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# Outcome and Process Measure Feedback as They Effect Therapy Outcomes

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Outcome and Process Measure Feedback as They Effect Therapy Outcomes

by

Brett T. Copeland

Presented to the Faculty of the

Graduate Department of Clinical Psychology

George Fox University

in partial fulfillment

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of the requirements for the degree of

Doctor of Psychology

in Clinical Psychology

Newberg, Oregon

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Outcome and Process Feedback ii

Outcome and Process Measure Feedback as They Effect Therapy Outcomes

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at the

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### Outcome and Process Measure Feedback as They Effect Therapy Outcomes

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#### Abstract

In the study of treatment outcomes, a subset of *effectiveness* research, the *client-focused* approach is ideal, as it examines individual responses to therapy over time. The Life Status Questionnaire (LSQ) is designed to track therapy outcomes over time. Despite the emphasis on client *outcomes*, the *process* between a therapist and client may have the greatest impact on therapy outcomes and should be an inherent part of a *client-focused* approach. This study investigated the effects of simultaneous use of an outcome (LSQ) and two Empathy Scale-Revised process subscales, Positive (ES-P) and Negative (ES-N), to determine how these separately and collectively affect therapy process and outcomes. Procedures included administering the LSQ before the 1<sup>st</sup>, 3<sup>rd</sup>, and 5<sup>th</sup> therapy sessions and both the ES-P and ES-N at the end of sessions 2 and 4. Dependent variables of interest included (a) LSQ, (b) ES-P, and (c) ES-N. The primary independent variables in this study was the impact that feedback derived from these instruments, although several ancillary independent variables were considered. Feedback effects were measured by randomly assigning clients to one of four treatment conditions: (a) No

Feedback, (b) LSQ Feedback, (c) ES Feedback (combined ES-P and ES-N), and (d) Both Feedback (feedback provided for all three instruments).

Results found no evidence that feedback conditions impacted therapy outcomes. However, insufficient sample size may be responsible. The LSQ showed significant improvement from sessions 1 to 5. The ES-P showed positive changes in therapeutic relationship from sessions 2 to 4 despite a significant ceiling effect. An even more profound ES-N floor effect may explain why four sessions were necessary to show significant reduction in the negative therapeutic relationship. Findings suggest that clients' overall mental health and in their positive and negative feelings toward their therapist improved over time, and that clients who terminated therapy generally had more improved LSQ scores compared to those who did not. These findings replicate that shown by, among others, Lambert et al., (2001).

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### Client-Focused Approach: Outcome

A third approach to measure client outcomes to therapy, the *client-focused* approach, is more practical as it monitors the individual client (Lambert, Hansen, & Finch, 2001). Thus, in the quest to answer, "What works best for this client?" identifying therapeutic issues on a case-by-case basis appears most suitable, because it monitors individual client progress and provides information to clinicians to guide ongoing change (Lambert et al., 2001).

The advantages of taking a *client-focused* approach are numerous. Lambert et al. (2001) show that providing therapists with their client's outcome questionnaire results can act as a source of feedback. In this approach, therapists are provided with the results of their client's questionnaire, i.e., are provided "feedback." When those questionnaire results negatively deviate from what would be expected to occur, therapists may then use that feedback to alter their intervention. In recent years, several studies have demonstrated that feedback from outcome questionnaires can inform treatment changes leading to quicker, better therapy outcomes, and earlier completion of treatment. This last phenomenon is deemed helpful, as clients who have received significant therapeutic gains, as evidenced by improved Outcome Questionnaire-45.2 (OQ-45.2) scores, are more likely to discontinue (Harmon, Hawkins, Lambert, Slade, & Whipple, 2005; Lambert et al., 2001; Lambert et al., 2002; Lambert, Harmon, Slade, Whipple, & Hawkins, 2005; Whipple et al., 2003).

In addition to looking at individuals *during* treatment, the *client-focused* approach also monitors individuals' *following* treatment. This emphasis on utilizing empirically-based outcome tools to capture an individual's treatment outcomes is helpful on two

levels: first, it helps to identify specific strengths and developmental areas at termination to inform client current and future growth as well as establish areas of import in case a client returns to therapy in the future (see Fishman, 2000; Seligman, 2000). Second, is the inherent drawbacks of solely using group means to describe treatment outcomes (Howard et al., 1996). Several studies have demonstrated the insufficiency of using mean change scores as the only analysis of therapy change (see Combs, Bufford, Campbell, & Halter, 2000).

#### Client-Focused Approach: Process

Although the treatment changes made through feedback are invaluable to outcome research, the treatment change is not one of *outcome* but of *process*. Hill and Williams (2000) state that process "refers to overt and covert thoughts, feelings, and behaviors of both client and therapists during therapy sessions" (p. 670). They further specify that only input variables (i.e., characteristics of the therapist and client), extratherapeutic factors and therapy outcomes are outside the realm of *process*. Consequently, even feedback is a *process* intervention with *outcome* implications. According to Lambert and Barley (2001), 45% of what causes client progress can be attributed to specialized treatment interventions and common factors (i.e., person-centered facilitative conditions and the therapeutic alliance). As these are qualities shared by the therapist and his or her client in the therapy session, the input of the *process* of therapy is substantial.

Of the two components to *process*—common factors and specialized treatment interventions—common factors have been proposed to have at least double the influence on therapy change (Lambert & Barley, 2001). Yet Hyer, Kramer, and Sohnle (2004) suggest that rather than viewing common factors as made up of two discrete entities (person-centered facilitative conditions and the therapeutic alliance), common factors are really describing different aspects of the same entity: the therapeutic alliance. Hyer et al. (2004) define the therapeutic alliance as "the collaborative nature of the relationship, the affective bond between patient and therapist, a trust in the therapist by the patient, and agreement on goals by both" (p. 276). Applying this definition to Lambert and Barley's (2001) study, therapeutic alliance would comprise 30% of therapy change. Wampold (2001) attributes a more profound causal role to therapeutic alliance, suggesting that it instigates 54% of therapy impact. He concludes that any intervention, if it is to prove helpful, is dependent on a meaningful therapeutic relationship.

Despite the aforementioned compelling figures, therapeutic alliance can be easily overlooked when considering treatment outcomes (Castonguay, 2002; Elkin, 1999). Nevertheless, therapeutic alliance research has been around for quite some time. In 1965, Carl Rogers published what he called a "somewhat radical hypothesis" (p. 99) when he pointed to the necessity of an accepting climate in the therapy relationship. Since that time, research has correlated therapeutic alliance with a successful long-term working atmosphere (Farber & Lane, 2001). Client-specific benefits include improved mood (Persons & Burns, 1985) and greater therapy outcomes (Henry, Schacht, & Strupp, 1986; Martin, Garske, & Davis, 2000). The connection between therapeutic alliance and client progress has fueled its own field of inquiry, Empirically Supported Relationships (Paul, 2003; Tan, 2003; Weiner, 2003).

Feedback is understood as a facet of *process* and the value of the therapeutic alliance has been confirmed. Thus investigating the merit of providing *process* feedback seems imperative to *client-focused* research. Current research has identified two

imperative *process* issues: First, the Empirically Supported Treatment (EST) field asks about the effectiveness of the *treatment* for the client (Beutler, 2004; Lambert et al., 2001). Second, the Empirically Supported Relationship (ESR) field, arguably the more influential on client progress, asks about the effectiveness of the *relationship* for the client (Tan, 2003).

### Merging Outcome and Process Feedback

Although in recent years a stable body of research has been devoted to providing feedback drawn from outcome questionnaires (Lambert et al., 2001; Lambert et al., 2002), feedback studies combining insight from both outcome and process questionnaires have only emerged in the last few years (Harmon et al., 2005; Whipple et al., 2003) and have been almost entirely limited to a student population. Moreover, no study has separately compared the impact of outcome and process feedback. The intent of this study was to explore the combined efforts of both types of feedback and to study their effects separately. The *client-focused* nature of this study led to two important things: first, that the study would not include tight experimental controls, but was designed to have application to clinical practice—although participants were randomly assigned to treatment conditions. Second, in addition to investigating group mean responses to therapy, this study attempted to explore how the distribution of clients responded to the variables in this study.

It was hypothesized that feedback from both measures would provide faster and better therapy change than feedback from one or the other, and that feedback from either measure would be greater than no feedback. Additionally, data collection included the incidence of (a) "no shows" and client-induced cancellations, (b) whether or not the client tem from 0 – 4 ndicate greater nbert's (1983) it, (b) interpers te the OQ-45... complete this (

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Interpersonal Problems (Horowitz, Rosenberg, Baer, Ureno, & Villasenor, 1988), and Social Adjustment Scale (Weissman & Bothwell, 1976). The results identified concurrent validity was significant beyond the .01 level of confidence (*rs*, .59--.70).

The Cutoff Score and Reliable Change Index combine to indicate clinically significant change. The Cutoff Score was calculated by comparing the LSQ results of a sample of non-patient community volunteers (M = 31.50, SD = 14.22) with a mixed outpatient sample (M = 55.56, SD = 13.95). The Cutoff Score identifies those with a score of 43 or lower in the functional range and 44 or higher in the clinical range. The Reliable Change Index was computed by using the standard error of measure for the community sample (SE = 3.76). It identifies a change score of 10 or greater, whether that score improves or worsens, as reliably different than the intake score. Further, an improved change score of 10 or greater meets what has been deemed by Lambert et al. (2001) as clinically significant change if, and only if, that change score of 43 or lower (dysfunctional range) that subsequently falls 10 or more points to a score of 43 or lower (functional range) in order for the change to be considered clinically significant.

*Empathy Scale (Revised)*. Of the two aspects of process, therapeutic alliance and specialized treatment interventions, the process measure used in this study placed greater emphasis on the role therapeutic alliance plays on therapy outcomes. The Empathy Scale (Revised) is a 23-item inventory comprised of three subscales: (a) Positive Feelings about the Therapist (7 items), (b) Negative Feelings about the Therapist (9 items) and (c) Helpfulness of the session (7 items). The first two subscales, Positive Feelings about the

data suggest high internal consistency (r = .94). ES-N reliability, also measured through internal consistency, was satisfactory (r = .83).

Regarding validity, concurrent validity was also developed in conjunction with the Kaiser Patient Satisfaction Scale at the same outpatient setting for the ES-P and ES-N (rs = .80 and .53, respectively). Discriminant validity pitted the ES-P against the ES-N. The results indicate adequate discriminant validity (r = ..46).

*Demographic and Other Data.* An understanding of methodology cannot be complete without discussion of the different demographic variables explored in this study. Of these, client attribute variables included the impact of Diagnostic Statistical Manual (4<sup>th</sup> Edition) Axes I, II, and V as well as client age and gender. Additional data collected included the incidence of "no shows" and client-induced cancellations, whether or not the client had terminated, the number of sessions attended, the time that elapsed between the 1<sup>st</sup> and 5<sup>th</sup> session, and the impact of therapy sites on outcomes—as there were six WPCS sites involved in the study. Each will be discussed in turn in the Procedures section.

