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THERAPIST PARAPHRASES AND COMMON FACTORS: EVIDENCE FOR
CAUSALITY

By

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Abstract

Therapist paraphrases are integral to clinical interviewing and are believed to promote common-factor variables like empathy and congruence. However, few studies have used an experimental design to examine therapist paraphrases independent of other treatment components. The purpose of this study was to study the degree to which therapist paraphrases influence outcome expectancy, treatment credibility, empathy, congruence, and the working alliance compared to another verbal response type: the minimal encourager. Participants were assigned to hear two therapy interactions in a random order. These interactions contained different levels of therapist paraphrases and minimal encouragers. Multivariate analyses revealed that paraphrases generally resulted in more favorable perceptions of therapy interactions. Follow-up analyses revealed that paraphrases generally produced higher scores across all variables, but the difference was statistically significant only for empathy and congruence. These results provide evidence that paraphrases make therapists appear more empathetic and congruent, at least compared to using minimal encouragers alone.

Keywords: psychotherapy, reflection, restatement, paraphrase, empathy, congruence, alliance, expectancy, credibility

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Therapist Paraphrases and Common Factors: Evidence of Causality

Research has established the overall effectiveness of psychotherapy although the source of this effectiveness remains a matter of debate (Lambert, 2013; Wampold & Imel, 2015). Despite widespread efforts to devise and disseminate treatment-specific techniques, much of the variance in client outcomes is attributable to factors common to all psychotherapies rather than to the techniques of any specific approach (Lambert, 2013). Specific techniques account for 1% to 17% of outcome variance; common factors account for 30% to 50% (Cuijpers et al., 2012; Lambert, 2013; Wampold, 2015). Examples of common factors include outcome expectations, treatment credibility, and therapist empathy (Leibert & Dunne-Bryant, 2015). Although specific techniques remain integral to psychotherapy, the common factors have received increased attention recently, as evident in databases that report publication trends (e.g., Web of Science).

Outcome expectations are beliefs about the effectiveness of treatment and are closely related to treatment credibility—beliefs about the reputability of a treatment. In theory, clients seek treatment because they believe psychotherapy to be effective, and these beliefs solidify as they work with therapists they perceive as credible (Beshai et al., 2019; Wampold & Imel, 2015, pp. 57-59). Expectancy and credibility are highly related, but distinct, constructs (Haanstra et al., 2015). Both increase following psychoeducation, and both are positively correlated with treatment outcomes (Beshai et al., 2019; Constantino, Coyne, et al. 2018; Constantino, Višlă, et al. 2018). Although permissive of third variables, these findings provide evidence (a) of covariation between expectancy and outcome and (b) of the temporal precedence of expectancy.

Relationship factors also correlate positively with outcome and include constructs such as empathy, congruence, and the working alliance. Carl Rogers (1957, 1992) defined empathy as experiencing the emotions of others and congruence as being genuine and free of façade. Bordin (1979) defined working alliance (also called therapeutic alliance or just alliance) as the ability of the therapist and client to reach consensus on the goals and tasks of therapy and to experience emotional bonding. Various meta-analyses have demonstrated that empathy, alliance, and congruence each correlate positively with psychotherapy outcomes (Elliot et al., 2018; Horvath

et al., 2011; Kolden et al., 2018). Furthermore, longitudinal studies have demonstrated that alliance and empathy in initial sessions predict post-treatment outcomes (Labouliere et al., 2017; McClintock et al., 2018). The relationship between alliance and outcomes persists even after controlling for initial symptom severity—a possible third variable (Labouliere et al., 2017). Although still permissive of third variables, these findings suggest that therapy techniques intended to promote expectancy, empathy, congruence, and alliance could be beneficial.

