DOCUMENT RESUME

ED 126 032 SP 010 227

AUTHOR Weathersby, Rita E.; And Others
TITLE New Roles for Educators: A Sourcebook of Career Information.
PUB DATE [70]
NOTE 121p.

EDRS PRICE MF-$0.83 HC-$6.01 Plus Postage.
DESCRIPTORS Career Change; *Career Opportunities; Community Organizations; Education; Federal Government; Industry; Private Agencies; *Professional Personnel; School Industry Relationship; State Government
IDENTIFIERS *Educational Personnel

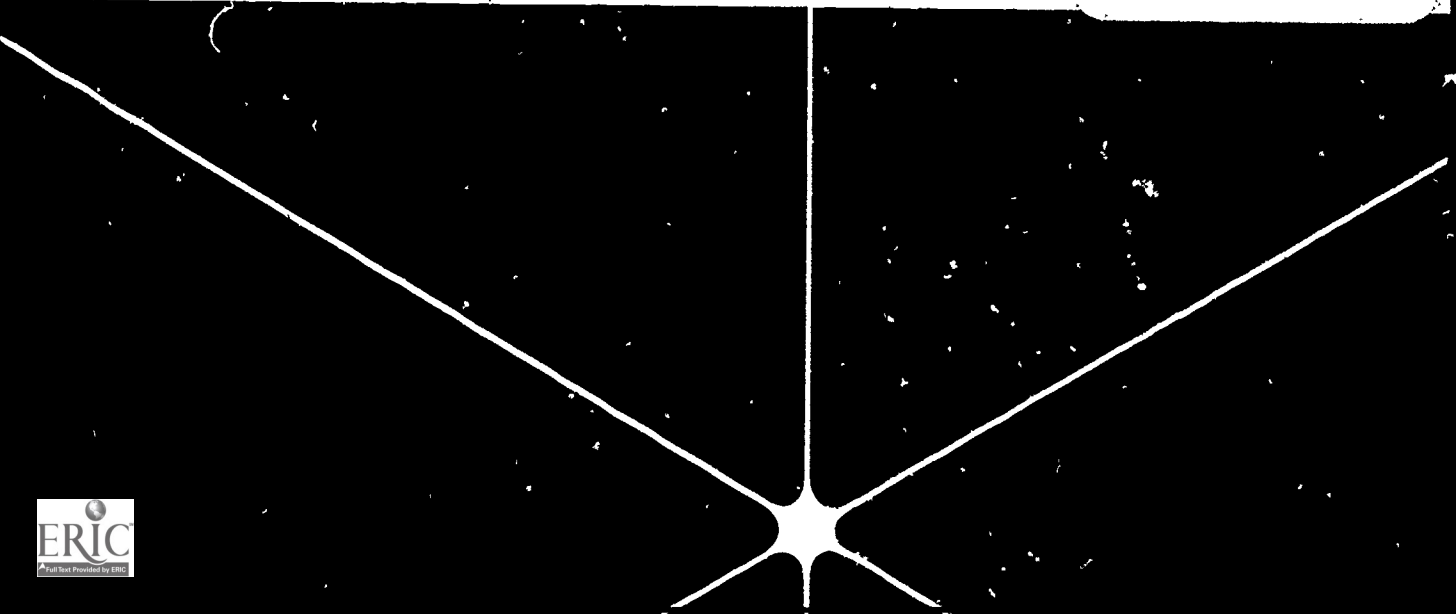
ABSTRACT

This is a sourcebook with two purposes, one philosophical and the other practical. It is a collection of information obtained through a questionnaire about the organizations, people, and programs currently involved in American education. It is hoped that the information will increase communication among agencies and individuals in education. This should result in higher standards of performance at all levels and a more accurate matching of resources and personnel. The second, more practical goal is that of providing a sourcebook of background information for people designing unconventional, or nonteaching, careers in education. The book discusses the role of industry, government (federal and state), schools and nonprofit organizations (research centers, foundations, and associations), and community organizations in education. For each of these sectors, a brief overview is given, followed by name, address, and descriptive profiles of specific corporations, agencies, and organizations. A section on "How to Find New Careers" gives advice on developing new career ideas and job hunting strategies. This is followed by profiles of individuals who have successfully created a new career in education. (DMT)

A SOURCEBOOK OF CAREER INFORMATION

BY RITA E. WEATHERSBY
PATRICIA R. ALLEN
ALAN R. BLACKMER, JR.

NEW ROLES FOR EDUCATORS



NEW ROLES FOR EDUCATORS

A SOURCEBOOK OF CAREER INFORMATION PREPARED FOR THE HARVARD GRADUATE SCHOOL OF EDUCATION PLACEMENT OFFICE

BY RITA E. WEATHERSBY
Teacher and Free-lance writer in Education

PATRICIA R. ALLEN
Bureau of Curriculum Innovation, Massachusetts Department of Education

ALAN R. BLACKMER, JR.
Associate Director, Placement Office Harvard Graduate School of Education

PRICE **$3.50**

CONTENTS

ACKNOWLEDGEMENTS

So many people have contributed generously to *New Roles for Educators* that we find it impossible to list all of them. We would, however, gratefully like to acknowledge the following persons. They are actually *doing* what this book is about.

Mary Albro
Jay T. Ball
Max Bogart
Joseph Breiteneicher
Audrey Butler
George Brosi
Grace Brubaker
Ann Caldwell
Fred Centanni
Eliot Chappelle
Susan E. Clark
Richard Clark
Linda Conroy
Patricia Cornu
Dana M. Cotton
Donna Leah Curtis
Carol Dannenberg
Patricia Fearing
Barton A. Fields
John Fischer
J. Gerald Fitzgibbon
William Flaherty
E.G Francisco
Solomon Fuller
Janice Greenfield
Malcolm Hamilton
Burton Harrison
Anne Higman
Robert Horn
Eugene Howard
Laurence Iannaccone
Shelby Johnson
Vivian Johnson
Philip Kehoe
Ivy Lee, Jr.
Richard Lee
Mary Lipscomb
Richard McCann
Carlyle Maw
Phyllis MacAdam
Austin J. McCaffrey
Milbrey McLaughlin
Dorothy Meyer
Ernest W. Michelsen
Robert C. Minor
Annette Moser
Charles Neathen
Thomas O'Hare
Frances Olson
Claire Palmour
Sara Perkins
Henry Perry
Paul Perry
Dan Pinck
Arthur Powell
Ronald Randall
Eric M. Rickard
Victoria Rupp
Byron Rushing
Samuel G. Sava
Charles Schulberg
William Sheridan
Stanley B. Sherman
Theodore R. Sizer
Alan B. Sostek
Richard Sovde
Mildred L. Sowers
John D. Sullivan
Kathy Sullivan
Patricia Sullivan
O.C. Sydnor
S. Stowell Symmes
Roger Twyman
Larry Van Dyne
James Ware
Mary Lee Warren
Fred J. Wilkinson
Adrienne Wilson
Rae L. Zielin

FOREWORD

New Roles for Educators is a sourcebook with two purposes, one philosophical and the other practical. We have collected into one book some, but by no means all, of the available information about the amazing variety of organizations, people and programs currently stirring American education. This information reflects a constantly broadening definition of education itself. We feel that the usual concepts of careers in education should also be expanded to include the roles of federal and state government, community agencies, private industry, professional and education-related associations, foundations, study councils, and research organizations. We also wish to provide information which will increase communication among the types of agencies and individuals we have described. Better communication should result in higher standards of performance at all levels and a more accurate matching of resources and personnel.

Our second, more practical, purpose is to provide a sourcebook of background information for people designing unconventional careers in education. Our emphasis on new roles by no means discredits traditional ones such as teaching and administration. Obviously, colleges must continue to train professionals to operate our schools creatively. Equally vital, however, are the emerging careers which attract and hold imaginative people who are frequently the most dissatisfied.

In the Placement Office an increasing number of people ask about "non-teaching jobs in education." Many have concluded from information they could gather that their best chance of effecting change would be from outside formal educational systems. Some are simply looking ahead a few years beyond the teaching they plan to do. Others want alternatives laid out before making any decision. Still others feel they have received all they could from the experience of teaching a few years and want to try something different.

In talking with these people we concluded that three groups would benefit particularly from accurate information: those whose definition of education was broad and who consequently sought a job with many facets; those in education who felt limited by the classroom but liked the profession and wanted to continue in some capacity; and those in other professions who wanted to explore ways they could contribute to education. To serve these groups we set out to describe objectively what was going on in the educational world.

Most of the alternative careers we describe in *New Roles* arise through linking two

currently separate worlds, those of the professional educators on the one hand and the rest of American society and economy concerned about education on the other. On the whole we are addressing the practical sections of this sourcebook to educators who wish to explore the other world or to bring the two worlds closer. But the contents are equally addressed to parents, industry, research and development organizations, the communications industry, community agencies, and state and federal government programs of all types. Each world should overcome its isolation, for all have much to gain from joint ventures, shared personnel, cooperation, and communication.

At the outset we must register strong disclaimers, lest we disappoint our readers. This is a sourcebook, *not* a comprehensive report. Much of the information we obtained from responses to a questionnaire. We followed up the most interesting comments, adding to the book as we talked with people. The result of our inquiries was an information explosion which we coped with as well as our limited time and resources allowed. There are many omissions and there are probably inaccuracies; for these, we apologize. Please use the Reader Response Form at the back of the book to inform us for possible future editions.

This project cannot accomplish all that we intend. But it is a beginning. And it provides a model which we hope others will copy. We have described new roles for educators nationally and generically; they could also be treated comprehensively and locally. Greatly expanded sections on state departments of education, university research centers, and unusual jobs within school systems could be written. There should be a New England edition of *New Roles*, a California edition, a New York, Washington, D.C., Mid-West and Southern edition. We hope someone will do them. In that way, *New Roles for Educators* will begin the kind of fruitful dialogue we are seeking.

Alan R. Blackmer, Jr.

Alan R. Blackmer, Jr.
Associate Director / Placement Office
Harvard Graduate School of Education
February, 1970

Industry

BUSINESS ROLES IN EDUCATION

Materials and Services

Education and Training

Overlapping Roles and Functions

EDUCATION INDUSTRY PROFILES

Publishers
Scott, Foresman and Company

Educational Materials and Equipment Suppliers
The Ealing Corporation
Selective Educational Equipment, Inc.

