

Religion and the Problem-Solving Process: Three Styles of Coping

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Three styles of problem-solving were proposed, each involving a different reported relationship between the individual and God. Scales were developed to measure these problem-solving styles and were administered to 197 church members. These three styles were clearly identifiable through factor analysis. Further, as predicted, the three styles of problem-solving related differently to measures of religiousness and competence. The report of a problem-solving style involving active personal exchange with God (Collaborative) appears to be part of an internalized committed form of religion, one holding positive implications for the competence of the individual. A problem-solving style in which the individual waits for solutions from God (Deferring) seems to be part of an externally-oriented religion providing answers to questions the individual is less able to resolve. This style was associated with lower levels of competence. A Self-Directing style emphasizes the freedom God gives people to direct their own lives. This approach appears to be an active coping orientation which stresses personal agency, involves lower levels of traditional religious involvement, and is part of a generally effective style of functioning. This study points to the important diverse roles religion plays in the problem-solving process.

A considerable body of theory and research points to the importance of the problem-solving process in people's efforts to deal with events in their lives. Differences in the individual's approach to problem-solving have been related to many variables including the efficacy of the solution, the long-term adjustment of the person, and the general life satisfaction of the individual (Lazarus & Folkman, 1984; Spivack, Platt & Shure, 1976; Tyler, 1978).

While definitions of problem-solving vary, there is widespread agreement that problem-solving is a complex process involving several phases of activities: definition of the problem; generation of alternative solutions; selection of a solution; implementation of the solution; and re-definition of the problem and its meaning to the individual once the problem has been resolved (D'Zurilla & Goldfried, 1971; Lazarus & Folkman, 1984; Spivack, Platt & Shure, 1976; Tyler, 1978). In addition, models of problem-solving generally acknowledge the importance of activities which help individuals manage their feelings in the process of dealing with problems.

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Religion may play a significant general role in the problem-solving process. For example, Pargament (1987) has noted that religion may serve important functions in helping people understand and cope with life events by offering guidance, support and hope. Spilka, Shaver and Kirkpatrick (1985) see religion as providing a frame of reference for individuals to help them understand, predict and control events, and to maintain self-esteem.

More specifically, religion represents a potentially significant element in many, if not all, of the problem-solving phases. For example, as recent research in religious attribution theory suggests, religion may affect how one understands the meaning of many problems (Spilka & Schmidt, 1983; Gorsuch & Smith, 1983; Pargament & Sullivan, 1982). Similarly, religious beliefs and practices may guide the individual in the process of selecting solutions to problems. Religion may also provide the individual with emotional support throughout the problem-solving process, particularly during stressful periods (Pargament & Hahn, 1986).

While the potential significance of religion for the problem-solving process is clear, the nature of the relationship between problem-solving and religion is not. The purpose of this paper was to define and examine empirically several styles of problem-solving which involve distinctive relationships with religion. Problem-solving styles refer to relatively consistent patterns of coping response to a variety of situations.

Through interviews with people and a literature review, three styles of problem-solving were formulated: Self-Directing, Deferring, and Collaborative. These three styles vary on two key dimensions underlying the individual's relationship with God: the locus of responsibility for the problem-solving process, and the level of activity in the problem-solving process.

Self-Directing

We asked 15 adult interviewees to respond to a number of open-ended questions about the role religion plays in their problem-solving. They were asked to describe a particular problem in which religion was involved. One style which emerged from their responses could be described as Self-Directing. From this perspective, it is the individual's responsibility to resolve problems. Faced with this responsibility, the individual takes on an active problem-solving stance. While God is not involved directly in this process, this style is not anti-religious. Rather, God is viewed as giving people the freedom and resources to direct their own lives. As one person commented: "God put me here on this earth and gave me the skills and strengths to solve my problems myself."

The Self-Directing style is not unlike Fromm's (1960) description of a humanistic religion which stresses the power of the person rather than the power of God, and the goal of self-realization. It is also evident in deistic views of God, and to some extent in contemporary process theology, which considers God's role in human affairs to be a passive one.

