

Personality and Structure of Resource Preferences

TWO STUDIES IN RESOURCE THEORY

Werner STANGL

Department of Educational Sciences and Psychology
University of Linz, A - 4040 Linz-Auhof, Austria

This chapter outlines two studies in resource theory (Foa & Foa, 1974; Foa & Foa, 1976). The first study presents the stages of development of the PW ("Persönliche Wunschorstellungen" - "Inventory of Preferences for Interpersonal Resources") - a German version of the "Inventory of Wishes for Interpersonal Resources" (IWIR; Foa & Bosman, 1979) -, the second study reports the results of an application of this psychological instrument. A detailed description of resource theory, its structure, and its premises can be found in some other parts of this book. In this chapter only those characteristics of the theoretical model are mentioned which are in close connection with the aims of both studies.

The first study reports the results of the development of the German test version. The original version of this instrument is based on a taxonomy of resource classes suggested by resource theory. This taxonomic system is viewed as a structural model of the relative degree of cognitive differentiation among the various interpersonal resource classes (Turner, Foa & Foa, 1971, p. 169). First of all, it is tested to what extent an instrument, developed for the most part for an American population with its cultural idiosyncracies, can be generalized on the basis of an European sample. Foa & Foa (1974, p. 65) point out, based upon empirical evidence, that the "structure of (resource) classes is constant across cultures, roles". It is also tested if the circular order of resources can be found in our cultural context also, and if the maintained symmetry of preferences for resources can be validated.

Finally, the aim of PW is the measurement of individual preferences for specific classes of resources irrespective of situations. It is supposed, that people differ in general, in which sort of resources they prefer to exchange in social situations and which they refuse. The preference for distinct resources is tested with reference to the cognitive structures of the subjects, which is an important individual component of personality, which must not be neglected in a psychological investigation on social processes and relations. Turner, Foa & Foa (1971, p. 168) point out that any resource is a potential reinforcer. Certainly, resources and their classification are no "objective" detectable facts and relations, but rather they pertain to the meaning, which is assigned or attributed to behaviors by the persons involved. Foa & Foa (1974, p. 82) emphasize, that "we should remember that the resource classes are categories of the meanings assigned to actions and not a classification of action". It is often the case that the same behavior will vary in meaning across different social contexts (Turner, Foa & Foa, 1971).

The second study is concerned in some differential psychological aspects of resource theory. It is tested to what individual characteristics preferences for resources can be traced back, that is to say what relations can be found between resource preferences and personality factors. Attributions of meaning are individual matters, which stands for the fact that the value and the importance of a resource depends first of all on the individual learning history and experiences of a person. The result of these individual experiences is the evaluation of a resource, which can be measured by the preference for or refusal of a specific resource. It is also tested if typical patterns of preferences for resources can be identified, and how these types can be interpreted with respect to personality structures.

STUDY 1

The first step in the development of the PW was the transcription of the IWIR (Foa & Bosman, 1979). This test measures the preference for each class of resources in three particularistic institutions (family of birth, marriage, friendship) and four nonparticularistic ones (school, employment, stores, hairdressers). In each institution (situation) six scales are presented, one for each resource class. The subjects are asked to rank each statement on a scale ranking from 0 to 4 ("not at all" to "very much"). The seven institutions differ with respect to the resource usually exchanged in them. Detailed investigations of resource theory suggest that preference for a given resource depends not only on the resource previously provided, but also on the situational context in which the exchange takes place (Foa & Foa, 1976, p. 117). In school, for instance, one is more likely to prefer information to service, or in marriage to prefer love to money. By averaging the ratings for a resource over all institutions a score of the preference for a particular resource can be found, irrespective of institutional constraints. Therefore, a higher average score indicates a stronger preference.

