DOCUMENT RESUME

ED 231 451 JC 830 296

AUTHOR Parsons, Michael H.
TITLE Catching Up: Faculty Technological Upgrade through Return to Industry.
PUB DATE 19 May 83
NOTE 10p.; Paper presented at the Conference of the New Jersey Consortium on the Community College, Inc. on "Vocational Education in the Community College" (Atlantic City, NJ, May 19, 1983).
PUB TYPE Speeches/Conference Papers (150) -- Viewpoints (120)

EDRS PRICE MF01/PC01 Plus Postage.
DESCRIPTORS College Faculty; Community Colleges; *Faculty Development; *On the Job Training; *Professional Continuing Education; *School Business Relationship; Teacher Improvement; Two Year Colleges; *Vocational Education Teachers

ABSTRACT

Since its inception in 1978, Hagerstown Junior College's (HJC's) Return-to-Industry Project has provided a model for addressing the problem of vocational and technical faculty keeping abreast of technological changes in their field. The project, which was funded by a 5-year Appalachian Regional Development grant, returned occupational faculty to industrial settings to reinforce, update, or expand their skills and knowledge. A faculty member wishing to participate in the project submitted a proposal, indicating area of specialization, tasks to be undertaken, time and resources required, host industry, and applicability of the experience to teaching. Subsequent to proposal approval, a three-part evaluation design was followed, including an on-site assessment, a summary report by a college evaluator, and a plan prepared by the instructor analyzing how the experience would be integrated into his/her teaching responsibilities. During the grant period, 14 of HJC's 15 occupational program clusters and 71% of its eligible faculty participated in the project. In all cases, the faculty member performed valuable services for the host industry, understanding between the host industry and HJC was increased, and experiences proved applicable to the teaching/learning situation. Despite lack of continuing grant support, HJC's Return-to-Industry Project will be maintained through college and state funds and personnel exchange with industry. (LL)

CATCHING UP:

FACULTY TECHNOLOGICAL UPGRADE THROUGH RETURN TO INDUSTRY

A Paper Commissioned For

Vocational Education in the Community College

A conference sponsored by

The New Jersey Consortium on the Community College, Inc.

Atlantic City, New Jersey

May 19, 1983

Michael H. Parsons, Ed.D.
Dean of Instruction
Hagerstown Junior College
Hagerstown, Maryland

The Problem

Thomas P. Melady recently reflected in the Community and Junior College Journal upon the insights he gained while serving as assistant secretary for postsecondary education, U.S. Department of Education. He states: "Probably the greatest strength community and junior colleges possess is your ability to be flexible to the needs of a country in general and a community in specific.... Your success in being responsive will take America far,...It...will reap the benefits of educational programs designed to meet a demonstrated need."[1] While Melady's generalization is valid, it contains the elements of a potentially serious problem for community/junior colleges. What he is describing is change and the community college response to it. American businesses and industries currently are undergoing a major technological transition not unlike the Industrial Revolution in scope and impact. Concurrently, colleges are plateauing; faculties have stabilized; turnover has virtually ceased to exist. Venture capital for innovation, program redesign, or experimentation is in short supply.

A monograph recently published by the National Center for Research in Vocational Education at Ohio State University suggests that "The task of keeping vocational and technical teachers abreast of the technologies of their own occupational field is becoming increasingly more important, but at the same time, more difficult."[2] The survey from which the monograph emanated included eighteen states. The average length of time that vocational and technical teachers had been out of the business or industry of their expertise was seven years.[3] The problem becomes obvious: "Many teachers, having acquired their technology-related skills and knowledge during earlier states of technology development, are finding those skills out of date. This is especially evident among high technology programs at the postsecondary level or in program areas where new technologies tend to be combined...thus demanding broader technical background for teachers."[4]

Community/junior colleges must respond to the demands of changing technology with faculties that have been characterized as "recluses"--isolated, in an eddy away from the mainstream of their discipline and the college.[5] A model for engaging the problem does exist.

The Model

Hagerstown Junior College (HJC) is a comprehensive community college located in one of the nation's thirteen Appalachian regions. The college has fifteen occupational program clusters. The instructors who staff these programs have an average of twelve years' teaching experience. They have not practiced their specialty in the work place for that length of time.

As a result of close interaction and cooperation with industry, HJC identified technological obsolescence as a problem facing its occupational faculty in 1977. Using data drawn from a survey of local industries and support from training personnel in these industries, the college obtained an Appalachian Regional development grant to return occupational faculty to industry over a five-year period. The project began during the summer of 1978. The goal of the project was quite specific. "Return to industry will provide the opportunity for the occupational faculty of the college to reinforce, update, or expand the skills and knowledge required to keep current with changing technology within their professions."[6] Procedures were outlined. The faculty member requesting return to industry was required to submit a proposal, including the specific area of specialization, the tasks to be undertaken, the time period required, and the resources needed to support the activity. Further, the faculty member had to identify the business or industry that would host the activity and provide evidence that the host agreed to participate. Finally, the participant was required

to indicate how the experience would be applied to the individual's teaching area.

Projects were assessed using the following criteria: length of time "out of the field," nature and degree of technological change in the business or industry, relationship between the technological change and the college program, accessibility of a host, and application of the experience to the teaching-learning situation. The college's professional development committee used an evaluation design to assign points to each proposal thereby ranking them. Approval was extended to proposals up to the limit of available funding.

Project Assessment

Once a project was approved, a tripartite evaluation design was used. One part is formative; two parts are summative. The formative component is an on-site assessment conducted by the Dean of Instruction or the participant's division head. The assessment is based on the objectives stated in the proposal document. The visitation is structured to include observation of the faculty member at work, discussion with the on-site supervisor, and discussion involving the faculty member, supervisor, and college evaluator. A summary report is prepared by the evaluator, reviewed by the faculty member and supervisor, then included in the project package.

