The results of this investigation support, in part, the diffusion of responsibility hypothesis which states that antisocial behavior will occur whenever individuals are motivated to engage in socially-unacceptable behavior, and find themselves in a group of similarly motivated individuals. The mechanism by which this antisocial behavior is produced is the spreading or diffusion onto other group members of feelings of personal responsibility for the anti-social behavior. Subjects, singly or in groups, with or without communication, were either angered or not angered and then given a revenge opportunity. Study results support the hypothesis that group membership, per se, without communication and hence without the possibility of social comparison, produces lessened feelings of responsibility and thus more extreme behavior. (Author/WSK)
Diffusion of Responsibility and Extreme Behavior

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This paper was presented at the Forty-fifth Annual Meeting of the Midwestern Psychological Association, Chicago, Illinois, May 10, 1973.
The diffusion of responsibility hypothesis states that antisocial behavior will occur whenever individuals are motivated to engage in socially taboo behavior and find themselves in a group of similarly motivated individuals. The mechanism by which this antisocial behavior is produced is the spreading or diffusion of feelings of personal responsibility for the antisocial behavior onto the other members of the groups. This hypothesis has been used to account for crowd behavior (Le Bon, 1968), the "risky shift" (Wallach, Kogan, & 3em, 1962), and bystander apathy (Darley & Latane, 1968). The primary emphasis of research associated with diffusion of responsibility has not been on the hypothesis itself but rather crowd behavior, group decision making, or helping behavior. As a result the hypothesis has not been tested under optimal conditions. In past work on diffusion of responsibility it has been assumed that people naturally desire to riot, act recklessly, or ignore persons in trouble. Evidence of such motives has not been sought. Without such evidence little can be concluded concerning the diffusion of responsibility hypothesis per se. What is needed is a paradigm in which the motivation to engage in taboo behavior is manipulated. The present experiment utilizes such a paradigm.

The taboo behavior used in this experiment was revenge taking. Subjects either singly or in groups of three were exposed to a situation eliciting either strong or weak desires for revenge. They were then given an opportunity to actually take revenge. Two dependent measures were obtained, the amount of actual revenge and the amount of responsibility felt for the revenge. We hypothesized that groups of subjects with strong desires for revenge would take more actual revenge than isolated subjects having similar desires. Also, groups of subjects having strong desires for revenge would feel less responsible for the revenge taken than isolated subjects having similar desires.
No differences in actual revenge or felt responsibility should be found for groups or isolated individuals experiencing weak desires for revenge.

An alternative explanation of extreme group behavior is Brown's (1965) cultural value and social comparison hypothesis. According to Brown, in some situations extreme behavior is valued and thus in such situations individuals in groups "compete" with each other to show the most extreme behavior and thus exemplify the value. The net effect is more extreme behavior on the part of groups than isolated individuals. This hypothesis views group communication, at least in the form of knowing another's position, as essential for extreme group behavior while the diffusion of responsibility hypothesis does not. In order to rule out this alternative explanation, half of the three person groups were allowed to communicate and half were not allowed such an opportunity. If no difference in amount of actual revenge were found between communicating and noncommunicating groups, the diffusion of responsibility hypothesis and not the cultural value hypothesis would be supported.

Method

Design and Subjects

The design used was a 3 X 2 factorial in which group membership (individuals alone, groups with communication, groups without communication) was crossed with desire for revenge (weak, strong). Ninety volunteers from the introductory psychology course at Iowa State University were assigned to the six treatment conditions such that nine subjects were in each cell except for the two group communication conditions in which nine groups of three subjects each were assigned. All groups were homogeneous with respect to sex.

Procedure and Manipulations

Group membership manipulation: individuals and groups of three. Subjects were
contacted by phone and arrangements made to come to the experiment in groups of two or four people. In all conditions one subject was subsequently recruited to play the part of a stooge thus leaving single subjects or groups of three subjects.

**Cover story.** Upon arrival at the laboratory subjects in the individual conditions were told that they were going to participate in two experiments, one studying the effects of punishment upon creative learning and the other studying the effects of punishment upon rote memorization. Each subject was told that he would receive one dollar at the beginning of the experiments and that punishment would consist of monetary fines. In the first experiment one subject, the learner, would write a creative essay on the topic "perfect beauty." The other subject, the teacher, would then read the essay, make helpful comments on it, and decide how much the learner should be fined for its defects. The learner would then have an opportunity to write an improved version of the essay. Subjects were told that roles would be switched for the second experiment. The teacher would become the learner and the learner would become the teacher. During this experiment the learner would attempt to learn a list of five pairs of nonsense syllables. The learner would be tested over the list four different times. For each error the teacher would punish the learner by fineing him or her from zero to ten cents. To prevent embarrassment, teacher and learner would be placed in separate rooms. Whether or not an answer was correct would be signaled by means of a pair of lights, one labeled correct and the other incorrect. Fines exacted would be signaled by means of a dial connected electrically to a meter.