For the first 30 students of economics were presented the translated version of the instrument (PWa). The empirical

results and discussions with the subjects led to slight modifications of the original test concept. These modifications concern first of all the selection of situations (institutions) and the wording of some statements (behaviors). Furthermore, a symmetry between the situations and the resource classes was established. The second version (PWb) comprises six situations (institutions), which differ regarding to the resources usually exchanged in them. These situations are: employment (status), hairdressers (service), insurances (money), partnership (love), school or training (information), stores (goods). In each institution six statements are presented, one for each resource class. At the outset of the test a try-out situation (family of birth) is placed, which is excluded from the computation of preference scores. Another modification compared with the original version of the test is the graphic (symbolic) presentation of the steps of scale (Appendix A). That symbolic presentation has proved its value in former test constructions, especially in respect to (interval) scalability. Specially these symbolic steps are familiar to the subjects. For the computation of individual preference scores the symbols are codified in numbers: 1 (not at all desirable) to 5 (very desirable). In addition the six ratings corresponding to a distinct resource class are averaged so that a higher score indicates a greater preference for a particular resource. This average scores can be computed by the mean of a scoring sheet (Appendix B). The second version of the instrument was administered to a sample of 30 subjects of different ages (range from 14 to 53 years; 15 male, 15 female) for testing the wording of the statements and the instruction. Based on the results, few further slight modifications are made. The resulting final version of the test (PW; Appendix A) was presented in four different studies besides other tests. One of these studies is reported on later (Study 2).

Subjects

This study involved a stratified sample of 447 subjects in Upper Austria, the mean age of the sample was 43 years (range 15 to 71), 210 males and 237 females. The distributions according to the size of communities, educational level and occupational status are corresponding to the population of Upper Austria. Testing was conducted in single sessions by the author, by psychologists working in a child guidance institution, and by students of economics.

Results

The empirical results of this study are presented according to the central hypotheses of resource theory. The first hypothesis is the similarity-dissimilarity hypothesis: the more two resource preferences are proximal in the order, the more they will be estimated similarly; the more two resource preferences are distal in the order, the more they will be estimated different. The second hypothesis concerns the structural (circular) order of resource preferences which is obtained by locating their position on the two conceptional dimensions of particularism and concreteness.

The similarity-dissimilarity structure of resource preferences

TABLE 1 shows the means of preference ratings for the six resource classes averaged over the six situations.

TABLE 1
Mean resource preferences in six social situations (N=447)

Resource	Mean preference score in					
	partnership	hairdressers	stores	insurance	school	employment
Love	4.8	4.5	3.9	3.6	3.6	3.8
Services	4.5	4.6	4.3	4.5	3.8	4.1
Goods	2.6	3.8	4.8	4.5	4.2	4.0
Money	2.9	3.8	4.6	4.7	3.9	3.7
Information	3.8	3.1	2.4	4.7	4.6	4.4
Status	4.8	2.1	3.9	3.9	4.6	4.7

Score range 1 to 5; a higher score indicates greater preference

Examination of the means reveals the expected structure, that is the behavior (resource) corresponding to the situation class (mean printed bold), i.e., which is usually exchanged in it, has the highest value of all behaviors presented. In four situations (partnership, hairdressers, stores, insurance) the mean scores for the other resource classes are decreasing in accordance with the predictions of resource theory, in two situations (school, employment) there are slight deviations. In school goods are more important (preferred) than predicted, in employment services and goods are more important. It must be noted that the PW does not measure real exchanges of resources in the presented situations, but only preferences for resources corresponding to the situation which only presumably evokes needs for a specific resource. Therefore each social situation may be characterized by its own profile of the relative frequency of resources preferred (Turner, Foa & Foa, 1971, p. 174). Probably the few deviations found stem from cultural differences in

interpreting situations and behaviors, e.g., in employment services - properly speaking, social relations - were attached more weight than in American samples. Nevertheless, examining columns and rows reveals only slight deviations so that the results seem to indicate the appropriateness of the propositions of resource theory.

For testing the internal consistency of the preference scales an item analysis was computed. The Cronbach's α -coefficients of the six scales are between $\alpha = 0.54$ and $\alpha = 0.66$, therefore they are smaller than in comparable scales. Considering that the six behaviors (statements) of every scale are in a different social context the consistency coefficients are sufficient. Nevertheless, several item's total correlations may be increased by an improvement of the statement wording.

The circular order of resource classes

One important characteristic of resource theory is the circular order of resource classes by plotting them on the two dimensions of concreteness and particularism. For testing the structural hypothesis product-moment correlations among the total scores of resource preferences are computed. The patterns of coefficients and their relative sizes support the predicted order. Only one prediction of the circular model of resource theory is violated by the results: the lowest correlation is not usually between resources two steps removed in the order.