Specialized Educational Service Firms
Croft Educational Services, Inc.
Pinck and Leodas Associates, Inc.
International Learning Corporation

Research and Development Firms
Abt Associates, Inc.
Information Resources, Inc.

Management Consulting Firms
Sterling Institute

Education and Training Consultants
Educational Sciences Programs, Inc.

Education Divisions of Large Corporations
General Learning Corporation

Business Roles in Education

A curious tension arises whenever people discuss industry and education. Educators are much too quick to point out the perils of business involvement in education: preoccupation with profits, lack of interest in quality work, insensitivity to humane goals, impetus toward control of the educational process. Conversely, businessmen mock the inefficiency of schools and school systems and assume all too often that educational problems are easier to solve than they really are. Mutual suspicion and legitimate concern are in many instances justified. But justified or not, this we/they dichotomy is unproductive. Neither world is idyllic. Arguing that the grass is shriveled on the other's side does not remove the fence.

Generally, businessmen seem to be involved in education in three ways: by providing materials and services to schools and students, by conducting training programs for employees or the unemployed, and by joining with government, school, or community agencies in public service efforts to improve education.

MATERIALS AND SERVICES

At the core of recent business activity is the realization that education may ultimately become the nation's largest enterprise. Over a fourth of the U.S. population is going to school. Nearly half of all Americans of college age attend a college or university. Annual expenditures for education are estimated to reach nearly $70 billion by 1977-1978.

This is quite a market, but it is not particularly easy to tap. Schools spend the vast bulk of their funds on staff salaries, utilities, maintenance, and interest on bonded indebtedness. After this, only a small percentage remains for anything else. Educators usually lack "free money" to purchase the goods and services industry has to sell. Potential clients such as students, parents, educational agencies, and other businessmen often have money but are difficult to reach.

Businessmen must learn to cope with 70-plus federal agencies supporting educational programs, 55 state and territorial departments of education, approximately 21,000 operating public school districts, private schools of various kinds and levels, and 2300 colleges and universities – with one or two new ones springing up each week. Although small amounts of money are beginning to be available, federal research and development funds for large-scale private development of new equipment, facilities, and approaches are just not forthcoming on anything like the scale of those for developing new weapons systems or sending men to the moon. Add to this the hostility of many educators to the entry of business into "their" sphere of influence, and the welcome mat is not out. But that does not seem to matter. Businessmen are becoming increasingly interested in education, and they are coming in whether educators hold open the door or not.

It is helpful to distinguish between the older and newer education companies. The older businesses are textbook publishers, manufacturers of standard equipment, educational film producers, and test publishers; the newer businesses tend to be research

and development companies, management consulting firms, materials developers, new technology and equipment producers, and suppliers of various kinds of specialized services to schools. Since 1962, a number of large "outside" corporations have acquired educational subsidiaries and established Educational Services or Educational Systems Divisions. The newcomers are familiar words: Xerox, Time, IBM, CBS, RCA, Bell & Howell, Raytheon, Litton, Westinghouse, and General Electric. Other recent mergers have resulted in large corporations that have diversified interests in education. Crowell, Collier and Macmillan, for example, can supply anything from consulting services and textbooks to crayons, band uniforms, and graduation gowns.

But not all the newcomers are huge monoliths. Among the corporate giants is a proliferation of interesting midgets, also newly founded but generally begun by teachers interested in educational change who have formed their own businesses to provide services and materials otherwise unavailable.

EDUCATION AND TRAINING

Businesses have also become involved in education because of their need for skilled workers and their need to train others to use the products they manufacture. Sylvania Electronics, for example, has an Education and Training Unit that is part of its worldwide product support operation. The unit designs training manuals, handbooks, courses, procedures, and equipment, teaches clients how to use the complex electronic equipment, provides general courses for their own employees and the employees of other firms, and has recently become involved in providing job skill training in electronics for the unemployed. Bolt, Beranek and Newman, another technical company, conducts an extensive Program for Advanced Study that provides continuing education at the graduate level for engineers, scientists, architects, and urban planners. Polaroid offers general interest courses to employees on company time. Most large firms must make some provisions for training their staff and keeping them up-to-date.

Apart from concern for their own staff, many firms have become involved in hiring and training the hard-core unemployed. Some of these programs are national in scope. Through the JOBS (Job Opportunities in the Business Sector) program launched in 1968 by the National Alliance of Businessmen (726 Jackson Place, N.W., Washington, D.C. 20235), more than 1000 firms have signed contracts to hire and train over 80,000 persons. "Training" ideally includes both adult basic education – for which there is a shortage of good programs, consultants, teachers, and materials – and job-oriented skill training. Recently the number of cities with JOBS programs was expanded from 50 to 125. Other training programs are sponsored by the Concentrated Employment Programs (CEP) of the Office of Economic Opportunity, by Community Action Programs (CAP) also sponsored by OEO, and by the armed services. The military budget for training and education is reported to be larger than the budget of the U.S. Office of Education. The huge scope of federal and military education and training programs has created a genre

of firms called education and training consultants. These companies prepare job-oriented training materials, operate Job Corps or other training centers, and help other firms establish training programs. The National Alliance of Businessmen's *Manpower Training Consultants Directory* lists over 100 such firms.

OVERLAPPING ROLES AND FUNCTIONS

Because of the willingness of many companies to work jointly with others toward improved education, it is becoming increasingly difficult to separate the roles of professional educators and "ordinary citizens" interested in education. Who teaches? Who develops curriculum materials? Who trains teachers? In many instances there seems to be a new kind of public-private partnership emerging. General Learning Corporation, for example, is part of a consortium including the Pittsburgh Public Schools and the Learning Research and Development Center of the University of Pittsburgh. Members of the faculty of the Pittsburgh schools, research psychologists and students from the University, and General Learning staff jointly hold classes and develop materials for children ages 3 through 9.

A second example of industrial and educational overlap occurs in Detroit, Michigan, where Michigan Bell Telephone Company and The Chrysler Corporation have each entered into an educational partnership with a Detroit school. Each company has assigned a person full time to the school and several other employees teach part time. Both the Pittsburgh and Detroit efforts have created new coordinating roles.

A third example of overlap is the Parkway Project in Philadelphia, a liaison between the city school system and several downtown businesses. Students spend their time in the various business buildings taking academic courses as well as being introduced to the different industries in the project. The Chicago High School for Metropolitan Studies represents a similar effort. Again, new roles were created in coordinating the relationships in both cities.

Industrial and educational interplay occurred in a management situation recently in New Haven, Connecticut. Analysts from the Winchester, Conn., division of Olin-Mathieson Chemical Corporation studied the New Haven school system in all aspects, but especially from the point of view of middle level management. The Southern New England Telephone Company then assigned three men to implement the findings of the Olin-Mathieson study. They developed a staff training program for middle level manpower development. Again, the cooperation created new administrative roles.

An interesting experiment in industrial and educational overlap is the "performance contract" idea being developed by the U.S. Office of Education under Title III of the 1965 Elementary and Secondary Education Act. Under this plan a company contracts with a school system to teach certain subjects. A pre-test, post-test, and test several months after the contract period has ended determine whether the students reach and maintain the level of education specified by the contract. The company rather than the

school is accountable and receives full payment for the contract only if the performance conditions are met. In suggesting that American businesses might be able to teach certain materials and types of student better than schools, the Office of Education is itself creating a variety of new roles.

A sixth and somewhat different example shows the relationship between industry and school districts on a regional level. It is represented by industry-education councils. Currently, three exist: two in California, the Northern California Industry-Education Council and the Southern California Industry-Education Council; and one in Arizona, the Arizona Business-Industry Education Council. They are independent, nonprofit organizations. By industry, they refer to business, labor, agriculture, military, government, etc. – in other words, the entire community other than education.

Their leadership is derived equally from industry and education. They serve as a clearing house for coordinating the needs of education and industry. They open channels of communications between those involved in industry and education, both on the regional as well as the local level. They strive to eliminate duplication of efforts. They endeavor to bring about a close cooperative relationship between all segments of the community so that their tremendous resources may be utilized to the benefit of all concerned.

The Northern California Industry-Education Council (NCI-EC), for example, focuses attention on major issues of concern to both education and the community at large. It has conducted conferences on such subjects as "Career Guidance," "New Concepts in Learning in Industry and Education," "Making Career Decisions," "The Changing World of Education," "Communications Revolution," "The Financial Crisis in Public Education in California," "Education for Employment," "The Search for Relevance in Education," and "The Search for Relevance in Education Continued – Individualized Instruction?" As a result of the latter two conferences, it sponsored an "NCI-EC Journey for Relevance" during which it took some eighty businessmen, members of boards of education, county and district superintendents, principals, administrators, teachers and parents to inspect, first-hand, five national Innovative Learning Centers. The Council provided coordination, whereas all participants, either individually or through their school districts, funded the program.

Recognizing that the real action takes place at the local level, the Councils have sponsored the development of local affiliates, generally on a county level. Representatives from both the local communities and the school districts meet and take action cooperatively to solve local educational problems. The most productive local councils have been those where the county superintendent's office has provided day-to-day coordination by assigning direct responsibility for such coordination to a member of the superintendent's staff.

While the individual programs carried out by local councils vary by areas, in general they encompass community resource surveys, curriculum development, economic education, in-service training, man-power needs and job requirements, motivation and

recognition, occupational guidance and counseling, science fairs and related projects, utilization of management procedures to increase operating efficiency, and work experience.

The activities of the three existing Councils have attracted national attention, as a result of which they have taken preliminary steps to create a national association tentatively known as Industry-Education Councils of America. Its headquarters are located in Room 1012, 235 Montgomery Street, San Francisco, California 94104.

Education Industry Profiles

Businesses that provide materials or services for education can be classified into seven generic categories: (1) publishers, (2) materials and equipment suppliers, (3) specialized school service firms, (4) research and development firms, (5) management consulting firms, (6) education and training consultants, and (7) large corporations with education divisions. Categories overlap, of course, and some of the most interesting companies are hybrids, but these terms should suffice as general guides. To illustrate each category, at least one company is described at length; names and addresses of other companies and sources of further information are also listed. These examples are not comprehensive, however, but merely illustrative. Other companies remain to be started, discovered, described, merged . . . the scene is a constantly changing kaleidoscope.