The instructions for the group conditions were similar except that subjects were told that, for the first experiment, one subject would teach the
other three subjects how to write creative essays and then for the second experiment the three subjects would teach the one subject nonsense syllable pairs. After the cover story was presented subjects were each given one dollar.

**Revenge eliciting manipulation.** In the individual conditions, while the learner wrote his essay, the teacher was taken into a separate room. There he or she was told that the experiment involved deception and that he would not read the learner's essay or make a punishing fine. Rather the experimenter would attach an arbitrary comment and fine to the essay. In the strong desire for revenge conditions, the experimenter attached a critical comment and large fine to the essay. An example of such a comment and fine is: "I have doubts about this essay. It doesn't make much sense. Maybe you could improve it by giving it more organization. I have no choice but to fine you $.60." The weak desire for revenge manipulation involved attaching a complimentary comment to the essay and exacting only a token fine. An example of such a fine and comment is: "I think that this essay is rather good. It is well organized. The only suggestion for improvement that I can make is that maybe you should elaborate the last point a bit more. I am going to fine you $.05." After the essay had been returned and the fine collected, the learner was asked to write a second essay.

For group conditions, the strong and weak revenge manipulations were similar to those in the individual conditions except that in the group conditions each member received a different insulting comment and fine or complimentary comment and token fine. For a given group, all members were either insulted or praised.

**Communication manipulation.** In the individual conditions, after the
learner had completed his essay, he was informed that the second experiment would be carried out. After the instructions concerning fining were repeated, the experimenter left the teacher (the subject who had been the learner) and went into the learner's room. The teacher was then fed a bogus series of correct and incorrect responses. A randomly selected ten of the 20 responses were called incorrect. How much each incorrect response was fined by the teacher was recorded. In the group membership with communication conditions, groups were asked to discuss the learner's progress and come to a joint decision concerning how much he should be fined. One of the group members then signaled this information to the learner. In the group membership without communication conditions, partitions were placed between group members and each member was given a dial. They were informed that each group member should decide individually how much the learner should be fined. The amount that the learner actually would be fined would be equal to the average of the three separate fines.

Dependent measures. The dependent measures in this experiment were the amount of money fined the learner (i.e., revenge taken) on each error trial and the amount of responsibility felt by the subjects in exacting fines from the learner. Felt responsibility was assessed by means of a questionnaire item given to the subjects after the experiment was completed. The item read: "How responsible do you feel for the punishments you chose as a teacher?" Responses were made by checking an eight point scale anchored at both ends.

Results

A 3 X 2 X 10 analysis of variance, with the last factor being error trials, was performed on the revenge data and a 3 X 2 analysis of variance was performed on the felt responsibility question. Responses to this question for the
group membership with communication conditions were averaged to obtain a single score for each three person group.

Following the experiment subjects were asked to mark, on an eight point scale, the extent to which they saw the administration of punishment as a chance to get revenge. Subjects in the strong desire for revenge conditions stated that they saw the administration of punishment as a chance to get revenge to a significantly greater extent ($p < .005$) than subjects in the weak desire for revenge conditions suggesting that the revenge manipulation was successful.

A near significant ($p < .10$) three-way interaction for fines exacted was found. The three-way interaction is plotted in Figure 1. The most interesting part of this graph is the plots for individuals and groups with strong desires for revenge. Single subjects who strongly desired revenge took more and more revenge (i.e., fined the learner more and more) through the seventh trial after which revenge taking decreased rapidly until on the tenth trial it was less than on the first trial. In contrast, groups strongly desiring revenge took more and more revenge until the trials were completed. For the last trial the differences between mean fines exacted by single subjects and subjects in groups were statistically significant at the .01 level. Fines exacted by groups with communication were also significantly greater ($p < .01$) than fines exacted by individuals for trials eight and nine. Significant differences were not found on these trials for groups without communication.

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A near significant group membership main effect for felt responsibility
(p < .10) was found. Groups felt less responsible for the revenge they took than did isolated individuals.

Discussion and Conclusions

The results of this investigation support, in part, the diffusion of responsibility hypothesis. The decrease in fining activity of single subjects after the seventh trial can perhaps be interpreted as a response to accumulated guilt mediated by feelings of personal responsibility for the fines extracted. In contrast, subjects in groups felt less personally responsible for their fining activity and as a result guilt feelings accumulated less rapidly. In the absence of guilt the subjects in groups continued to exact increasingly heavy fines throughout the ten trials. Further research, however, is needed to verify this post hoc explanation.

Brown's cultural value hypothesis cannot easily explain the obtained three-way interaction. According to this hypothesis communication is a prerequisite for extreme behavior on groups. Yet the results are such that by the tenth trial both groups with communication and groups without communication were exacting similarly heavy fines, fines which were significantly greater than those exacted by isolated individuals. The finding that groups with communication begin exacting heavy fines earlier (trials eight and nine) than groups without communication suggests that communication may play a part in facilitating groups to engage in extreme behavior. However, communication does not appear to be a necessary condition for such behavior.
References


Fig. 1. Fines exacted as a function of errors.