The correlation matrix was used as the basis for a principal component analysis. Only one eigenvalue is greater than 1.0, but the explained variance of all factors is greater than 5 percent, so that the extraction of more than one factor is justifiable. Extracting and rotating three factors the loading orders of two factors defined the hypothesized dimensions concreteness (Factor I) and particularism (Factor III). The second factor has high loadings in money, goods, and services. It could be interpreted as evaluative dimension ranging from a materialistic evaluation of resources to an idealistic one on the opposite of this dimension. Maybe there is a similarity to the dimension of availability postulated by Brock in his commodity theory. Its principle premise is that "any commodity will be valued to the extent that it is unavailable, or scarce" (Brock, 1968, p. 246; quoted by Brinberg & Castell, 1982, p. 267). To illustrate the triple factorial structure of resource preferences the rotated loadings are found in FIGURE 1.

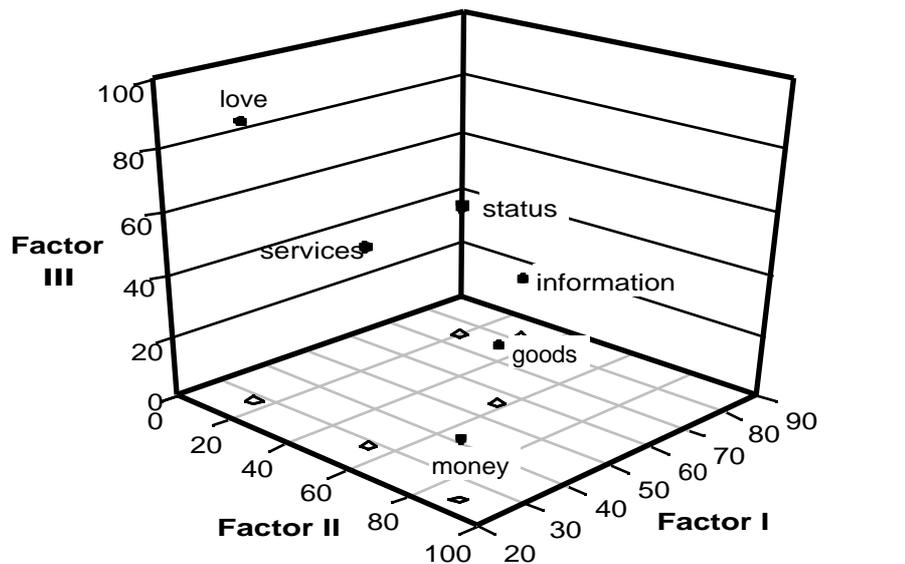


FIGURE 1
Structure of resources

It shows an inclined plane on which the six resource preferences are plotted in the hypothesized order with one exception: the resource classes money and goods are changed. Presumably this deviation from the predicted structure is due to the situations stores and insurance, in which there is a close relationship between the meanings of service and money. Another reason for the deviations from the theoretical structure may be located in the greater heterogeneity of the samples, which are taken from normal populations in contrast to the homogeneous student samples of most investigations on resource theory.

A separate factor analysis for males and females - here not reported in detail - shows in the two factor solutions for males the following order of resource preferences: goods-money-information-status vs love-service. For females

the order is: money-goods-information vs love-status-service. Maybe women have preferences which conform more to resource theory's propositions.

In general, the results validate the propositions of resource theory. Some reasons for slight deviations from the expected structure will be discussed later.

STUDY 2

The purpose of the second study of resource theory was to investigate interrelations between resource preferences and characteristics of personality. It is supposed that people differ with respect to their resource preference profiles. That means that groups of persons can be found which are similar to their needs for exchanging particular resources. Such groups or types of persons can be interpreted in accordance with personality traits.

Methods

Additional to the PW in this study the ESV ("Eigenschaften-Situationen-Verhaltensweisen" - "Adjectives-Situations-Behaviors") was presented to subjects. The ESV consists of 3 x 16 contrasted pairs of adjective groups, situations, and behavior groups for a self-rating of personality. Sixteen personality factors can be computed each containing a situation, an adjective, and a behavior rating on a scale from 1 through to 5. These scales are derived from the German version of the 16 PF (Schneewind, Schröder & Cattell, 1983) and represent a further development of the PKP ("Polaritätsprofil zur Erfassung der kindlichen Persönlichkeit" - "Semantic differential for measuring child personality"; Stangl, 1986) and of the 16 PA ("Sechzehn Persönlichkeits-Adjektivskalen" - "Sixteen Personality-Adjective-Scales"; Brandstätter, 1987). The ESV cannot substitute a personality test but it allows to take a person's measure in the rough for scientific research questions. Compared to other scales the ESV is based on a structural model of personality, especially it is set against simple trait-oriented conceptions of personality. Judgements of situations, adjectives, and behaviors expand the scope on personality in a more complex and interactional way. In Appendix C the dichotomous conceptualized primary and second order factors of the ESV can be found. For tables the conventional signs of abbreviation for factors are used.