### Procedures

Procedures included administering the instruments, relaying results to the primary researcher, having the primary researcher score and provide feedback for the instruments, and, finally, advising therapists to review faxed results before the next therapy session with the client for whom the feedback was intended. Each will be addressed in turn.

*Aggregation of Demographic Data*. Demographic data was acquired post-hoc. Specifically, April 7, 2006 was the last day that LSQ, ES-P, and ES-N feedback was delivered to therapists and the next week, April 14, concluded the reception and coding of these instrument scores. As the primary researcher was out-of-state during this time, a research assistant, Adam Fenske, accumulated demographic data on a twice-weekly basis. He visited one WPCS site each day, beginning May 18 and ending June 7, 2006. During these visits, however, Mr. Fenske could only acquire data for client files that remained open. Data for terminated cases was acquired on June 23, 2006.

Regarding the diagnostic Statistical Manual (4<sup>th</sup> Edition) data, only intake diagnoses were aggregated, as many client cases had not been closed when data were collected. The remaining data were recorded according to what was available at the time of data collection. These include age and gender, and non-client attribute variables, such as the number of "no shows" and cancellations, whether or not the case had been terminated, the number of sessions attended, the time that elapsed between sessions 1 and 5, and which therapy site or location they received therapy. Hence, depending on when a particular WPCS site was visited, data may have been recorded as early as May 18 or as late as June 7. All terminated cases had been recorded as such by or before June 7.

*Site Procedures.* The outcome questionnaire of interest, the LSQ, was already routinely administered to WPCS clients before sessions 1, 3, and 5 as a requirement of care, thus therapist and office staff research procedures were limited to the following: first, therapists administered the ES-P and ES-N at the end of sessions 2 and 4. Second, following administration of the LSQ, ES-P, and ES-N, clients concealed the instruments in an appointed folder and therapists submitted the folder to WPCS Office Managers. Third, Office Managers faxed the instruments to the principal investigator. Fourth, the principal investigator scored the instruments and recorded these scores in an Excel file. This was followed by logging these scores and the accompanying feedback code and

message on a sheet that was faxed to Office Managers. Finally, Office Managers submitted this feedback sheet to therapists who reviewed the content prior to their next therapy session with the client for whom the feedback was intended.

Therapists treating clients in the Outcome Feedback (OF) condition received LSQ feedback for session 3; those with clients in the Empathy Feedback (EF) condition received ES-P and ES-N feedback for session 2 and 4; therapist counseling clients in the Both Feedback (BF) condition received all feedback for the OF and EF conditions. *Statistical Design* 

This study originally proposed random assignment of participating clients to the 4 conditions, thus constituting as a true experiment. However, the next section will discuss how center compliance concerns and/or additional unanticipated concerns compromised this design.

The three feedback instruments, the LSQ, the ES-P, and the ES-N, represented continuous variable scales. Feedback generated from these scales comprised the four feedback conditions initially leading to use of a repeated measures analysis of variance performing independent analyses of different outcomes. However, given the numerous covariate variables, including client attribute variables, investigated during data analysis, an analysis of covariates (ANCOVA) was utilized. This permitted adjustment to these numerous potentially confounding variables before determining the impact that the primary independent variable of interest, condition, had on LSQ, ES-P, and ES-N posttest scores. Determining if LSQ, ES-P, and ES-N scores changed over time, regardless of condition, was determined through a *t*-test with repeated measures. An eta square was

also utilized as was an analysis of variance testing two main effects and the interaction of three independent variables. These will be discussed later in this manuscript.

### Chapter 3

### Results

#### Demographic

145 participants were involved in this study. These 145 participants represented six WPCS sites. Participants ages ranged from 18 to 75 (M = 39.01, SD = 12.84), 67.36% (97 persons) versus 32.64% (47 persons) were female and male, respectively. *Complications with Data* 

Through random assignment, 33 to 39 participants were assigned to each of the four conditions. The sample size of 145 participants would have been sufficient if essential criteria for analysis were met for each. Table 1 introduces the first blow to this study's sample size that, as it will be shown, limited the power available for data analyses. Fifty-eight (41.13%) of participants completed 4 or fewer sessions, thus they did not meet the minimum session requirement; eleven (7.80%) completed 5 sessions, and 72 (51.07%) completed 6 or more sessions.

As a minimum of five sessions were necessary to acquire sufficient data for analysis, 40.00% of clients, or 58 of the 145 participants, were not eligible for analysis. Data for sessions attended could not be acquired for an additional four clients, leaving only 83 of the original 145 clients (57.24%) available for the 4 research conditions of interest.

Total Sessions Attended	Number of Participants	Percentage of Sample
1	20	14.18%
2	13	9.22%
3	13	9.22%
4	12	8.51%
1 to 4 Sessions: Percentage of Tota	l Sample 41.1	3%
5	11	7.80%
6-10	41	29.08%
11+	31	21.99%
5+ Sessions: Percentage of Total S	ample 58.8	7%
Grand Total	141	100.00%

Total Number of Sessions Attended by Research Participants

*Note.* Data is reported for all clients, whether they had terminated or not. Hence this data should not be considered depictive of the total number of sessions attended by the average client, as many clients were still in treatment at the time of data collection.

Although 83 participants met the minimum therapy session requirement for inclusion in data analysis, data for all three LSQ administrations (sessions 1, 3, and 5) and both ES-P and ES-N administrations (sessions 2 and 4) was acquired for only 47 clients (56.63%). Ironically, out of the original 145 clients, although the LSQ was already in Western Psychological & Counseling Services' system, less data were

available for it (40%) than were available for the ES-P and ES-N (43.45% for both measures). Combined, only 32.41% of the 145 participants in the study met all criteria for data analysis. Table 2 demonstrates the number of clients from each condition eligible for data analysis before and after necessary data aggregation was completed. The original goal was to have eight clients randomly assigned with two per condition for each of 20 participating therapists. Midway into data collection, it was determined that fulfilling this goal would not occur. This goal was compromised by an increase in the number of therapists and slowing client referrals. Hence, rather than randomly assigning up to two clients per condition, I shifted the randomization goals. This included attempting to fit one client per condition, until the four conditions were represented. If that goal was met, I then repeated the process, seeking a second client per condition. Although this reduced the range of randomization, it was believed to be the best approach for eliminating therapist effects, given evidence that the number of clients completing the research would be less than expected.

Despite this effort, no therapist had two clients assigned to each condition that met the minimum research requirements, i.e. attended at least 5 sessions with all instrument data acquired for those sessions. Furthermore, only one therapist had one client in all four conditions with all accompanying data. Hence, efforts to eliminate therapist effects were not successful.

#### Measuring Group Mean Change Scores Over Time

With the data available, the first major question was approached. This question sought to determine, regardless of condition to which clients were assigned, if the LSQ, ES-P, and ES-N identified either outcome or therapeutic alliance changes over time.

Research	Number of		Number of Participants	
Condition	Participants	%	Eligible for All Analyses <sup>a</sup>	0⁄0
No Feedback	39	27.08%	12	8.33%
LSQ Feedback	37	25.69%	13	9.03%
ES Feedback	33	22.92%	9	6.25%
Both Feedback	35	24.31%	13	9.03%
Grand Total	144	100.00%	47	32.64%

Client Data Analysis Eligibility

*Note*. One of the 145 clients that initiated the study was not assigned to a condition, because it was determined they could not complete 5 sessions by the pre-designated stop date for data collection.

<sup>a</sup>By "all" analyses, it is meant that every LSQ, ES-P, and ES-N score for sessions 1 to 5 was acquired. Some analyses were capable of being performed despite the absence of some data.

In the case of LSQ, statistically significant improvement in overall mental health was met when analyzing change scores from session 1 to session 5. However, only one of two criteria for clinically significant change was satisfied. Of these two criteria, Cutoff Score and Reliable Change Index, the Cutoff Score criterion was met due to the sample mean LSQ score reducing from the dysfunctional at pre-test to the functional range at post-test. As indicated earlier, the dysfunctional range included any score of 44 or higher. The mean intake score of 47.72 fell in this range. At post-test, however, the mean score had, in a period of 5 sessions, descended into the functional range of 43 or lower (M = 41.72). Clinically significant change also required that clients' most recent LSQ score improve by 10 or more points. The mean change of 6 points failed to meet this criterion.

When compared to the Lambert et al. (2001) study, LSQ intake scores for this study were comparable to those acquired at BYU. Although the OQ-45.2 is a longer instrument that the LSQ, the fact that the OQ-45.2 number of items, potential highest score, Cutoff Score, and Reliable Change Index are all close to 1.5 larger than the LSQ (1.5, 1.5, 1.47, and 1.4, respectively), makes comparison easy and fairly equitable.

Dividing the Lambert et al. (2001) study's client intake score (69.13) mean by 1.5 resulted in a score of 46.09 compared to 47.72 for this sample. In Lambert's study, after dividing by 1.5, clients observed a 3.33 change score for an average of 3.3 sessions. This 1-to-1 change score per session ratio is slightly improved upon in this study (6-point drop on LSQ for 5 sessions). However, the approach these studies took to assessing sample means was different, as Lambert appeared to average all change scores, regardless of the number of therapy sessions received, whereas this study looks at changes in clients who completed 5 and only 5 sessions.

Despite differences in instrument length, the pre-test outcome questionnaire standard deviations for these clientele were similar without making corrections for instrument length (somewhere between 22.48 and 23.49 for Lambert's study and 19.59 for this study). This result for standard deviation was higher than what was found for the mixed outpatient sample that comprised the instrument normative data, despite the outpatient sample having a higher mean LSQ score (M = 55.56, SD = 13.95).

The duration studied for the ES-P and ES-N was even shorter than that for the LSQ, with ES-P and ES-N duration spanning from immediately after session 2 to immediately after session 4. Regarding the ES-P, data clearly indicates statistically significant improvement in clients' positive feelings toward their therapist at session 4. The ES-N showed no statistically significant change in perceptions of negative therapist qualities from sessions 2 to 4 (See Table 3). However, on Table 3 it may be seen that sufficient data were acquired for post-session 6 ES-N scores; contrasting session 6 data with session 2 data was statistically significant (t < .001). Session 6 ES-N scores were not statistically different from 0.

#### Table 3

Pre-test, Post-test Change Scores for the LSQ, ES-P, and ES-N at Sessions 4 and 6.

