DOCUMENT RESUME

ED 057 950 RC 005 821

AUTHOR	Purley, Anthony F.
TITLE	Evaluation of Vocational Programs for American Indians. A Position Paper.
SPONS AGENCY	Southwestern Cooperative Educational Lab., Albuquerque, N. Mex.
PUB DATE	May 70
NOTE	13p.
EDRS PRICE	MF-$0.65 HC-$3.29
DESCRIPTORS	Adult Development; *Adult Vocational Education; *American Indians; *Evaluation Criteria; Federal Programs; Job Training; *Research Needs; Systems Concepts; *Vocational Adjustment; Vocational Development; Vocational Education

ABSTRACT

After a review of the literature on past and present vocational education programs conducted by the Bureau of Indian Affairs (BIA) and private industry, 5 methodologies for use in evaluating Indian vocational programs are discussed. Research needs are then suggested. First an assessment of vocational education programs offered in BIA schools--considering teacher preparation and recruitment, curriculum, school organization, and community role--is needed, as is an assessment of vocational education programs for American Indian adults. Special attention also needs to be given to research on adequacy of opportunities, training, and placement of Indians. Additional studies are needed in terms of on-the-job behavior, values, attitudes, motivation, and competencies held or needed by Indians for successful entry, persistence, and advancement in vocational training and employment. (LS)

EVALUATION OF VOCATIONAL PROGRAMS

FOR

AMERICAN INDIANS

A Position Paper - by Anthony F. Purley

May 1970

Submitted to
Southwestern Cooperative Educational Laboratory

Evaluation Of Vocational Programs For

American Indians

American Indian education in the United States has become a vital social enterprise. Today it embraces formal education at the pre-school, primary, secondary, and higher education levels. Included as an important cornerstone within the total educational framework are vocational and continuing education.

Changing vocational technology is placing even greater demands on Indian people, along with offering them new opportunities. In its demands, technology is bringing about changes to the personal and social life, as well as the occupational life of American Indians. It has increased the number of possibilities for personal enjoyment. Cultural and recreational activities presently require better vocational and general educational levels in order for individuals to participate on a satisfying level.

While total accurate statistics for measurement of the scope of vocational education programs and needs for Indian people are not available, the Bureau of Indian Affairs, through the Division of Employment Assistance, has compiled some relevant information to use as partial criteria. From its inception in 1952 through 1969, the Division of Employment Assistance has served approximately 60,000 Indian people through Adult Vocational Training programs and through Direct Employment Services.

Other information is available through other Bureau of Indian Affairs divisions. The Branch of Education, through such schools as Haskell Institute,

the Institute of American Indian Arts in Santa Fe, New Mexico, the Indian School in Brigham City, Utah, and other educational facilities is also involved in entry level vocational training for Indians.

Private Industry has become involved in vocational training of "hard-core" Indian people. The Bureau of Indian Affairs, through the Division of Employment Assistance, has contracted to such corporations as Thiokol Chemical Corporation, Philco-Ford, Bendix, and RCA, to develop unique resident vocational training programs.

Indian organizations, whether tribal or a combination of tribes, are also rapidly becoming involved in vocational education and orientation to jobs for Indian people. Funding for Indian involvement comes from the Bureau of Indian Affairs, private corporations, private foundations, and tribal sources. Some of these Indian organizations are: The United Tribes of North Dakota, The Zuni Indian Pueblo of New Mexico, the All Indian Pueblo Council of New Mexico, the Urban Indian Development Association of California, and the Inter-tribal Council of California.

While concern for vocational training for Indian people is increasing, Indian unemployment still ranges between 40 and 75 per cent in comparison with about 4 per cent for the nation as a whole. Vocational education is no longer adequate in its teaching of fixed habits and established facts. The emphasis for Indian people now must be on the ability to meet new situations, on how, not what, to learn. Technological changes are occurring so rapidly, Indian people must be trained so that they can adapt themselves to new

methods of doing things; new ideas. Vocational education for Indians has not focused on this aspect of training. To failure oriented Indian people, learning is only meaningful if they can see a direct connection between what they are learning in school and what they desire to do in jobs outside of school.

The nature and scope of vocational education for Indian people is complex and increasing in its vastness. A more critical examination of present programs is a must.

Current research on evaluation, methods and techniques, and the status of the various vocational education programs are meager if not nonexistent. Agencies concerned with research in all aspects of Indian education have been unable to secure any studies that are currently relevant to the evaluation of vocational programs for Indian people.