For reducing data a hierarchical cluster analysis has been used besides correlative measures. The Wardian (1963) clustering algorithm applied in this study uses the squared Euclidian distances between the individual resource preference profiles as similarity index. A class (group, type) of persons is defined as a clustering of objects wherein every object in the class is more similar to every other member of the class than it is to any object placed outside the class. This algorithm produces clusters of persons that are highly homogeneous and distinct from one another. To recheck (cross validate) the classification of cluster analysis a discriminant analysis is performed. Sixty percent of the sample is used to compute a linear combination of the six preference scores. The discriminant function coefficients are used to predict the cluster membership of the unselected cases.

Subjects

The second study used a subsample of the total sample in study 1. The PW and the ESV were presented to 183 subjects. Mean age of this sample was 33 years (range 15 to 71 years), 89 male, 94 female. Aside from age and educational level (higher in this study) the sample is comparable to the total sample in study 1. The averaged means of resource preferences were not different from them in the study already reported.

Results

For testing in a rough interrelations between resource preferences and personality factors product-moment correlations between preferences for resources and ESV factors were computed. Six primary factors and three second order factors show interpretable interrelations with preference scores. The signs of coefficients in a particular personality factor are in the same direction for all resource preferences, for the most part. It would be misplaced to interpret single coefficients in detail, but generally speaking there are some remarkable interrelations between preferences for resources and characteristics of personality.

People with high preference scores

- are more conscious of their duties,
- show high group adherence and high sociability,
- are more pragmatic and robust,
- are self confident and have a high level of endurance.
- are more conservative, and
- have high constraint to norm.

In general, people with high preferences for resources - irrespective of resource classes - are full of expectations of the world and have developed appropriate social skills for exchanges of resources. On the other hand, people with weaker need for resources are more anxious and cautious, especially in social contacts, but they are more independent and autonomous.

For reducing the complexity of the data, a cluster analysis has been used to identify classes, groups or types of persons with similar preference profiles. Visual inspection of the increase of the squared error sums (weighted distances from centroids), which is usually taken as a criterion for defining the number of clusters, resulted in four clusters. TABLE 2 presents the means of resource preferences for these groups.

TABLE 2
Cluster analysis (N=183)

Resource	Mean preference score in			
	Cluster A	Cluster B	Cluster C	Cluster D
Love	3.5	4.0	3.8	4.5
Services	3.8	4.2	4.4	4.7
Goods	3.4	3.8	4.2	4.4
Money	3.3	3.7	4.1	4.3
Information	3.3	3.6	3.9	4.3
Status	3.4	4.0	4.0	4.5

Score range 1 to 5; a higher score indicates greater preference

N for clusters: A - 38, B - 50, C - 36, D - 59

Cluster A and D are characterized by the extent of preference for resources in substance. Subjects in cluster A have low preference scores, subjects in cluster D high ones. The order of preferences is similar for both, only the preferences for status and goods are changed. Cluster B has the same order of preference scores as cluster D, so that three clusters differ only in terms of quantity. Only Cluster C differs in respect of structure. In the light of these circumstances Cluster A, B, and D must be interpreted cautiously, maybe they are representing only response tendencies. In contrast to the other groups the subjects of cluster C seems to prefer materialistic resources (services, goods, money) to idealistic ones. The structure of preferences of the subjects in this cluster calls to mind the evaluation factor found in study 1. In summary, the cluster analysis of resource preference profiles reveal some quantitatively and some structurally characterized groups of subjects. The cross validation of clustering using the algorithm described above, resulted in a correct classification of 85 percent, a number far from chance (24 percent).

Using the same clustering of persons reflecting the similarity of resource preference profiles, in TABLE 3 the means of the 16 primary and 5 second order factors measured by the ESV are reported.