Feedback		Pre-test	Post-test	Difference			
Condition	п	M (SD)	M (SD)	M (SD	t-value	Sig.	$R^2$
LSQ	58	47.72 (19.59)	41.72 (19.48)	6.00 (11.82)	3.86	.001	.37
ES-P <sup>a</sup>	63	24.84 (3.44)	25.84 (3.10)	1.00 (2.99)	2.66	.010	.52
ES-N: 4	63	.52 (.91)	.28 (.87)	.24 (.98)	1.93	.058	.81
ES-N: 6	43	.52 (.91)	.07 (.34)	.56 (.93)	3.92	.001	.98

<sup>a</sup>Note that the ES-P is the only one of the three scales where improvement is evidenced by an increase in score.

No definitive data was provided for computing clinically significant change for the ES-P or ES-N. Runyon & Haber (1988) identify a standard deviation of 1.96 as a sufficient marker for two-tailed tests seeking to make claims about clinical significance at the .05 level. In applying this approach, it may be noted that the term "clinically significant change" is essentially equivalent to the term "Reliable Change Index" used for the LSQ. This is the case due to the fact that the Empathy Scale-Revised subscales do not have Cutoff Scores providing a more stringent measure of clinically significant change.

Looking at our yardstick for clinically significant change, the ES-P and ES-N change score standard deviations (2.99 and .98, respectively) multiplied by Runyon & Haber's (1988) standard deviation marker of 1.96 resulted in a mandatory change score of 5.86 for the ES-P and 1.92 for the ES-N. Rounding up, this required a change score of 6 for the ES-P and 2 for the ES-N in order for the group mean to improve in a clinically significant way.

For both subscales, the standard for clinical significance could not be met. It can be seen that the ES-P and ES-N scores were too close to the ceiling and floor, respectively, to make  $a \ge 1.96$  standard deviation change score possible.

### Client-Focused Perspective on Change Scores Over Time

Although analyses focusing on group means did not identify clinically significant change, a *client-focused* approach, recognizing individual treatment responses, demonstrated varied responses to therapy. Table 4 simply displays the distribution of LSQ session 1 to session 5 change scores. It may be seen that the significant mean treatment effect obscures the widely variable client outcomes from significant worsening for a few to significant benefits for several more.

# LSQ Change Scores from Session 1 to 5

Change Score	Number of Participants	Percentage of Sample
Increase in Score		
30-21	1	1.72%
20-16	1	1.72%
15-11	1	1.72%
10-6	2	3.45%
5-1	11	18.97%
Percentage of Total Sampl	e	27.59%
0	2	3.45%
Decrease in Score		
1-5	9	15.52%
6-10	13	22.41%
11-15	8	13.79%
16-20	5	8.62%
21-30	2	3.45%
31+	3	5.17%
Percentage of Total Sample	3	68.97%
Grand Total	58	100.00%

Tables 5 and 6 more appropriately describe changes in client outcomes. Regarding Table 5, it may be recalled that the LSQ possesses a Reliable Change Index that identifies change scores of 10 or greater, regardless of directionality, as meeting one of two criteria for clinically significant change. For simplicity, these Reliable Change Index outcomes, depending on directionality, will forthwith be labeled as "improvers" or "deteriorators."

Of the 58 clients listed in Table 4, 20 (34.48%) had session 5 change scores that improved by 10 points or more, 58.6% experienced no change, and four clients (6.90%) met the Reliable Change Index for deterioration.

### Table 5

Change Status	Number of Participants	Percentage of Sample
Improvers	20	34.48%
No Change	34	58.62%
Deteriorators	4	6.90%
Grand Total	58	100.00%

A slightly different picture is provided in Table 6, which describes the slope of recovery for these clients. Table 6 shows that, when recovery curves are considered at session 5, "deteriorators" or not-on-track clients (i.e. clients with either a yellow or red code) comprise only 10.34% of the 58 participants for whom essential LSQ data was

# Color Codes Associated with Session 3 and 5 LSQ Change Scores

Color Code	Number of Participants	Percentage of Sample
Session 3		
Improvers		
Blue	18	21.43%
White	24	28.57%
Green	26	30.95%
Deteriorators		
Yellow	3	3.57%
Red	13	15.48%
Grand Total	84	100.00%
ession 5		
Improvers		
Blue	13	22.41%
White	16	27.59%
Green	23	39.66%
Deteriorators		
Yellow	2	3.45%
Red	4	6.90%
Grand Total	58	100.00%

acquired. Explanations for each of the following color codes can be found on pages 9 and 10 of this manuscript.

Table 7 applied the most stringent definition of meaningful change, as it addresses the two criteria for clinically significant change, Cutoff Score and Reliable Change Index. Like the previous table, Table 7 investigates clinically significant change that is met at sessions 3 and 5. The sample is smaller than in previous tables, due to the fact that only clients who begin in the dysfunctional range (i.e. have intake scores  $\geq$  44) have the potential of falling below the Cutoff Score that forms the first essential criterion for clinically significant change.

### Table 7

### LSQ Clinically Significant Change (CSC) Reached at Session 3 and 5

CSC Status	Number of Participants	Percentage of Sample
Session 3		
Reached CSC	8	16.33%
Did not Reach	CSC 41	83.67%
Grand Total	49	100.00%
Session 5		
Reached CSC	7	21.21%
Did not Reach (	CSC 26	78.79%
Grand Total	33	100.00%

As with the LSQ, individual responses to the ES-P and ES-N were varied (See Tables 8 and 9). For the ES-P, increased scores reflect better empathy. For the ES-N, lower scores reflect better empathy.

### Table 8

### ES-P Change Scores from Session 2 to 4

Change Score	Number of Participants	Percentage of Sample
Decrease in Score		
<u>≥</u> 5	1	1.59%
4-3	3	4.76%
2-1	8	12.70%
Percentage of Total San	nple 19	9.05%
0	24	38.10%
Increase in Score		
1-2	13	20.63%
3-4	5	7.94%
<u>≥</u> 5	9	14.29%
Percentage of Total Sam	ple 42	2.86%
Grand Total	63	100.00%

Change Score	Number of Participants		Percentage of Sample
Increase in Score			
<u>≥</u> 3	1		1.59%
2	1		1.59%
1	3		4.76%
Percentage of Total Sam	ple	7.93%	
0	41		65.08%
Decrease in Score			
1	14		22.22%
2	2		3.17%
<u>≥</u> 3	1		1.59%
Percentage of Total Sam	ble	26.98%	
Grand Total	63		100.00%

### ES-N Change Scores from Session 2 to 4

As mentioned earlier, the ES-P and ES-N had substantial ceiling and floor effects, respectively, that made improvement impossible when looking at clinically significant group mean change. Although, looking at group means, clients improved on both the ES-P and ES-N, the *client-focused* approach recognizes that certain individuals may deteriorate despite the group's tendency to improve. Further, the ES subscales' ceiling

and floor effects do not prevent us from investigating deterioration in the therapeutic alliance. It may be seen that the lowest ES-P intake score was a 16, thus a 6-point change score in the negative direction (suggesting deterioration of the relationship) was available to all clients. The highest ES-N intake score (higher representing more negative therapeutic qualities from a therapist to his or her client) was a 5; with a ceiling of 36 on the ES-N, and clinically significant change requiring a 2-point change score, clients had at least 31 points through which to endorse greater severity of negative therapeutic relational attributes from their therapist. Table 10 illustrates the eligibility and results of the sample for ES-P and ES-N unhealthy clinically significant change. It may be noted that the ES subscales were administered at the end of sessions 2, 4, and 6, instead of sessions 1, 3 and 5, as was the case with the LSQ.

Table 10 almost unanimously indicates that, regardless of ES-P or ES-N intake score, clients did not perceive a weakening in the therapeutic alliance as therapy progressed. This does not, however, prove that the therapeutic alliance improved as therapy advanced. Although statistically significant improvement was identified for both measures, the *client-focused* approach asks about clinically significant change from the individuals' perspective. Here the ES-P ceiling effect and the ES-N floor effect significant reduce the sample size for those capable of experiencing clinically significant change. Table 11 showcases the reduced sample size eligibility for the subscales as well as the number and percentage experiencing clinically significant improvement within those samples. Although the sample sizes were small, especially for the ES-N, clinically significant improvement in the therapeutic alliance seemed to impact many clients. particularly those who, at intake, expressed concerns on the ES-N and for clients who remained in therapy until the 6<sup>th</sup> session.

### Table 10

		Sample	Number Deteriorated	Percentage of Sample
ES-P				
	Session 4			
		63	0	00.00%
	Session 6			
		50	0	00.00%
	Grand Total	113	0	00.00%
ES-N				
	Session 4			
		63	1	1.59%
	Session 6			
		50	0	00.00%
	Grand Total	113	1	00.09%

		Sample	Number	Improved	Percentage of Sample
ES-P					
	Session 4				
		17		5	29.41%
	Session 6				
		15		8	53.33%
	Grand Total	32		13	40.63%
ES-N					
	Session 4				
		7		4	57.14%
	Session 6				
		5		4	80.00%
	Grand Total	12		8	66.67%

ES-P and ES-N Clinically Significant Change Score Improvement for Sessions 4 and 6

Comparing the prevalence of perfect versus non-perfect scores for both the ES-P and ES-N for sessions 2, 4, and 6 (Table 12) demonstrated that, by session 6, 70% of clients did not endorse any therapeutic alliance deficits provided by their therapists in the areas of (a) lacking positive qualities or (b) displaying negative qualities.

Therapy Session Administration	п	Percentage Perfect	Percentage Non-Perfect
Session 2	63	34.92%	65.08%
Session 4	63	55.56%	44.44%
Session 6	50	70.00%	30.00%

Perfect Versus Non-Perfect Scores on the ES-P and ES-N

*Note*. A perfect score is represented by the absence of client complaint on both measures. This requires a score of 28 on the ES-P and an ES-N score of 0.

### Analysis of Covariates

The second and only other major question pursued through this study was to determine what impact, if any, condition assignment, or other covariates, may have on therapy outcome and therapeutic alliance. This question was explored through analysis of covariance (ANCOVA). Although condition (i.e., the feedback group clients were randomly assigned to) and intake score have been discussed previously, it may be helpful to recap the other independent variables investigated in the ANCOVA.

In the last paragraph of the introduction a list of independent variables is delineated. The first on that list was the incidence of "no shows" or client-induced cancellations. Table 13 provides descriptive data on this variable.

"No Shows" and	Number of	Percentage of	
Cancellations	Participants	Sample	
0	54	41.54%	
1-2	54	41.54%	
3-4	17	13.07%	
5-7	5	3.85%	
Grand Total	130	100.00%	······

Rate of "No Shows" and Cancellations Exhibited by Research Participants

*Note.* These rates represent documented "no shows" and cancellations regardless of the number of sessions attended by participants. No efforts were made to ensure accurate documentation of this data.

The next variable looked at was whether or not clients had terminated (and the relationship of that termination to outcomes and therapeutic alliance) at the time demographic data were collected. Of the 145 participants, termination data were collected for all but one client on June 7, 2006. Sixty clients had terminated at the time of demographic data collection (41.67%), while 84 clients had not terminated (58.33%). The time that had transpired from the beginning to the end of data collection was somewhere between nine and ten months.

