat or rephrase the client's statements with an emphasis on his or her feelings. |
| 25 | Repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear. | Give the client suggestions, directives, or advice that may imply actions for the client to take. |
| 26 | Ask questions that help clients to examine or clarify their thoughts or feelings | Reveal personal information about your history, credentials, or feelings, or disclose present or past experiences in which you gained some personal insight. |
| 27 | Teach or provide the client with data, opinions, facts, resources, or answers to questions. | Repeat or rephrase the client's statements with an emphasis on his or her feelings. |

Please circle your answer for each item.

When I am helping a client with a personal problem or concern, I would prefer to...

| Item | A | B |
|------|--|--|
| 28 | Reveal personal information about your history, credentials, or feelings, or disclose present or past experiences in which you gained some personal insight. | Point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change. |
| 29 | Use silence to allow clients to get in touch with their thoughts or feelings. | Make statements that go beyond what the client has overtly stated and that give the client a new way of seeing his or her behavior, thoughts, or feelings. |
| 30 | Reveal personal information about your history, credentials, or feelings, or disclose present or past experiences in which you gained some personal insight. | Teach or provide the client with data, opinions, facts, resources, or answers to questions. |
| 31 | Teach or provide the client with data, opinions, facts, resources, or answers to questions. | Ask questions that help clients to examine or clarify their thoughts or feelings |
| 32 | Ask questions that help clients to examine or clarify their thoughts or feelings | Point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change. |
| 33 | Repeat or rephrase the client's statements with an emphasis on his or her feelings. | Point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change. |
| 34 | Repeat or rephrase what the client has said, in a way that is succinct, concrete, and clear. | Point out discrepancies, contradictions, defenses, or irrational beliefs of which the client is unaware or that he or she is unwilling or unable to change. |
| 35 | Repeat or rephrase the client's statements with an emphasis on his or her feelings. | Reveal personal information about your history, credentials, or feelings, or disclose present or past experiences in which you gained some personal insight. |
| 36 | Teach or provide the client with data, opinions, facts, resources, or answers to questions. | Use silence to allow clients to get in touch with their thoughts or feelings. |

Appendix B

Helping preference ranking descriptive statistics

Table 13. Helping Skill Preference Rankings: Range, Mean, and Standard Deviations

| Helping Skill | Min | Max | Mean | SD |
|---------------------|-----|-----|------|------|
| Challenges | 1 | 9 | 4.33 | 2.25 |
| Direct guidance | 1 | 9 | 4.09 | 2.22 |
| Information-giving | 1 | 9 | 4.24 | 1.96 |
| Intentional Silence | 2 | 9 | 2.76 | 2.02 |
| Interpretations | 1 | 9 | 5.21 | 2.23 |
| Open Questions | 1 | 9 | 7.87 | 1.60 |
| Reflections | 1 | 9 | 6.55 | 2.26 |
| Restatements | 1 | 9 | 6.10 | 2.50 |
| Self Disclosure | 1 | 9 | 3.86 | 2.07 |

Note: Helping skill preference variables were rated on a 9-point scale ranging from 1 (very weak preference) to 9 (very strong preference).

Appendix C

Correlations between helping skill preference ratings, rankings, and ipsative measures

Table 14. Correlations between helping skill preference measures

| Helping Skill | Rating-Ranking | Ranking-Ipsative | Rating-Ipsative |
|---------------------|----------------|------------------|-----------------|
| Challenges | .71 | .56 | .63 |
| Direct guidance | .67 | .72 | .68 |
| Information-giving | .56 | .54 | .40 |
| Intentional Silence | .69 | .70 | .66 |
| Interpretations | .70 | .50 | .57 |
| Open Questions | .57 | .53 | .40 |
| Reflections | .59 | .54 | .25 |
| Restatements | .68 | .50 | .36 |
| Self Disclosure | .75 | .67 | .58 |

Note: Helping skill preference variables were rated on a 9-point scale ranging from 1 (very weak preference) to 9 (very strong preference).