TABLE 3
ESV scores in four resource preference clusters (N=183)

ESV factor	Mean factor scores in				Analysis of variance	
	Cluster A	Cluster B	Cluster C	Cluster D	F=	p=
A	3.3	3.8	3.5	3.6	2.39	0.07
B	3.4	3.3	3.3	3.2	0.55	0.65
C	3.1	3.2	3.3	3.2	0.19	0.90
E	3.2	3.1	3.4	2.9	2.90	0.04
F	2.8	3.0	2.9	2.8	0.43	0.73
G	3.0	3.5	3.7	3.8	6.59	0.00
H	2.9	3.3	3.3	3.1	1.89	0.13
I	3.3	2.8	2.7	2.6	4.93	0.00
L	3.1	2.9	3.3	3.1	1.38	0.25
M	3.0	2.6	2.4	2.4	5.99	0.00
N	3.1	3.1	3.3	3.1	0.52	0.67
O	2.7	2.7	2.5	2.4	1.96	0.12
Q1	3.0	2.8	2.8	2.5	2.88	0.04
Q2	3.0	2.5	2.5	2.5	4.21	0.01
Q3	3.1	3.3	3.3	3.2	0.49	0.69
Q4	2.9	2.8	2.9	2.6	1.36	0.26
QI	3.0	3.3	3.4	3.4	4.08	0.01
QII	3.0	3.2	3.2	3.2	1.33	0.27
QIII	3.0	3.1	3.2	3.0	1.53	0.21
QIV	2.9	2.9	3.0	3.1	1.68	0.17
QV	2.9	3.2	3.1	3.2	3.61	0.01

Characteristic personality factor scores are printed bold; score ranges 1 to 5
N for clusters: A - 38, B - 50, C - 36, D - 59

The preference clusters A and D, in the above analysis only quantitatively characterized, show with regard to the self-ratings in the ESV the most distinct personality profiles. Cluster A (low preference scores) includes subjects with task orientation, flexibility, unconventionality, radicalism, autonomy, low constraint to norms, and low sociability. This group differs most of all from group D (high preference scores), which is characterized by self-possession, sense of duty, robustness, pragmatism, and conservatism. Briefly, these personality types can be pointed out as more active and more passive. The personality self-rating scores of subjects in cluster B (idealistic) and C (materialistic) support the interpretation above like that the first type is highly interpersonal orientated and has high sociability, the latter is more self-assertive, pragmatic, and highly independent.

Combining the structures of resource preferences and personality factors in clusters A and D, a somewhat surprising characterization of groups is found. Subjects with low preference scores, which may be interpreted as persons with low needs, are more active than persons with high needs. Persons with high needs - that means that they are deficient of some basic resources - become inactive and passive. Presumably, this passivity is combined with a high level of dissatisfaction. The combination of passivity and high needs influences a person's social functioning, so that society does not provide the person with needed resources. In the long run such a person becomes unable to establish and realize a stable self. These results seem to reveal a certain need-behavior complementarity in personal structures. These conclusions must be regarded cautiously, because need and personality data were gathered from the same persons. Without further and detailed investigations they are a matter of speculation only.

Resuming this study in TABLE 4 three demographic characteristics of the clusters discussed above are reported.

TABLE 4
Clusters and several demographic variables (N=183)

	Cluster A	Cluster B	Cluster C	Cluster D	Analysis of Variance	
					F=	p=
Age (in years)	29	29	31	39	7.29	0.00
Sex (% of males/females)	71/29	42/58	33/67	49/51	4.05	0.01
Educational level (1)	4.8	4.8	4.5	3.7	10.43	0.00

N for clusters: A - 38, B - 50, C - 36, D - 59

(1) range 1 (low) to 6 (high educational level)

The interrelations reveal some interesting details. First of all, the extent of resource preferences depends on age in a way that older subjects are more passive and have higher needs than younger ones. Second, the lower the educational level the higher the resource preference scores. Third, cluster A characterized above as an active type with low needs comprises the overall highest percentage of males. These findings raise some questions which cannot be answered in this context. Maybe older people have a trend toward granting their preferences more frankly, maybe they really have more needs. A lower educational level maybe an indication of a lower economical level which resulted in higher needs.

Nevertheless, the results of the second study validates the theoretical concept of resource theory. The close relationship between person-environment interaction (exchange of resources) and the development of personality (need and preference for resources) emphasizes the importance of studying developmental processes over a long period of time. It is well-known that a lasting condition marked by the feeling of lack or want of something in young age is difficult to reverse.