Deferring

One of our interviewees spoke about her confusion of whether to try to reconcile with her spouse following his recent affair and their separation. She said: "I let God decide

and waited for a sign from Him about what I should do." In direct contrast to the Self-Directing style, some individuals appear to defer the responsibility of problem-solving to God. Rather than actively solve problems themselves, they wait for solutions to emerge through the active efforts of God. From this Deferring perspective, God is the source of solutions, rather than the person.

The Deferring Style is similar to Fromm's concept of authoritarian religion which emphasizes the omnipotence of the deity and the relative insignificance of the person, and the goal of submission to God's powers (Fromm, 1960). Roberts (1984) has also discussed an "Other-Worldly" theology which stresses a passive personal approach to the problems of this world, problems which will be resolved ultimately by God.

Collaborative

Most common in the responses to questions about religion and problem-solving were comments like: "God is my partner. He works with me and strengthens me." These comments suggested a third problem-solving style, Collaborative. In this style, responsibility for the problem-solving process is held jointly by the individual and God. Neither the individual nor God is seen as a passive participant. Instead, both participants are viewed as active contributors working together to solve problems.

Religious perspectives consistent with a Collaborative approach to problem-solving can be found in Jewish and Christian traditions. Abelson (1969) states that in the rabbinic tradition, people are seen as "co-partners" with God. God prompts the person to do what is right through the inner voice of the Holy Spirit. Thus, a clearly active role is defined for the individual and God. Hart (1984) cites a number of verses from the New Testament which also reflect a Collaborative orientation. For example, he quotes Paul: "I can do all things through Christ who strengthens me."

Implications for Religiousness and Competence

The two dimensions underlying the styles of problem-solving, locus of responsibility and level of activity, have been used to distinguish people holding different religious orientations. Allport (1950), for example, describes a mature religion, in part, as active and intentional, a master-motive directing the individual to the future, enabling the person to "act wholeheartedly even without absolute certainty" (81). He distinguishes this dynamic religious orientation from one which is a servant to personal fears, wishes and drives. Similarly, Batson and Ventis (1982) describe a searching creative form of religion leading to new ways of processing information and understanding the world. Yet, they note that not all forms of religious experience are creative.

These writings suggest different relationships between the styles of problem-solving and dimensions of religiousness. Although it is an active style, the Self-Directing approach relies on personal rather than religious resources to resolve problems. The Self-Directing style then should not be associated with traditional forms of religious expression, at least among Christian groups. The Deferring style may be related to religious expressions tied to traditional structures and dogma, and the belief that God will respond to personal needs. In contrast, the Collaborative style should be associated with a more involving religion,

one which relies less on God to meet personal needs, and more on practices which facilitate and maintain a personal relationship with God.

The three styles of problem-solving may also have different implications for the competence of the individual. Robert White (1959) proposed that "effectance," defined as "the active tendency to put forth effort to influence the environment," is the foundation for the ability to deal competently with the world (185). Since then, notions of personal responsibility for life tasks and an active coping orientation have been hallmarks of various definitions and empirical studies of personal well-being (Barron, 1963; Smith, 1968; Spivack *et al.*, 1976; Tyler, 1978). More directly relevant to the study of religion is the work of Pruyser (1977), who distinguishes between a neurotic religion characterized by the sacrifice of personal responsibility and agency, and a healthy religion involving the full active use of human capacities in life.

This literature clearly suggests a direct relationship between the Self-Directing problem-solving style and competence. The Deferring style, however, may ultimately hinder the individual from confronting and dealing with personal problems and developing greater competence. Indeed, the generic criticisms of religion as a "crutch" or "defense" may be most relevant to this problem-solving style (Freud, 1949; Ellis, 1960). Thus, the Deferring approach is expected to relate to lower levels of competence.

Like the more active Self-Directing style, the Collaborative problem-solving style should relate to higher levels of competence. Unlike the Self-Directing style, however, it incorporates the notion of shared responsibility for problem-solving. With some exception (e.g., Wong & Sproule, 1983), the idea of shared responsibility has not been discussed by social scientists. Yet, as a style involving a supportive relationship with God, it may be helpful in dealing with personal problems. In this vein, several investigators have reported higher levels of self-esteem and spiritual well-being among those who see themselves as more involved in a personal caring relationship with God (Benson & Spilka, 1973; Maton & Rappaport, 1984; Paloutzian & Ellison, 1982).