Appendix D

Correlations between ratings of helping preferences

Table 15. Correlations between ratings of helping skill preferences

| Helping skill | Restatement | Open question | Reflection of feelings | Self disclosure | Intentional Silence | Challenge | Interpretation | Information giving |
|------------------------|-------------|---------------|------------------------|-----------------|---------------------|-----------|----------------|--------------------|
| Restatement | | | | | | | | |
| Open question | -0.08 | | | | | | | |
| Reflection of feelings | .21* | .29** | | | | | | |
| Self disclosure | 0.03 | 0.02 | 0.02 | | | | | |
| Intentional Silence | 0.04 | -0.16 | -0.04 | -0.04 | | | | |
| Challenge | -0.05 | -0.09 | -0.02 | 0.14 | 0.15 | | | |
| Interpretation | -0.14 | -.20* | 0.13 | 0.13 | .22* | .52** | | |
| Information giving | -0.10 | 0.03 | -0.02 | .22* | -0.04 | 0.01 | 0.10 | |
| Direct guidance | -0.12 | -0.08 | -.23* | 0.11 | -0.17 | .19* | 0.09 | .45** |

Note: Helping skill preference variables were rated on a 9-point scale ranging from 1 (very weak preference) to 9 (very strong preference). Info-giving is abbreviated for information giving. Reflection is abbreviated for reflection of feelings.

Appendix E

Personality Measure

IPIP FFM

On the following pages, there are phrases describing people's behaviors. Please use the rating scale below to describe how accurately each statement describes you. Describe yourself as you generally are now, not as you wish to be in the future. Describe yourself as you honestly see yourself, in relation to other people you know of the same sex as you are, and roughly your same age. So that you can describe yourself in an honest manner, your responses will be kept in absolute confidence. Please read each statement carefully, and then circle the choice that corresponds to the number on the scale.

| | 1 Very Inaccurate | 2 Moderately Inaccurate | 3 Neither Inaccurate nor Accurate | 4 Moderately Accurate | 5 Very Accurate |
|---|-------------------------|-------------------------------|---|-----------------------------|-----------------------|
| 1 Often feel blue | 1 | 2 | 3 | 4 | 5 |
| 2 Have little to say | 1 | 2 | 3 | 4 | 5 |
| 3 Believe in the importance of art | 1 | 2 | 3 | 4 | 5 |
| 4 Have a sharp tongue | 1 | 2 | 3 | 4 | 5 |
| 5 Am always prepared | 1 | 2 | 3 | 4 | 5 |
| 6 Rarely get irritated | 1 | 2 | 3 | 4 | 5 |
| 7 Feel comfortable around people | 1 | 2 | 3 | 4 | 5 |
| 8 Am not interested in abstract ideas | 1 | 2 | 3 | 4 | 5 |
| 9 Have a good word for everyone | 1 | 2 | 3 | 4 | 5 |
| 10 Waste my time | 1 | 2 | 3 | 4 | 5 |
| 11 Dislike myself | 1 | 2 | 3 | 4 | 5 |
| 12 Keep in the background | 1 | 2 | 3 | 4 | 5 |
| 13 Have a vivid imagination | 1 | 2 | 3 | 4 | 5 |
| 14 Cut others to pieces | 1 | 2 | 3 | 4 | 5 |
| 15 Pay attention to details | 1 | 2 | 3 | 4 | 5 |
| 16 Seldom feel blue | 1 | 2 | 3 | 4 | 5 |
| 17 Make friends easily | 1 | 2 | 3 | 4 | 5 |
| 18 Do not like art | 1 | 2 | 3 | 4 | 5 |
| 19 Believe that others have good intentions | 1 | 2 | 3 | 4 | 5 |
| 20 Find it difficult to get down to work | 1 | 2 | 3 | 4 | 5 |
| 21 Am often down in the dumps | 1 | 2 | 3 | 4 | 5 |
| 22 Would describe my experiences as somewhat dull | 1 | 2 | 3 | 4 | 5 |
| 23 Tend to vote for liberal political candidates | 1 | 2 | 3 | 4 | 5 |
| 24 Suspect hidden motives in others | 1 | 2 | 3 | 4 | 5 |
| 25 Get chores done right away | 1 | 2 | 3 | 4 | 5 |
| 26 Feel comfortable with myself | 1 | 2 | 3 | 4 | 5 |