DISCUSSION

The results of the first study - the testing of a German version of the IWIR - show that the structure of resource preferences found is similar to the original circular classification of resource theory. Further support was found for some further fundamental aspects and premises of this theory. However, the ordering of the resource categories along the dimension of concreteness is not completely consistent with the hypothesized structure. This result can be attributed partly to modifications of the original concept underlying the translated instrument, especially the choice of presented situations (institutions) and wording of the statements.

In general, the pattern of interrelationship among the investigated six classes of resources in the PW follows the theoretical order and is invariant with respect to different situations. Some slight deviations from the predicted order occur, but presumably these deviations are due to the construction of the scales and stem from specific characteristics of the chosen test situations. Often such deviations involve information, suggesting that this class of resources may require a closer scrutiny (Turner, Foa & Foa, 1971). For instance, the nonparticularistic resource classes (especially money and information) have some particularistic connotations in social contexts. Nevertheless, one important feature of resource theory is to make such latent implications visible and bring them within reach of empirical research.

One proposition of resource theory that the six classes of resources can be ordered by plotting them on two dimensions of particularism and concreteness must be changed for the German version of this test slightly, although the circular order of preferences for interpersonal reinforcers is supported. It seems that a third dimension, in this study interpreted as value dimension, influences the (cognitive) order of resources. This result may be due to the chosen situations, but as well due to characteristics of the cultural context the used samples belong. Gergen (1980, p. 262) illustrates this problem by pointing out many exceptions and resumes: "In short, the exchange patterns upon contemporary formulation is based may be considered historically, culturally, and situationally specific. In like manner, whether one repeats an action for which he or she has been rewarded is also historically situated. One need not do so (unless the concept of reward or reinforcement is entirely circular), and there would appear to be numerous occasions in which people do not. ... In no case do the patterns, norms, or endpoints of exchange seem genetically programmed. To the extent that theories of social exchange are dependent on observed regularities within the culture, they are essentially documenting social history. They primarily reflect the recurring patterns favored by the peculiar interplay of contemporary circumstance" (Gergen, 1980, p. 263). Our results seem to indicate this tendency.

Therefore, further research seems to be necessary on the symbolic characteristics of resources. Although the situations and statements of the PW are selected and constructed to be representative of a particular resource

category, the meanings of the contexts and behaviors very often can be interpreted in a divergent way. Discussions with subjects after testing show that the meaning of a resource changed very often when they were informed of the underlying concept. As Brinberg & Castell (1982) show money can be a symbol of love in a specific context. Some differences between the results obtained by the German PW and the original version of the instrument can be interpreted by the way that the symmetry of particularistic and nonparticularistic situations in the PW influences the interrelations found. But also some situations, e.g., stores, can be perceived in different ways: it makes a difference if a subject thinks of a large supermarket or a small drugstore. This aspect stresses the importance of developing a classification of situations and institutions similar to the taxonomy of resources. The theoretical model of resource theory comprises the personal context as well as the situational context of behavior, but up to now research is more concentrated on cognitive personal and behavioral characteristics than on situational contexts. However, it seems that the model of resource theory can be generalized on research on environmental contexts also. The studies of Brinberg & Castell (1982) show in this direction. By way of example the preference means of TABLE 1 are used to order the situations in the same circular order as resource preference classes. The structure of the PW situations in FIGURE 2 computed by correlating their resource demanding profiles follows the structure of preferences in FIGURE 1 to a great extent. It means that situations as well as behaviors can be classified by comparing their resource preference profiles.