PUBLISHERS

Publishing is one of the older education industries. Most activity centers around New York, Chicago, Boston, and, increasingly, the San Francisco Bay Area. Some firms publish only educational materials; others are trade book publishers with educational publishing divisions. The three major divisions of the industry are elementary and high school texts ("elhi"), college texts, and reference books.

Most publishing houses tend to be large, somewhat conservative organizations with long-established relationships with schools and school systems. Publishers rely on teachers and college professors, for the most part, to author textbooks; and they often employ ex-teachers to edit and sell their materials. Clients are schools and school systems and state departments of education where state adoption of textbooks is standard procedure.

In the last decade there have been many mergers, acquisitions, and organizational changes in publishing, generally because new trends in instructional materials require an immense amount of capital and diversification to keep up with education's rapid growth. In some cases publishing firms have combined forces in order to serve a larger span of the market, uniting different levels of education, producing instructional materials other than textbooks, or adding trade books to their line. In other situations, communications and electronics firms have acquired publishing subsidiaries to help them

produce materials for new systems of communication. Other associations were formed to provide the facilities to compete for large government contracts such as military training and Job Corps centers. This increased activity has transformed many publishing houses from small, family-owned businesses into large public concerns.

Many publishers are branching out into the production of multi-media materials, some into such fields as computer-assisted instruction and information technology. But they are caught in a bind between educators who advocate the use of newer, more individualized and manipulative materials, and most school systems whose purchases still make standard textbooks the major source of revenue. Nevertheless, in 1968, the American Textbook Publishers Institute changed its name to the American Educational Publishers Institute to indicate the broader role its members play in creating and selling all kinds of instructional programs, not just textbooks.

COMPANY PROFILE

SCOTT, FORESMAN AND COMPANY
1900 East Lake Avenue
Glenview, Illinois 60025
(312) 729-3000

Focus: An elhi (elementary-high school) house originally known for its elementary reading series, Scott, Foresman is expanding its markets. In November, 1967, the company doubled its volume of business in high school and college texts when it acquired the South-Western Publishing Company, which specializes in business and economics materials at those levels. Another subsidiary also acquired in 1967, William Morrow and Company, serves the juvenile and adult trade markets. Sales volume for 1969 breaks down as 46% elementary, 24% high school, 21% college, and 9% trade books.

Scott, Foresman's pattern of expansion illustrates general trends in publishing. Within the last 10 years, the firm has grown from a functionally-organized company into a multi-divisional firm with several subsidiaries serving specialized markets. In the same period, the company has undergone a transition from a family-owned, family-managed organization to a publicly-owned, professionally managed corporation. The company has also been evolving a much broader concept of the nature of its business.

> "Where once we published basic books, now we produce many kinds of non-book and non-print educational material as well. In addition, the company has attempted to meet students' individual needs more completely by making available specialized programs for both the culturally enriched and the culturally deprived. This diversification of products reflects our company's effort to implement in a meaningful way the systems concept within the field of education – that is, to produce complete multi-media educational programs that serve students at all levels."

In the future, the company expects to diversify further into related educational markets.

> ". . . We are essentially broadening the definition of our business to a concern for all forms of education, both formal and informal. Thus we are becoming increasingly concerned with the more informal learning experiences – those that take place outside formal educational institutions."

Personnel: Scott, Foresman hires an extraordinary number of educational professionals because of its emphasis on communication and service. The elementary and high school sales force, for example, is composed almost entirely of former teachers or school administrators, many

with advanced degrees. The parent company's total professional staff numbers about 600. Personnel categories are editors ($6000-$20,000/35-50 hired each year), artists, designers and copywriters ($6000-$20,000/10-15 hired each year), sales representatives ($8000-$15,000/15-20 hired each year), and educational consultants who help teachers use Scott, Foresman materials ($8000-$15,000/3-5 hired each year).

SOURCES OF INFORMATION

American Educational Publishers Institute (AEPI). This is a voluntary non-profit association of most of the nation's educational publishers. AEPI has a membership of approximately 110, with affiliates in map and globe production. A membership list is available upon request, as are a descriptive brochure, annual report and various AEPI publications. Write 432 Park Avenue South, New York, N.Y. 10016, (212) 679-6488.

Literary Market Place. This is the annual business directory of American book publishing. It is a standard reference work in most libraries. It contains a list of book publishers, classified by type (textbook publishers, children's books, etc.) and geography; it also lists associations of publishers and writers, placement agencies, government agencies, book clubs, writers' conferences, and so on.

A Career in Book Publishing. This concise, informative pamphlet was written by the Vice President and Editorial Director of McGraw-Hill Book Company. It outlines the career ladder in a publishing house, describing who does what, what background and skills are needed. A short bibliography is included. Write 330 West 42nd Street, New York, N.Y. 10036.

Training Courses. Some publishers, colleges, university extension programs, and adult education centers offer basic courses in publishing procedures.

Yellow Pages. A good source of information about local publishers is the yellow pages of the telephone directory, under *Publishers*.

EDUCATIONAL MATERIALS AND EQUIPMENT SUPPLIERS

This category includes a large and diverse group of businesses ranging from ordinary school suppliers to distributors of computer-assisted guidance systems. Educational materials and equipment have undergone rapid change as a result of the work of curriculum study groups, interest in educational technology, and the trend toward nonverbal and individualized learning. Companies producing educational films and filmstrips are old timers in this field; relative newcomers are the producers of language laboratories, teaching machines, programmed instruction, talking typewriters, computer consoles, film loops, simulation games, learning kits and packages, and manipulative materials for young children.

Firms in this category tend to develop and produce either "hardware" or "software;" some do both. "Hardware" is equipment; "software" is the ideas, concepts, lesson sequence and presentation that determines whether anyone learns anything. It is a cliche to speak of the "hardware-software imbalance," but cliche or not, it is still true. It is easier to design and manufacture equipment than it is to determine what to teach and how to teach it.

Educational materials firms sell to schools and to school systems. Some sell to the general public as well. Other more industrially-oriented firms develop materials and

technology for their own use in teaching adults, often in staff development, in job upgrading or in training programs for the unemployed. Much technical and industrial training is done for the armed forces; servicemen are often the first to try out new materials and approaches.

COMPANY PROFILE

THE EALING CORPORATION
2225 Massachusetts Avenue
Cambridge, Massachusetts 02140
(617) 491-5870

Focus: The Ealing Corporation has been in education since the late 1950's when it was formed to import physical science teaching apparatus for high schools and colleges from England and Germany. Ealing still sells apparatus and other school equipment, but this has given way to production and distribution of 8mm film loops, a new teaching medium developed in the early 1960's. Film loops deal with single concepts or demonstrations and have the virtues of being short, silent, versatile, easy to use, and readily adaptable for individualized, small group or large group instruction. Ealing is the largest publisher of film loops, offering more than 1,000 titles in their four 1969 catalogs and supplementary brochures. Teaching packages are being developed to accompany some of the film loops.

In 1969-1970 Ealing is expanding in yet another direction: teacher staff development. Over a two-year period the company has developed "Starting Tomorrow," a year long program of inservice workshops for elementary teachers. Six packages of materials – workshop films, leaders' guides, teachers' guides, materials to take to the classroom – are delivered at appropriate intervals throughout the school year. Additional units are in development. Structured after the teaching style they advocate, the workshops are self-directed, participant-centered, and discovery-oriented; they employ various media according to purpose and activity and come with feedback materials for teachers to take back and use in their own classrooms "starting tomorrow." Although focused on curriculum content (composition, reading, science, art), the materials are not random lessons but vehicles en route to a more differentiated style of teaching. Its director explains that:

> " 'Starting Tomorrow' is akin to a cake mix where you add teachers and stir. You wouldn't think this would lead to a change in behavior, but it does . . . It really works . . . It's mostly a matter of packaging practices that have worked in many classrooms, putting them in a group dynamics framework, and letting teachers discover, enjoy, try out, and synthesize for themselves what is valuable . . ."

If Ealing can offer concrete, practical help for practicing teachers, it will have made a portentous beginning. Programs of continuing education are becoming increasingly indispensable in all the professions.

Personnel: Out of a total professional staff of about 30, approximately 20 work in education. Most are subject editors who work with authors (educators, specialists or persons with unusual skills) to produce the film loops. Editors specialize in a subject area, and usually have master's degrees, teaching experience, and other experience in curriculum development, educational films or television. Salaries range from $10,000-$18,000. The "Starting Tomorrow" units are developed by a small program staff, aided by consultants and supervised as to overall direction by Ealing's National Advisory Committee, which consists of professional educators who are directors of curriculum centers, inservice and teacher education, and elementary education, superintendents of schools, associate professors of education. Ealing's business is approximately 70% education, 30% optics in the United States; in Europe, its mix is 50-50%.

COMPANY PROFILE

SELECTIVE EDUCATIONAL EQUIPMENT, INC. (SEE)
3 Bridge Street
Newton, Massachusetts 02158
(617) 969-3330

Focus: SEE was started two years ago by a businessman from the "real world" who became interested in education when he started coordinating production of the kits that accompany the Elementary Science Study (ESS) units. Essentially, SEE acts as a broker-procurer, making materials and equipment available to teachers at prices that are high enough to make a profit but still cheap enough to get the materials into the hands of children. To cut costs, SEE houses educators, developers, manufacturers, and distributors under one roof.

The word "equipment" is perhaps deceptive. SEE supplies materials for the ESS kits – berry boxes, soda straws, pipe cleaners, and so on, for "Kitchen Physics," rubber sheeting, balloons, mung beans and two pounds of clay for "Gases and Airs" – along with other things teachers can use to give children a chance to explore the world around them. "Other things" include film loops about the monarch butterfly, samples of pond water, 10" slide rules for elementary students, unbreakable plastic mirrors, transparent adding machines, pregnant mice, green iguanas, and a pair of mated gerbils in a cage with a water bottle. SEE will furnish a baby elephant if anyone orders it.

The people at SEE make some of these things themselves; others they import or purchase and distribute. Either way, they assure school people that their materials really will perform the way they are supposed to when they get into the classroom.

Where older education businesses tend to develop packaged answers to teachers' needs, SEE's approach is more of a two-way street: "Tell us what you want; if we can do it, we will." One tangible proof of this philosophy is a SEE-designed, nonbreakable 60X (or 120X) simple microscope that children can put together themselves – for $4.25, with illuminator. Other proofs are 1" wooden blocks not generally available by themselves but needed for current mathematics and science experiments. SEE's catalog also lists several items developed by teachers and produced and distributed by SEE more as a public service than a profit-making venture.

