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Early Memories as Expressions of Relationship Paradigms: A Preliminary Investigation

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Earliest childhood memories (EMs) have been utilized as expressions of relationship paradigms, but few empirical studies have been conducted. This study outlines the construction and development of an EM relationship scoring system and scale utilizing nonclinical and clinical samples. It was hypothesized that relationship episodes could be reliably coded using EMs and that they would demonstrate convergent validity with measures of attachment style (Separation–Individuation Test of Adolescence), mood (Profile of Mood States), and clinical symptomatology (Symptom Checklist 90–Revised [SCL–90–R] and the Minnesota Multiphasic Personality Inventory [MMPI]). The hypotheses received broad support. Findings indicate that relationship episodes may be reliably coded from EMs. Associations between individual EM variables, the EM relationship scale, and objective measures suggest that the quality of relationships expressed in EMs is associated with degree of general maladjustment. Suggestions for further research are discussed.

Although concern with interpersonal relationships has never been remote from clinical interest, the last 20 years have witnessed a dramatic upsurge of theoretical, clinical, and empirical focus on relationships and personality functioning. Of particular interest has been the cognitive and affective bases of interpersonal functioning. Object relations theory, with its interest in dimensions of self- and other perception and experience, social-cognitive psychology, with its focus on

relationship schemas and expectancies, and interpersonal theory, with its stress on associations between relationships in clinical assessment and intervention.

The work of Sullivan (1953) established important foundations for the view that human relationships form the matrix of personality (Greenberg & Mitchell, 1983). Kernberg (1976) stressed the fundamentally transactional nature of personality functioning with his view that an individual's representational world (Sandler & Rosenblatt, 1962) is built up through a repertoire of self- and object images linked through predominant affective dispositions. These "cognitive–affective schemata" or "relationship paradigms" (Mayman & Faris, 1960) function as the representational substrates of interpersonal experience, organizing relational expectancies and assumptions, perception, emotional experience, and interpersonal behavior. Relationship paradigms, as schemas or scripts of self and others, are the basis of transference phenomena, namely, the reenactment of prototypical interpersonal scenarios in the therapeutic relationship (Luborsky, 1984; Singer, 1985; Westen, 1988). Finally, personality disorders are centrally related to relationship paradigms inasmuch as they involve dysfunctional interpersonal relationships (McLemore & Benjamin, 1979; McLemore & Brokaw, 1987). Emerging research suggests that Axis II personality disorders may predispose individuals to or actually be comorbid with Axis I psychopathology (Everly, Shapiro, Levine, Newman, & Sherman, 1985; Joffe, Swinson, & Regan, 1988; Mavissakalian & Hammann, 1986, 1988).

The analysis of relationship paradigms through projective assessment data, including the Rorschach, the Thematic Apperception Test, person descriptions, dreams, and early memories, has stimulated and revitalized the empirical investigation and clinical utility of projective techniques of personality assessment. For example, the work of Sidney Blatt and his colleagues has focused on the assessment of object relations through the use of open-ended person descriptions (Blatt, Wein, Chevron, & Quinlan, 1979) and the Rorschach test (Blatt & Lerner, 1983). Urist (1977; Urist & Shill, 1982), similarly emphasizing the transactional nature of Rorschach percepts, developed his Mutuality of Autonomy Scale (MAS) to assess the nature and quality of self in relation to others. Mayman and his colleagues at the University of Michigan studied object representations in relation to the Rorschach (Mayman, 1967), early memories (Mayman & Ryan, 1972), and dreams (Krohn & Mayman, 1974). The upshot of these studies is that "level of object representation appears to be a salient, consistent, researchable personality dimension . . . it is not a redundant construct synonymous with level of psychopathology or severity of psychopathology" (Krohn & Mayman, 1974, p. 451). Krohn and Mayman found that levels of object representation correlated with the Luborsky's Health-Sickness Rating Scale.

Though not addressing relationship episodes directly, Bruhn and his colleagues have accumulated an impressive series of findings relating the content of EMs to locus of control stance (Bruhn & Schiffman, 1982), classification of

delinquency (Bruhn & Davidow, 1983), degree of psychopathology (Last & Bruhn, 1983), and type of psychopathology (Last & Bruhn, 1985). The findings of these studies invariably included content related to self-concepts and interpersonal transactions.