The reflection and the restatement are two therapist verbal-response techniques believed to promote these common factors. Both techniques require therapists to paraphrase client statements, but reflections are paraphrases of emotional content, and restatements are paraphrases of non-emotional content (Hill, 1978, 2019). Some researchers distinguish between the two (e.g., Goates-Jones et al., 2009; Rautalinko, 2013), but others group them into a single verbal-response category called *paraphrases* (e.g., Anvari et al., 2019). Paraphrases are integral to specific therapies such as motivational interviewing and to clinical interviewing in general (Miller & Arkowitz, 2015; Sommers-Flanagan & Sommers-Flanagan, 2017, pp. 130-139). Paraphrase usage has been associated with improved goal setting and emotional expression in clients (Anvari et al., 2019; Hunt et al., 2015; Rautalinko et al., 2007), decreased intimate-partner aggression (Woodin et al., 2012), and strengthened therapeutic alliances (Rautalinko et al., 2007). However, these studies are correlational in nature and fail to rule out third variables.

Most experimental studies involving the paraphrase technique have failed to provide sound evidence for the independent utility of paraphrases because entire treatment packages—rather than their specific techniques—were the manipulated variables. For example, Stain et al. (2016) found that a common factor control called non-directive reflective listening was superior to cognitive-behavioral therapy at reducing psychosis-related distress, but this randomized-control trial could not establish the effectiveness of paraphrases independent of other treatment components (e.g., congruence). Similarly, experimental trials for motivational interviewing are unable to reveal the unique contributions of paraphrases compared to techniques such as open-ended questions and affirmations (Lee et al., 2019; Strait et al., 2019). In the absence of

experimental dismantling studies, the evidence that paraphrases produce changes in relationship variables, outcome expectations, and treatment credibility is limited.

Few laboratory experiments have manipulated paraphrases specifically. In a structured search of the PsycINFO database, which included search terms such as *reflection of feelings*, *reflection*, *restatement*, and *empathic reflection*, only a few studies have used an experimental design to study therapist paraphrases. In two independent samples, Rautalinko (2013) randomly assigned participants to read transcripts or hear audio recordings of therapy interactions that contained different levels of therapist paraphrases and open-ended questions. Overall, participants evaluated sessions more positively when therapists paraphrased more frequently, but statistically significant differences in working alliance ratings only occurred when participants read transcripts; no other relationship variables were studied. In a study on clinical interviewing, Seehausen et al. (2012) found that clients who heard paraphrases between interview questions felt more positively after the interview than clients who heard nothing (i.e., therapist was silent between questions), though relationship variables were not examined in this study. In an experimental trial of a computerized intervention for alcohol use, Grekin et al. (2019) found that delivering empathic reflections through an animated narrator reduced alcohol-related consequences; relationship variables were not measured. Although these results provide some preliminary evidence for the independent utility of paraphrases, additional research is needed to confirm the degree to which paraphrases influence relationship variables, outcome expectations, and treatment credibility.

The purpose of this study was to examine the effect of therapist paraphrases on empathy, congruence, alliance, outcome expectation, and treatment credibility. To align with previous research, this study employed a design similar to Rautalinko (2013) but included additional dependent-variable measures. To increase external validity, this study included a racially diverse sample and included both marital discord and depression as presenting problems in the stimulus materials. Participants were randomly assigned to hear two psychotherapy interactions with different levels of paraphrases and minimal encouragers. They then completed established

observer report measures of the dependent variables. Hypothesis 1 was that therapist paraphrases would result in greater perceived empathy. Hypothesis 2 was that therapist paraphrases would result in greater perceived congruence. Hypothesis 3 was that therapist paraphrases would result in greater perceived alliance. Hypothesis 4 was that therapist paraphrases would result in higher outcome expectations. Hypothesis 5 was that therapist paraphrases would result in higher treatment credibility.

