

"Why not," asks Dr. Frost, "teach probability theory in mathematics via poker odds; and why not explore the fascinating process of genetics in a biology class by asking the question: 'What color would the American people be if Negroes and whites intermarried at random?'"

"We are not discovering spectacular 'new' techniques in Upward Bound," says Dr. Frost, "be we are proving that a lot of lip-serviced teaching principles really do work when put into operation."

MAJORITY OF SAMPLE UPWARD BOUND STUDENTS IMPROVED ATTITUDE AND MOTIVATION FOR COLLEGE

A 10% representative sample of Upward Bound students tested at the beginning and end of the summer phase of the on-campus program showed significant improvement in six psychological measurements:

1. Motivation for college;
2. Possibility of graduating from college;
3. Self-evaluation of intelligence;
4. Self-responsibility;
5. Interpersonal understanding;
6. Self-esteem.

The students, in 21 of the total 220 programs, were selected to represent all urban and rural, small and large Upward Bound projects, and all racial and ethnic backgrounds.

The 21 programs were chosen as a representative sample to evaluate the initial effect of the Upward Bound experience on the attitudes and motivation of the high school students enrolled in the pre-college program last summer (1966).

The study was performed by Syracuse University's Youth Development Center under contract to the Office of Economic Opportunity. Dr. David E. Hunt is director of the Youth Development Center's continuing evaluation of Upward Bound students.

Because the student's attitude toward college was so important, this factor was measured both directly and indirectly. The direct score, "Possibility of graduating from college," was based on the student's rating of this possibility on a scale ranging from "not possible" to "extremely possible." The students' own estimation of ability to graduate from college increased in 16 of the 21 programs.

The indirect score, "Motivation for college," was based on the number of students who mentioned college when constructing a story about future plans from scratch. The number who did mention college increased in 20 of the 21 programs between the beginning and end of the summer Upward Bound programs. Students' self-evaluation of intelligence, based on a rating of "Myself" on a scale ranging from "dumb" to "smart", increased in 18 of the 21 programs.

Self-responsibility (or internal control) scores, which were based on a scale of items such as "Becoming a success is a matter of hard work; luck has little or nothing to do with it," increased in 20 of the 21 programs. Interpersonal understanding scores, which were based on a scale of items such as "The best way to understand a person is to put yourself into his shoes to see how he looks at things," increased in 17 of the 21 programs. Self-esteem scores, which were based on items such as "I feel that I have a number of good qualities," increased in 16 of the 21 programs.

Scores on an alienation measure, using questions as "These days a person doesn't know who he can count on" showed no significant change. (It was expected that Upward Bound would cause a decrease in alienation.)

An attempt to measure the students' planning for the future, through such questions as "People should just live for today and let tomorrow take care of itself" also showed no significant change. Apparently, it takes longer than one summer to make significant inroads into these attitudes.

UPWARD BOUND PROGRAMS RATED BY STUDENTS

Highly structured versus flexible programs were measured for effectiveness in a questionnaire answered anonymously by students at the end of the summer