The total number of sessions attended by each client was considered in data analysis (see Table 1) and is entitled "Total Sessions" on the ANCOVA tables. Also the time that elapsed between sessions 1 and 5 was considered. This data was only available for 57.24% of the 145 participants, primarily because almost ½ of the clients did not complete 5 sessions by the pre-determined stop date for data collection. Table 14 provides insight into the session 1 to 5 distribution.

Table 14

Weeks	Number of Participants	Percentage of Sample
1-3	3	3.61%
4	18	21.69%
5	19	22.89%
6	12	14.46%
7	5	6.02%
8	7	8.43%
9	3	3.61%
10+	16	19.28%
Grand Total	83	100.00%

The Number of Weeks Required for Clients to Complete 5 Therapy Sessions

Location, or the impact of the six different therapy sites, is another variable that was investigated.

Finally, client attribute variables such as age, gender, and the influence of DSM-IV Axes I and V ("GAF") were also considered (see Table 15). As only three clients were identified with an Axis II disorder (two of these were merely labeled as "rule outs"),

Axis II was not considered in this inquiry.

#### Table 15

#### DSM-IV Diagnoses for Research Participants

Axis I Description	Number of Participants	Percentage of Sample
No Diagnosis	0	0.00%
Adjustment Disorders	56	39.72%
Depression Disorders	38	26.95%
Anxiety Disorders	26	18.44%
Miscellaneous Disorders <sup>a</sup>	13	9.22%
Substance Disorders w/ Com	orbidity <sup>b</sup> 8	5.67%
Grand Total	141	100.00%

<sup>a</sup> Miscellaneous Disorders refer to any disorder not represented on the other rows. Most tended to be more severe (e.g. Bipolar, Schizoaffective). <sup>b</sup> All clients with a substance abuse diagnosis had some form of comorbid diagnosis.

The ANCOVA, as mentioned earlier, initially considered all independent variables and then selectively removed variables judged to lack sufficient influence on therapy outcomes or therapeutic alliance. See Tables 16, and 18-20 for a listing of covariates deemed sufficiently influential on post-test LSQ, ES-P, and ES-N scores,

#### Change Score Number of Participants Percentage of Sample Increase in Score 1 1.59% ≥3 2 1 1.59% 1 3 4.76% Percentage of Total Sample 7.93% 0 41 65.08% Decrease in Score 1 14 22.22% 2 2 3.17% 1 1.59% ≥3 Percentage of Total Sample 26.98% Grand Total 63 100.00%

#### ES-N Change Scores from Session 2 to 4

As mentioned earlier, the ES-P and ES-N had substantial ceiling and floor effects, respectively, that made improvement impossible when looking at clinically significant group mean change. Although, looking at group means, clients improved on both the ES-P and ES-N, the *client-focused* approach recognizes that certain individuals may deteriorate despite the group's tendency to improve. Further, the ES subscales' ceiling

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Finally, client attribute variables such as age, gender, and the influence of DSM-IV Axes I and V ("GAF") were also considered (see Table 15). As only three clients

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<sup>a</sup> Miscellaneous Disorders refer to any disorder not represented on the other rows. Most tended to be more severe (e.g. Bipolar, Schizoaffective). <sup>b</sup> All clients with a substance abuse diagnosis had some form of comorbid diagnosis.

The ANCOVA, as mentioned earlier, initially considered all independent variables and then selectively removed variables judged to lack sufficient influence on therapy outcomes or therapeutic alliance. See Tables 16, and 18-20 for a listing of covariates deemed sufficiently influential on post-test LSQ, ES-P, and ES-N scores, respectively. Tables 19 and 20 provide ANCOVA results for the ES-N, the former investigated session 2 to 4 change while the latter researched session 2 to 6 change. Table 17 describes the Change Scores for each condition.

Although several covariate variables were included in the final analysis for Tables 16, and 18-20, intake score for the respective instrument under investigation was the common thread for these analyses. In fact an eta square examined the impact of therapy involvement. It noted that therapy involvement effect sizes for the LSQ, ES-P, ES-N (sessions 2 to 4) and ES-N (sessions 2 to 6) ranged from .37 to .98 indicating that therapy participation has profoundly impacts instrument change scores.

Beyond the impact of therapy involvement on treatment outcomes was the relationship between termination status and LSQ change score. In this example, cases that were terminated were likely to have better LSQ outcomes than those who were still receiving therapy at the time these data were collected. Specifically terminated cases had improved by an average of 9.41 points on the LSQ compared to an improvement of 2.03 LSQ points for those who were still receiving therapy.

It may be observed that location was not among the variables listed under the ANCOVA run for LSQ, ES-P, or ES-N session 4 change scores. Preliminary analyses found no evidence that location was an influential variable, suggesting that results were similar across sites. However, location was statistically significant for the ES-N when an ANCOVA compared session 2 to session 6 change scores. Several additional variables would have been correlated with change scores for the above-stated instruments if the less stringent *p*-value of .10 had been applied, yet it was determined that .05 was a more appropriate significance level to use with these analyses.

<u></u>	Source of Variation	SS	df	MS	F-Value	Sig.
Covar	riate					
	LSQ Intake Score <sup>a</sup>	985.16	1	985.16	9.55	.003
	Cancel/No Show	407.65	1	407.65	3.95	.053
	Terminated	599.83	1	599.83	5.81	.020
	Condition <sup>b</sup>	178.35	3	59.45	.58	.634
Error		4745.44	46	103.16		
Total		6438.53	52			

Analysis of Covariance for Session 5 LSQ Change Score

<sup>a</sup>LSQ Intake Score represents the severity of symptoms at the initial session. This score represents the first major research inquiry discussed previously.

<sup>b</sup>Condition was computed in the final analysis after non-influential variables were

identified through the aid of a series of previous analyses and subsequently omitted.

# Table 17

# LSQ Session 1 to 5 Change Scores by Feedback Condition

		Change Score	
Condition	Number of Participants	M(SD)	
No Feedback	12	5.38 (2.85)	
LSQ Feedback	13	4.47 (2.93)	
ES Feedback	9	4.28 (3.02)	
Both Feedback	13	8.75 (2.73)	

Of the change scores that occurred within each condition, clients in the Both Feedback condition, on average, experienced an 8.75-point change on the LSQ compared to a range of 4.28 to 5.38 for the other conditions. An analysis of variance with repeated measures comparing Both Feedback to "Other" Feedback (i.e., combined change scores of other conditions) was not statistically significant.

## Table 18

Analysis of Covariance for Session 4 ES-P Change Score

Source of Variation	SS	df	MS	F-Value	Sig.
Covariate					
ES-P Intake Score	135.31	1	135.31	22.63	.001
Cancel/No Show	14.18	1	14.18	2.37	.131
Session 1 to 5 <sup>a</sup>	18.36	1	18.36	3.07	.087
Condition	10.92	1	3.64	.61	.613

<sup>a</sup>This refers to the number of weeks that elapsed from session 1 to 5. In this case, the

time that transpired between session 1 and 5 was not associated with ES-P change scores.

	Source of Variation	SS	df	MS	F-Value	Sig.
Covar	iate					
	ES-N Intake Score	21.65	1	21.65	78.08	.001
	Gender	.81	1	.81	2.92	.095
	Cancel/No Show	.69	1	.69	2.50	.121
	Total Sessions <sup>a</sup>	.96	1	.96	3.45	.070
	Time from Session 1 t	co 5 .88	1	.88	3.17	.082
	Condition	.86	3	.29	1.04	.386
rror		11.65	42	.28		
otal		51.65	50			

Analysis of Covariance for Session 4 ES-N Change Score

<sup>a</sup>Total Sessions is the number of sessions attended for clients at the time data was

collected. This was not associated with ES-N change scores.

Sou	rce of Variation	SS	df	MS	F-Value	Sig.
Covariate						
ES-	N Intake Score	18.63	1	18.63	297.88	.001
Age	;	.18	1	.18	2.90	.098
Axi	s I	.17	1	.17	2.79	.104
Tota	al Sessions	.22	1	.22	3.59	.066
Loc	ation	2.04	5	.41	6.52	.001
Con	dition	.11	3	.04	.61	.612
Error		2.19	35	.06		
otal		37.98	47			

Analysis of Covariance for Session 6 ES-N Change Score

## Eta Square

An ANCOVA previously determined that men were more likely to have terminated than were women and that those who had terminated were more likely to have better therapy outcomes than those who had not terminated (p < .05). By extension, an eta square was utilized to see if these main effects could be upheld and to test the interaction of the three independent variables—LSQ change score, gender, and termination. The LSQ and main effect reported previously was upheld with F(1, 53) =17.14, p < .001. However, neither gender nor the interaction of gender and termination were associated with better treatment outcomes, F(1, 53) = .91 (p = .35) and F(1, 53) = .05 (p = .82), respectively.

#### Chapter 4

## Discussion

#### Summarizing the Results

The clients seen at WPSC had statistically significant improvement in the areas of outcome, as measured by the LSQ, and therapeutic alliance, as measure by the ES-P and ES-N. These improvements were identified regardless of which site a client received therapy or which feedback condition they were assigned to. Terminated cases were also correlated with improved post-test LSQ scores. An *effectiveness* approach, looking at group means, identified one element of clinically significant change—reduction from dysfunctional to the functional range as measured by the LSQ Cutoff Score. Client's who had terminated therapy at the time of data collection nearly met the second element of clinically significant change, the Reliable Change Index, as their group mean improvement of 9.41 was only slightly lower than the 10-point change required.

The *client-focused* approach recognized that 34.48% of clients met the Reliable Change Index for improved LSQ scores at post-test. It also noted that, compared to session 3, the number of session 5 not-on-track clients was reduced by almost half (19.05% and 10.34%, respectively). Although data were limited, ES-P and ES-N improvements, as measured through the *client-focused* approach, had an even higher incidence of clinically significant change, as only one client deteriorated (.09%) while between 29.41% and 80.00% reported clinically significant improvement to the therapeutic relationship. Greatest improvements to the therapeutic alliance were seen from those who continued in therapy until session 5 and from those who originally complained of the presence of negative alliance factors.

Although termination and location influenced LSQ change score and ES-N session 6 change score at the .05 level, respectively, numerous variables met a less stringent .10 confidence level. These variables may have had statistically significant impact on LSQ, ES-P, and ES-N change scores had the study's sample size been larger and/or more missing data had been accounted for. Yet the naturalistic nature of this study implied less control over compliance and other variables that may have impacted limited data.