Methods

Participants

Participants were selected through an undergraduate subject pool and consisted of students enrolled in psychology courses at The University of Memphis. Of the 224 students consented to participate, only 143 listened to all of the manipulation. Because the inclusion of nonadherent participants can weaken even well-established effect sizes (Peer et al., 2017), only participants who heard the full manipulation were included in the final analyses. Adherence was similar between experimental conditions, $\chi^2 (N = 224) = .086, p = .769$. Four other participants were excluded because they did not complete the dependent-variable measures. Of the participants included in the final sample, 108 (77.7%) were female, 20 (14.4%) were male, 3 (2.2%) were neither male nor female, and 8 (5.8%) did not respond to demographic questions. Participants identified as White ($n = 72, 51.8%$), Black ($n = 28, 20.1%$), Hispanic ($n = 16, 11.5%$), Multiracial ($n = 8, 5.8%$), Asian ($n = 6, 4.3%$), or other ($n = 1, 0.7%$). The average age was 22.18 ($SD = 16.13$), and the median age was 19. The median completion time was 30 minutes and 27 seconds. Due to local health guidelines related to the COVID-19 pandemic, participants completed the study remotely. Participants received compensation in the form of research participation credit, which can count toward course credit in a way determined by the course instructor. Procedures for this study were approved by the Institutional Review Board of The University of Memphis (PRO-FY2020-416).

Measures

The Working Alliance Inventory – Observer Form (Darchuk et al., 2000; Horvath, 1990)

contains three subscales intended to measure Bordin's (1979) three-part model of the therapeutic alliance, consisting of goal agreement, task agreement, and emotional bonding. Because the therapist interactions within this study involved neither goals nor tasks, only the bond scale, which has nine items (three reverse scored), was included. Items were assessed on a seven-point scale (from *never* to *always*). Items were averaged to create a total score that ranged from 1 to 7. The observer form has high internal consistency (.98) and inter-rater (.92) reliability (Cecero et al., 2001; Tichenor & Hill, 1989), and internal consistency in this sample was comparably high (.94). Previous research has demonstrated that observer-report alliance measures correlate with outcome almost as well as client-report measures (Horvath, 2001).

The empathy and congruence scales of the Barrett-Lennard Relationship Inventory (Barrett-Lennard, 2015) measure the empathy and congruence that one person displays toward another. On the observer form, each scale contains 10 items evaluated on a six-point numeric scale (from -3 to +3, with no 0). Items for each scale were averaged to form total scores that ranged from -3 to +3. In previous iterations of the measure, test-retest and split-half reliability were high for both scales (Barrett-Lennard, 1962; Mills & Zytowski, 1967). Client- and observer-report measures of empathy and congruence are associated with client outcome although the correlation is slightly stronger for client-report measures (Elliott et al., 2011; Kolden et al., 2011). Internal consistency in this sample was high for empathy (.90) and moderate for congruence (.78).

The Credibility/Expectancy Questionnaire (Deville & Borkovec, 2000) has two subscales that measure the degree to which clients (a) believe a treatment to be credible and (b) expect positive outcomes. The credibility subscale contains three items assessed on a nine-point scale, and the expectancy subscale contains one item assessed on a nine-point scale and two items assessed on an 11-point scale. To facilitate data analysis, all items on the expectancy subscale were assessed on an 11-point scale. The credibility scale has moderate-to-high internal consistency (.81) and test-retest (.75) reliability; the expectancy scale also has moderate-to-high internal consistency (.79) and test-retest reliability (.82; Devilly & Borkovec, 2000). Internal

consistency in this sample was high for both credibility (.90) and expectancy (.90). The item wording was adapted to reflect an observer perspective. For example, phrases like “reducing your trauma symptoms” were changed to “reducing the client’s symptoms.” Previous studies (e.g., Berman & Battles, 2012) have used similarly adapted versions.

Materials

Development of psychotherapy interactions. Sixteen audio recordings portraying client-therapist interactions were created using four individuals (two male and two female) trained in the use of paraphrases and minimal encouragers. These individuals met with a clinical psychology doctoral student to hear real examples of therapy interactions and to practice the verbal responses. After training, they practiced using paraphrases and minimal encouragers with a partner who had received an outline describing a presenting problem (i.e., depression or marital discord). They were asked to prioritize paraphrases or minimal encouragers as they responded to the concerns presented. The result was sixteen recorded therapy interactions that portrayed various combinations of verbal response (i.e., paraphrases or minimal encouragers), presenting problem (i.e., depression or marital conflict), therapist gender (i.e., male or female), and client gender (male or female). Although verbal response was the principal variable of interest, these other variables were included to increase generalizability. The average interaction length for the minimal encourager and paraphrases conditions were 7 minutes 12 seconds ($SD = 1$ minute 29 seconds) and 7 minutes 24 seconds ($SD = 1$ minute 34 seconds), respectively. The average number of therapist verbal responses for the minimal encourager and paraphrases conditions were 46.00 ($SD = 18.78$) and 37.38 ($SD = 10.76$), respectively.