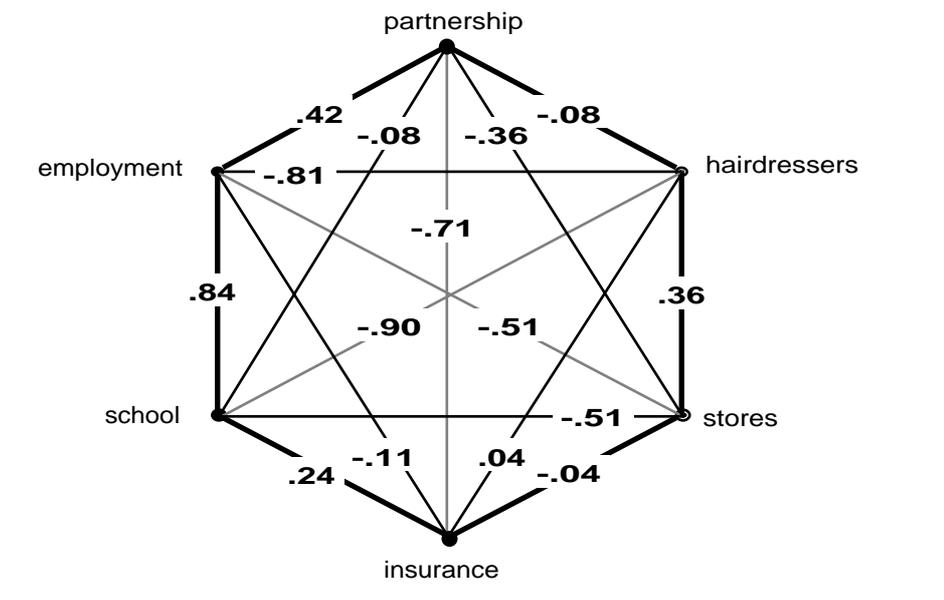


FIGURE 2
Intercorrelations among the six situations (N=447)

Furthermore, some propositions of resource theory may be associated with findings of Price & Bouffard (1974) and Price (1974). These authors analyzed the relationship between situational and behavioral clusters with respect to their mutual appropriateness. They found that certain behavior clusters were uniquely appropriate in certain situations. This result corresponds with findings of resource theory that situations differ in respect to the distribution of preferences for distinct resources. It must be emphasized repeatedly that the presented results are limited to the cognitive (perceived) structure of interpersonal reinforcers and cannot be extended to overt behavior implicitly. "A verbal report is not necessarily a reliable indication of what people do in actual situations. Indeed, many studies show that statements given by people regarding their reactions are not always identical with what they actually do" (Foa & Foa, 1976, p. 117). Only further studies on this topic will show to what extent the order of cognitive categories is reflected in overt behavior, but many comparisons between verbal reports and overt behaviors reveals that in both cases the pattern of preferences follows the theoretical structure (Foa & Foa, 1976, p. 118). Nevertheless, a growing body of empirical research confirms the premises and rules of resource theory.

It must be recognized that in many situations very often people have a limited choice of exchangeable resources. Institutional and situational restrictions prevent people from behaving "in accordance to theoretical propositions". Brinberg & Castell (1982, p. 268) bring to prominence that individuals modify their exchange of a resource by taking into account its actual availability. The functional meaning of an exchange depends in social situations not only on its specific classification of the behavior (i.e. the cognitive structure of subjects) but also on the limitations and barriers of the context (i.e. the subjective

reconstruction of a situation). One eminent feature of resource theory is to reveal and to explain differences between individual needs and situational constraints. As Donnenwerth & Foa (1974) show, leads the blocked opportunity for resource retaliation in kind to hostility and aggression and increases the intensity of retaliation.

Examining the results found in our studies very often it is difficult to decide if the interrelation between two resources is due to some "objective" kind of resource content or due to its interpretation (in the sense of subjective meaning) by a subject. Subjects of course will differ in respect of the interpretation of similarity or dissimilarity of two resources. This fact is complicated by the everyday life experience that a particular reinforcing event is often a combination of two or more resources (Turner, Foa & Foa, 1971, p. 178). Presumably, people differ in how many classes of resources they distinguish (cognitively and behaviorally). It seems possible that some people discriminate only between four or five classes of reinforcers. The discrimination between resource classes especially with regard to its evaluations also can change from situation to situation, even if the relative structure remains constant. Further research on this topic seems necessary.

Furthermore, a detailed comparison of resource theory to the hexagonal person- environment-model of Holland (1966, 1973, 1985) - although the latter is a trait-and-factor theory only - may be fruitful. The dimensions and structural characteristics of this model (realistic, investigative, artistic, social, enterprising and conventional behavior) and some of its premises are very similar to the propositions of resource theory. In Holland's model structures of personal behavior preferences are compared to perceived structures of environments for testing the person-environment congruence. The amount of congruence influences - disturbing or supporting - psychological phenomena like achievement, motivation, and satisfaction.