In this study, the styles of problem-solving were examined through factor analytic methods. The relationships between these styles and measures of religiousness and measures of competence were then studied.

METHOD

Measures

Development of Religious Problem-Solving Scales. The sequential models of problem-solving developed by Spivack *et al.* (1976), D'Zurilla and Goldfried (1971), Folkman and Lazarus (1980), Lazarus and Folkman (1984), and Tyler (1978) served as a framework for building the religious problem-solving scales. Six phases of problem-solving were identified: define the problem, general alternative solutions, select a solution, implement the solution, redefine the problem, and maintain oneself emotionally. Religious problem-solving items reflective of the three styles were generated for each of these phases. More specifically, for every religious problem-solving style, two items were generated for each of these six phases. Thus, each religious problem-solving style scale consisted of twelve items. The items are presented in Table 1. The subjects were asked to indicate how often each of

the statements applied to them. They responded on a five-point Likert scale ranging from "Never" to "Always." The items from the three scales were mixed together to form a single questionnaire.

Religiousness. Several measures were used to assess multi-dimensional aspects of the individual's religious orientation. The importance of religion to the individual, or Religious Salience, was assessed by a five point Likert-type item ranging from "not at all" to "very religious." Frequency of Attendance at Religious Services was measured by a Likert-type item with six alternative responses ranging from "never" to "two or more times a week." Frequency of Prayer outside of church was studied through a Likert-type item with seven alternatives ranging from "never" to "one or more times a day." The degree to which religion represents a central motivating force in the individual's life was measured by Hoge's (1972) Intrinsic Religious Motivation Scale. Feagin's Extrinsic Religious Orientation scale was used to measure the extent the individual is involved in religion for external reasons (e.g., social gain, social approval). To assess the degree the individual approaches religion from a searching questioning perspective, the Quest scale was used (Batson & Ventis, 1984). Kopplin's (1976) eight item God Control scale was used to measure the individual's sense of control by God. Finally, adherence to orthodox religious doctrine was assessed by a seven-item revised version of Batson's Orthodoxy scale (Batson & Ventis, 1984). These scales and items have been widely used in prior study and have demonstrated reliability and validity as measures of personal religiousness.

Competence. Smith (1968) and Tyler (1978) have conceptualized individual competence in terms of three dimensions:

Self Attitude: The degree to which subjects view themselves positively was assessed by the Rosenberg (1972) Self Esteem scale. The degree to which subjects attribute control over the events in their lives to themselves and to chance was studied through Levenson's (1971) Personal Control and Chance Control scales.

World-Attitude: The extent to which the individual views others positively was measured by an Intolerance of Differences scale made up of eight items from Martin and Westie's (1959) and Budner's (1962) Intolerance of Ambiguity scales and two items developed by the investigators. A sample item from the scale is "I have a hard time accepting people who are different from me."

Problem-solving: Tyler's (1978) Behavioral Attributes of Psychosocial Competence (BAPC) scale was used to assess the individual's ability to solve problems in an active planful manner. Evidence supportive of the reliability and validity of each of these scales has been presented in previous research.

Subjects

One hundred ninety-seven members were drawn from one Presbyterian church and one Missouri Lutheran church in the midwest. The sample was 57% female, 69% married, almost exclusively white, and varied in their educational background (25% less than high school; 17% graduate education). On the average, they were 46 years old, had lived in town for 20 years, and had belonged to the church for 11 years. Ninety-five percent of the sample reported attending religious services at least once a month.

Procedure

Members were selected through a systematic sampling procedure. Specifically, the minister and leaders of the church divided their membership list into groups of more active and less active members. Fifty members from each group were contacted by phone and asked to participate in the study by church leaders or the clergy. Those unable to participate were replaced with another member from the respective group through the systematic sampling process.