Manipulation check. A team of independent raters conducted a manipulation check. Raters assessed each recording using the Hill Counselor Verbal Response Category System (Hill, 1978, 2019) to ensure that the paraphrase condition ($M = 14.42$, $SD = 4.06$) had more paraphrases than the minimal encourager condition ($M = 2.20$, $SD = 2.60$) and that the minimal encourager condition ($M = 36.92$, $SD = 17.83$) had more minimal encouragers than the paraphrase condition ($M = 14.69$, $SD = 6.47$), which was the case in both instances. Raters were

blinded to the intended manipulation of each recording to reduce bias.

Preliminary analyses were also conducted to assess the believability of the therapy interactions. To this end, credibility ratings were analyzed for participants who reported having received psychotherapy previously. Results indicated that credibility scores were lower than those found in clinical trials (see Cogle et al., 2020; Shu et al., 2019; Tankha et al., 2020) but were still moderately credible for both paraphrase ($M = 5.02$, $SD = 2.08$) and minimal encourager ($M = 4.84$, $SD = 2.08$) conditions.

Procedure

The experiment was administered through Qualtrics, an online survey generator. Due to health guidelines related to the COVID-19 pandemic, the experiment was conducted remotely, and participants completed the study in a location of their choosing. Participants had the opportunity to review the consent form after opening the survey but before random assignment, and this form contained the contact information of the primary investigator, to whom participants could direct questions or concerns. After participants agreed to the information in the consent form, the Qualtrics randomizer evenly assigned participants to hear one of the sixteen therapy interactions. Because of the likelihood of distraction among undergraduate participants, particularly when not closely monitored, the survey did not prevent participants from skipping the recordings but instead tracked the amount of time that participants spent listening to each one. This allowed the researcher to measure adherence and control for it if necessary. After completing the dependent-variable measures, Qualtrics assigned participants to hear another therapy interaction—one with the other verbal response, presenting problem, and client-therapist gender dyad. A within-subject design was used to strengthen statistical power. As can be seen in Table 1 in Appendix A, counterbalancing for therapist response, presenting problem, therapist gender, and client gender was incorporated into the design. After completing the second dependent-variable measures, participants provided some demographic information and were provided with additional information on the study.

Results

To reduce the number of multiple comparisons, the data were first analyzed using a repeated-measures, multivariate analysis of variance (MANOVA) with verbal response (paraphrase, minimal encourager), presenting problem (depression, marital discord), therapist gender (male, female), and client gender (male, female) as independent variables and empathy, congruence, alliance, expectancy, and credibility at times one and two as dependent variables. As shown in Table 2 in appendix A, within-subject multivariate results revealed a statistically significant interaction between time and verbal response, $F(5, 112) = 13.65, p < .001, \eta_p^2 = .38$, which indicated that verbal responses in the first recording influenced the ways in which participants responded to the verbal responses in the second recording. Because the presence of an order effect can limit the generalizability research findings, the data from the second administration were excluded, and subsequent analyses were between-subject only.