This study was conducted to provide preliminary construct validation of relationship paradigms by examining relationship episodes from EMs. Clinical interest in EMs has been longstanding, primarily in the Adlerian school. In recent years, however, the number of articles focusing on the empirical investigation and clinical utility of EMs has increased dramatically (e.g., Acklin, Sauer, Alexander, & Dugoni, 1989; Binder & Smokler, 1980; Bruhn, 1981, 1984, 1985; Last & Bruhn, 1983, 1985).

EMS, in general psychology terms, derive from autobiographical memory, specifically episodic or event memory (Tulving, 1983), that is, "memory that is autobiographical in character, and contains more or less explicit reference to the self as an agent or experiencer of some event . . ." (Kihlstrom, 1987, p. 1446).

EMs have been viewed, not as simple recollections of past events, but as expressions of ". . . themes which define the person's enduring view of himself and his enduring expectations of others . . . the themes define nuclear relationship patterns which are likely to repeat themselves isomorphically in a wide range of other life situations" (Mayman, 1968, p. 304). From this perspective EMS reflect "the quality and range of the individual's internalized repertoire of interpersonal relationship paradigms, and his predispositions to experience and react to new situations within the confines of old, habitual and pathologically distorted expectations" (Binder & Smokler, 1980, p. 55). Thus, in the clinical setting, EMs have been used to assess and focus on the interpersonal issues that bring the patient to seek help.

Finally, the role of affect in EMs is of both theoretical and clinical interest. Although early EM theorists (including Adler and Mayman) tended to stress the temporal stability of EMs, recent clinical and laboratory research has demonstrated important links between mood states and aspects of autobiographical memory, including latency of recall and type of memories recalled. The notion of "mood-dependent recall" has been extended to autobiographical memory (Acklin et al., 1989; Bower, 1981; Teasdale & Fogarty, 1979). A recent study of the test–retest (10-week retest) reliability of EMs indicated that some aspects of EMs tend to remain stable across time, whereas others varied in association with naturally occurring mood states (Wingo, Acklin, & Dewolfe, 1990). Coefficients for views of self, others, and the environment at the 10-week retest were .48, .69, and .41, respectively.

This preliminary study of EMs as expressions of relationship paradigms had four hypotheses:

1. To take an initial step toward operationalizing relationship episodes and to determine whether they could be reliably coded using EMs.

2. To examine associations between components of an EM relationship scoring system and objective measures of mood, attachment style, and psychopathology.
3. To provide preliminary reliability and validity data on the clinical application of an EM relationship scale by examining its associations with objective measures of mood, attachment style, and psychopathology.
4. Overall, it was hypothesized that quality of relationships as expressed in EMs would be correlated with objective measures of mood, attachment style, and clinical symptomatology.

METHOD

Study 1

Subjects. The pilot study endeavored to operationalize relationship paradigms by examining relationship episodes in a sample of EMs obtained from 61 volunteers. The sample was obtained from students in undergraduate psychology classes who received experimental credit for their willingness to complete the EM questionnaires and a set of other measures. Individuals who had received or were currently receiving mental health treatment were excluded ($n = 6$) from the study. The pilot sample was composed of 21 men (34%) and 40 women (66%). The mean age of the sample was 20.56 years ($SD = 1.21$). The ethnic composition of the sample was White (71%), Hispanic (15%), Asian (8%), Black (5%), and other (2%).

Instruments. Subjects were administered a brief questionnaire, a modified version of the instrument used by Mayman (1968), which elicits a written EM narrative and questions clarifying the age at which the EM incident occurred, the clearest aspect of the EM, the feelings associated with it, and what in the EM the respondent would choose to change. A single EM was obtained from each subject.

In addition, a battery of objective measures of social desirability, attachment styles, and mood were also completed. These included the Marlowe–Crowne Social Desirability Scale (Marlowe & Crowne, 1960), the Separation-Individuation Test of Adolescence (SITA; Levine, Green, & Millon, 1986), the Depressive Experiences Questionnaire (DEQ; Blatt, D'Afflitti, & Quinlan, 1979; Blatt, Quinlan, Chevron, McDonald, & Zuroff, 1982), the Beck Depression Inventory (BDI; Beck, Ward, Mendelson, Mock, & Erbaugh, 1961), and the Profile of Mood States (POMS; McNair, Lorr, & Droppleman, 1971).