The final summative component is a plan prepared by the faculty member analyzing how the return to industry experience will be integrated into the individual's teaching responsibility. The college supervisor reviews the plan, then adds it to the package to complete the project.

Program Results

During the five years of the Appalachian development grant, HJC was able to realize the goal of the Return-to-Industry project. Fourteen of the college's fifteen occupational program clusters, or 93%, were represented in the project. Twenty-four of thirty-four eligible faculty, or 71%, returned to industry. Participant outcomes document the value of the program.

In virtually every case, the participant was able to perform a service for the host business or industry. The on-site supervisors indicated that these tasks were desirable but of insufficient priority to be assigned to full-time personnel. Another benefit was the increase in understanding that developed between the host and the college. Most of the on-site supervisors indicated a degree of apprehension regarding participation at the outset. The concern was replaced with genuine respect for the expertise and diligence of the faculty members. A positive result of the increased understanding has been more placements for program graduates with participating businesses and industries. Further, hosts were unanimous in requesting continued participation in the program. They indicated that the original participant was welcome to return. Also, they desired to have other faculty work with them. They have even requested participants from specific programs. Finally, several faculty were able to negotiate consultant contracts with industries as a result of the return-to-industry experience.

From the pedagogical perspective, return to industry has been productive for HJC. Participating faculty were unanimous in their enthusiasm about the project and evidenced no difficulty in applying their learning to the classroom environment. Also, the college initiated a dissemination activity at the close of each return-to-industry cycle. Faculty members, division heads, counselors,

and administrators gather to discuss the experiences, assess their applicability to the teaching/learning situation, and evaluate the potential of future business or industrial experiences. This activity makes it possible for all members of the college community to profit from the return-to-industry experience.

Program Continuation

Does the conclusion of the Appalachian development grant signal the end of the return-to-industry experience? Most emphatically no! During the five-year life of the grant, planning evolved within HJC's professional development committee for continuation of the program. The committee unanimously adopted the following resolution in March 1983: Since technology continues to change at an ever-increasing rate, the need to maintain some form of return to industry is essential if the college faculty are to remain abreast of what is occurring in the businesses, industries, and agencies to which we send our graduates. The following procedures are recommended for the continuation of return to industry.

No more than $1,200 of each approved summer research and development amount would be reserved to fund return to industry.

The maximum length of return would be two weeks. Approximately 15 hours a week would be expected of the faculty member returning.

Payment would be based on the same design currently used for summer research and development, that is, one credit-hour equivalent a week.

The remaining return-to-industry procedures developed during the period of the Appalachian Regional Commission grant would continue.

The first return to industry approved under the modified formula will occur during the summer of 1983. There is every indication that the experience will continue to be successful.

The second strategy designed to continue the return-to-industry experience is personnel exchange with industry. In April 1983, HJC entered into an agreement with Mack Trucks, Inc. for direct exchange of personnel. Each agency will remain responsible for compensating their personnel. The exchange will be on an hour-for-hour basis. Where possible, the industry has agreed to provide technological upgrading for HJC faculty as a byproduct of their involvement. The exchange is currently in operation with college and industry personnel enthusiastic about its potential.

Finally, HJC has worked with the Maryland State Department of Education, Division of Vocational-Technical Education (MSDE-DVTE) to provide funds for return to industry. Members of the staff of MSDE-DVTE participated in a performance evaluation of return to industry. Their assessment of the program was that it is a viable strategy for technological upgrading of faculty. Beginning in fiscal 1984, professional development funds under PL 94-482 will be provided by formula to the college for return to industry. As a result of these three interrelated strategies, return to industry remains viable at HJC.

Conclusion

In a recent monograph describing educationally-based high technology program that work, Abram, Ashley, Faddis, and Wiant suggest that: "'Innovative approaches and strategies are needed to facilitate vocational programs' responsiveness to occupational changes. Even more important, postsecondary programs will need to become more directly involved in helping to transfer technological innovations across and into industries and businesses. In effect, ways must be found to encourage vocational educators to expand beyond their current reactive roles

and to become more aggressive in promoting the use of new technology in cooperation with the business and industry community.[7] HJC's return-to-industry strategy involves faculty with industry to create a synergistic relationship beneficial to both. One hundred and forty-four years ago, Ralph Waldo Emerson described the scholar as a person who "must take up into himself all the ability of the time, all the contributions of the past, all the hope of the future. He must be an [sic] university of knowledges."[8] As community college faculty members face the 1980's, the university of knowledge concept remains valid. Return to industry is an effective vehicle for making the concept a reality.

FOOTNOTES

1. Thomas P. Melady. "Keep the Faith." Community and Junior College Journal. Vol. 53, No. 7 (April 1983), p. 14.

2. James B. Hamilton, Michael E. Wonacott, and Adonia Simandjuntak. Technological Update of Vocational/Technical Teachers: A Status Report. (Columbus, OH: The National Center for Research in Vocational Education, 1982), p. 1.

3. Ibid., p. 5.

4. Ibid., p. 49.

5. Arthur M. Cohen and Florence B. Brawer. The Two-Year College Instructor Today. (New York: Praeger Publishers, 1977), pp. 25-32.

6. "Return to Industry for Career Faculty." The Appalachian Regional Commission. Project Application--Non-construction, 1977, p. 4.

7. Robert Abram, William Ashley, Constance Faddis, and Alan Wiant. Preparing for High Technology: Programs That Work (Columbus, OH: The National Center for Research in Vocational Education, 1982), p. 1.

8. Ralph Waldo Emerson. "The American Scholar," Nature, Addresses, and Lectures. (Philadelphia: Henry Altemus, 1899), p. 88.