The Educational Resources Information Center Clearinghouse on Rural Education and Small Schools at New Mexico State University, Las Cruces, lists about three studies that might facilitate current efforts. They are: "Project Awareness, University - American Indian Educational Enrichment and Vocational Motivation Program. Annual Report," Paskewitz, Daniel and Stark, Matthew, University of Minnesota, St. Paul, 1967, 47 p. "Doorway Toward the Light, The Story of the Special Navajo Education Program," Coombs, L. Madison, Bureau of Indian Affairs, Washington, D. C., 1962, 174 p., and "An Evaluation of Institutional Vocational Training Received By American Indians Through the Muskogee, Oklahoma Area Office of the Bureau of Indian Affairs," Blume, Paul R., Oklahoma State University, Stillwater, 1960, 261 p.

Without detailing traditional assumptions and historical shortcomings that are still prevalent, the Blume study at Oklahoma State appears to be one of the better efforts toward evaluation of Indian vocational programs. Criteria of the evaluation by Mr. Blume included employment experience, income, labor force attachment, and benefit cost ratio. An overview of the study will suffice, however, it is representative of other studies, reports, observations, and assumptions that this writer examined and heard, with the possible exception of the benefit cost ratio.

Trainee characteristics brought out by the study were: (1) The average trainee was better educated than the average Indian, (2) The employment and income levels were low by most standards, (3) There was a high noncompletion rate among the trainees, and (4) The questionnaire response rate was partially affected by the cultural and historical background of the trainees. Conclusions were: (1) Training completion results in average increase in income of $1,929, (2) The average increase in employment was about three and one half months of additional employment, and (3) The social benefit cost ratio was found to be 2.39.

The above study pin-pointed two specific needs. One, of course, is the pressing need for more relevant studies in vocational education. The other is a much needed re-direction of research away from the evaluations of skills and numbers only in vocational programs.

Some traditional concepts were also implied that are grossly inadequate today. The old concept of vocational education for Indians is

exclusively "shop" education was implied. Furthermore, the belief that vocational education is only for the less able, therefore Indians can do better in vocational education was another implication. Traditional approaches are valid because "cultural conflict" is a major consideration where Indians are involved in vocational or other education. These concepts must be dispelled as it concerns Indian people because it has established a reputation of inflexibility in evaluation procedures of vocational progress.

To provide a more favorable climate for more valid research in evaluation several things must occur. One, the highest priorities in vocational education must be given to the employability of Indian young people, including both initial and continuing employability. These priorities must come about without being limited by traditional concepts and learning theories as it concerns Indian people. This is especially pertinent as the present job structure requirements in specific jobs are spiraling and that the Indian population has the greatest bulge of employable youth in proportion to the total Indian population.

Another is the misconception that academic education and vocational education present an either - or choice to the Indian needs more attention. The unfortunate stigma that is attached to Indian people in relationship to vocational education must be removed. Vocational education for Indians does not eliminate all other forms of general or liberal education.

The third thing that must occur is the realization that the lack of a solid foundation in the basic communicative and computative skills is the greatest deterrent to Indian employability. In addition, we must inform students that elements of vocational skills are included in any professional education.

The fourth needed action is to remove the inflexibility forced on Indian vocational programs. Since most vocational education for Indian people is funded by some federal agency, many of the programs are inflexible because everything is prescribed by law. Less rigid definition of allocations is needed to extend vocational education of every kind so Indian people will have opportunities everywhere for work.

In light of the conditions and limitations described above, future studies must put emphasis toward innovation in pure research and more actual experimentation in vocational education.

Some effort toward these innovations have already begun. The Division of Employment Assistance in the Bureau of Indian Affairs has taken the lead. In its effort to improve and evaluate present vocational programs for Indian people, this division has involved private corporations to assist it in experimentation and innovation of vocational education in its demonstration projects contracted to private Industry. It has asked Thiokol Chemical Corporation to come up with new ways of evaluation of present vocational programs. In response to this request, Thiokol Chemical Corporation established the Roswell Employment Training Center, which has a perpetual

Indian student body of 350 Indians broken up into 100 Indian families, including children, and 150 single male and female Indian students, and a Police Academy with a 40 man cadet corps. Experiments and demonstrations in innovative teaching techniques, counseling, curriculum and job preparation are part of the Roswell Employment Training Center program.