The SITA, based on an operationalization of Mahler, Pine, and Bergmann's (1975) dimensions of separation–individuation, provides scale scores for the following dimensions of attachment style: dependency denial, nurturance seek-

ing, enmeshment seeking, symbiosis seeking, healthy separation, separation anxiety, engulfment anxiety, and self-centeredness. The DEQ, based on psychoanalytic notions of anaclitic and introjective personality styles (Blatt, 1974), which are similar to Beck's (1983) sociotropic and autonomous personality types, yields scale scores for an introjective scale, involving concerns about personal autonomy; an anaclitic scale, involving concerns about the maintenance of close, dependent relationships; and an efficacy scale, involving a sense of self as instrumentally effective.

Because affect is viewed as a crucial ingredient of relationship episodes (Stern, 1985), self-report moods were assessed. The POMS provides normative scores for state anxiety, depression, confusion, fatigue, and vigor.

The EM relationship scoring manual was developed by the first author utilizing resources from contemporary object relations theory and social-cognitive psychology, including the work of Kernberg (1976), Blatt's (Blatt & Lerner, 1983) developmental concept of the object, and Urist's (1977; Urist & Shill, 1982) MAS. The scoring system assesses the presence and absence of three prototypical scenarios: attempts at instrumental mastery (self as agent), care-giver interactions (transactions between adults and children), and peer–sibling interactions (self and peers). Various dimensions of these EM transactions were coded, including their nature and outcome, views of self, others, environment, coherence, and associated affects. Scores on the EM Likert scales ranged from 1, indicating the negative end of the continuum, to 5, indicating positive outcomes. Because high scores on the EM scales indicated positive views of self, others, situations, and outcomes, negative correlations with objective measures were expected. See Appendix for a synopsis of the EM scoring manual.

Procedure. Following a training sequence during which raters achieved a predetermined level of proficiency in coding relationships episodes (interrater reliability criterion = .80), the EMs were subsequently coded independently by two raters according to the EM scoring manual. No identifying information or other questionnaire data was available to the raters. The initial manual contained 21 items focusing on the specific details of the EM, for example, age when the EM incident occurred, affect tone of the EM, and nature of interactions between persons, animals, and objects in the EM. These items included attempts at instrumental mastery, care-giver, and peer–sibling interactions. Individual items were either scored dichotomously (yes/no) or on a 5-point Likert scale. Kappa coefficients (Cohen, 1960; DynaStat, 1988) were calculated for dichotomous variables and Pearson product-moment correlations were calculated for scaled data to determine interrater reliability.

After interreliability coefficients were calculated, all disagreements were conferenced to agreement. Subsequent scale internal consistency analyses were conducted to create the pilot EM Relationship Scale, which was then examined in relation to scores obtained from measures of social desirability, attachment

style, and state moods. The strategy for scale choice of items was empirical, with the objective of maximizing internal consistency, based on reliability analyses using SPSS/PC+ (Norusis, 1988). Through various combinations of EM items and examination of the resulting coefficient alphas and interitem correlations, a simple and nearly homogeneous scale was created (see Table 1).

Study 2

Subjects. Following the pilot study and minor refinements in the scoring manual, including the addition of three items, a second study examined EMs obtained from a sample of 122 consecutive psychiatric outpatient admissions to an urban community mental health center. The sample was composed of 54 men (44%) and 68 (56%) women. Mean age for the sample was 36.57 years (SD = 12.89). The racial composition of the sample was White (52%), Asian (30%), Hawaiian or other pacific islander (5%), Black (3%), and other (10%). The range of diagnoses for this sample included adjustment disorders, anxiety and affective disorders, and various personality disorders.

Instruments. After obtaining informed consent, subjects were administered a single EM questionnaire and a set of commonly used measures of clinical psychopathology, including the MMPI (Hathaway & McKinley, 1967), the POMS (McNair et al., 1971), the SCL-90-R (Derogatis, 1983), and the BDI (Beck et al., 1961). The measures were administered as part of a standard clinical intake process.