The second analysis was a MANOVA in which verbal response, presenting problem, therapist gender, and client gender were independent variables and empathy, congruence, alliance, expectancy, and credibility were dependent variables. The results revealed a statistically significant main effect for therapist verbal response, $F(5, 119) = 2.95, p = .015, \eta_p^2 = .11$, which indicated that paraphrases were perceived more favorably than minimal encouragers. The analyses failed to reveal any other statistically significant interactions or main effects. Thus, presenting problem, therapist gender, and client gender were dropped from subsequent analyses. Without these variables in the model, there remained a statistically significant main effect for verbal response, $F(5, 133) = 3.07, p = .012, \eta_p^2 = .10$. As a follow-up to this analysis, the effects of verbal response on empathy, congruence, alliance, expectancy, and credibility were analyzed using independent t-tests. As shown in Table 3 in appendix A, the means for the paraphrase condition were highest across all measures. Furthermore, inferential statistics revealed statistically significant differences on empathy and congruence. Parallel analyses with the full sample showed similar results (see Appendix B).

Discussion

Common factors account for much of the variance in client outcomes, and therapist paraphrases are believed to influence at least some of these factors. However, in the absence of experimental research, the relationship between paraphrases and common factors has been ambiguous. This study used an experimental design to test the relationship between therapist paraphrases and several common factors. The data supported Hypotheses 1 and 2 because participants systematically rated the paraphrases condition more favorably than the minimal encourager condition on the measures of empathy and congruence. The data failed to support Hypotheses 3, 4, and 5 as the data did not reveal reliably different perceptions of alliance, credibility, or expectancy when comparing paraphrases and minimal encouragers.

These findings on empathy, congruence, and alliance were consistent with previous theory and research. Paraphrases are believed to be an important component of empathy and congruence (Brailon & Taiebi, 2020; Miller & Rollnick, 2013, p. 392). These results provided evidence that the use of paraphrases can make therapists appear more empathetic, at least compared to the use of minimal encouragers alone. Furthermore, although some may worry that paraphrases make therapists appear ingenuine, these findings provide support for the opposite: The use of paraphrases can make therapists appear more congruent (or genuine), at least compared to the use of minimal encouragers alone. Although paraphrases could reasonably influence alliance as well, Rautalinko (2013) found no difference in alliance scores when paraphrases were presented in audio format, and the same was true for the present study. Many possible explanations exist. Verbal response could be unrelated to alliance, or the effect have been too small to detect with this sample. Alternatively, paraphrases and minimal encouragers could have comparable effects on alliance, and the use of a different comparison condition (e.g., other therapist verbal responses) could reveal other findings. Alliance could also require more time to change (i.e., could require longer interactions). In this case, the present study may have been too short to detect changes in alliance.

Although the relationship between verbal responses and expectancy and credibility had

not been previously explored, these results do not provide evidence of covariation among these variables. As with alliance, verbal response could be unrelated to expectancy and credibility, or paraphrases and minimal encouragers could influence these variables in the same way. Additionally, the possibility exists that between-group differences in credibility and expectancy were too small to be reliably detected given the measurement techniques and sample size—especially after repeated-measure analyses were discarded. These findings suggest that paraphrases promote perceptions of empathy and congruence, but and outcome expectations and credibility may be influenced by other variables—like previous experiences in therapy.

Strengths and Limitations

There are several notable strengths and limitations of this study that should be taken into consideration. Random assignment to a paraphrase or minimal-encourager condition resolved some issues of internal validity, providing evidence that paraphrases influence perceptions of empathy in the absence of other treatment techniques, but the possibility remains that unknown third variables influenced attrition rates for participants who did not complete any measures. The presence of an order effect and the subsequent exclusion of the second dependent-variable measures adversely influenced statistical power, which could account for the null findings for alliance, credibility, and expectancy. The manipulation included variations of client gender, therapist gender, and presenting problem, and the sample was racially diverse, which improved the generalizability of these findings. However, because all participants were students at the same university, the results could be specific to this demographic. The use of pseudo-therapists, pseudo-clients, and observer-report measures allowed the researchers to ethically control and manipulate the experimental setting, but this control came at the expense of ecological validity. Furthermore, although the use of audio recordings drew attention to the verbal components of therapy interactions, this approach limited the degree to which the non-verbal cues (e.g., eye contact, trunk lean, facial expressions) that accompany paraphrases could influence the ratings, which could happen in naturalistic settings. Indeed, the possibility exists that the effects of paraphrases, as well as other relationship-promoting behaviors, are less potent when transmitted

through recorded media—both video and audio. Finally, although these results indicate that paraphrases influence perceptions of empathy and congruence, and although observer-report measures of empathy and congruence are predictive of client outcomes (see Elliott et al., 2011; Kolden et al., 2011), both the clinical significance of these findings and the relationship between paraphrases and client outcomes remain ambiguous because the degree to which empathy and congruence themselves improve client outcomes is unclear.

