Encoding and Decoding of Meaning in Social Behavior

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Encoding and Decoding of Meaning in Social Behavior

Abstract
In an effort to further the understanding of social action, we explored the processes by which people interpret or understand the meaning of social behaviors, and also how social behaviors are constructed when people wish to communicate a specific meaning in a social action. This involved two phases. First, participants generated behaviors that expressed a given set of semantic features. These were then rated by a second group of participants on scales representing the dimensions of dominance and affiliation as a measure of accuracy. The second phase investigated the process by which meaning is derived from a social behavior and was accomplished by participants rating a number of given behaviors on the same set of scales. Analysis of variance of the resulting means show that, generally, behaviors that were submissive and dissociative were the hardest to produce and comprehend accurately.

Introduction
The question of how people interpret and construct the meaning of social behavior is central to the understanding of social interaction. While many theorists have attempted to understand the psychological process by which meaning and action define each other, research in the area remains very difficult due to the complexity of the problem.

A number of social psychologists have investigated the structure of interpersonal behavior over the past thirty years (Triandis, 1977, 1994; Adamopoulos, 1984, 1988). A general finding appears to be that the major psychological dimensions (semantic features) along which social behavior varies include association - dissociation (affiliation), superordination - subordination (dominance), and intimacy - formality. These dimensions appear to be relatively stable across individuals and cultures. For that reason, Adamopoulos (1988, 1991) has attempted to account for their emergence in terms of a model based on the differentiation of resources exchanged during interpersonal interaction.

A basic question underlying much of this work concerns the process through which semantic structures lead to the production of interpersonal behaviors and, conversely, the construal of meaning out of specific behaviors. Osgood (1970) observed while researching the structure of interpersonal intentions that the process of decoding semantic meaning from interpersonal verbs appears less difficult than the process of encoding meaning into interpersonal verbs. Specifically, he was able to assign semantic features to interpersonal verbs (decoding), but found it difficult to derive an interpersonal verb from a randomly selected set of semantic features (encoding).

This difference in difficulty was also mentioned by Boyatzis and Satyaprasad (1994) after examining children's ability to encode and decode nonverbal behavior. They hypothesized that the ability to decode should surpass the ability to encode, based upon the developmental expectation that comprehension of the meaning of action should precede the production of behavior.

However, if the difference in difficulty between encoding and decoding meaning in general was in fact due only to developmental factors, it would be expected that the behavior of children would not accurately portray the semantic meaning communicated by the behavior. This is not the case, however, as children are more than capable of expressing meaning through behavior (encoding) even before they are able to verbally describe what features are associated with a behavior (decoding).

If this asymmetry in the difficulty of encoding and decoding social meaning is not due only to developmental processes, it is surprising given that people engage in both processes constantly in their every-
day lives. This research will attempt an initial exploration of this intriguing problem. In particular, we will address two questions: (1) How do people understand the meaning of social behaviors (i.e., decode); and (2) How are social behaviors constructed (i.e., encoded) when people wish to communicate a specific meaning?

The main hypothesis is that the decoding of social behavior (construction of meaning) will be more accurately accomplished than the encoding (construction) of behavior. "Accuracy" here means the location of the stimulus on a semantic dimension. Thus, participants should be less able to encode specific behavior features into a single action than to decode behavioral features from a given social action. A corollary to the analysis, to be addressed at a later stage, is that the perception of the difficulty of the task will vary as a function of accuracy.

In order to investigate this relationship the research involved two phases: the first examined the process by which social behaviors are encoded (constructed); and the second investigated the process by which meaning is derived from a social behavior, or decoded.

**Method**

**Phase 1 - Construction (Encoding)**

Each participant was given four sets of two semantic features from each of two psychological dimensions: (1) affiliation (association and disassociation), and (2) dominance (superordination and subordination), and asked to construct a social behavior that expressed the meaning of the combination of given features. For example, encoding a behavior expressing the features of control over others (superordination) and affiliation (association) may have resulted in behaviors such as to teach, to advise, or to nurture. Each subject completed four such tasks, for a total of twelve behaviors. The order of presentation of the four combinations of stimuli was counterbalanced according to a Latin square design.

All behaviors generated from the encoding task were then compiled and presented to a second group of research participants, who judged the relevance of all behaviors on fifteen scales representing the dimensions of affiliation and dominance, along with five filler scales. The anchors for the scales were as follows:

**Dominance**
- strong/weak
- timid/aggressive
- severe/leneient
- self-confident/self-doubting
- powerful/powerless

**Affiliation**
- cold/warm
- friendly/unfriendly
- uncooperative/cooperative
- unsociable/sociable
- courteous/discourteous

**Filler**
- fast/slow
- intuitive/rational
- careless/careful
- complex/simple
- unemotional/emotional

These scale values were then assigned to the behaviors generated by the first group of participants and constituted the main dependent variable (accuracy of encoding).

**Phase 2 - Construal (Decoding)**

A third group of research participants were given a set of twelve social behaviors representing the four-feature set combinations, (advise, protect, teach - representing superordination and association; exploit, insult, punish - representing superordination and dissociation; ask for help, flatter, obey - representing subordination and association; and hide

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Table 1

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<tr>
<th>Feature Set</th>
<th>Encoding</th>
<th>Means</th>
<th>Decoding</th>
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<td>52.92</td>
<td>51.43</td>
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<tr>
<td>Superordination/Dissociation</td>
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<td>35.74</td>
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Table 2

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<td>Error^</td>
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<td>74</td>
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<td>.27</td>
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negative feelings toward, make false accusations against anonymously, shy away from - representing subordination and dissociation), and were asked to rate them on the same set of scales representing the basic dimensions reported earlier.

Results
The mean scale values (on the two dimensions of affiliation and dominance) of the responses produced in the two phases were analyzed in a 2 (encoding/decoding) x 4 (affiliation/dominance) x 4 (order of presentation) analysis of variance. Tables 1 and 2 present the major findings.

Analysis of variance of the mean scale values indicated no significant differences in the accuracy achieved by performance of the two different tasks (encoding and decoding). The main effect of feature set was found across task and order, indicating that subjects were more accurate with specific sets of semantic features, regardless of task or order of presentation.

Analysis also revealed a significant three-way interaction. This appears promising, but requires greater investigation and interpretation, and is, therefore, not discussed further in this paper.

Discussion
We tentatively conclude that subjects were most accurate in understanding and producing the social behaviors that involved dominance, especially when accompanied by affiliation. It appears that, generally, behaviors that were submissive and dissociative were the hardest to produce and comprehend accurately.

It is difficult to explain at this point the implications of these results. It appears that a cultural explanation reflecting independent and affiliative social interaction favored by individualistic cultures like the U.S. may be appropriate here. Clearly, further research is indicated.

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References