The subjects anonymously completed a questionnaire containing the Religious Problem-Solving scales, the religiousness scales, and the competence scales in a group testing at their respective church.

RESULTS AND DISCUSSION

Factor Analysis and Reliability

The 36 items making up the Religious Problem-Solving Scales were entered into a factor analysis computed by SAS PROC FACTOR (non-iterative principal factors). A Promax oblique rotation was selected because the factors were expected to be distinct but correlated with each other. The scree plot pointed to a three factor solution, each of which had an eigenvalue greater than one. The three factors accounted for 86 percent of the common variance in the sample.

In Table 1 the factor loadings are presented for each of the 36 items. The loadings are SAS standardized regression coefficients after Procrustean rotation. As can be seen, the three factor solution provides strong support for the three problem-solving styles hypothesized in this paper. The first factor consists of the twelve items from the Collaborative scale. The second factor consists of the twelve items of the Self-Directing scale. The third factor consists of the twelve items from the Deferring scale. The factor solution is quite clean. With the exception of one item (Self-Directing #11), every item loads greater than .40 on its appropriate factor and less than .30 on the other two factors. In fact, 31 of the 36 items load greater than .60 on their appropriate factors. Not unexpectedly, the three factors are moderately intercorrelated: Collaborative with Self-Directing ($r = -.61$), Collaborative with Deferring ($r = .47$), and Self-Directing with Deferring ($r = -.37$).

The three religious problem-solving scales were used in further analyses by summing the twelve items from each scale to form scale scores. As a check on the internal consistency of the scales, Cronbach's alpha statistics were calculated. The reliability estimates for the three scales were high: .94 (Collaborative), .94 (Self-Directing) and .91 (Deferring). The means and standard deviations for the three scales were: Collaborative (Mn = 36.02, SD = 10.67); Self-Directing (Mn = 29.70, SD = 10.71); and Deferring (Mn = 25.81, SD = 9.19). Taitel, Kooistra and Hathaway (1987) conducted a test-retest reliability analysis of the scales over a one week period among a sample of 97 college students. The reliability estimates were .93 (Collaborative); .94 (Self-Directing); and .87 (Deferring).

In sum, the results of the factor analyses provided strong support for the three problem-solving styles. Each of the three factors was clearly defined by one of the three

TABLE 1
FACTOR ANALYSIS OF RELIGIOUS COPING STYLES

Scale	Problem-Solving Dimension	Item	Factor 1	Factor 2	Factor 3
C 1	S	When it comes to deciding how to solve a problem, God and I work together as partners.	0.85	-0.02	0.01
C 2	G	When considering a difficult situation, God and I work together to think of possible solutions.	0.80	-0.05	0.04
C 3	I	Together, God and I put my plans into action.	0.80	0.00	0.04
C 4	M	When I feel nervous or anxious about a problem, I work together with God to find a way to relieve my worries.	0.78	-0.09	-0.07
C 5	G	The Lord works with me to help me see a number of different ways that a problem can be solved.	0.75	0.00	0.03
C 6	R	After solving a problem, I work with God to make sense of it.	0.72	0.03	0.09
C 7	D	When I have a problem, I talk to God about it and together we decide what it means.	0.71	-0.16	0.00
C 8	I	In carrying out solutions, I work hard at them knowing God is working right along with me.	0.70	0.06	-0.06
C 9	D	When faced with a question, I work together with God to figure it out.	0.68	-0.14	0.03
C 10	S	God and I talk together and decide upon the best answer to my question.	0.65	-0.19	-0.05
C 11	R	When a hard time has passed, God works with me to help me learn from it.	0.48	-0.21	0.20
C 12	M	When I'm upset, I try to soothe myself, and also share the unpleasantness with God so He can comfort me.	0.43	-0.11	0.08
S 1	R	After I've gone through a rough time, I try to make sense of it without relying on God.	-0.04	0.82	0.02
S 2	D	When I have difficulty, I decide what it means by myself without help from God.	-0.09	0.79	0.05
S 3	R	When a difficult period is over, I make sense of what happened on my own without involvement from God.	-0.04	0.79	0.03
S 4	M	When faced with trouble, I deal with my feelings without God's help.	-0.20	0.72	-0.6
S 5	S	When deciding on a solution, I make a choice independent of God's input.	0.00	0.72	0.08
S 6	M	When I feel nervous or anxious, I calm myself without relying on God.	-0.03	0.70	0.01
S 7	G	When thinking about a difficulty, I try to come up with possible solutions without God's help.	-0.08	0.70	-0.01
S 8	S	When faced with a decision, I make the best choice I can without God's involvement.	-0.19	0.70	0.05
S 9	G	When I am trying to come up with different solutions to troubles I am facing, I do not get them from God but think of them myself.	-0.14	0.70	0.01
S 10	I	I act to solve my problems without God's help.	-0.22	0.64	0.00