Personnel: Originally, the "company" was its founder Burton Harrison, his wife, and one secretary. Staff now numbers 28, with approximately 14 "professionals" although the categories overlap. The firm needs people who are jacks-of-all-trades, who have taught or want to teach, who are observant, who have drive and imagination, and who can relate resources in solving practical problems without losing sight of eventual educational goals.

EDUCATIONAL MATERIALS AND EQUIPMENT SUPPLIERS

This short listing illustrates the tremendous diversity among companies that produce and distribute educational materials and equipment.

American Science & Engineering
EQUIPMENT FOR SCIENCE AND SOCIAL STUDIES KITS
20 Overland Street
Boston, Mass. 02115

Blackside, Inc.
A BLACK-OWNED, INTERRACIAL RADIO & TELEVISION PRODUCTION COMPANY
21 Greenwich Street
Boston, Mass. 02120

Creative Playthings, Inc.
TOYS AND MATERIALS FOR HOME AND SCHOOL
Princeton, New Jersey 08540

Didactic Game Company
SIMULATION GAMES
Box 500
Westbury, N.Y. 11590

Educational Modules, Inc.
LECTURE MATERIAL, VISUAL AIDS & DEMONSTRATIONS FOR HEALTH AND BIOLOGY
266 Lyell Avenue
Rochester, N.Y. 14608

Encyclopedia Britannica Educational Corporation
FILMS, FILMSTRIPS, FILM LOOPS, TRANSPARENCIES, PROGRAMMED INSTRUCTION
425 N. Michigan Avenue
Chicago, Ill. 60611

Interactive Learning Systems
COMPUTER-ASSISTED GUIDANCE SYSTEMS
1616 Soldiers Field Road
Brighton, Mass. 02135

Medical Communications, Inc.
HEALTH EDUCATION MATERIALS
280 Park Avenue
New York, N.Y. 10017

Michael Sand Associates
GRAPHICS, EXHIBITS, EDUCATIONAL MATERIALS DESIGN
101 Winthrop Street
Cambridge, Mass. 02138

Products of the Behavioral Sciences
TOY AND GAME DESIGN
1140 Dell Avenue
Palo Alto, Calif. 95008

Society for Visual Education
FILMSTRIPS, SLIDES, STUDY PRINTS, FILM LOOPS AND RECORDS
1345 Diversey Parkway
Chicago, Ill. 60614

Teaching Resources Corporation
MATERIALS FOR CHILDREN WITH LEARNING PROBLEMS
100 Boylston Street
Boston, Mass. 02116

Teaching Systems Corporation
TRAINING COURSES FOR BUSINESS
100 Boylston Street
Boston, Mass. 02116

Ward's Natural Science Establishment
GEOLOGICAL & BIOLOGICAL SPECIMENS
P.O. Box 1712
Rochester, N.Y. 14603

SOURCES OF INFORMATION

Knowledge Industry Publications. Current information regarding who is doing what appears in *Knowledge Industry Report*, a businessmen's newsletter on the knowledge industry, and *The Educational Marketer*, a newsletter for sales, marketing, and advertising executives in educational publishing, materials and equipment companies. Subscription rates are $60 for 24 semi-monthly issues of *Knowledge Industry Report*, $28 for 24 semi-monthly issues of *The Educational Marketer*. Write Knowledge Industry Publications, Inc., 120 E. 34th Street, New York, N.Y. 10016.

Patterson's Source Guide for Educational Materials and Equipment. Names and addresses of companies can be found in this annual buying guide for school superintendents, business managers, and board of education members. Companies are listed yellow-page fashion according to products; then listed alphabetically. The guide is available in some education libraries, or write Educational Directories, Inc., P.O. Box 199, 140 E. Northwest Highway, Mt. Prospect, Ill. 60056. $1/copy.

Educational Salesmen's Associations. The Educational Salesmen's Association of New England publishes an annual directory of the New England School Superintendents that also includes a directory of their own members listed alphabetically under the firms for which they work. The directory is available from Madeline W. Cobb, Secretary-Treasurer, 72 Bow Road, Newton Centre, Mass. 02159. $2/copy for nonmembers.

Other regions have similar salesmen's organizations. For example, there are associations for greater Chicago, New York, New York City, Philadelphia, Colorado, Northern California, the Pacific Northwest, and the American Midland. Addresses are given in *Literary Market Place;* other information can be had from the Board of Education in the capital city of each state.

Yellow Pages. Some local information is in the yellow pages of the telephone directory, under *School Supplies.*

SPECIALIZED EDUCATIONAL SERVICE FIRMS

This small but potentially influential category reflects a trend toward offering differentiated, individualized services to teachers and school administrators. Firms in this category are close kin to non-profit organizations that offer similar services. Older businesses in this genre offer reading instruction, guidance and testing services to public and often to private schools. Newer businesses tend to offer custom-tailored publishing, custom-tailored curriculum and materials development, and individually-tailored staff development programs and consulting services. There seem to be two varieties of newcomers: small, newly-established "angry young men" companies that specialize in innovation and educational reform, and large multi-faceted corporations whose Education Group provides consulting and other services. Businessmen are usually the prime movers in the large corporations; young education professionals tend to dominate the small companies.

COMPANY PROFILE

CROFT EDUCATIONAL SERVICES, INC.
100 Garfield Avenue
New London, Connecticut 06320
(203) 442-8521

Focus: Croft Educational Services provides publishing, consulting, and research services to school administrators, school boards, principals, teachers, and to educators and educational institutions generally. They have developed a unique series of printed materials, mailed in regular installments, that facilitate communication and problem solving at all levels of school operation.

The complete service includes separate materials for top administrators, school board members, central office administrators (federal aid to education, curriculum, school business practices), principals (elementary, middle school/junior high, high school), teachers (a general *Teacher's Letter*, a subject matter-grade level report, a problem-oriented supplement), secretaries, and custodians. Their approach appears practical:

> "No platitudes. No preaching. No gobbledygook. Just an abundance of hard facts, useful tools, great ideas, and strategies that will help any principal become a *better* principal."

More and more, Croft is expanding in the direction of supplying individualized services to school systems. They offer a consulting service in school board policy development that has already been used by over 300 institutions and school systems. They do general consulting in the fields of school administration and curriculum development.

Personnel: Croft has a professional staff of about 20: 3-4 are in administrative management (1-2 hired yearly), 12-15 are on the editorial staff (2-3 hired yearly), and 15-20 are professional sales representatives (2-3 hired yearly). They look for people with a master's or doctorate degree and experience in education; excellent writing skills; skill in selling and persuading; and skill in management.

COMPANY PROFILE

PINCK AND LEODAS ASSOCIATES INCORPORATED
2000 Massachusetts Avenue
Cambridge, Massachusetts 02140
(617) 864-7780

Focus: Pinck and Leodas is a private organization devoted to improving education. They work primarily with schools and associated governmental agencies and focus on staff development, community participation, and school curriculum. Some of their projects are the following: planning and organizing staff training colleges operated by public school systems in which teachers assume major responsibility for curriculum development, pre-service and in-service training; providing in-service education programs for teachers and administrative staff development programs for principals; developing community schools with new organizational patterns of responsibility and in-service training programs for community aides, teachers, administrators, and policy-making groups; helping with educational planning at local, state, and regional levels; helping cities to become Model Cities.

Emphasis throughout is on listening to people and on providing thoughtful counsel in helping them solve their own problems.

> "Group processes play an important part in our work and in effecting change. But it is always done in combination with other things that matter, such as curriculum content, individualizing instruction, developing a community school or working in neighborhood and community development, not to coerce people into a fraudulent togetherness but to use it in specific situations for specific educational goals . . ."

Their public statements are unusually straightforward.

> . . . "Almost all of the fads and innovations in education are useless because the simple human ties are hardly able to reach beyond the folly and ridiculous prescriptions of experts in education, in training, in community development. We have worked in these fields around the world, our mistakes have been awesome, and our knowledge has come only from making mistakes and an occasional glimmer of insight. But we have made mistakes, and we have learned from them; and will continue to make mistakes. Maybe we've made enough to know what not to do; and that's the stage we're at now; we think we know enough of what not to do to be helpful. Anyone who promises more is a fool."

Personnel: Dan Pinck and Costa Leodas formed this company in May, 1969. Pinck has a background in writing and publishing as a staff member of *The New Yorker* and contributor to *The Reporter* and *The New Republic*. He was Secretary of the Committee on Curriculum Content Planning at Massachusetts Institute of Technology and Deputy Director of Educational Services Incorporated. Leodas has been a university teacher, an elementary school principal, a curriculum developer, a Peace Corps trainer, and director of Headstart and community action programs. Four others, plus 13 consultants, make up the firm at this time.

COMPANY PROFILE

INTERNATIONAL LEARNING CORPORATION (ILC)
245 Southwest 32nd Street
Fort Lauderdale, Florida 33301
(305) 525-0873

Focus: International Learning Corporation was formed in 1968 by a group of industrialists and educators to publish and market academic games developed through the Nova University Academic Games Project. The company has since widened its interests to include both publishing and consulting activities related to educational innovation and change. "Assisting school districts in institutionalizing the change process" is their unusual specialty. "Our product," says the president, Eugene Howard, "is the change process itself."

In its first year of operation, International Learning published the Nova games and distributed other games developed by the Accelerated Learning of Logic (ALL) Project at Yale Law School. They also developed learning kits for elementary school mathematics and science and began a pamphlet series on innovation and on planning and man-

aging change ("A String of Beads," "The School-Based Development Team as a Means of Fostering Rational Change in Educational Institutions"). The ILC staff also organized a corps of one hundred consultants to provide services centered on planning, implementing, and evaluating educational change. The consultants are organized into task forces: academic games, educational planning, communications, continuous progress, small group instruction, instructional materials centers, and innovation evaluation. As for the future:

> "With increasing public, pupil, and professional dissatisfaction with our schools, we see a growing need for educational services designed to help school districts plan and manage the change process. We also see a growing market for educational materials designed for individualized learning. We hope to meet these needs with our present and projected products and services."

Personnel: International Learning has a very small central staff of four people: the president ($25,000-$50,000), an advertising director ($15,000-$20,000), and two sales representatives ($15,000-$20,000/approximately two hired each year). Members of the consultant pool are scattered throughout the United States, and in Mexico and Western Europe; most are employed full-time elsewhere but are available to work on company contracts when needed. Consultants chosen are people who have already earned reputations as innovators in education.