The SCL-90-R is designed to reflect the current psychological symptom status of psychiatric and medical patients. It yields normed factor scores for the following variables: somatization, interpersonal sensitivity, obsessive symptoms, paranoid ideation, phobic anxiety, psychosis, and a global severity index (GSI). The GSI, the best single measure of current level of psychological disturbance, combines data from the various symptom dimensions of the SCL-90-R. The GSI coefficient alpha and the test-retest reliability each have been calculated at .84 (Derogatis, 1983).

Procedure. EM questionnaires were scored independently by two trained raters according to the scoring manual. Following calculation of interrater reliability coefficients (Cohen's kappa and Pearson's r), disagreements were conferenced to agreement. The same EM Relationship Scale items derived from the pilot study were used in the clincial study. Table 2 presents interrater reliability, interitem correlational, and internal consistency data for the EM scoring system and EM Relationship Scale. EM item and relationship episode scores were subsequently analyzed in relation to the objective measures of mood and psychopathology.

RESULTS

Study 1

Table 1 presents reliability data for the pilot study of nonclinical volunteers. Supporting Hypothesis 1, these data indicate that individual items relevant to episodic memory may be coded with an acceptable degree of interrater reliability. In addition, Table 1 presents internal consistency data for the EM Relationship Scale.

Analyses of variance (ANOVA) indicates there were neither sex, $F(1, 60) =$

TABLE 1
Reliability Data: EM Pilot Study[a]

Interrater Reliability Coefficients	
Dichotomous Items	*Kappa*
Mastery	.8213
Care-giver interaction	.9573
Peer–sibling interaction	.9571
Likert Items:	*r*
Age	1.00
EM affect	.91
Mastery outcome	.87
Care-giver interaction outcome	.84
Care-giver attitude	.75
Care-giver nurturance	.82
Peer–sibling interaction nature	.78
Peer–sibling attitude	.79
Self-activity	.78
Self-role	.83
Perception of environment	.80
Damage: Self	.83
Damage: Others	.73
Damage:Animals	1.00
Mean	.84

Interitem Correlations and Internal Consistency for the EM Relationship Scale

Scale Items	*1*	*2*	*3*	*4*	*5*	*6*
1. EM affect	–	.60	.56	.57	.94	.95
2. Care-giver outcome		–	.98	.98	.67	.62
3. Care-giver attitude			–	.98	.63	.59
4. Care-giver nurturance				–	.64	.60
5. Self-role					–	.92
6. Environment						–

Note. Mean interitem correlations = .75. Coefficient alpha = .94.
[a]$N = 61$.

.424, $p = .59$, nor ethnic, $F(1, 60) = .460$, $p = .501$, differences on the EM Relationship Scale. The correlation between the social desirability measure and the EM Relationship Scale was nonsignificant, $r = .02$, $p = .68$. No significant correlations were found between the EM Relationship Scale and the objective measures. Visual analyses of the distributions of scores in this homogeneous, nonclinical sample indicated a limited range of scores, which, in addition to the small sample size, tended to restrict variance.

No significant correlations were obtained between individual EM variables and the social desirability measure. With respect to attachment style, again the range of distribution of scores was quite narrow, tending to restrict variance. Nevertheless, a number of significant associations, consistent with the hypotheses, were found. Because the large number of correlations between EM scores and the SITA (around 120 correlations, none of which were in a direction contrary to the hypotheses) increased the probability of Type I error, alpha was readjusted to a more conservative .01 level of significance to reduce the family-wise error rate. The SITA Separation Anxiety scale, which measures fears of losing physical or emotional contact with an important other, correlated with the Care-Giver Attitude Scale, $r = -.32$, $p < .01$. The SITA Engulfment Anxiety scale, a measure of concerns about being overwhelmed with needs or demands of the other, correlated with the EM Self-Activity Scale, $r = -.29$, $p < .01$. The SITA Healthy Separation scale measures a proactive, but differentiated, tendency to closeness in relationships. This scale correlated in the expected direction, with the EM peer–sibling interaction nature and Peer–Sibling Attitude Scales, $rs = .58$ and .71, $p < .005$, respectively.

Consistent with the hypotheses, a number of correlations confirmed the predicted associations between EM scenarios and self-report of mood. EM affect correlated with BDI scores, $r = -.33$, $p < .01$. Peer–sibling interaction nature scores were also correlated with the BDI, $r = -.58$, $p < .001$. Peer–sibling interaction nature was also correlated with the POMS Confusion scale, $r = -.58$, $p < .001$.