TABLE 1 (continued)
 FACTOR ANALYSIS OF RELIGIOUS COPING STYLES

Scale	Problem-Solving Dimension	Item	Factor 1	Factor 2	Factor 3
S 11	I	God doesn't put solutions to my problems into action, I carry them out myself.	0.47	0.62	-0.30
S 12	D	When I run into a difficult situation, I make sense out of it on my own without divine assistance.	-0.26	0.62	0.00
D 1	S	Rather than trying to come up with the right solution to a problem myself, I let God decide how to deal with it.	-0.01	-0.03	0.84
D 2	I	In carrying out solutions to my problems, I wait for God to take control and know somehow He'll work it out.	-0.01	-0.07	0.80
D 3	G	I do not think about different solutions to my problems because God provides them for me.	-0.05	0.06	0.78
D 4	D	When a troublesome issue arises, I leave it up to God to decide what it means for me.	0.12	0.00	0.73
D 5	M	When a situation makes me anxious, I wait for God to take those feelings away.	0.09	0.00	0.69
D 6	S	When faced with a decision, I wait for God to make the best choice for me.	0.04	-0.03	0.68
D 7	R	I don't spend much time thinking about troubles I've had; God makes sense of them for me.	0.12	0.09	0.64
D 8	D	When I have a problem I try not to think about it and wait for God to tell me what it means.	-0.04	-0.14	0.60
D 9	M	I do not become upset or nervous because God solves my problems for me.	0.10	0.10	0.60
D 10	G	When I run into trouble, I simply trust in God knowing that he will show me the possible solutions.	0.22	-0.06	0.54
D 11	R	I don't worry too much about learning from difficult situations, since God will make me grow in the right direction.	0.12	0.12	0.51
D 12	I	God solves problems for me without my doing anything.	-0.21	-0.09	0.47

C - Collaborative
 S - Self-Directing
 D - Deferring

D - Define the Problem
 G - Generate Alternatives
 S - Select a Solution
 I - Implement the Solution
 R - Redefine the Problem
 M - Self-Maintenance

problem-solving styles. Further, the scales derived from these factors demonstrated high internal consistency and high stability.¹

1. Shorter versions of the scales were also developed by selecting the one item from the pair of items for each of the problem-solving dimensions with the higher factor loading. This process yielded three six-item scales with high internal consistency: Collaborative (Items C1, C2, C3, C4, C6, C7; $\alpha = .93$); Self-Directing (Items S1, S2, S4, S5, S7, S10; $\alpha = .91$); and Deferring (Items D1, D2, D3, D4, D5, D7; $\alpha = .89$). The short form scales also correlated highly with the full forms: Collaborative ($r = .97$), Self-Directing ($r = .98$), and Deferring ($r = .97$).

Problem-Solving and Religiousness

Pearson Correlations. Pearson correlations were conducted to assess the relationship between the three religious problem-solving style scales and the measures of religiousness. These results are presented in Table 2. The Self-Directing scale scores correlated in a significant negative direction with each of the measures of religiousness with the exception of Quest. Positive relationships emerged between the Deferring and Collaborative Scales and the religiousness measures. Both of these problem-solving styles were associated with significantly higher scores on each of the religiousness measures with the exception of Quest.