SPECIALIZED EDUCATIONAL SERVICE FIRMS

Associates for Human Resources (non-profit)
HUMAN RELATIONS IN ORGANIZATIONS
387 Sudbury Road
Concord, Mass. 01742

Baldridge Reading & Study Skills, Inc.
INSTRUCTION AND CONSULTING SERVICES
14 Grigg Street
Greenwich, Conn. 06830

City Schools Curriculum Service
PUBLISHING & CURRICULUM DEVELOPMENT
60 Commercial Wharf
Boston, Mass. 02110

Crabtree, Dawson & Michaels, Inc.
SCHOOL BUILDING CONSULTANTS
14 Spring Street
Waltham, Mass. 02154

Educational Testing Service (non-profit)
TEST CONSTRUCTION & ADMINISTRATION
Princeton, New Jersey 08540

Independent Educational Services (non-profit)
READING, TESTING & TEACHER PLACEMENT FOR INDEPENDENT SCHOOLS
80 Nassau Street
Princeton, New Jersey 08540

MultiMedia Education, Inc.
CONSULTING ON SCHOOL MANAGEMENT AND INSTRUCTIONAL PROGRAMS
11 West 42nd Street
New York, N.Y. 10036

Science & University Affairs
HIGHER EDUCATION COMMUNICATIONS; UNIVERSITY RELATIONS & POLICY
59 East 54th Street
New York, N.Y. 10022

Science Research Associates
INSTRUCTIONAL LABORATORIES & TEST MATERIALS
259 Erie Street
Chicago, Ill. 60171

The University Center, Inc.
HUMAN RESOURCES COUNSELING AND PROGRAMS
420 Boylston Street
Boston, Mass. 02116

SOURCES OF INFORMATION

There is no published source of information for this category; members will appear on various other published lists. Locally, some will be listed in the yellow pages of the telephone directory, under *Educational Consultants*. However, there is no substitute for asking around.

RESEARCH AND DEVELOPMENT FIRMS

Firms in this category are new to education, but representatives of the genre have been around scientific, military and business circles for some time. Prototype research and development companies are "think tanks" like the RAND Corporation which were established after World War II to facilitate non-commercial military research outside the confines of formal governmental structure and civil service regulations. Other research firms have their origin in university faculty members, particularly in business and in science, who have formed a non-profit corporation to enhance their research opportunities. If an umbrella corporation is extraordinarily successful, its creators may turn it into a "profit-making" concern.

Since federal money has become available for educational programs, some of these firms have turned to work in education. A few smaller companies, somewhat atypical but perhaps newer prototypes, have been formed specifically to develop the educational and social science market. With most, however, education is only a small but potentially larger part of their total operations.

Research and development firms often have contracts in planning and administering higher education, in evaluating educational programs, in developing curriculum, and in developing training materials for industry or the armed services. They are usually interested in practical applications of educational technology. Staff in these firms tends to come from the academic world, particularly from science, quantitative social science, and business administration.

COMPANY PROFILE

ABT ASSOCIATES, INC.
55 Wheeler Street
Cambridge, Massachusetts 02138
(617) 492-7100

Focus: Abt Associates is a social science research and development firm. Founded early in 1965, its special focus is the application of systems analysis and social science research techniques to problems of industry, government, and education.

Three of the company's thirteen task areas relate to education: Education Curriculum Development, Education Systems Analysis and Planning, and Manpower Development and Training Services. Curriculum Development projects have included designing simulation games, organizing teachers' workshops on the use of simulation games and on cross-cultural teaching techniques, writing a book for laymen on educational games, preparing a fourth grade social studies course on man's adaption to his environment, and outlining the scope and sequence of a tenth grade biology course. Education Systems Analysis and Planning projects have included evaluating adult basic education programs for migrant workers, analyzing the operation of Bureau of Indian Affairs schools, developing a cost-effectiveness model to predict effects of remedial education programs, and preparing programs for a women's Job Corps Center. Manpower Development and Training contracts have included developing a two-week training program to prepare unemployed persons for jobs in the New York City retail industry and devising a "visual response learning environment" for bank teller training.

Personnel. Out of a professional staff of 150, approximately 20 work in education. Salaries range from $800-$1250/

month, and up; three or four new employees are hired each year. Abt looks for people with experience in program planning and operation and with skills in research, educational administration, management, and analysis. An interdisciplinary background including either social or management sciences study is desirable.

COMPANY PROFILE

INFORMATION RESOURCES, INC. (IRI)
96 Mt. Auburn Street
Cambridge, Massachusetts 02138
(617) 868-4770

Focus: Information Resources, Inc. is a small research and development company that is closing the gap between educational research and the activities of educational publishing houses and training consultants. The firm was formed in 1967 by Robert Horn, a man with compelling interests in two subjects usually on opposite peripheries of the educational research world – educational technology and affective education. IRI's capabilities include programmed instruction, computer-aided instruction, training games and simulations, information retrieval and also T-groups, encounter groups, awareness training, and so on. IRI's main business is the design of information and learning systems.

> "We are interested in large bodies of information: how to deal with information and make it accessible, what structures we can find or impose for various purposes, how we can display it effectively. . . . Our research will make information transfer easier and quicker and more fun."

Before starting Information Resources, Bob Horn spent a year and a half developing The Guide To Federal Assistance For Education. The Guide is a file of 300 indexed and cross referenced file folders describing federal programs, laws, deadlines, etc., updated with a monthly newsletter. Something of a sequel to The Guide is The Federal Marketplace, a simulation for administrators on the process of obtaining federal aid for colleges and universities. IRI has also developed The Employment Marketplace, a training simulation for the unemployed. Currently, the staff is designing the format of an introductory text on probability and statistics, compiling a directory of simulation games, and planning a product line in affective education.

Their goals?

> "We are preparing for the education of the future. When the information displays of *Education and Ecstasy* become technologically possible, we will have done the research to be able to build them. Then with the increase in efficiency we can devote a significant part of the school day to affective education – and IRI will have something to say about that too."

Personnel: Although the number varies, the professional staff at IRI averages out to about 6 people, doing the following things: research psychologists ($12,000-$18,000/1 hired yearly), writers and curriculum specialists ($5000-$12,000/2 hired yearly), research assistants and statisticians ($5000-$8000/2 hired yearly). IRI values "joyful, responsible people who have initiative, curiosity, a wide general knowledge, and lots of first hand experience."

RESEARCH & DEVELOPMENT FIRMS

Creative Studies, Inc.
CURRICULA FOR SCHOOLS, INDUSTRY & HOME STUDY; RESEARCH IN THE SOCIAL SCIENCES
1117 Corey Road
Boston, Mass. 02146

Environmetrics, Inc (nonprofit)
URBAN SYSTEMS SIMULATION
1100 Seventeenth Street N.W.
Washington, D.C. 20031

Systems Research Group
MANAGEMENT & PLANNING FOR HIGHER EDUCATION
130 Bloor Street West
Toronto 5, Ontario, Canada

SOURCES OF INFORMATION

The best way to track these companies down is to watch the title pages of research reports and read the credits on interesting materials. Locally, some are included in the yellow pages of the telephone directory, under *Educational Consultants* or *Educational Research*.

MANAGEMENT CONSULTING FIRMS

Management consulting firms with contracts in education are often difficult to distinguish from research and development firms. Ways of operating and kinds of contracts are similar, although management consulting firms are generally more narrowly business-oriented and less equipped for research or curriculum development outside of the fields of business management, economics, or consumer education. Historically, management consulting firms sometimes began with accounting firms that broadened to advise businesses in such areas as financial management, staff development, and organizational planning. Many now offer training seminars for middle management and also develop training materials. Like research and development firms, only a few are actively providing services to the public schools – but others are interested.

COMPANY PROFILE

STERLING INSTITUTE
3750 Prudential Tower
Boston, Massachusetts 02199
(617) 262-6600

Focus: Sterling Institute is a management consulting firm concerned with the discovery and application of new knowledge to improve individual and organizational effectiveness. The Institute designs multi-media learning systems, prepares instructional materials, conducts educational and training programs, and provides educational consulting services to industry, government agencies, and educational institutions. It undertakes research in the behavioral sciences, in education technology, in computer sciences, and in financial management.

The activities of Sterling Institute are conducted through ten specialized centers and groups: Behavioral Science Center, Community Development Center, Defense and Aerospace Center, Educational Technology Center, Executive Development Center, Health Services Group, Management Accounting Center, Motivation Research Group, Sterling Educational Facilities Network, and Training and Development Center.

The centers are located in Boston, New York, or Washington, D.C. Size of center staffs ranges from 3-28. The overall work averages approximately 40% research, 30% materials development, 20% teaching, and 10% consulting.

In conjunction with the work of its centers, Sterling Institute operates multi-media educational facilities in Boston and in Washington, D.C. By the mid-1970's, they hope to have a network of facilities in most urban areas of the United States, creating a "national university" for long-term career development at professional levels. Future plans also include developing non-conventional materials for school-age children and exploring further the educational applications of computer technology.

Personnel: Sterling Institute was formed in 1966 by J. Sterling Livingston, a professor at the Harvard University Business School. The company's professional staff is augmented by a large number of collaborating professors, many of whom continue their academic duties and consult or teach on appropriate Institute projects. Each of the centers is staffed on a full-time basis by a director with expertise in the special fields suggested by the center's activities, by a number of consultants and program managers, and by a supporting staff of varying size. Altogether,

the full-time professional staff is approximately 70; the number of consultants active in any one year is approximately 50.

Sterling Institute has seven categories of employment: officer of the company; director of a center ($20,000-$30,000/1-2 hired each year); senior consultant ($15,000-$22,000/5 or more hired each year); consultant ($10,000-$17,000/10 or more hired each year); technical assistant ($6000-$15,000/5 or more hired each year); editor ($6500-$9000) and clerical.