In response to the request of the Division of Employment Assistance for a clearer definition of goals and an overhaul of the educational process, in terms of more adequate measuring procedures and well defined objectives, Thiokol Chemical Corporation is developing the following methodologies for use in Indian vocational programs: (1) The first method employed to facilitate evaluation was the "systems" approach to training. This approach to training includes the careful integration of several sub-systems and components. In essence, the integration and interaction of vital components results from a systems design that insures the most efficient and effective learning for the individual student through individually prescribed programs leading to the achievement of behavioral goals. Steps for implementation include stating the output specifications in terms of behavioral objectives, synthesizing the objective among the various disciplines, developing appropriate materials and measurement instruments, and selecting media. A task analysis is a vital part of the "systems approach." The task analysis as applied here facilitates appropriate feedback. Feedback, in this case, is information concerning the adequacy of the training program in meeting the needs of the trainees and the employers. The system in operation also focuses on the

incoming trainee as an individual having specific and unique strengths and weaknesses. It determines the abilities and skills the trainee already possesses, as well as those that need to be developed. Assessment is continuous and it starts the individual into the development process where he should start and not where others start. It allows the student to move at his own rate and compares his progress with his own development from one period to the next. The "systems approach" provides a framework for collecting information needed to: (a) design training programs that meet the needs of the students and the requirements of the employers, (b) operate training programs efficiently, (c) adapt instruction to the changing requirements, (d) provide a constant check and evaluation of training based upon realistic job and life-related criteria, (e) develop better methods of attaining vocational training objectives.

(2) The second method and of more recent design, is the cost benefit analysis for evaluation. In determing costs in vocational education many basic factors have never been quantified. There has been no clear guides for measuring vocational school outputs. The cost benefit system basically includes information collection, analysis, and experimentation as ways of efficiently expending money. In essence it is perpetual program accounting. This system, while still in the experimental stage, assists expenditure decisions away from the incremental type and allows for analysis of the cost of input, developmental process, output, and the prognosis of output success with data needed to analyze and assess alternative patterns of resource

allocation. It assists in determining the cost of an individual's training and what his contribution back into the economy will be over a set number of years in the future. The system itself evaluates and facilitates forecasting, programming, and budgeting.

(3) Evaluation is constant by another method of measuring technological learning effectiveness by vocational clusters rather than by one specific vocational skill. Skill training includes various areas of a given vocation. As an example, Auto Mechanics trainees are exposed to small two cycle engines, tune-up, auto welding, body and fender, painting, in addition to the main course of instruction. Every effort is made to develop a flexible worker and his course content in addition to his specific vocational course includes verbal and written communication, human relations, computation, reading, reading comprehension, and an analysis and solution of problems. The student is evaluated in relationship to course content and inculcated with better working habits, pride, and the desire to continue his development beyond his terminal status. Periodic evaluation by personal interviews, observations, team meetings of teachers, verbal and written tests, and job performance is a vital part of the program.

(4) The use of consultants is another method of evaluation of the training program. Industrial involvement is a vital part of this evaluation procedure. Businessmen or workers representing the various vocational clusters act as a committee of consultants and periodically evaluate the vocational program. In addition, Indian people representing Indian tribes

from various sections of the United States are also set up in a committee of consultants for evaluation of the program. A local committee of citizens representing educators, businessmen, agencies, and civic organizations are also part of the consultant group that assists in evaluation of program content.

(5) One final method of evaluation is periodic self-evaluation of staff and administrators regarding the program content, staff effectiveness, and staff attitudes. This method also includes student participation in evaluation of program content and staff effectiveness. Student peer group evaluation of one another through group encounters is a valuable part of this method.

In view of some of my observations and experiences concerning the evaluation of vocational programs for Indian people, many recommendations come to mind. However, I realize not all recommendations are researchable at this time. I would recommend priorities be given to the following for research or demonstration:

(1) Research to develop a more accurate and adequate picture of the status of vocational education for Indians.

(2) Research in vocational education standards for teachers. So little is known about the training and sources of recruitment of teachers.

(3) More studies to explore the values, attitudes and motivation necessary beyond basic job skills. Studies should not be necessarily cultural in nature, and should include teachers, employers, and students.

(4) More demonstration projects in education resource development and training focusing on vocational education curriculum, school

organization, and the role of the communities.

(5) More research and demonstration projects in human resource development for Indian people in terms of better preparation for affecting the goals and decisions they face.

In summary, future possibilities for the development of evaluation procedures for vocational training is to circumvent the structured school system in order to give Indian people concrete experience that is related to jobs. To discourage the tide of dropouts, we should explore the possibilities that are available for the constructive use of human talents in the interest of the community and the Indian work force. We need to consider what skills are durable and what skills are transferable. Emphasis in training and evaluation should now be on self-understanding and on an individual's ability to interact well with both his peers and his seniors, as these are highly desired as occupational skills.

Every effort must be made to encourage agencies such as the Division of Employment Assistance, who is leading the way in vocational education for Indians, to become more involved in depth with Indian people. Private Industry has proven it can perform because it is less structured and because it is not limited by conservative educational tradition.

Private research laboratories must come out more aggressively than in the past. They must become more action oriented and participate actively in improvement of education with more emphasis toward vocational education.

Last but not least, Indian people must be given the opportunity to become deeply involved in all aspects of education. Consultant services must be made available by federal, state, and local gaencies, research laboratories, and private industry.