Future Directions

Replication is integral to the advancement of science. To improve the generalizability of these findings, researchers could recruit a more nationally representative sample—such as those available through crowdsourcing platforms such as Amazon Mechanical Turk or Qualtrics Panels (see Chandler et al., 2019). The use of video recordings, as well as the involvement of real client-therapist dyads, could also improve generalizability. In a more ecologically valid replication, researchers could randomly assign therapists to alter the frequency of their paraphrases one or more sessions to measure the degree to which such changes influenced the real relationship.

Conclusion

Research has suggested that much of the variance in client outcomes is attributable to common factors (Lambert, 2013). Considering this relationship, the development—and experimental verification—of techniques intended to influence these factors could prove beneficial. Although paraphrases have received considerable attention in theory and in correlational research, they have received little attention in experimental research. The purpose of this study was to systematically assess whether paraphrases meaningfully contribute to the therapeutic process. The findings provide useful experimental evidence of the effectiveness of the paraphrase technique that has been key to psychotherapeutic therapy, tradition, and practice for decades—to enhance empathy and congruence.

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Appendix A

Table 1

Counterbalancing Scheme for the Conditions Presented to Participant

Interaction 1				Interaction 2			
Response	Problem	Therapist	Client	Response	Problem	Therapist	Client
Paraphrase	Depression	Male	Male	Minimal	Marital	Female	Female
Paraphrase	Depression	Male	Female	Minimal	Marital	Female	Male
Paraphrase	Depression	Female	Male	Minimal	Marital	Male	Female
Paraphrase	Depression	Female	Female	Minimal	Marital	Male	Male
Paraphrase	Marital	Male	Male	Minimal	Depression	Female	Female
Paraphrase	Marital	Male	Female	Minimal	Depression	Female	Male
Paraphrase	Marital	Female	Male	Minimal	Depression	Male	Female
Paraphrase	Marital	Female	Female	Minimal	Depression	Male	Male
Minimal	Depression	Male	Male	Paraphrase	Marital	Female	Female
Minimal	Depression	Male	Female	Paraphrase	Marital	Female	Male
Minimal	Depression	Female	Male	Paraphrase	Marital	Male	Female
Minimal	Depression	Female	Female	Paraphrase	Marital	Male	Male
Minimal	Marital	Male	Male	Paraphrase	Depression	Female	Female
Minimal	Marital	Male	Female	Paraphrase	Depression	Female	Male
Minimal	Marital	Female	Male	Paraphrase	Depression	Male	Female
Minimal	Marital	Female	Female	Paraphrase	Depression	Male	Male

Note. The counterbalancing scheme ensured that participants heard different combinations of therapist verbal response, presenting problem, client sex, and therapist sex across the two interactions.

Table 2*Means and Standard Deviations for Dependent Variables by Order*

Variable	Minimal Encourager <i>M (SD)</i>	Paraphrase <i>M (SD)</i>
Empathy		
First recording: Minimal	0.28 (1.31)	1.75 (0.89)
First recording: Paraphrase	0.28 (1.47)	0.90 (1.02)
Congruence		
First recording: Minimal	-0.37 (1.03)	1.05 (0.70)
First recording: Paraphrase	-0.18 (1.00)	0.00 (0.94)
Working Alliance		
First recording: Minimal	4.63 (1.31)	5.83 (0.71)
First recording: Paraphrase	4.65 (1.36)	4.84 (1.15)
Expectancy		
First recording: Minimal	4.05 (2.57)	5.95 (2.07)
First recording: Paraphrase	3.97 (2.70)	4.30 (2.25)
Credibility		
First recording: Minimal	4.77 (2.17)	6.61 (1.62)
First recording: Paraphrase	4.89 (2.31)	5.04 (2.14)

Note. Means and standard deviations across dependent variables showed the presence of an order effect in which participants viewed paraphrase-heavy interactions more positively after viewing minimal-encourager-heavy interactions first. Sample sizes ranged from 132 to 139.