#### Comments on the Results

Initially, regarding the *effectiveness* approach, it was asked, "Do sample mean change scores, in the areas of outcome and therapeutic alliance, improve over a fairly limited period of time?" The answer appears to be "yes." Results for the LSQ, which monitored symptom changes during the first 5 sessions, indicated 5 sessions provided ample time to detect positive statistically significant treatment outcomes. Furthermore, one criterion for clinically significant change, the Cutoff Score, was met when comparing the sample's mean pre-test and post-test scores.

The ES-P and ES-N were also able to identify statistically significant improvements in the sample means perceived empathy over 2 and 4 therapy sessions, respectively. Fortunately, in the latter case, the original research procedure intended to follow therapy sessions over 7 sessions, thus leading to sufficient session 6 ES-N data to confirm change from session 2 to session 6. Since this duration was equal to what was utilized with the LSQ (session 1 to 5), observing changes over 2 additional sessions does not seem to provide undue leniency to the ES-N subscale.

The second question, although fairly similar to the first, utilized the *client-focused* approach to determine how individuals changed over the course of treatment in the areas of outcome and therapeutic alliance. Regarding the LSQ, not only did the group mean improve by 6 points during the 5 sessions investigated, but over 1/3 (34.48%) of the clients involved met the  $\geq 10$  point change score indicative of Reliable Change. This was about 5 times (6.90%) as many clients as the number that met Reliable Change in the direction of deterioration.

Clinically significant change did not occur with much greater frequency after session 5 when compared to session 3. However, two variables could account for this fact. First, the dose-response literature that forms the foundation form Thompson's (2004) recovery curves clearly indicates that positive therapeutic effects generally occur very rapidly within the first few sessions and then taper off near to a plateau. In fact, Lambert et al. (2001) noted that initial level of severity, as measured by the OQ-45.2, plus change scores from intake to session 3 accounted for 40% of the final variance in client outcomes. In this study, most of the clients who did not reach clinically significant change by session 3 may have required several more sessions for this to occur. This is not uncommon. Thirteen or even 21 sessions may be necessary for 50% of outpatient university clients to reach clinically significant change (see Anderson & Lambert, 2001 and Lambert, Hanson, & Finch, 2001). The second variable potentially impacting the percentage of clients attaining clinically significant change may be qualities of the population. As stated earlier, this author is not aware of other feedback studies investigating a non-student population.

Although there was a modest increase when comparing session 3 to 5 improvements in clinically significant changes (16.33% and 21.21%, respectively), "alert" scores were almost cut in half (19.05% and 10.34%, respectively). As will be discussed later, it is hard to determine which variables may have impacted the reduction of red and yellow "alert" messages during this span of two sessions, but it is valuable to see that those Lambert et al. (2001) regarded as "not-on-track" clients at session 3 seemed, in many cases, to return to typical recovery rates at session 5.

A compliment to the LSQ was in its ability to capture the greater variance of this population while noting changes in client outcomes. This suggests that the LSQ utility as an outcome measure may be similar to the OQ-45.2 despite being a briefer scale and being incorporated with a relatively small, non-student sample.

The ES-P and ES-N clinically significant change data, although less rigorous than that defined for the LSQ, was still very meaningful. Every client, after completing the pre-test ES subscales after session 2, was eligible for deterioration following subsequent administrations. However, only one client on one occasion (.09% of total population) believed that, following initial administration, the therapeutic relationship had worsened. Some studies have demonstrated how specific interventions can improve therapeutic alliance at post-test for a sample (see Hilsenroth, Ackerman, Clemence, Strassle, & Handler, 2002), but this author is not aware of studies that clearly demonstrate how alliance improves at an individual level (i.e., *client-focused*) in a naturalistic setting where interventions are not controlled. At WPCS, it appears that if therapeutic alliance changes over time, it changes for the better. The only potential exception to this lies in ES-N change scores from session 2 to 6, for this is the only of the four investigations that found change scores to not be generalizable across treatment sites. Hence it is possible that mean ES-N improvement is descriptive of several sites and but not all of them. Given the limited sample size, it seems more likely that lack of generalizability is describing one or two therapists rather than a WPCS location.

The extent to which therapeutic alliance improves seems quite remarkable. Of the limited sample who, at pre-test, endorsed alliance low enough to make clinically significant change possible, the majority of these found meaningful improvement 4 sessions later—regardless of the subscale in question (53.33% and 80.00% for the ES-P and ES-N, respectively). Of the sample eligible for clinically significant improvements on the ES-N, a majority (57.14%) met this standard only 2 sessions later.

The point could be raised that ES subscale ceiling and floor effects might make possible the assignment of "perfect" scores to therapists who are merely providing "good," not exceptional, alliance. With the ES-N, for example, clients' endorsement of their therapists' empathy was not significantly different from 0 by session 6. One could argue that the absence of negative empathy after only 6 sessions is a far-fetched. In addition to scale limitations, it may be argued that clients feel a growing desire, regardless of whether or not alliance has improved, to present their therapist in a positive light. If either of these statements were true, the value of individual clients' ES subscale assignments could be seriously compromised. Although more will be said later in this section specifically about ES subscale ceiling and floor effects, regarding these concerns, Burns (1995) stated: "Many [clients] will find it easier to criticize you on paper than when talking to you. They will nearly always mark you down, at least somewhat, if they are upset" (p. 50). Burns (1995) continues by stating: "The more common problem [is that clients] are quite willing to criticize therapists when filling out the ES. Most therapists receive less-than-optimal evaluations from as many as 50% of their [clients], or even more, when they first use the instrument" (p. 50).

Burns' (1995) claims indicate the following: first, although the ES subscales likely restrict the range of ways a client may express therapeutic alliance dissatisfaction, clients are likely to endorse on the ES some degree of dissatisfaction. This opportunity to express dissatisfaction, especially when requested by the therapist at intake, is likely to supersede any fears associated with evaluating their therapist. Second, in Table 12 we discussed the incidence of "perfect" scores clients assigned to their therapists for the ES subscales. Burns (1995) indicated that some complaint expressed on the ES may be provided by 50% or more of clients when this instrument is first employed. This appears consistent with what was seen in this study, in that 65.08% of clients gave less-thanperfect scores to their therapists at pre-test. However, the reduction of imperfect scores at post-test (44.44% and 30.0% for sessions 4 and 6, respectively), coupled with the fact that feedback condition was not correlated with improved ES scores at post-test, indicate that WPCS therapists' clinical intuition may have been sufficient to adjust to their clients alliance needs.

The third major research questioned asked, "What role does experimental condition or other variables play in therapy outcome or relationship?" Although the hypothesis supposed that LSQ feedback and ES feedback would create better therapy outcomes than either alone, and either alone would be greater than none at all, only a variable unrelated to condition, termination, could be substantiated in this study. In large part, the lack of effect for treatment conditions may be explained by insufficient sample size, limited compliance to research procedures (e.g., therapists not reviewing client feedback for the condition wherein that client was assigned), or data not returned to the primary researcher that may have strengthened the power of the analyses.

Regarding termination, it was noted that clients who terminated had significantly greater therapy outcomes than those who had not terminated. It was also noted that men were more likely than women to have terminated at the time of data collection. However, there was no evidence that men had better outcomes than women. Termination results are consistent with Lambert et al. (2001), who claim that clients generally withdraw from therapy when they have experienced significant reduction in the problem areas identified by the OQ-45.2. It appears that the same may be identifiable through the abbreviated OQ-45.2 used in this study, the LSQ.

Regarding the sites used for this study, location was not one of the variables correlated with change scores for the LSQ, ES-P, or ES-N. This may actually be identified as a favorable result, as it suggests that the gains identified on this measures may likely be generalized to all locations where treatment is provided by WPCS. To the extent that other agencies or providers have different policies or procedures, or different clientele, results may not generalize so readily to them.

#### Limitations of the Study: Compliance

Before delving into the drawbacks of less-than-expected compliance, it may be helpful to discuss how compliance limitations may be expected at Western Psychological

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Appendix A

Informed Consent Forms

# Consent to Participate in a Research Study of Mental Health Treatment Provided by Western Psychological and Counseling Services

## To be read to clients before they sign the research informed consent:

Western Psychological and Counseling Services is conducting a study of the effectiveness of counseling. We would like you to participate in that study, and are requesting your agreement to do so. Your participation is intended to help us improve the treatment that we provide. Participation is voluntary, and you may withdraw at any time, but we strongly encourage you to participate.

We believe that it would be helpful for you to know about the study before you provide your consent. This study involves two questionnaires: You have completed the first questionnaire already—the Life Status Questionnaire (LSQ). All Western clients complete the Life Status Questionnaire whether or not they are in the study. The Empathy Scale-Revised is the second questionnaire. This questionnaire allows a client to indicate the extent to which their therapist is listening to and understanding them. It is intended only for Western clients in the study. You will complete it at a later date when you give consent to participate in the study.

The purpose of the study is to determine if providing your counselor with the results of your questionnaire scores is helpful to you in treatment. Although all participants in the study will complete both questionnaires, your therapist may or may not receive the results of your questionnaire. Limiting the number of therapists who receive questionnaire results makes it possible to study the value of the questionnaires. Clients whose therapists do not receive questionnaire results may miss out on insights those questionnaires provide. On the other hand, some clients may experience some discomfort knowing that their therapists are viewing questionnaire results. They may also wonder how the therapist will use the completed questionnaires.

Western Psychological and Counseling Services is committed to the welfare of its clients. This study is designed to uphold that commitment. We believe that this study may show us how to serve you, future Western clients, and clients outside of Western. We request that you sign your name on the accompanying informed consent if you are willing to be involved in the study. Thank you.

## Consent to Participate in a Research Study of Mental Health Treatment Provided by

#### Western Psychological and Counseling Services

The purpose of this study is to examine the role of empathy in the effectiveness of treatment provided by Psychologists and Counselors employed by Western. I am agreeing to participate in this research study by filling out the 16-item Empathy Scale Revised (ES-R) at the end of the 2<sup>nd</sup>, 4<sup>th</sup>, and 6<sup>th</sup> therapy sessions at Western Psychological & Counseling Services in addition to completing the LSQ symptom checklist as required by my insurance plan, Providence Behavioral Healthcare. I understand that my therapist may use the results of the questionnaire to alter his or her treatment approach with me in therapy, and that any changes would be made with the intention to improve therapy. I understand that I may choose to discontinue the use of the ES-R at any time by requesting to discontinue in writing to the Western office where I receive treatment or by declining to complete additional ES-R forms provided by my therapist.

I understand that the purpose of this study is to examine the way my therapist works with consumers in order to improve future treatment and is not specifically related to me and/or my family. Furthermore, I understand that my name and/or family's name will not be listed on the questionnaire or any other form connected to it and that all personal indemnifying information will be removed once all data is collected. I also understand that the ES-R is covered under the same rights of confidentiality applicable to my entire health record. Finally, I understand that the ES-R questionnaire will not by kept as part of my record or file at Western Psychological & Counseling Services.