In sum, the pilot study, despite a small sample of nonclinical subjects and restricted distribution of scores, provided encouraging findings. Results indicated that relationship episodes could be operationalized and reliably coded using EMs. Furthermore, the pattern and direction of correlations provide preliminary evidence to support the validity of the relationship paradigms construct.

Study 2

Table 2 presents reliability data for the EM Relationship Scale derived from the sample of 122 psychiatric outpatients. As with the reliability data that emerged from the pilot study, quite respectable interrater reliability coefficients were obtained, indicating that relationship episodes could be accurately rated by

TABLE 2
Reliability Data: Clinical Sample[a]

Interrater Reliability Coefficients	
Dichotomous Variables	*Kappa*
Mastery	.8153
Care-giver interaction	.9396
Peer–sibling interaction	.9326
Likert Items:	*r*
EM Age	1.00
EM affect	.93
Mastery outcome	.86
Care-giver interaction outcome	.86
Care-giver attitude	.94
Care-giver nurturance	.92
Peer–sibling interaction nature	.93
Peer–sibling attitude	.93
Self-activity	.92
Self-role	.85
Perception of environment	.89
Damage: Self	.92
Damage: Others	.94
Damage:Animals	1.00
Relation of reality	1.00
Individual distinctiveness	.78
Degree of interpersonal contact	.85
Mean	.91

Interitem Correlations and Internal Consistency for the EM Relationship Scale

Scale Items	*1*	*2*	*3*	*4*	*5*	*6*
1. EM affect	—	.25	.25	.25	.78	.82
2. Care-giver outcome		—	.99	.99	.35	.35
3. Care-giver attitude			—	.99	.34	.34
4. Care-giver nurturance				—	.34	.36
5. Self-role					—	.83
6. Environment						—

Note. Mean interitem correlation = .55. Coefficient alpha = .88.
[a]*N* = 122.

judges. The EM Relationship Scale reliability analysis, using the items derived from the pilot study, yielded a six-item scale with an acceptable coefficient of internal consistency, albeit somewhat lower than the pilot scale. This was undoubtedly due to greater heterogeneity in the clinical sample. The scale, consistent with object relations theory, includes a view of the self, a view of the other, a linking affect disposition, and a general perception of the environment.

There were no statistically significant sex, age, or ethnic differences on either individual EM items or the EM Relationship Scale.

Table 3 presents correlational data examining the associations between the EM Relationship Scale and the validity and clinical scales of the MMPI, including mean MMPI evaluation (Scales 1, 2, 3, 4, 6, 7, 8, 9).

All of these correlations were in the expected direction. These data tend to support the hypothesized association between quality of relationships as expressed in EMs and measures of clinical symptomatology (Hypothesis 4). The uniform loadings of the EM Relationship Scale on the MMPI scales suggest that the EM Relationship Scale taps into a General Health-Sickness or Maladjustment factor (Eichman, 1961; Kassebaum, Couch, & Slater, 1959). A follow-up stepwise regression analysis, using the items on the EM Relationship Scale as predictors, found that perception of environment accounted for the largest amount of shared variance in the mean MMPI elevation variable.

A number of individual correlations, consistent with Hypotheses 3 and 4, lent support to the notion that EMs reflect dimensions of the self-concept, views of others, and accompanying affects. Because of the large number of correlations between the EM Relationship Scale and the MMPI, alpha was reset at the more conservative .01 level of significance. For example, mastery outcome correlated negatively with MMPI Scales 1, $r = -.32$, $p < .01$; 2, $r = -.40$, $p < .01$; 7, $r = -.38$, $p < .01$; and 0, $r = -.38$, $p < .01$.

Table 4 presents correlational data examining the associations between the

TABLE 3
Intercorrelations: EM Relationship Scale With MMPI Scales

MMPI Scales	*EM Relationship Scale*
L	−.04
F	−.24**
K	.11
1	−.33***
2	−.27**
3	−.33**
4	−.29**
5	.21*
6	−.29**
7	−.33**
8	−.29**
9	.08
0	−.25**
Mean elevation	−.36***
Regression analysis (stepwise)	
Perception of Environment	Multiple R = .3230
	R^2 = .10
	F = 12.46128****

*$p < .05$. **$p < .01$. ***$p < .001$. ****$p < .0001$.