MANAGEMENT CONSULTING FIRMS

Bell Educational Services, Inc.
MANAGEMENT SYSTEMS, STAFF DEVELOPMENT & RECRUITING; COMPUTER USAGE
1101 17th Street, N.W.
Washington, D.C. 20036

Boston Consulting Group, Inc.
MANAGEMENT CONSULTING
100 Franklin Street
Boston, Mass. 02106

Education for Management, Inc.
SEMINARS, TRAINING PROGRAMS, HOME STUDY MATERIALS FOR BUSINESSMEN
1168 Commonwealth Avenue
Brighton, Mass. 02135

Heald, Hobson and Associates, Inc.
CONSULTING SERVICES
230 Park Avenue
New York, New York 10017

Nelson Associates, Inc.
POLICY STUDY, MASTER PLANNING, ORGANIZATIONAL & FISCAL REVIEW, PERSONNEL DEVELOPMENT AND TRAINING FOR NON-PROFIT ORGANIZATIONS
845 Third Avenue
New York, N.Y. 10022

Social Dynamics, Inc.
HUMAN RELATIONS TRAINING IN CONJUNCTION WITH COMMUNITY PROGRAMS AND SOCIAL ISSUES
335 Newbury Street
Boston, Mass. 02115

SOURCES OF INFORMATION

Like research and development firms, the right management consultants are hard to track down. One place to begin is the yellow pages of the telephone directory, under *Management Consultants*.

Others might be traced through The *Institute of Management Science*, 321 South Main St., Providence, R.I. 02903.

EDUCATION AND TRAINING CONSULTANTS

These companies design materials or operate programs in adult basic education, vocational training, or continuing education for various levels of employees. Some provide training and materials for men in the armed forces. Others operate home study schools or schools for adults that provide work-oriented training. In some instances, they provide training and materials under contract to a governmental agency, to another company, or to a non-profit foundation or association. In other instances, they deal directly with the persons who want the training. Research and development or management consulting firms sometimes work in education and training, as do the Training Divisions of large corporations. A few non-profit governmental agencies also operate in this area.

COMPANY PROFILE

EDUCATIONAL SCIENCES PROGRAMS, INC. (ESP)
229 Park Avenue South
New York, New York 10003
(212) 677-7390

Focus: Established in 1967, Educational Sciences Programs, Inc. provides a broad corporate umbrella for subsidiaries specializing in vocational training and manpower development. The company aims for a unified approach that will break down artificial distinctions among home study, classroom study, and on-the-job training. Says its president, John Douglas

> "What I believe must come is the marriage – or at least a friendly and continuing relationship – between the formal public school system and the consumer of its products, employers."

To this end, ESP subsidiaries operate a four-year academic high school, provide resident vocational training in electronics and television and automotive mechanics, offer home study vocational and high school training, and develop curriculum, training materials and aids and provide management support for the branch schools of the corporation. Another subsidiary conducts manpower development and training programs for private industry and community action agencies under various government contracts.

Recently, under grants from two private foundations, ESP conducted special courses for disadvantaged young men to prepare them to take successfully the entry examinations for police and fire civil service in New York City. American Learning Systems, one subsidiary, is currently providing remedial education and orientation to the world of work to more than 1000 unemployed persons under contract to the Community Action Agency in Washington, D.C. In conjunction with the Army's Project Transition, American Learning is providing high school education to soldiers about to return to civilian life.

Personnel: Of the 300 people employed by ESP, approximately 200 work in education. People are hired in the following classifications: high school instructors ($6400-$12,000/6-10 hired each year), manpower remediation counselors ($7300-$10,000/10-20 hired each year), industrial arts teachers ($8,000-$10,000/5-10 hired each year), and home study advisors (salary based on assignments/10 hired each year).

> "We look for people who have had advanced work in remedial education and teaching the disadvantaged; instructors with good academic preparation and postgraduate work; evidence of dedication to working with the disadvantaged such as Peace Corps, Vista, or Teacher Corps; experience in practical shop instruction and work, plus interest in young students and workers."

SOURCES OF INFORMATION

National Alliance of Businessmen. The NAB is a government-industry partnership designed to find jobs in business for the hard-core unemployed. In the 128 target cities where NAB is located, there is a full-time staff of volunteer executives directed by a metropolitan chairman appointed by the President. The NAB staff works with companies encouraging them to recruit and hire the unemployed and to set up training programs for them. "Training" includes adult basic education and job-oriented skill training.

Local NAB offices are good sources of information as to what companies and agencies are involved locally in education and training. Additionally, each NAB office has a *Manpower Training Consultants Directory* that describes national firms available to help local companies with training programs and materials.

NAB offices are listed in the telephone directories of the target cities. Information is also available from NAB National Headquarters, 726 Jackson Place, N.W., Washington, D.C. 20235, from the regional office of the Department of

Labor, and from the U.S. Department of Labor, Manpower Administration, Washington, D.C. 20210.

National Security Industrial Association. The NSIA is an association of industrial, educational and scientific organizations involved in defense and government work. It is a source of information concerning education and training programs in the military. The NSIA Annual Report lists member organizations and their areas of specialization. A standing advisory committee deals with education and training programs. Write NSIA, 1030 15th Street, N.W., Washington, D.C. 20005.

Training in Business and Industry. This is a service magazine for company executives. Looking through it is a good way to gain perspective. Subscriptions are $10/year. Write 33 West 60th Street, New York, N.Y. 10023.

EDUCATION DIVISIONS OF LARGE CORPORATIONS

Since 1962 a number of large "outside" corporations have acquired educational subsidiaries and established Educational Services or Educational Systems Divisions: Xerox, Time, General Electric, IBM, CBS, RCA, Bell & Howell, Raytheon, Litton, Westinghouse, Honeywell. These corporations have diversified interests in education, often cutting across the other six categories. It is typical for these firms to have one or two publishing houses, an educational materials or equipment firm, an Educational Services Group that offers specialized consulting services, a Commercial and Industrial Training Division, and possibly a research center for developing new products and services.

Since 1965, for example, Raytheon Education Company has acquired D.C. Heath (textbooks), Macalaster Scientific (school science equipment), Dage-Bell Corporation (closed-circuit television and learning labs) and Edex (learning labs and driver training). Xerox Education Division has purchased University Microfilms, Basic Systems (programmed instructional materials), American Education Publications (*My Weekly Reader* and school newspapers), Professional Library Services (library supply), R.R. Bowker (reference materials related to publishing and libraries), and Ginn & Company (textbooks).

Corporate headquarters are frequently in New York City; other activities can be nationwide. Westinghouse Learning Corporation's Commercial and Industrial Training Division is in Pittsburgh, Pennsylvania; the Government Training Division, which works with community action programs, evaluation, and VISTA training, is in Bladensburg, Maryland; the Behavior Systems Laboratory is in Albuquerque, New Mexico; there is an electronic test scoring and data processing division in Iowa City, Iowa, an Educational Systems Development Program in Palo Alto, California, and a Job Corps Center in Edinburg, Indiana.

Given the size and scope of large corporate activity, the employment picture is not as promising as it might be. The last three years have been down trends for the educational materials industry generally; furthermore, businessmen-educator management teams have not always governed the new enterprises smoothly. The letter below, written by the personnel manager of a large new corporation in education, outlines some of the problem areas.

AN OPEN LETTER TO EDUCATORS CONCERNING THE KNOWLEDGE INDUSTRY

The education industry needs competent educators if it is to make its proper contribution. However, the joining together of technologist, businessman, and educator has sometimes produced a very uneasy triumvirate. Vocabularies, basic assumptions and philosophies, approaches to problem definition and solution, and, at times, even basic goals may differ. Such diversity is part and parcel of what makes for stimulating, fruitful, and productive working relationships. At the extremes, however, these divergencies bring about a severing of relationships. Each person - educator, businessman, or technologist - seeks a more familiar, comfortable, and, for him, congenial atmosphere.

To narrow our scope, let us consider the educator's situation. Much grief could be avoided if an educator were aware of what is in store for him as he embarks on a career with an education industry firm. What will he find and what is he liable to miss? Of course circumstances will vary, but in general he will find that the pressures of time, money, and results weigh heavily. If he has been accustomed to these pressures in his educator role he may find no problem in that regard but, instead, be frustrated by the fact that so much of his job is poorly defined. As a result, little precedent exists for possible answers to the problems he faces. The industry is young and the expectations and needs are great. This is only another way of saying that the opportunities are great - but so are the risks. It is often true that no one has ever been asked to do what he is now being asked to do. Here there is no history, no tradition, no system, and no institution to help define his role, or to build upon, or to fall back on.

The educator also may be frustrated by the fact that many of his co-workers do not understand him. This presents him with possibilities for growth, new understanding, reappraisal of cherished stereotypes, and the joy of discovery. But not everyone really wants that much jostling and rearranging of mental furniture.

Many, if not most, educators enter the education industry with high hopes and expectations regarding the impact they will now have on a much broader scope. Part of the reason for their job change is to be able to effect such an influence. There is some justification for this expectation but there is also a question of degree and timing. Briefly, such change comes slowly in small ways, with many set-backs, false starts, and with more sustained effort, patience, and courage called for than originally anticipated. The root problem here is that people, generally, vastly overestimate the amount of leverage that the education industry has on education.

Finally, perhaps the greatest disappointment to many educators is that they have lost the immediate contact and involvement with the learning process itself. They no longer function as teachers or administrators in the school system. They no longer see students, they see the people who see the students. They are now once removed. There are compensations for the loss of this immediacy of contact but there is no substitute.

This has been written in hopes that skilled educators will continue to be attracted to the education industry for the particular challenges and rewards it has to offer. It is also hoped that they will come with realistic expectations as to what the price may be and what the challenges consist of.

Eric M. Rickard
Personnel Manager
General Learning Corporation

COMPANY PROFILE

GENERAL LEARNING CORPORATION
3 East 54th Street
New York, New York 10022
(212) 421-9850

Focus: When General Learning was created in 1966 – the child of distinguished corporate parents, Time Incorporated and the General Electric Company – it was primarily a publisher. While educational publishing still forms the major part of their business, the firm has also entered the relatively new area of educational consulting through its Educational Services Division, has made contributions to the education and training of the disadvantaged through the Career Programs Division, and has within the last year offered educational puzzles, toys, and manipulatives for young children through the Early Learning Division. Currently, the Educational Services Division is involved in educational planning for the Fort Lincoln New Town project in Washington; the Career Programs Division is involved in a training program for Indians in Chandler, Arizona; and Silver Burdett, the textbook subsidiary, has recently won the right to publish and market the Intermediate Science Curriculum developed by the Florida State University and is at work on a black studies film strip and record program in conjunction with Blackside Incorporated of Boston. In the future, General Learning plans to provide increased services to school systems, particularly in inservice teacher education, and will probably offer an increasing number of products that allow teachers to take a larger role in constructing their own materials.