TABLE 2

PEARSON CORRELATIONS OF COPING STYLES WITH RELIGIOUSNESS MEASURES, AND PARTIAL CORRELATIONS OF EACH COPING STYLE WITH RELIGIOUSNESS MEASURES WITH EFFECTS OF OTHER TWO COPING STYLES PARTIALLED OUT

	Self-Directing		Deferring		Collaborative	
	Pearson	(Partial)	Pearson	(Partial)	Pearson	(Partial)
Frequency Church Attendance	-.24**	-.09	.20**	.06	.26**	.08
Frequency Prayer	-.56***	-.31***	.33***	-.03	.54***	.24***
Religiousness Salience	-.41***	-.03	.33***	.08	.53***	.32***
Intrinsic	-.64***	-.38***	.39***	.08	.59***	.23**
Extrinsic	-.18*	.01	.37***	.32***	.27**	.05
Doctrinal Orthodoxy	-.59***	-.38***	.49***	.25***	.51***	.10
God Control	-.60***	-.35***	.62***	.44***	.56***	.09
Quest	.09	.17*	-.11	-.11	.00	.17*

N = 185

*p < .05

**p < .01

***p < .001

In several instances, the measure of religiousness was more strongly related to the Collaborative than the Deferring problem-solving style. To test for the significance of the difference between these correlations, these Pearson correlations were converted to Z scores and a t test was calculated. The results indicated that Intrinsic ($t(176) = 3.28$, $p < .01$), Frequency of Prayer ($t(186) = 3.51$, $p < .01$), and Religious Salience ($t(186) = 3.15$, $p < .01$) related more strongly to the Collaborative than the Deferring scale.

Partial Correlations. As noted earlier, the three problem-solving factors were moderately correlated with each other. To assess the independent relationship between

each of the problem-solving style scales and the measures of religiousness, partial correlations were conducted. Specifically, the relationships between each problem-solving scale and the measures of religiousness were calculated after partialling out the effects of the other two problem-solving scales. The results of these analyses also are presented in Table 2.

These results provide a sharper picture of the unique correlates of the three problem-solving styles. The Self-Directing style continues to relate negatively to Frequency of Prayer, Intrinsic, Doctrinal Orthodoxy, and God Control. However, with the effects of the other styles removed, it no longer relates inversely to Frequency of Church Attendance, Religious Salience and Extrinsic. Further, it correlates in a small but significantly positive manner with Quest.

While both Deferring and Collaborative scales continue to relate directly to measures of religiousness, they are associated with different aspects of religion. The Deferring problem-solving style correlates significantly with Extrinsic, Doctrinal Orthodoxy, and God Control. In contrast, the Collaborative style relates positively to Frequency of Prayer, Religious Salience, Intrinsic and Quest.

As predicted, the three styles of problem-solving appear to reflect different orientations to religion. Traditional religious interest and practices are not a part of the Self-Directing problem-solving style. To the extent that individuals define themselves as the source of problem definition and solution, they may feel less need for religious involvement. However, it is important to note that all of the members of the sample maintained some relationship with their congregation and religion. Further, when the effects of the other problem-solving styles were removed, the Self-Directing approach was related significantly to a quest orientation. Thus, this style is not entirely a "non-religious approach."

In contrast, both Deferring and Collaborative approaches were associated with significantly higher levels of involvement in religion. Consistent with our expectations, however, these styles were related to different dimensions of religion. The Deferring style seems to be part of a religious orientation characterized by reliance on external rules, beliefs and authority to meet particular needs. On the other hand, the Collaborative orientation appears to be part of an internalized committed form of religiousness founded on an intimate interactive relationship with God.

Problem-Solving and Competence

Pearson Correlations. Pearson correlations were also conducted to examine the relationship between the measures of religious problem-solving and measures of competence. The results of these analyses are presented in Table 3. Modest support was obtained for the predicted relationship between the Self-Directing approach and competence. This style correlated significantly with Personal Control and Self-Esteem. However, it did not relate significantly to Chance Control, Intolerance of Differences, or the BAPC.

Contrary to the predictions, the Collaborative style did not relate positively to the measures of competence. With the exception of a small inverse relationship with Personal Control, this problem-solving style was not significantly associated with the competence measures.