TABLE 4
Intercorrelations: EM Relationship Scale and SCL 90-R

SCL 90-R Variables	*EM Relationship Scale*
Somatization	−.39***
Obsessive symptoms	−.20*
Interpersonal sensitivity	−.21*
Depression	−.22*
Anxiety	.22*
Hostility	−.22*
Phobic anxiety	−.30**
Paranoid ideation	−.24*
Psychosis	−.29**
Global symptom index	−.33***
Regression analysis: Stepwise	
Perception of Environment	
	Multiple R = .34185
	R^2 = .12
	$F(1, 107)$ = 14.16****

*$p < .05$. **$p < .01$. ***$p < .001$. ****$p < .0001$.

EM Relationship Scale and the clinical variables of the SCL-90-R, a self-report measure of clinical symptomatology.

All of the correlations between the EM Relationship Scale and the SCL-90-R fell in the hypothesized direction (Hypothesis 4).

Table 5 presents correlational data for individual items of the EM Relation-

TABLE 5
Intercorrelations: EM Relationship Variables With SCL90-R Scales

EM Relationship Scale	*SCL90-R Scales*									
	S	*OS*	*IS*	*D*	*A*	*H*	*PA*	*PR*	*P*	*GSI*
Affect	−.29	−.18	−.24	−.20	−.27	−.18	−.39	−.23	−.29	−.31
Care-Giver Outcome	−.36	−.18	−.22	−.21	−.17	−.22	−.23	−.21	−.27	−.30
Care-Giver Attitude	−.36	−.19	−.26	−.23	−.18	−.25	−.23	−.22	−.28	−.30
Care-Giver Nurturance	−.36	−.18	−.25	−.22	−.19	−.23	−.24	−.28	−.31	−.30
Self-Role	−.33	−.17	−.20	−.18	−.24	−.14	−.31	−.18	−.24	−.28
Perception on Environment	−.34	−.26	−.27	−.28	−.30	−.21	−.32	−.26	−.33	−.37

Note. S = Somatization; OS = Obsessive symptoms; IS = Interpersonal sensitivity; A = Anxiety; H = Hostility; PA = Phobic Anxiety; PR = Paranoid Ideation; P = Psychosis; GSI = Global Severity Index. Decimals have been deleted. All correlations significant, $p < .05$, except Self-role by hostility, $p < .10$; correlatios larger than −.23 significant, $p < .01$; correlations larger than −.28 significant, $p < .001$.

ship Scale and the clinical scales of the SCL–90–R. Note the uniformity and the especially strong associations between Symptom scales and the EM Affect and Perception of Environment scales.

A picture similar to the MMPI findings emerges in Tables 4 and 5, namely, uniform negative loadings between the EM Relationship Scale and Symptom scales. These findings suggest that the EM Relationship Scale assesses a dimension of general psychological distress or maladjustment, including dysphoric affective tone. As before, a stepwise regression analysis, using EM Relationship Scale items as predictors and mean SCL–90–R elevation as the criterion, indicates that Perception of Environment accounts for the largest amount of shared variance.

Associations between individual EM variables, the EM Relationship Scale and mood measures (the BDI and POMS) were all in the expected direction, but with slightly less magnitude and uniformity than those found on the MMPI and SCL–90–R. A more conservative alpha level was set at .01 to control for family-wise error rate. Negative correlations were found between the BDI and EM Relationship Scale, $r = -.25$, $p < .01$, Care-giver Attitude, Care-giver Nurturance, Self-Role, and Perception of Environment, $rs = -.24$, $-.23$, $-.21$, and $-.21$, $p < .01$, respectively. No significant correlations (.01) were found between the EM Relationship Scale and the various POMS scales. EM Affect correlated negative with the POMS Tension–Anxiety and Depression scales, $rs = -.22$ and $-.25$, $ps < .01$, respectively. The POMS Vigor scale, a measure of positive affect, correlated positively with Mastery Outcome ($r = .48$, $p < .001$). EM Self-Role correlated with the POMS Tension, Depression, Fatigue, and Confusion scales, $rs = -.21$, $-.25$, $-.26$, and $-.22$, $ps < .01$, respectively. Perception of the environment correlated with POMS Tension, Depression, Fatigue, and Confusion scales, $rs = -.21$, $-.32$, $-.26$, and $-.28$, $ps < .01$, respectively. Finally, Perception of Others correlated with POMS Fatigue, $r = -.24$, $p < .01$.

