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A Group Level of Aspiration Technique as a Measure of Personality Rigidity¹

By SEYMOUR L. ZELEN AND EUGENE E. LEVITT

The problem of "personality rigidity" or the persistence of maladaptive behavior is becoming increasingly important in our culture. As part of a series of studies of the Preventive Psychiatry Project of the Iowa Child Welfare Research Station concerning this variable, it was decided to develop a group level of aspiration technique which would provide an operational measure of this concept. Inherent in such a technique is the opportunity for the subject to make numerous shifts of his goal level. The capacity to change goals in the light of new experience is an integral aspect of flexibility, and conversely an inability to shift goals may be an expression of rigidity. Most level of aspiration tasks are individually administered and data collection is a slow process. Those level of aspiration situations (4) which are group administered lack criterion validity. A valid group level of aspiration technique would, therefore, offer the advantages of more rapid and more extensive sampling, without loss of the predictive value of the individual task.

If this group level of aspiration technique provides a valid measure of rigidity, it is predicted that those subjects considered highly rigid in terms of this measure would tend to receive higher scores on the California Ethnocentrism Scale (1) and could also be discriminated from flexible subjects on a Short Form of the Wesley Rigidity Scale (11). Another cross validation of the group level of aspiration technique as a measure of rigidity would be a high degree of relationship with a generally accepted, standard, individual level of aspiration technique, in this case the Rotter Board.

In addition, if this group form meets the criteria of an adequate level of aspiration situation, a positive correlation should exist between goal setting behavior in these two distinct tasks.

EXPERIMENTAL PROCEDURE

The group level of aspiration task

Nature of the task

The specific task used was adapted from the digit-symbol test of the Wechsler-Bellevue Scale, Form I. The test, as ultimately used,

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consisted of a series of separate trials each of 15 digit-symbol blanks, administered as a digit-symbol test with additional instructions that essentially were:

- (1) That this was one of many types of intelligence tests.
- (2) Before work is started on each trial a written estimate of how many spaces will be completed correctly must be made.
- (3) The ultimate score will depend on how correctly the estimate is made. There will be no credit beyond the estimate and penalties for falling below estimates will be imposed.

Treatment conditions of the group task

It should be noted that there is no time limit or even mention of time in these instructions and that time per trial was varied according to a prearranged pattern. No subject knew in advance, however, what the time for the succeeding trial would be. For the sake of clarity, this experimental condition will be called "*Random Time*." Since the test was structured as one which measures intelligence, self-esteem of the subjects would suffer if they failed to reach their stated goals.

In a separate experiment two other variations were made of the main variable of the experiment, the "time condition". Under one condition it was announced that there would be a "*Set Time*" for each trial, and under another condition the subjects were informed that there would be progressive increments of time from trial to trial or an "*Increasing Time*" condition.

The "random time" condition of the test was administered with all of the trials on one page so that the subject had all his previous experience in the test immediately available. The "set time" and "increasing time" conditions were given with the digit symbol trials on alternate pages of a test booklet.

Measures derived from the group level of aspiration technique

Level of aspiration technique yield a variety of measures, but since this experiment is primarily concerned with rigidity, the primary score derived from this situation was the *number of shifts of stated goal* or estimate made during the course of the experimental period. The *Discrepancy Score* was another measure used in this investigation, but its value lay in its use as a validating measure of the technique as a whole, rather than as an additional measure of rigidity.

The California Ethnocentrism scale

Form 78, a 14 item questionnaire was used. It is designed to

measure the tendency to accept "the culturally alike" and reject the "unlike".(1)

The short form of the Wesley Rigidity Scale is a thirteen item questionnaire abbreviation of the R scale, consisting of MMPI—like items which was found to be a discriminative measure of rigidity.

Subjects

All subjects in this experiment were taken from undergraduate courses at the State University of Iowa. For the *Random Time Condition* there were 47 subjects; and 17 of these subjects were used in correlating the Group and Individual Forms; for the *Set Time Condition* there were 74 subjects. The N for the *Increasing Time* condition was 78.

RESULTS

When the number of shifts made under Increasing Time and Set Time conditions were compared there was little appreciable difference between them. The two means were 6.82 and 6.01 respectively.

The correlation between the group level of aspiration rigidity measure, i.e. the number of shifts, both under set and increasing time with the E Scale and with the Short Form of the Wesley R. Scale proved to be nonsignificant.

Using the Random Time form and instructions significant correlations were found with both the E Scale and the Short R Scale. Two groups of 22 and 27 subjects had a correlation averaged by Fisher's Z of $-.305$ between the number of shifts and the E Scale, significant at the 5% level of confidence. The same two groups provided correlations of $-.30$ and $-.58$, and an averaged correlation of $-.44$ (5) between number of shifts and the R Scale. This correlation proved significant at the .01 level.

When the scores of both the E Scale and the R Scale were used to predict the number of shifts, a multiple correlation coefficient of .48 resulted.

With an N of 17 comparison of the Group Level of Aspiration technique with the Rotter Board resulted in a correlation for the measures of rigidity of .49, significant at the .05 level of confidence. For the same comparison the D Scores, the correlation was .59, significant at below than the .02 level of confidence.

DISCUSSION

The failure of the set time and increasing time conditions to discriminate between subjects of differing degrees of rigidity and also

the failure of these two treatments to affect the score in any differential manner can be explained by the fact that the entire form of the task apparently created such a structured, situation that there was only one general way to respond, i.e. the basis for shifting goals in this constant frame of reference was not personality needs but learning.

It was only when there was sufficient ambiguity in the situation, an uncertainty as to what to anticipate in the succeeding trials such as occurred with the random time treatment, that the idiosyncratic motivations could be involved to a significant degree. In this less structured group level of aspiration situation then, the same need systems operating in the questionnaires would then also be available to the individual.

The results of cross validation indicate that a high positive relationship exists between the rigidity measures of the group level of aspiration task and measures of ethnocentrism and other rigidity measures, namely the Short Form of the Wesley Rigidity Scale and the rigidity measures of the Rotter Board. It may be concluded that the group level of aspiration technique is a valid measure of rigidity.

In respect to goal setting behavior the significantly positive correlation of the group level of aspiration technique measure with that of the Rotter Board would seem to indicate that here too a valid measure exists. In addition, there were five cases where physical evidence of handicap was evident and the group level of aspiration technique was not only able to predict the direction and general range of the scores of these individuals on the Rotter Board (9) (10), but the patterns on the group task were similar to Rotter's crippled group. Such clinical discriminations add further support to the validity of this technique.

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