Resuming our findings it should be possible to develop a structural model of persons, behaviors, and situations according to the premises of resource theory that is more general than Holland's model, because Holland's theory is restricted to a few psychological questions up to now. The great benefit of resource theory is the strict concentration upon the symbolic meaning of psychological phenomena, and that it emphasizes that the meaning of any phenomenon is due to persons, behaviors, and contexts. This fact refers to a constructivistic view of psychological problems which implications cannot be discussed in detail here. Interpersonal exchanges of resources are not automatic reflexes but are mediated by emotional, motivational, and cognitive processes, which render the evaluation of resources and the sequence of events susceptible to the influences of individual expectations, interpretations, sets, and intentions.

The relations of resource preferences to personality characteristics - investigated in the second study - must not be overinterpreted, but give much evidence to the fact that individual preferences for resources depend on personality characteristics too. These findings are not surprising because the interpretations of situations and behaviors result to a great amount from individual experiences in the past. Further research on resource theory should take into account this fact. Interesting questions may be the investigation of the development of cognitive resource preference structures, as Foa & Foa (1974, p. 83) describe. Such questions are not only interesting with respect to child development, but the changing of resource preferences in the course of life in general should be investigated.

REFERENCES

- Brandstätter, H. 1987. *Sechzehn Persönlichkeits-Adjektivskalen (16 PA). Eine ökonomische Alternative zum 16PF?* Linz: University of Linz.
- Brinberg, D. & Castell, P. 1982. A resource exchange theory approach to interpersonal interaction: A test of Foa's theory. *Journal of Personality and Social Psychology*, 43, 260-269.
- Brock, T.C. 1968. Implications of commodity theory for value change. In A.G. Greenwald, T.C. Brock & T.M. Ostrom (Eds.), *Psychological foundations of attitudes*. New York: Academic Press.
- Cronbach, L.J. 1951. Coefficient alpha and the internal structure of tests. *Psychometrika*, 16, 297-334.
- Donnenwerth, G.V. & Foa, U.G. 1974. Effect of resource class on retaliation to injustice in interpersonal exchange. *Journal of Personality and Social Psychology*, 29, 785-793.
- Foa, U.G. & Bosman, J.A.M. 1979. Differential factors in need for love. In M. Cook & G. Wilson (Eds.), *Love and attraction*. Oxford: Pergamon Press.
- Foa, U.G. & Foa, E.B. 1974. *Societal structures of the mind*. Springfield, Ill.: Thomas.
- Foa, U.G. & Foa, E.B. 1976. Resource theory of social exchange. In J.W. Thibaut, J.T. Spence & R.C. Carson (Eds.), *Contemporary topics in Social Psychology*. Morristown, N.J.: General Learning Press.
- Gergen, K.J. 1980. Exchange theory. The transient and the enduring. In K.J. Gergen, M.S. Greenberg & R.H. Willis (Eds.), *Social exchange. Advances in theory and research*. New York: Plenum Press.
- Holland, J.L. 1966. *The psychology of vocational choice: A theory of personality types and model environments*. Waltham, Mass.: Blaisdell.

- Holland, J.L. 1973. *Making vocational choices*. Englewood Cliffs, N.J.: Prentice Hall.
- Holland, J.L. 1985. *Making vocational choices: A theory of careers*. Englewood Cliffs, N.J.: Prentice Hall.
- Price, R.H. & Bouffard, D.L. 1974. Behavioral appropriateness and situational constraint as dimensions of social behavior. *Journal of Personality and Social Psychology*, 30, 579-586.
- Price, R.H. 1974. The taxonomic classification of behaviors and situations and the problem of behavior-environment congruence. *Human Relations*, 27, 567-585.
- Schneewind, K.A., Schröder, G. & Cattell, R.B. 1983. *Der 16-Persönlichkeits-Faktoren-Test (16 PF)*. Bern: Huber.
- Stangl, W. 1986. *Polaritätsprofil zur Erfassung der kindlichen Persönlichkeit (PKP)*. Linz: University of Linz.
- Turner, J.L., Foa, U.G. & Foa, E.B. 1971. Interpersonal reinforcers: Classification, interrelationship and some differential properties. *Journal of Personality and Social Psychology*, 19, 168-180.
- Ward, J.H. 1963. Hierarchical grouping to optimize an objective function. *Journal of the American Statistical Association*, 58, 236-244.