DISCUSSION

This study hypothesized that relationship episodes could be reliably coded using EMs and that they would demonstrate predictable associations with measures of mood, attachment style, and clinical symptomatology. With some exceptions, the hypotheses received broad preliminary support. As predicted (Hypothesis 4), respectable and uniform associations between the EM relationship scoring system, the EM Relationship Scale, and measures of clinical symptomatology (MMPI and SCL–90–R) were found. Although the uniformity of these associations is likely to be related to the intercorrelation of the symptom scales between themselves (Brophy, Norvell, & Kiluk, 1988), their uniformity supports the

notion that the EM Relationship Scale is associated with a General Health-Sickness or Maladjustment factor (Luborsky, 1975), a finding that replicates those of Krohn and Mayman (1974). Furthermore, there is support confirming the role of affective quality of representations of people and relationship expectancies.

These findings provide empirical support for the theoretically postulated and clinically familiar linkage between quality of human relationships and psychopathology. EMs provide easily obtained, economical, and "experience-near" access to the focal issues that shape the individual's experience of self in relation to others. Because the data are correlational, however, they do not imply causality. It may very well be the case that psychological maladjustment influenced recall of childhood experiences, similar to the effects of mood-dependent recall observed in other contexts (Acklin et al., 1989; Bower, 1981; Teasdale & Fogarty, 1979; Wingo et al., 1990).

Although encouraging, these preliminary findings require further elaboration and replication. Application of the EM scoring system and EM Relationship Scale to clinical discrimination by diagnostic grouping (e.g., comparison of Axis I and/or Axis II disorders) or level of severity (e.g., comparison of neurotic, borderline, and schizophrenic disorders; cf. Nigg, Lohr, Westen, Gold, & Silk, 1989) may be useful. The use of only one EM may have tended to limit the strength of the findings. Examining two, three, or a series of EMs should be explored (A. Bruhn, personal communication, March 23, 1990). The temporal consistency of EMs remains somewhat controversial, and the test–retest reliability of relationship episodes, especially in psychiatric samples, demands investigation. The EM Relationship Scale scoring system and scale may be profitably applied to other objective and projective personality tests, for example, the Adjective Checklist or Thematic Apperception Test. Examining associations between EM Relationship Scale episodes obtained at intake and subsequent transference enactments in psychotherapy, similar to Luborsky's (1984) Core Conflictual Relationship Theme methodology, would strengthen the empirical basis of their utility in psychotherapy. Finally, investigation of overt behavioral correlates of EM Relationship Scale episodes, for example, in marital, familial, or social interaction, would more firmly establish the link between private experience and interpersonal behavior.

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APPENDIX

Synopsis: EM Scoring Manual

The scoring manual assess three prototypical scenarios: mastery, care-giver interaction, and peer–sibling interaction. Various probes of these scenarious follow with a focus on their nature and outcome.

Early memory age	(age when EM occurred)
Rater affect	(Likert: Unpleasant–Pleasant)
Attempts at mastery	(Dichotomous: Absent–Present)
Mastery outcome	(Likert: Failure–Success)
Care-giver interaction	(Dichotomous: Absent–Present)
Care-giver outcome	(Likert: Negative–Positive)
Care-giver attitude	(Likert: Malevolent–Benevolent)
Care-giver nurturance	(Likert: Depriving–Satisfying)
Peer–sibling interaction:	(Dichotomous: Absent–Present)
Peer–sibling nature	(Likert: Negative–Positive)
Peer–sibling attitude	(Likert: Malevolent–Benevolent)
Self-activity	(Likert: Passitve–Active)
Self-role	(Likert: Victim–Success)
Perception of environment	(Likert: Dangerous–Safe)
Damage aspect:	
Self, Others, Animals	(Likert: None–Death/destruction)
Reality adherence	(Likert: Inchoherent–Coherent)
Individual distinctiveness	(Likert: Vague–Distinctive)
Degree of contact	(Likert: Alone–Sustained)