| | 1 Very Inaccurate | 2 Moderately Inaccurate | 3 Neither Inaccurate nor Accurate | 4 Moderately Accurate | 5 Very Accurate |
|---|-------------------------|-------------------------------|---|-----------------------------|-----------------------|
| 27 Am skilled in handling social situations | 1 | 2 | 3 | 4 | 5 |
| 28 Avoid philosophical discussions | 1 | 2 | 3 | 4 | 5 |
| 29 Respect others | 1 | 2 | 3 | 4 | 5 |
| 30 Do just enough work to get by | 1 | 2 | 3 | 4 | 5 |
| 31 Have frequent mood swings | 1 | 2 | 3 | 4 | 5 |
| 32 Don't like to draw attention to myself | 1 | 2 | 3 | 4 | 5 |
| 33 Carry the conversation to a higher level | 1 | 2 | 3 | 4 | 5 |
| 34 Get back at others | 1 | 2 | 3 | 4 | 5 |
| 35 Carry out my plans | 1 | 2 | 3 | 4 | 5 |
| 36 Am not easily bothered by things | 1 | 2 | 3 | 4 | 5 |
| 37 Am the life of the party | 1 | 2 | 3 | 4 | 5 |
| 38 Do not enjoy going to art museums | 1 | 2 | 3 | 4 | 5 |
| 39 Accept people as they are | 1 | 2 | 3 | 4 | 5 |
| 40 Don't see things through | 1 | 2 | 3 | 4 | 5 |
| 41 Panic easily | 1 | 2 | 3 | 4 | 5 |
| 42 Don't talk a lot | 1 | 2 | 3 | 4 | 5 |
| 43 Enjoy hearing new ideas | 1 | 2 | 3 | 4 | 5 |
| 44 Insult people | 1 | 2 | 3 | 4 | 5 |
| 45 Make plans and stick to them | 1 | 2 | 3 | 4 | 5 |
| 46 Am very pleased with myself | 1 | 2 | 3 | 4 | 5 |
| 47 Know how to captivate people | 1 | 2 | 3 | 4 | 5 |
| 48 Tend to vote for conservative political candidates | 1 | 2 | 3 | 4 | 5 |
| 49 Make people feel at ease | 1 | 2 | 3 | 4 | 5 |
| 50 Shirk my duties | 1 | 2 | 3 | 4 | 5 |

Appendix F

Theoretical orientation measure

Rate the extent to which you believe in and identify with each of the following theoretical orientations.

| | Low | | | | High |
|--------------------------------|------------|---|---|---|-------------|
| Psychoanalytic/Psychodynamic: | 1 | 2 | 3 | 4 | 5 |
| Humanistic/Person-Centered: | 1 | 2 | 3 | 4 | 5 |
| Cognitive/Cognitive-behavioral | 1 | 2 | 3 | 4 | 5 |
| Other (please pecify):_____ | 1 | 2 | 3 | 4 | 5 |

Appendix G

Demographics questionnaire

Demographics Questionnaire

1. Please write your age:_____

2. Circle your gender:

Female

Male

3. Circle your class:

Freshman

Sophomore

Junior

Senior

4. Ethnicity (please circle one or more to which you self-identify):

American Indian or Alaska Native

Asian

African American

Caucasian

Hispanic

Native Hawaiian or Other Pacific Islander

Ethnicity not listed

5. Please write your major:_____

6. What are your plans after graduation?

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