A brochure explains GL's objectives to the public.

. . . "the General in General Learning means we have granted ourselves a rather large franchise. Our long-range objective is to serve the learning process wherever it takes place – in nursery schools and other preschool settings, in schools and colleges, on the job and in the home. We also plan to serve the teaching process however it may be improved – through curriculum materials and programs, instruction methods, pupil guidance, school administration and planning, community-school relations, and technological assistance. We shall not be able to exercise the full franchise for some time, but we are making progress toward the day when we can."

Personnel: General Learning has five divisions: *Career Programs Division*, with approximately 30 professional staff working as salesmen, editors, and consultants; *Early Learning Division*, with approximately 14 staff members working as writers, designers, salesmen and program managers; *The Judy Company*, producers of visual-manipulative materials for young children; *Silver Burdett*, General Learning's largest division and one of the ten largest educational publishers, with approximately 300 employees in Morristown, New Jersey, and 200 more in branch offices in Park Ridge, Illinois, Dallas, Texas, and Palo Alto, California; *Educational Services Division*, with approximately 25 consultants who give advice on the planning, analysis and design of school buildings and instructional equipment, school management and administrative techniques (especially planning-programming-budgeting), and the use of educational data processing systems and the analysis of administrative procedures and practices.

In general, the company looks for employees with experience in teaching and administration, people who know information theory, and people who have had experience as systems analysts, authors, and editors.

SOURCES OF INFORMATION

It is difficult to keep current. For a start, subscribe to the *Knowledge Industry Report*, read *Fortune*, skim the education pages of the Sunday newspaper. For organization, subsidiaries, and past activities, write for company annual reports.

Government

JOBS IN FEDERAL AGENCIES

- Educational Positions
- Civil Service Procedures
- The Office of Education

FEDERAL PROGRAM PROFILES

- Bureau of Indian Affairs Schools
- Bureau of Prisons Schools
- Head Start
- Job Corps
- Manpower Training Programs
- New Careers Program
- Overseas Dependents Schools
- Peace Corps
- Teacher Corps
- Upward Bound
- VISTA – Volunteers in Service to America

REGIONAL EDUCATIONAL NETWORKS

- Research and Development Centers
- Regional Educational Laboratories
- ERIC Clearinghouses

JOBS IN STATE DEPARTMENTS OF EDUCATION

Jobs in Federal Agencies

Opportunities in federal government service are far more varied, numerous, and promising than the uninitiated contemplating a monolithic structure might think. Most federal departments with domestic responsibilities have at least one program that is educational. The core agency is the U.S. Office of Education; but the Office of Economic Opportunity administers VISTA and Upward Bound; the Department of Labor is responsible for the Job Corps, New Careers, and programs under the Manpower Development and Training Act; the Department of the Interior oversees the Bureau of Indian Affairs Schools; the Bureau of Prisons of the Department of Justice seeks teachers for the federal correctional programs; the Department of State has educational positions in the Agency for International Development and the Office of Overseas Schools; the Department of Defense administers the overseas dependent schools and a multitude of education and training programs for servicemen; and the Department of Health, Education and Welfare, including the Office of Education, administers Head Start, the Teacher Corps, and a growing number of national educational networks such as the regional educational laboratories, the federal research and development centers, and the ERIC clearinghouses. The Peace Corps is an independent agency similar to the Office of Economic Opportunity. Although program alignments change periodically, federal involvement in education is here to stay.

EDUCATIONAL POSITIONS

One can work directly for a federal agency at its headquarters in Washington, D.C., at one of the U.S. government regional offices, or in a federally-sponsored program at the local level.

Within the federal agencies, persons are hired in mid-level positions as education specialists, education services officers, program specialists and advisors in education, Job Corps teachers and guidance counselors, librarians, or public health educators (Announcement WAS–908); or economists, sociologists, anthropologists, social scientists, social science analysts, manpower analysts, social science program specialists, and social work program specialists (Announcement WAS–827). There are also positions in administrative, staff, and technical services. (Announcement 413). Those interested in communications will be comforted to know that more than 7,000 writers and editors, 2,000 public information specialists, and 800 printing and publications officers – not to mention a number of visual information specialists – work for the federal government, many in educational positions.

Many of the newer federal programs – Teacher Corps, New Careers, Head Start – have workers in prime new roles tackling some of the unsolved educational problems of American society. These programs also offer unusual kinds of training for teachers, of interest both to prospective teachers and to professionals concerned about teacher training. The Peace Corps now talks about "in-country" training; it is developing its

own training facilities and has launched combination degree/training programs with the State University of New York at Brockport and with Wilmington College in Ohio.

Generally, employment with the federal government has real possibilities for young professionals who want to gain experience outside the classroom. In a number of fields it offers a neophyte a chance to get some excellent seasoning. For example, it is difficult for an inexperienced college graduate to find a position dealing with the problems of education in urban areas. Appearing in a large city with two or three years of experience at the federal level puts one in a much stronger job bargaining position. Knowing federal programs and procedures is a definite asset on the local and state scene.

Additionally, the prospective educator is wise to cultivate special talents even before leaving college. Many interesting federal education jobs, for example, open up with just two courses in statistics; or writing and publications experience; or language training, particularly Spanish; or skill with graphics; or knowledge of the basics of a vocation such as sheet metal work; or experience teaching special groups such as illiterates.

CIVIL SERVICE PROCEDURES

The key in most cases is the Federal Service Entrance Examination: FSEE. The FSEE is similar to the Graduate Record Examination verbal and quantitative examinations; in some cases, exceptionally high GRE scores even allow one to bypass this test. Federal recruiters advise taking the FSEE early in the senior year of college. With the FSEE score in hand, the inquirer's visits to Washington agencies can be much more fruitful.

Recent college graduates with outstanding qualifications may want to investigate both management internships and the Office of Education Junior Professional Program (see page 34). The Management Internship Program encompasses most government agencies and brings candidates with outstanding potential into responsible management positions at an accelerated pace. Generally only about 2 per cent of those taking the FSEE qualify. Candidates must have an exceptionally high FSEE score, pass a group oral interview, and come highly recommended. Training programs generally include agency orientation, rotating assignments, study outside of regular working hours, special projects, individual counseling, and special assistance in planning career development. Training lasts 12-36 months.

The current relevant government salary schedule is:

Rating	Minimum	Maximum
GS-5	$ 6,176	$ 8,030
GS-7	7,639	9,934
GS-9	9,320	12,119
GS-11	11,233	14,599
GS-12	13,389	17,403
GS-13	15,812	20,555
GS-14	18,531	24,093

Note: Each rating has ten increments from minimum to maximum.

FOR INFORMATION:

When the address is given, government publications referred to in the following descriptions are best obtained directly from the agency itself. When the address is not given, apply to the appropriate regional office or to the regional U.S. Civil Service interagency office. Addresses for these offices are given in the white pages of the telephone directory under *U.S. Government*. Additionally, many government publications are available from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402.

Possibly the best information about government programs is in the *Listing of Operating Federal Assistance Compiled During the Roth Study* (House Document 91-177, 1969) available from the Superintendent of Documents, $4.50.

A good, usefully-indexed book describing OEO-related programs is *The Catalog of Federal Domestic Assistance*. It explains the nature and purpose of programs, specifies major eligibility requirements, tells where to apply, and lists printed materials available. Write: Information Center, Office of Economic Opportunity, Washington, D.C.

Accurate and complete information about all Department of Health, Education and Welfare programs may be obtained in the *Catalog of HEW Assistance*. Printed in 1969; costs $5.50; obtained from Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402.

Interagency Board of Civil Service Examiners. 1900 E Street, N.W., Washington, D.C. 20415. Regional offices are located in Atlanta, Boston, Chicago, Dallas, Denver, New York, Philadelphia, St. Louis, San Francisco, Seattle, Honolulu, Washington, D.C., and Hata Rey, Puerto Rico. Information and printed materials are available; the College Relations Office is usually in touch with such persons as the VISTA or Teacher Corps Regional Directors.

Go Government and *Preparing for the FSEE*. These pamphlets provide basic information.

Announcement WAS-908. A mid-level announcement for educators and librarians.

Announcement WAS 827. A mid-level announcement of professional opportunities for social scientists.

Announcement 413. A mid-level announcement for positions in administrative, staff, and technical services.

Federal Policy and The Public Schools, American Association of School Administrators (NEA), 1967, $2.00. Write: 1201 16th Street, N.W., Washington, D.C. 20036.

Note: When writing government agencies for information, if you include your telephone number, they will frequently reply via a special government telephone network.

THE OFFICE OF EDUCATION

The central federal educational agency is the U.S. Office of Education. It employs about 2,900 persons, 2,500 in Washington, D.C., the others in regional offices. OE's major function is to channel federal funds into programs developed by state education agencies, local school districts, and colleges and universities. These cover the educational spectrum from pre-school to postdoctoral study and from high school vocational training to continuing adult education. During the fiscal year 1968, it administered a $3.9 billion budget involving more than 75 major programs. Nearly all 21,000-plus local school districts and 2,300 colleges and universities participate.

Until 1957, when the Soviets launched the first artificial earth satellite, the Office of Education was basically a fact-finding and dissemination agency. But with the passage of the National Defense Education Act of 1958 to strengthen science and related fields, the Cooperative Research Act of 1963, the Elementary and Secondary Act of 1965, and the Higher Education Act of 1965, the Office of Education has assumed the role of leader and catalyst, providing incentives for local organizations to experiment, to develop better coordination and communication, and to meet the needs of students from low-

income families. By 1968, for example, there were over 2000 OE-funded projects under Title III E.S.E.A., "Projects to Advance Creativity in Education." Over 100 research-related projects dealing with the educational uses of computers had been funded under the Cooperative Research Act.