Exceptions to this agreement:

The ES-R will not be kept as part of my record or file at Western Psychological & Counseling Services and can only be used for the purpose listed in paragraph two.

Client	Da	Date

Therapist\_\_\_\_\_

Date \_\_\_\_\_

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Appendix B

Fax Cover Sheet

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# WESTERN RESEARCH COVER SHEET

то:	FROM: Brett Copeland			
FAX:		801-733-0988 801-733-4713		
# OF PAGES (including this page):				

# **CONFIDENTIALITY STATEMENT**

The information contained in this message is confidential information intended for the use of the addressee listed on the cover sheet. If the reader of this message is not the intended recipient, you are hereby notified that any dissemination, distribution or copy of

this telecopy is strictly prohibited. If you have received this facsimile in error, please notify me immediately by telephone at (801) 733-4713. Thank you.

Appendix C

**Condition Notification Forms** 

Dear: \_\_\_\_\_

I recently received an LSQ fax regarding your client, \_\_\_\_\_\_. This email is not intended to provide you with feedback (e.g. LSQ score) for that client. Instead, it is intended to inform you of the condition or group your client has been randomly assigned to in this study.

Your client has been assigned to the NO FEEDBACK GROUP. THIS MEANS THAT YOU WILL **NOT** BE RECEIVING LSQ OR EMPATHY SCALE FEEDBACK FOR YOUR CLIENT FOR THE DURATION OF THIS STUDY (SESSIONS 1 THROUGH 7).

It is **not** recommended that you apprise this client of the group they have been assigned to. PLEASE ALSO REMEMBER TO HAVE YOUR CLIENT COMPLETE THE EMPATHY SCALE AT THE END OF SESSION #2. THIS PROCEDURE IS CONSISTENT WITH THE UPDATED EMPATHY SCALE INFORMED CONSENT REQUESTING EMPATHY SCALE ADMINISTRATION AT THE END OF SESSIONS 2, 4, AND 6.

If you have further questions about this study, please feel free to contact me. Thank you very much for your participation.

Brett Copeland 8978 Cobblemoor Ln. Sandy, UT 84093-1965 <u>brett\_copeland@byu.edu</u> (801) 422-3035 (work) (801) 733-4713 (home) Dear:\_\_\_\_\_

I recently received an LSQ fax regarding your client, \_\_\_\_\_\_. This email is not intended to provide you with feedback (e.g. LSQ score) for that client. Instead, it is intended to inform you of the condition or group your client has been randomly assigned to in this study.

Your client has been assigned to the LSQ FEEDBACK GROUP. THIS MEANS THAT YOU WILL BE RECEIVING LSQ FEEDBACK BEFORE SESSIONS 4 AND 6 AND YOU WILL **NOT** RECEIVE EMPATHY SCALE FEEDBACK FOR YOUR CLIENT FOR THE DURATION OF THIS STUDY (SESSIONS 1 THROUGH 7).

It is **not** recommended that you apprise this client of the group they have been assigned to. PLEASE ALSO REMEMBER TO HAVE YOUR CLIENT COMPLETE THE EMPATHY SCALE AT THE END OF SESSION #2. THIS PROCEDURE IS CONSISTENT WITH THE UPDATED EMPATHY SCALE INFORMED CONSENT REQUESTING EMPATHY SCALE ADMINISTRATION AT THE END OF SESSIONS 2, 4, AND 6.

If you have further questions about this study, please feel free to contact me. Thank you very much for your participation.

Brett Copeland 8978 Cobblemoor Ln. Sandy, UT 84093-1965 brett\_copeland@byu.edu (801) 422-3035 (work) (801) 733-4713 (home)

Dear:

I recently received an LSQ fax regarding your client, \_\_\_\_\_\_. This email is not intended to provide you with feedback (e.g. LSQ score) for that client. Instead, it is intended to inform you of the condition or group your client has been randomly assigned to in this study.

Your client has been assigned to the EMPATHY SCALE FEEDBACK GROUP. THIS MEANS THAT YOU WILL BE RECEIVING EMPATHY SCALE FEEDBACK BEFORE SESSIONS 3 AND 5 AND YOU WILL **NOT** RECEIVE LSQ FEEDBACK FOR YOUR CLIENT FOR THE DURATION OF THE STUDY (SESSIONS 1 THROUGH 7).

It is **not** recommended that you apprise this client of the group they have been assigned to. PLEASE ALSO REMEMBER TO HAVE YOUR CLIENT COMPLETE THE EMPATHY SCALE AT THE END OF SESSION #2. THIS PROCEDURE IS CONSISTENT WITH THE UPDATED EMPATHY SCALE INFORMED CONSENT REQUESTING EMPATHY SCALE ADMINISTRATION AT THE END OF SESSIONS 2, 4, AND 6.

If you have further questions about this study, please feel free to contact me. Thank you very much for your participation.

Brett Copeland 8978 Cobblemoor Ln. Sandy, UT 84093-1965 brett\_copeland@byu.edu (801) 422-3035 (work) (801) 733-4713 (home) Dear:

I recently received an LSQ fax regarding your client, \_\_\_\_\_\_. This email is not intended to provide you with feedback (e.g. LSQ score) for that client. Instead, it is intended to inform you of the condition or group your client has been randomly assigned to in this study.

Your client has been assigned to the BOTH FEEDBACK GROUP. THIS MEANS

THAT YOU WILL BE RECEIVING LSQ AND EMPATHY SCALE FEEDBACK FOR YOUR CLIENT FOR THE DURATION OF THE STUDY (SESSIONS 1 THROUGH 7). You may expect LSQ feedback to arrive before sessions 4 and 6 and Empathy Scale feedback before sessions 3 and 5.

It is **not** recommended that you apprise this client of the group they have been assigned to. PLEASE ALSO REMEMBER TO HAVE YOUR CLIENT COMPLETE THE EMPATHY SCALE AT THE END OF SESSION #2. THIS PROCEDURE IS CONSISTENT WITH THE UPDATED EMPATHY SCALE INFORMED CONSENT REQUESTING EMPATHY SCALE ADMINISTRATION AT THE END OF SESSIONS 2, 4, AND 6.

If you have further questions about this study, please feel free to contact me. Thank you very much for your participation.

Brett Copeland 8978 Cobblemoor Ln. Outcome and Process Feedback 73

Sandy, UT 84093-1965 brett\_copeland@byu.edu (801) 422-3035 (work) (801) 733-4713 (home) Outcome and Process Feedback 74

Appendix D

Empathy Scale Feedback Form

I recently received a fax regarding one of your clients. Below is the LSQ score and the message that corresponds to that score for the client listed below. Please make sure to review this information prior to your next session. Additionally, please remember to have your client complete the Empathy Scale at the conclusion of session # \_\_\_\_, conceal it in one of the provided envelopes, and have the Office Manager fax it to me, Brett Copeland, at (801) 733-0988. Thank you.

Client Name: \_\_\_\_\_ I.D. #: \_\_\_\_\_

LSQ Score: \_\_\_\_\_

Color Code: Blue

Color Code Message:

This patient is having an unusually rapid, positive treatment response and is expected to end treatment as markedly improved and maintain treatment gains for at least six months.

I recently received a fax regarding one of your clients. Below is the LSQ score and the message that corresponds to that score for the client listed below. Please make sure to review this information prior to your next session. Additionally, please remember to have your client complete the Empathy Scale at the conclusion of session # \_\_\_\_\_, conceal it in one of the provided envelopes, and have the Office Manager fax it to me, Brett Copeland, at (801) 733-0988. Thank you.

Client Name: \_\_\_\_\_ I.D. #: \_\_\_\_\_

LSQ Score: \_\_\_\_\_

Color Code: White

Color Code Message:

The patient is functioning in the normal range. It is unlikely that prolonging therapy will result in further treatment gains. Consider termination.

Dear

I recently received a fax regarding one of your clients. Below is the LSQ score and the message that corresponds to that score for the client listed below. Please make sure to review this information prior to your next session. Additionally, please remember to have your client complete the Empathy Scale at the conclusion of session # \_\_\_\_, conceal it in one of the provided envelopes, and have the Office Manager fax it to me, Brett Copeland, at (801) 733-0988. Thank you.

Client Name: \_\_\_\_\_ I.D. #: \_\_\_\_\_

LSQ Score: \_\_\_\_\_

Color Code: Green

Color Code Message:

Although the patient has not yet recovered, his/her progress appears to be on track. Progress is judged to be within the range of expected response. Further progress is expected.

I recently received a fax regarding one of your clients. Below is the LSQ score and the message that corresponds to that score for the client listed below. Please make sure to review this information prior to your next session. Additionally, please remember to have your client complete the Empathy Scale at the conclusion of session # \_\_\_\_\_, conceal it in one of the provided envelopes, and have the Office Manager fax it to me, Brett Copeland, at (801) 733-0988. Thank you.

Client Name: \_\_\_\_\_ I.D. #: \_\_\_\_\_

LSQ Score: \_\_\_\_\_

Color Code: Yellow

Color Code Message:

The rate of change the patient is making is less than expected. This patient may end up with no significant benefit from therapy. It is recommended that you be alert to the possible need to improve the therapeutic alliance, reconsider the client's readiness for change and the need to renegotiate the therapeutic contract, intervene to strengthen social supports, or possibly alter your treatment plan by intensifying treatment, or shift intervention strategies. Continue to carefully monitor treatment progress.

I recently received a fax regarding one of your clients. Below is the LSQ score and the message that corresponds to that score for the client listed below. Please make sure to review this information prior to your next session. Additionally, please remember to have your client complete the Empathy Scale at the conclusion of session # \_\_\_\_\_, conceal it in one of the provided envelopes, and have the Office Manager fax it to me, Brett Copeland, at (801) 733-0988. Thank you.

Client Name: \_\_\_\_\_ I.D. #: \_\_\_\_\_

LSQ Score: \_\_\_\_\_

Color Code: Red (A)

Color Code Message:

The patient is not making the expected amount of progress. Chances are they may drop out of treatment prematurely or have a negative treatment outcome. Steps should be taken to carefully review this case and identify reasons for poor progress. It may be helpful to assess the quality of the therapeutic alliance, the client's motivation, social support network, or decide upon a new course of action, such as referral for medication or intensification of treatment. The treatment plan may need to be reconsidered.

I recently received a fax regarding one of your clients. Below is the LSQ score and the message that corresponds to that score for the client listed below. Please make sure to review this information prior to your next session. Additionally, please remember to have your client complete the Empathy Scale at the conclusion of session # \_\_\_\_, conceal it in one of the provided envelopes, and have the Office Manager fax it to me, Brett Copeland, at (801) 733-0988. Thank you.