Table 3*Inferential Statistics of Each Dependent Variable Measure*

Variable	Minimal <i>M (SD)</i>	Paraphrases <i>M (SD)</i>	<i>t</i>	<i>p</i>	<i>d</i>
Empathy	0.28 (1.31)	0.90 (1.02)	3.12	.002	0.53
Congruence	- 0.37 (1.03)	0.00 (0.94)	2.27	.025	0.38
Working Alliance	4.63 (1.31)	4.84 (1.15)	1.01	.314	0.17
Credibility	4.77 (2.17)	5.04 (2.14)	0.75	.458	0.10
Expectancy	4.05 (2.57)	4.30 (2.25)	0.61	.541	0.12

Note. Inferential statistics with effects sizes for each dependent variable measure indicated that participants viewed paraphrase-heavy interactions as having more empathy and congruence than minimal-encourager-heavy interactions. $N = 210$. Minimal = minimal encourager condition; Paraphrases = paraphrase condition

Appendix B

Parallel analyses were conducted with the full sample ($N = 210$). A MANOVA was calculated in which verbal response, presenting problem, therapist gender, and client gender were independent variables and empathy, congruence, alliance, expectancy, and credibility were dependent variables. As expected, effect sizes were smaller when inattentive participants were included. The main effect for verbal response showed a non-significant trend, $F(5, 190) = 2.04, p = .075, \eta_p^2 = .05$. The model was adjusted to exclude presenting problem, therapist gender, and client gender. The result of a second MANOVA with verbal response as the independent variable and empathy, congruence, alliance, expectancy, and credibility as the dependent variables revealed a statistically significant effect of verbal response, $F(5, 204) = 2.34, p = .043, \eta_p^2 = .05$. The results of five independent t -tests revealed that empathy and congruence were reliably higher in the paraphrase condition (see Table A1).

Table A1*Parallel Analyses Including Inattentive Participants*

Variable	Minimal <i>M (SD)</i>	Paraphrases <i>M (SD)</i>	<i>t</i>	<i>p</i>	<i>d</i>
Empathy	0.35 (1.17)	0.76 (0.97)	2.86	.006	0.38
Congruence	-0.22 (0.97)	0.07 (0.85)	2.35	.021	0.32
Working Alliance	4.60 (1.18)	4.77 (1.02)	1.08	.282	0.15
Credibility	5.00 (1.99)	5.21 (2.00)	0.77	.444	0.13
Expectancy	4.31 (2.28)	4.60 (2.10)	0.94	.348	0.11

Note. Inferential statistics with effects sizes for each dependent variable measure indicated that participants viewed paraphrase-heavy interactions as having more empathy and congruence than minimal-encourager-heavy interactions even with inattentive participants included. $N = 210$.

Minimal = Minimal encourager condition; Paraphrases = paraphrase condition.



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March 20, 2020

PI Name: Andrew Snell
Co-Investigators: Rivian Lewin
Advisor and/or Co-PI: Jeffrey Berman
Submission Type: Initial
Title: Do Therapist Paraphrases Influence Empathy, Congruence, Expectancy, or Alliance?
IRB ID : #PRO-FY2020-416
Exempt Approval: March 20, 2020

The University of Memphis Institutional Review Board, FWA00006815, has reviewed your submission in accordance with all applicable statuses and regulations as well as ethical principles.

Approval of this project is given with the following obligations:

1. When the project is finished a completion submission is required
2. Any changes to the approved protocol requires board approval prior to implementation
3. When necessary submit an incident/adverse events for board review
4. Human subjects training is required every 2 years and is to be kept current at citiprogram.org.

For any additional questions or concerns please contact us at irb@memphis.edu or 901.678.2705