TABLE 3

PEARSON CORRELATIONS OF COPING STYLES WITH COMPETENCE MEASURES, AND PARTIAL CORRELATIONS OF EACH COPING STYLE WITH COMPETENCE MEASURES WITH EFFECTS OF OTHER TWO COPING STYLES PARTIALLED OUT

	Self-Directing		Deferring		Collaborative	
	Pearson	(Partial)	Pearson	(Partial)	Pearson	(Partial)
Personal Control	.33***	.27***	-.44***	-.42***	-.16**	.25***
Chance Control	.08	.03	.18*	.26***	-.06	-.17*
Self-Esteem	.16*	.17*	-.28***	-.35***	.00	.27***
Intolerance of Differences	.00	.10	.33***	.36***	.10	-.03
BAPC	.06	.04	-.19*	-.23**	.00	.14

N = 185

*p < .05

**p < .01

***p < .001

However, as predicted, the Deferring scale correlated in a significant negative direction with Personal Control, Self-Esteem and BAPC. Further, this style related directly to Intolerance for Differences and Chance Control.

Partial Correlations. Once again, partial correlations were conducted to assess the relationship between each of the problem-solving styles and the measures of competence with the effects of the other two problem-solving styles removed statistically. Given the positive correlation between the Deferring and Collaborative factors, we were particularly interested in determining whether the predicted positive relation between the Collaborative scale and competence had been masked by the effects of the Deferring scale. The results of these analyses are presented in Table 3.

These results indicate that the positive relationship between the Collaborative approach and competence had indeed been suppressed by the other problem-solving scales. The partial correlations between the Self-Directing and Deferring scales and the competence measures are quite similar to the Pearson correlations. However, when the effects of these two problem-solving scales are partialled from the relationship between Collaborative problem-solving and competence, a different set of results emerges. Specifically, the Collaborative scale is significantly positively, rather than negatively, related to Personal Control. Further, it now relates significantly to lower Control by Chance and higher Self-Esteem.

Thus, the three styles of problem-solving seem to have different implications for the competence of individuals as well as for their religious orientation. The Self-Directing problem-solving style appears to be an active coping orientation which stresses personal agency, involves lower levels of traditional religious involvement, and is part of a generally effective style of functioning. These findings are consistent with a large body of research

in which active self-directed problem-solving efforts have been associated with greater psychological competence (Lazarus & Folkman, 1984; Smith, 1968; Tyler, 1978).

Strong support was obtained for the negative relationship predicted between the Deferring style and competence. This problem-solving approach was related significantly to a lower sense of personal control, lower self-esteem, less active planful problem-solving skills, less tolerance for individual differences, and a greater sense of control by chance. Thus, this study empirically identified what may be the generally dysfunctional religious problem-solving style often alluded to in criticisms of religion (Ellis, 1960; Freud, 1949; Pruyser, 1977). The Deferring approach seems to be part of a passively-oriented life style in which individuals rely on external structures and authority to deal with problems which they are less able to resolve.

Finally, in support of our prediction, when the effects of the other problem-solving scales are partialled out, the Collaborative problem-solving style was significantly associated with a greater sense of personal control, a lower sense of control by chance, and higher self-esteem. Therefore, in contradiction to the arguments of those who view religion in generally critical fashion (Ellis, 1960; Freud, 1949), an efficacious style of religious problem-solving was identified in this study. The process of active personal exchange with God embodied in the Collaborative approach appears to hold positive implications for the competence of congregation members.

The Independent Contribution of the Problem-Solving Styles to Competence

Gorsuch (1984) has argued that researchers should demonstrate the contribution new constructs and measures make above and beyond existing approaches in the scientific study of religion. In the present study, the problem-solving scales related to the measures of competence. Since the problem-solving measures also correlated significantly with the measures of religiousness, question arises whether the styles of problem-solving contribute variance, independent of religiousness, to the prediction of competence.