Client Name: \_\_\_\_\_\_ I.D. #: \_\_\_\_\_

LSQ Score: \_\_\_\_\_

Color Code: Red (B)

Color Code Message:

The patient is not making the expected level of progress. Chances are they may drop out of treatment prematurely or have a negative treatment outcome. Steps should be taken to carefully review this case and identify reasons for poor progress. It may be helpful to assess the quality of the therapeutic alliance, the client's motivation, social support network, or decide upon a new course of action, such as referral for medication or intensification of treatment. The treatment plan may need to be reconsidered. The patient is clearly in need of further help but the treatment is not having the expected positive impact and is not likely to have a positive result unless a way is found to strengthen the impact of treatment.

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Appendix F

Curriculum Vita

# Curriculum Vita

# Brett T. Copeland, M.A.

8978 Cobblemoor Lane Sandy, UT 84093 (801) 733-4713 copeland.brett@gmail.com

# **Education**

2001-Present	<b>Student in Clinical Psychology Psy.D. Program</b> Graduate School of Clinical Psychology, <b>APA Accredited</b> George Fox University, Newberg, Oregon
2001-2003	Master of Arts in Clinical Psychology Graduate Program of Clinical Psychology George Fox University, Newberg, Oregon

- 2000-2001 **Bachelor of Science, Psychology** Brigham Young University, Provo, UT
- 1995 &Associates of Arts, Psychology
- 1998-1999 Ricks College, Rexburg, ID

# Awards & Honors

2004	Richter Scholars Research Grant
1999-2000	National Dean's List: Awarded for 4.0 GPA. Ricks College, Rexburg, ID
1/00-5/00	Service Award for teaching and assembly preparation at North Star Elementary School.
9/99-12/99 &	Dean's List
1/99-5/99	Ricks College, Rexburg, ID
1998	Scholarship, L.D.S. Church: For exceptional service during mission and supervision of 17 missionaries.

#### **APA Accredited Internship**

2005-2006 Brigham Young University: Counseling & Career Center, Provo, UT. Participated in a full-time pre-doctoral internship. Services rendered included psychotherapy (individual, couples and group) and assessment (personality and career). Additional provisions included outreach and consultation, intake interviews, emergency services, supervision of practicum students, and Student Health Center rotation as well as other rotations. Internship also provided didactic training 6 hours weekly and 4 weekly hours of individual supervision.

#### Rotations:

 Teaching rotation: Co-taught 117 Career Exploration and codeveloped and taught 317 Graduate School Preparation. Responsibilities included curriculum development, lecturing, examinations, and coordination of undergraduate student projects.

Supervisors: Richard Heaps, Ph.D., ABPP, Licensed Counseling Psychologist and Maureen Rice, Ph.D. Licensed Counseling Psychologist.

2) Career rotation: Served in the Brigham Young University University Advisement Center and Career Learning & Information Center. Duties included specializations in open major advisement, development of graduate application assistance program, and conducting program evaluations of the Health Professions Advisement Center, Counseling and Career Center, and advising offered by advisors at three different universities. These program evaluations resulted in presentations to the President of Brigham Young University, the American Psychological Association, and a regional National Academic Advising Association, respectively. Further tasks involved administration and interpretation of career instruments, job placement assistance and Career Fair assembling.

Supervisor: Vaughn Worthen, Ph.D., Licensed Counseling Psychologist

#### Group Experience:

Co-led psychoeducational group teaching self-esteem strategies, a general therapy group, and three sexual concerns groups dealing with masturbation and pornography addiction.

Supervisors: Barbara Morrell, Ph.D., Licensed Counseling Psychologist, Steve Smith, Ph.D., Licensed Counseling Psychologist, Rick Moody, Psy.D., Licensed Clinical Psychologist, and Tyler Pedersen, Ph.D., Licensed Counseling Psychologist.

Primary Supervisor: Vaughn Worthen, Ph.D. Licensed Counseling
Psychologist
Secondary Supervisors: Dianne Nielsen, Ph.D. Licensed Clinical
Psychologist, Michael Buxton, Ph.D., Licensed Marriage and Family
Psychologist, Lynne Bennion, Ph.D., Licensed Counseling
Psychologist, and James MacArthur, Ph.D., Licensed Counseling
Psychologist.

#### **Total Clinical Hours: 2000**

## Supervised Practicum Experience

 Preinternship (Total Hours: 975)
 1) Newberg School District, Newberg, OR Conducted psychoeducational assessment for students within the school district with emphasis on high school students. Used Woodcock Johnson-III, Wechsler Intelligence Scale for Children-III and IV and Wechsler Individual Achievement Test-II. Supervised 1<sup>st</sup> and 2<sup>nd</sup> year Psy.D. students in their practicum work. Received weekly individual and group supervision.

Supervisor: Nancy Zamirah, Psy.D., Licensed Clinical Psychologist

2) George Fox University: Career Services, Newberg, OR Provided career assessment and counseling to students, faculty, alumni and community members. Administered and assessed Strong Interest Inventory, 16 PF, Sigi Plus and Career Direct. Educated nontraditional students in career search and placement. Directed graduate program search and application process. Performed other duties associated with vocational and educational pursuits. Received weekly supervision.

Supervisors: Stan McCleary III, Ph.D., Licensed Counseling Psychologist & Bonnie Jerke, MA, GCDF, MCDP

 2003-2004 Practicum II (Total Hours: 573)
 1) Cascade College, Portland, OR Provided individual psychotherapy to students and community members. Administered psychological and cognitive/intellectual assessment. Consultation/orientation for incoming freshmen highlighting college adjustment and vocational training. Conducted a psychoeducational group focusing on principles of success including setting and reaching goals, a process group discussing family issues, and a men's issues group instructing interpersonal training and anger management. Received weekly individual and group supervision.

Supervisor: Juliana Ee, Ph.D., Licensed Clinical Psychologist.

2) George Fox University: Health & Counseling, Newberg, OR Provided outpatient service to an undergraduate student within the health and counseling center. Direct service included clinical interview, diagnosis and individual psychotherapy. Responsibilities entailed report writing and consultation. Received weekly individual and group supervision.

Supervisors: Clark Campbell, Ph.D., Licensed Clinical Psychologist & Nathan Henry, M.A.

2002-2003 **Practicum I** (Total Hours: 625) <u>Columbia River Mental Health, Vancouver, WA</u> Provided individual psychotherapy—emphasizing the Brief therapy model—to adults in community mental health. Treated culturally diverse clients with multiple diagnoses of Axis I and II disorders. Developed the structure for a psychoeductional group that places emphasis on setting and reaching goals. Co-facilitated an anger management group promoting practical strategies for mood stabilization and appropriate response to hostility in others. Received weekly individual and group supervision.

Supervisor: Doug Park, Ph.D., Licensed Clinical Psychologist.

2001-2002 **Pre-practicum** (Total Hours: 60) <u>George Fox University: Health & Counseling, Newberg, OR</u> Formal didactic instruction and development of essential therapy skills. Duties included diagnoses, intake interviews, treatment plans and individual psychotherapy to undergraduate students. Receive weekly individual and group supervision.

Supervisor: Carol Dell'Oliver, Ph.D., Licensed Clinical Psychologist.

**Total Clinical Hours: 2243** 

# **Relevant Clinical Experience**

10/02	<ul> <li>Depression Screener</li> <li>National Depression Screening Day, Providence Newberg Hospital, Newberg, OR</li> <li>Assessed members of the community for depression, Bipolar Disorder, Generalized Anxiety Disorder and PTSD. People who endorsed symptoms conducive with the preceding disorders were educated regarding symptomology, given pamphlets containing additional information and were referred to mental health therapists residing near the community.</li> </ul>
6/00-8/01	<b>Resident Assistant</b> Olympus Care Center, Sugarhouse, UT Assisted low-functioning adults in an inpatient setting. Elected to conduct weekly presentations related to personal and spiritual development.
1/00-6/00	Youth Aide University of Utah Neuropsychiatric Center, Salt Lake City, UT Directed children between 8 and 18 in school related activities at an outpatient setting. Supervised, counseled and provided guidance in appropriate language, behavior and study habits.
1/00-6/00	Youth Assistant Child Crisis Center, Salt Lake City, UT Assisted in counseling, observing, and directing abused children in their daily activities in an outpatient setting.
<u>Relevant Work</u>	Experience
5/02-2/04, 1/00-6/00 &	<b>Sunday School Instructor</b> , Salt Lake City, UT & Newberg, OR Taught adults and adolescents in weekly lessons.

6/98-9/98

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#### 9/02-5/03 Peer Mentor

George Fox University, Newberg, OR Provided peer support and mentoring to a 1<sup>st</sup> year Psy.D student in her graduate work.

12/01-5/02	Seminary Instructor, Newberg, OR
	Taught religious course to 10 sophomore high school students.

- 6/00-8/01 **Clinical Documentation Auditor** Cornerstone Counseling Center, Salt Lake City, UT Assessed the accuracy of the centers clinical notes and corrected discrepancies between the notes and client billing. Assisted in creating and re-designing the centers auditing procedures.
- 6/00-8/01 **Young Men's Leader**, Salt Lake City, UT Presided over church-related activities for boys between ages 12 to 18. Activities included service projects, Boy Scout programs, growth groups and various presentations.
- 8/99-12/99 Spiritual & Temporal Committee Chairperson, Rexburg, ID Supervised programs designed to administer emergency relief, assistance to the poor and elderly, and organized community projects.

# 7/96-6/98MissionaryServed a volunteer mission to Salt Lake City, Utah for the L.D.S.<br/>Church. Activities included presentation of a spiritual message,<br/>service in the community and various leadership responsibilities.

# **Teaching Experience**

9/05-9/06	Co-Instructor
	Brigham Young University, Provo. UT.
	Co-led 117 Career Exploration and co-piloted 317 Graduate School
	<i>Preparation</i> courses as part of student development. Course duties included curriculum development, lecturing, examinations, and overseeing undergraduate student projects, e.g. web searches and information interviews.
4/05	Guest Lecturer
	Brigham Young University, Provo, UT and George Fox University,
	Newberg, OR.
	Instructed 15 times on the topic, <i>How to get into Graduate School</i> to undergraduate students.
2/05	Youth Conference Speaker
	Church of Jesus Christ of Latter-Day Saints, Newberg, OR.
	One of four individuals selected in a region to speak on the topic: "How to Create a Spiritual Experience." Audience included 170 young persons between the ages of 14 and 18 and their leaders.

1/04-3/04	Adjunct Professor Department of Psychology, Chemeketa Community College, McMinnville, OR. PSY 237 <i>Life Span Development</i> . Responsibilities included curriculum development, lecturing, examinations, and coordination of undergraduate student projects.
3/04	<b>Guest Lecturer</b> Department of Psychology, George Fox University, Newberg, OR. <i>General Psychology</i> . Introduced the etiology of mental disorders as defined through various theories.
11/03	<b>Guest Lecturer</b> Department of Psychology, Cascade College, Portland, OR. <i>Developmental Psychology</i> . Presented a lecture on how family dynamics influence children.
10/03	<b>Guest Lecturer</b> Department of Psychology, George Fox University, Newberg, OR. <i>Advanced Counseling</i> . Delineated a history of Cognitive-Behavioral theories and interventions.
10/03	<b>Guest Lecturer</b> Department of Psychology, George Fox University, Newberg, OR. <i>General Psychology</i> . Discussed physiological underpinnings of sleep and dreaming.
9/03	<b>Guest Lecturer</b> Department of Psychology, George Fox University, Newberg, OR. <i>Personality Theory</i> . Outlined various theories of human motivation.
11/02-12/02	<b>Teaching Assistant</b> Department of Psychology, George Fox University, Portland, OR. Led small group in a M.A. program specializing in Marriage & Family Therapy. Oversaw group in the application of marital therapy techniques, supervised role plays, fostered group discussion and provided materials emphasizing Cognitive-Behavioral treatment of family and marital discord. Supervisor: Brian Shaw, Ph.D.
9/01-12/01	<b>Teaching Assistant</b> Department of Physical Education, George Fox University, Newberg, OR. <i>Wallyball</i> . Supervised and instructed students in the fundamentals of the sport.

# 1/00-5/00 Teaching Assistant

North Star Elementary School, Salt Lake City, UT. Substitute teaching of 2<sup>nd</sup> grade students, monitored students' progress, and offered individualized instruction.

# **Research Experience**

# 9/02-Present Vertical Research Team Member

Graduate School of Clinical Psychology, George Fox University, Newberg, Oregon.

Weekly team meetings focusing on research in the areas of outcome response and spiritual/formation issues. Duties include presenting literature reviews and providing consultation with respect to methodology, statistical analysis and formulation of hypotheses.

Dissertation: *Outcome and Process Measure Feedback as They Effect Therapy Outcomes*.

Status: Preliminary defense completed 4/05. Data Analysis completed 8/06. Final Oral Defense scheduled 12/06.

This dissertation employed the results of the abbreviated Outcome Questionnaire-45, the Life Status Questionnaire, and Empathy Scale to study treatment outcomes through the use of "feedback" (i.e. sharing client questionnaire results with their therapists to provide treatment insight). In addition to the variables explored in other feedback studies (i.e. questionnaire responses and attrition rates), my study examined client age and gender, the incidence of "no shows", client-induced cancellations, client termination status, and elapsed time between the 1<sup>st</sup> and 5<sup>th</sup> session, the total number of sessions, and the impacts of location and Axes I, II, and V on treatment outcomes and therapeutic alliance.

Supervisor: Rodger Bufford, Ph.D.

# 9/05-9/06 Researcher

Brigham Young University, Provo, UT. Led three program evaluations resulting in presentations to the American Psychological Association, Rocky Mountain regional National Academic Advising Association, and President of Brigham Young University.

#### 3/03-4/03 **Research Assistant**

Crater Elementary, Newberg, OR. Interviewed and tested 41 children ages 6 through 12 as part of a dissertation project. Responsibilities included conducting an informal interview of each child, administering the TOVA neurological test, making behavioral observations and recording their responses to the test.

Supervisor: Kent Rosengren, M.A.

#### 1/01-5/01 Research Assistant

Brigham Young University, Provo, UT Worked with Provo, UT school district to determine consistency between students and teachers/faculty regarding the effectiveness of after-school education programs.

Supervisor: Steve Wygant, Ph.D.

#### **Presentations**

- **Copeland, B.,** Bramble, C., Bates, C., & Campbell, M. (2006, Aug.). *Program Evaluation of the Brigham Young University Health Professions Advisement Center*. Presented to the Brigham Young University Counseling and Career Center, Vice President of Student Affairs, and to the university President.
- Smart, D., Isakson, R., Pedersen, T., Copeland, B., Jones, M., Seager, M., & Ennis, K. (2006). Evaluating Responses to a Treatment Monitoring System. Presented to Aug. 2006 annual meeting of the America Psychological Association, New Orleans, LA.
- **Copeland, B.** (2006, Feb.). *Graduate school advisement: Why not start with freshman?* Presented to Feb. 2006 Rocky Mountain regional NACADA at Albuquerque, NM.
- Bufford, R., O'Friel, M., Lonigan, G., Krzich, J., Janzen, D., Harrier, A., Harmon, M., & Copeland, B. (2004, July). *Right-wing authoritarianism revisited: Religious* correlates of RWA factor scales. Presented at the 2004 annual meeting of the American Psychological Association, Honolulu, HI.
- Wygant, S., **Copeland, B...**(2000, Dec.). *Perceptions regarding after-school education programs*. Presented to the Provo School District in Provo, UT.

# **Membership and Professional Affiliations**

11/01-Present	Graduate Student Affiliate, American Psychological
	Association

# Additional Clinical Training

6/06	Core Competencies: Suicide Risk Assessment, Clinical Management, Treatment and Documentation. M. David Rudd, Ph.D., ABPP., Provo, UT.
2/06	<u>Prepare for the Future by Learning About the Past: A Survey of</u> <u>Behavioral Science Graduates</u> . Hannah Thomson, Laura Clay, and Corban Raun, Albuquerque, N.M.
2/06	Creating Your Own Advising Manual. Jennifer Shewmake, Albuquerque, N.M.
2/06	Conducting Advising Research and Constructing a NACADA Grant Proposal. Sharon Aiken-Wisniewski, Ph.D., Albuquerque, NM.
2/06	<u>The Problem is Not the Problem; the Problem is Your Attitude About</u> <u>the Problem: Dealing with Change.</u> Ruth Harrison and Megen Ralphs, Albuquerque, NM.
1/06	Negotiating the Therapeutic Alliance. Christopher Muran, Ph.D., Provo, UT.
1/06	<ul> <li><u>Utah Counseling Center Conference.</u> Park City, UT.</li> <li>Attended several workshops on topics such as understanding psychotropic medications as they effect counseling center clients, utilizing the RELATE instrument in couples counseling, and so forth.</li> </ul>
10/05	<u>Newly Revised Strong Interest Inventory Tool for Career Assessment.</u> Catherine Holmes, M.S., Provo, UT.
4/05	Motivational Interviewing: Theory, Practice, and Evidence. Denise Walker, Ph.D., Newberg, OR
10/04	Acceptance and Commitment Therapy (ACT). Vijay Shankar, Psy.D., and Anne Shanker, MSSW, Newberg, OR
6/04	WISC-IV: An Overview and Discussion of Changes. Jerome Sattler, Ph.D., ABPP/CL, Newberg, OR

6/04	Wide-Range Assessment of Memory and Learning-2. Wayne Adams, Ph.D., ABPP, Newberg, OR
10/03	Dialectical Behavioral Therapy: An Introduction. Brian Goff, Ph.D., Newberg, OR
5/03	Current Guidelines for Working with Gay, Lesbian, and Bisexual Clients. Carol Carver, Ph.D., Newberg, OR
3/03	Using Psychological Knowledge and Skills to Consult with Businesses. Steven T. Hunt, Ph.D., Portland, OR
2/03	Counseling Issues of the Soul: Guilt, Loneliness and Despair. William C. Buhrow, Jr., Psy.D., Newberg, OR
10/02	Assessment and Treatment of Traumatized Children. Sophie Lovinger, Ph.D., Newberg, OR
10/02	Integration of Religion and Psychotherapy: Explicit, Implicit, or What? Robert Lovinger, Ph.D., Newberg, OR
10/01	Starting your own Private Practice. Paul Stolzfus, Psy.D., Newberg, OR

# **Relevant Coursework**

#### Core Courses:

Biological Basis of Behavior Ethics for Psychologists History & Systems of Psychology Human Development Learning, Cognition & Emotion Psychometrics Psychopathology Research Design & Outcome Evaluation Social Psychology Statistics Theories of Personality & Psychotherapy

# **Clinical Theory and Practice:**

Child/Adolescent Psychotherapy Cognitive-Behavioral Psychotherapy Family/Couples Therapy Gender Issues Human Sexuality & Sexual Dysfunction Industrial/Organizational Psychology Multicultural Psychotherapy Prepracticum Psychodynamic Psychotherapy Psychopharmacology Sports Psychology

### Clinical Assessment:

Advanced Career Counseling (assessment emphasis) Career Assessment & Counseling Cognitive & Intellectual Assessment Forensic Psychology Personality Assessment Neuropsychological Assessment

#### **Religion Courses:**

Christian Theology Historical Christianity Integration Seminar New Testament Old Testament Spiritual Formation Systems of Integration: Theory & Therapy World Religions

# **Psychological Testing**

#### Adults:

Measure	# Administered	# Reports
16PF	4	3
Beck Depression Inventory	1	0
Burn's Outcome Questionnaire	26	1
Campbell Interest & Skills Survey	4	0
Career Direct	8	1
Finger Recognition Test	3	2
Finger Tip Number Writing	3	2
Finger Tapping Test	3	2
FIRO-B	4	4
Grip Strength	3	2
Meyers Briggs Type Indicator	5	0
Millon Clinical Multi-Axial Inventory-III	6	6
Mini Mental Status Exam	4	1
MMPI-2	8	8
Outcome Questionnaire (45.2)	23	2
Personality Assessment Inventory	6	_4

Rey 15-Item test	1	0
Rex Complex Figure	2	1
Seashore Rhythm Test	1	0
Self Directed Search	3	0
Sentence Completion task	5	5
Sigi Plus	5	1
Strong Interest Inventory-Revised	10	1
Strong Interest Inventory-III	8	0
Student Adjustment to College Questionnaire	7	0
Symptom Assessment (45)	8	0
Tactual Performance Test	2	1
Thematic Apperception Test	5	5
Trail Making Test	3	2
Wechsler Adult Intelligence Scale-III	7	7
Wechsler Memory Scale-III	4	4
Wechsler Individual Achievement Test-II	5	5
Wide Range Intelligence Test	3	3
Wide Range Achievement Test-II	2	2
Wisconsin Card Sort	1	0

# Children:

Measure	# Administered	# Reports
Achenbach Behavioral Assessment	12	3
Adaptive Behavior Assessment System-II	4	1
Behavioral Rating Inventory of Executive Functioning	6	2
Brown Attention-Deficit Scale	6	2
Outcome Questionnaire (45.2)	6	1
Peabody Picture Vocabulary Test-III	1	1
Symptom Assessment (45)	2	0
Tova	41	0
Wechsler Individual Achievement Test-II	4	4
Wechsler Intelligence Scale for Children-III	4	4
Wechsler Intelligence Scale for Children-IV	2	2
Wide Range Assessment of Memory & Learning	2	2
(WRAML)		
Woodcock Johnson-III Cognitive Tests	16	16
Woodcock Johnson-III Tests of Achievement	18	18