To examine this possibility, the religiousness measures were correlated with the indices of competence. Of the religiousness measures, only the Extrinsic religious orientation scale related in significant fashion to the competence scales. Extrinsic religiousness was associated with lower Personal Control ($r = -.15$, $p < .05$), greater Chance Control ($r = .27$, $p < .01$), lower Self-Esteem ($r = -.34$, $p < .001$), and greater Intolerance of Differences ($r = .39$, $p < .001$).

As noted earlier, the partial correlations revealed that Extrinsic religiousness was significantly associated with only the Deferring style. To assess the unique contribution of the Deferring scale to the prediction of competence, Deferring scale scores were regressed on the measures of Extrinsic religiousness and competence. This analysis resulted in an R squared value of .39. Deferring scores were then regressed on the measure of Extrinsic religiousness alone, yielding an R squared value of .14. The difference between these two values (R squared = .25) points to a substantial contribution of a Deferring style to the prediction of competence independent from that of Extrinsic religiousness. Thus, the concept and measures of religious problem-solving appear to add new information to our understanding of the relationship between religion and competence.

CONCLUSIONS AND IMPLICATIONS

In sum, these results provide initial support for three styles of religious problem-solving, styles which relate in distinctive ways to aspects of the individual's religious orientation and competence. More broadly, this study underscores the important role religion plays in the problem-solving process.

The findings suggest several directions for additional theoretical, as well as more applied, study. First, it is interesting to note that both Deferring and Collaborative styles were significantly related to Kopplin's (1976) measure of the sense of control by God. This scale has been frequently used in the religious attribution literature (Pargament, Sullivan, Tyler & Steele, 1982; Spilka & Schmidt, 1983; Maton & Rappaport, 1984). These results support the view that the construct of "God control" is a multi-dimensional one, more complex than initially imagined (Pargament & Hahn, 1986). More specifically, an individual reporting a high sense of control by God may not necessarily be speaking of control through active manipulation *by* God, but rather control through active exchange or interaction *with* God. Indeed, the higher mean score of the sample on the Collaborative than the Deferring scale suggests that the interactive style of relationship with God may be more commonly held than the manipulative style. However, it should be stressed that the partial correlations point to the Deferring approach, not the Collaborative approach, as the significant independent predictor of the sense of control by God. Thus, as a "pure construct," the sense of control by God seems most reflective of a Deferring style. These results highlight the importance of specifying the type of relationship between the individual and God underlying the sense of control by God in further attributional research.

It is also important to note that despite their different implications for the well-being of the individual, the Deferring and Collaborative problem-solving styles were significantly correlated with each other. This correlation suggests that people who are likely to use a Collaborative problem-solving approach in one situation are more likely to use a Deferring approach in that or other situations as well. This finding may have some practical significance. Given their very different implications, religiously involved individuals might be helped to distinguish between these two problem-solving styles and to rely more on a Collaborative problem-solving approach.

However, it is important to note that while the active problem-solving styles may be more *generally* useful than more passive approaches, these styles may be somewhat differentially effective for those confronting different life problems. For example, the Self-Directing approach may be most useful to people dealing with personally controllable situations. It may prove less helpful to individuals who face situations, such as medical illness, accidents or death, which lie beyond their control or severely test their coping resources. In these situations, the Collaborative and Deferring styles could be more helpful. Thus, further research should consider the implications of the styles of problem-solving for different populations facing different life situations.

Finally, it is particularly important to examine how the problem-solving styles develop. At least two processes may be operating. Individuals of different levels of competence may be particularly attracted to different problem-solving styles. For example, people less competent may prefer a Deferring style for the external support and strength it provides. More competent individuals may be drawn to Self-Directing or Collaborative

styles for the personal initiative, responsibility and opportunities they offer. The problem-solving styles may also inhibit or promote the development of competence. For example, the Deferring style, while offering short-term reassurance and respite from anxiety, may also discourage active experimentation in the world and opportunities for learning. Through the promise of partnership with God, the Collaborative style may help individuals manage their feelings, while encouraging explorations of the world and more effective living skills.

Research in these directions may contribute to a clearer understanding of the ways in which religion is involved in the problem-solving process. More practically, it may be useful to religious and secular counselors in their efforts to help people deal with problems and prevent further problems from developing.

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