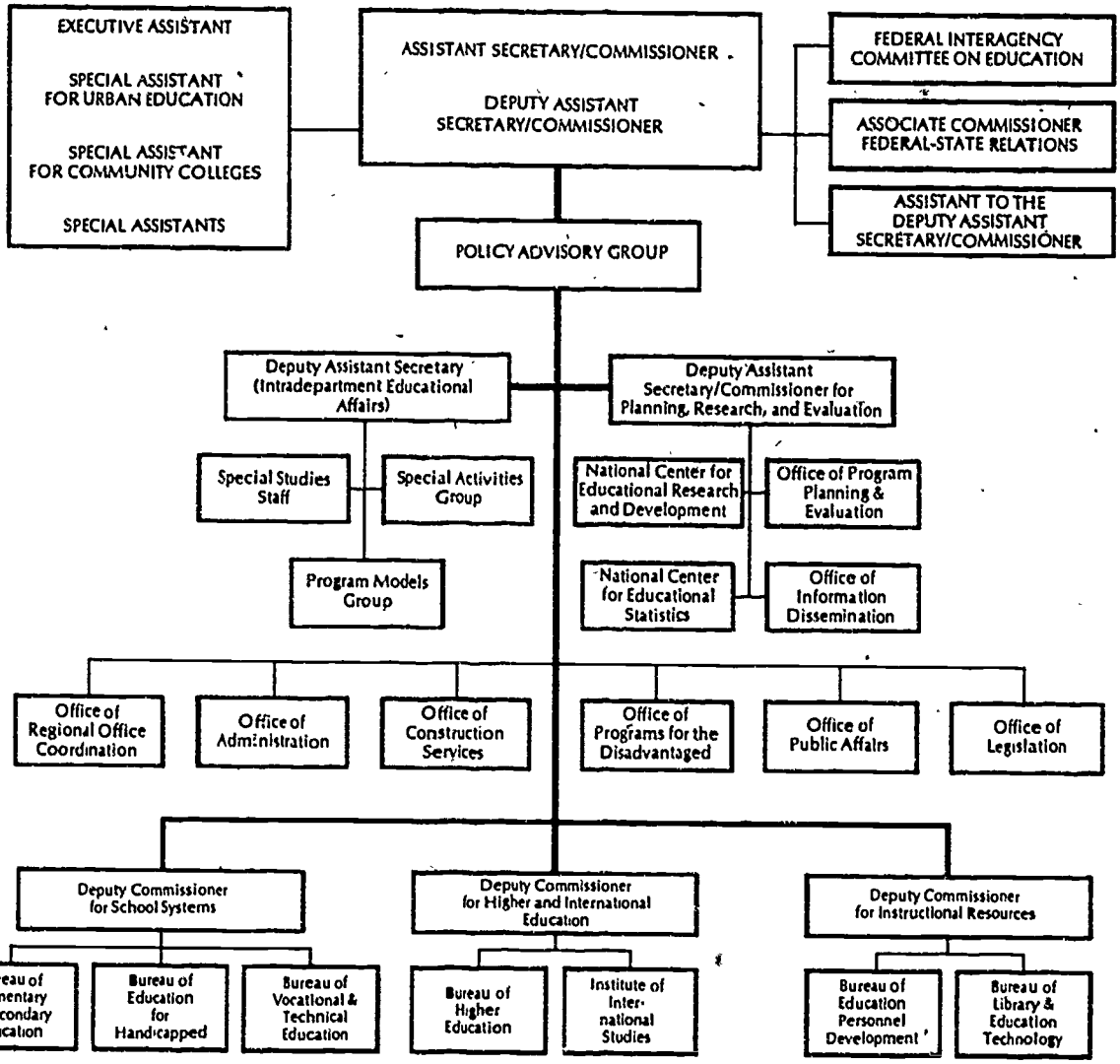
As the accompanying chart indicates, the Office of Education is organized into six major offices, each directed by an assistant commissioner, and seven bureaus, each directed by an associate commissioner. A sampling of divisions suggests the scope of OE activities: International Exchange and Training, Data Analysis and Dissemination, Compensatory Education, Equal Educational Opportunities, Manpower Development and Training, Adult Education Programs, College Facilities, Elementary and Secondary Education, and Research.

One OE unit is primarily concerned with roles in education: the two-year-old Bureau of Education Personnel Development. It has pulled together a variety of preservice and inservice programs (including the Teacher Corps) previously scattered throughout OE. The Education Professions Development Act, which the Bureau administers, includes sections dealing with vocational education, trainers of teacher trainers, teacher leadership development, basic studies, career opportunities, early childhood education, educational administration, more effective staff personnel utilization, and support personnel (media and pupil personnel). One strong purpose of EPDA is to promote the creation of new roles – but not in a vacuum.

The Office of Education has a Junior Professional Program as a counterpart to the management internship program of other federal agencies. Interns with writing and editing ability may work in a variety of fields as educational assistants. Other interns with mathematical skills may work with statistics and computers. Those interns having business or accounting skills may work in grants management. After trainees have familiarized themselves with the major programs and procedures of OE, they are considered for a one-year exchange program with regional offices, universities, and state education departments. Requirements include a score of 85 or above on the FSEE and outstanding academic work and leadership records.

Three other Office of Education programs are particularly interesting. Each year the Office of Education selects twenty men and women between twenty-five and thirty-five years of age to be Office of Education Fellows. Each spends a year of broad work moving "at large" through various positions in the Office of Education. Most OE Fellows either have a doctorate or are working on one and most have also had some qualifying experiences. A Summer Aide Program hires high school students by Office of Education regions to work as general aides within their region. The students are not required to take the Civil Service examination. A third program, The Summer Intern Program, is for older students to work at all levels; the Civil Service examination is required. Inasmuch as the present Washington administration is stressing decentralization, regional offices of OE will probably show increases in funding, staffing, and program responsibility within the next year.

OFFICE OF EDUCATION



Aug. 22, 1969

FOR INFORMATION:

Office of Education. 400 Maryland Ave., S.W., Washington, D.C. 20202.

Regional Offices of Education.

Region I
John Fitzgerald Kennedy Federal Building
Boston, Massachusetts 02203

Region II
42 Broadway
New York, New York 10004

Region III
(being formed)
Philadelphia, Pennsylvania

Region IV
50 Seventh Street, N.E.
Atlanta, Georgia 30323

Region V
New Post Office Building
433 West Van Buren Street
Chicago, Illinois 60607

Region VI
1114 Commerce Street
Dallas, Texas 75222

Region VII
601 East 12th Street
Kansas City, Missouri 64106

Region VIII
Federal Office Building, Rm. 9017
19th and Stout Streets
Denver, Colorado 80202

Region IX
Federal Office Building, Rm. 232
50 Fulton Street
San Francisco, California 94102

Region X
(being formed)
Seattle, Washington

Where It's Happening: A Selective Guide to Continuing Programs Funded by the U.S. Office of Education; by Clarice Kelley, 1968; Doubleday Publishing Company, Garden City, New York.

The U.S. Office of Education. This booklet outlines OE's organization and functions. Write the U.S. Government Printing Office, Washington, D.C. 20402. 75¢.

An eight-page mimeographed collection of OE professional intern job descriptions prepared by interns themselves is available from OE.

American Education. This is the official journal of the Office of Education, published 10 times a year and sold by the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402. $7.00/year, 70¢, copy.

FEDERAL PROGRAM PROFILE

BUREAU OF INDIAN AFFAIRS SCHOOLS

In the United States some 35,000 students are taught by about 3,000 teachers employed by the Bureau of Indian Affairs of the Department of the Interior. Most schools are located in Arizona, New Mexico, Alaska, North Dakota, and South Dakota, although a few teachers are needed each year in California, Florida, Iowa, Kansas, Louisiana, Mississippi, Montana, Nevada, North Carolina, Oklahoma, Oregon, and Utah.

As the Bureau articulates it, "The primary objective of Federal schools operated for Indian children is to prepare them for successful living. Throughout their academic experience, capable educators act as cross-cultural interpreters aimed at enabling Indian youth to identify with and function as members of the total society in which they will move as adults."

Most of these schools are in isolated rural locations more than 30 miles from the nearest urban community. Teachers work on a 12-month basis; in addition to the 9 months of school, they can take their annual leave (13 to 26 days)

and/or educational leave to evaluate programs, attend workshops, conduct parent-student follow-up, and prepare for the coming year. The workweek is 40 hours. Guidance counselors, usually working in boarding schools, are responsible for dormitory students. The guidance staff also makes arrangements for students during their non-class hours.

Basic requirements are about the same as for most teaching positions. Scores on the National Teacher Examination can affect qualification for one of the higher GS levels. Guidance counselors must have completed 24 hours in education, including 12 semester hours in educational guidance and psychology. Some background in linguistics is helpful, since several schools are trying a bilingual approach. (See "The Center Forum," September, 1969, on bilingual education, which includes accounts of some Indian programs; free from Center for Urban Education, 105 Madison Avenue, New York, New York 10016.)

FOR INFORMATION:

The administering agency is the Indian Affairs Schools, Bureau of Indian Affairs, U.S. Department of the Interior, 1951 Constitution Ave., N.W., Washington, D.C. 20241.

Candidates should secure Announcement VA-7-30 for information. They will also need Form 170-71, application for employment; Card Form 5001-ABC; Standard Form 15 (veterans preference). Transcript or transcript information and National Teacher Examination scores (if applicable) are also required. Those of one-fourth or more Indian blood should file a certificate from the Superintendent of the agency in which enrolled. These forms are available from any Interagency Board of Civil Service Examiners. The Bureau will pay travel and moving costs for new appointees and their immediate families. Housing is provided on a rental basis at all Alaskan schools and most other locations.

FEDERAL PROGRAM PROFILE

BUREAU OF PRISONS SCHOOLS

Of the 34 federal prisons in the United States, about 25 have formally organized educational and vocational activities. The penitentiary at Leavenworth, Kansas, even includes a junior college program where student inmates can earn an A.A. degree.

The typical program emphasizes vocational education, together with supportive general education – math, reading, writing. Since 96% of the federal prisoners are high school dropouts (20% are functional illiterates), many students prepare for high school equivalency examinations. Social education, including attitudes and behavior, civic education, and vocational orientation is part of the curriculum.

Prisons employ about 350 teachers altogether, as well as supervisory staff – principals and assistant principals. Most teachers have had some experience in the public schools, ranging from 2 to 10 years. Many have math or English backgrounds. Others have teaching degrees in vocational subjects or a degree in industrial arts. Journeymen are also drawn from the crafts and trades register. The best teacher, according to the national vocational director of prison education, is the generalist with a talent for remedial work, able to achieve rapport with students, and possessing social sensitivity.

Because such teaching is considered hazardous duty, teachers may retire at age 50 after 20 years' service, a feature which makes the job attractive to many. Consequently, the turnover rate is a low 10%, and the lists are rapidly filled. Teachers generally live in the nearby community. In some cases, housing on the penitentiary grounds is provided for the program supervisor.

FOR INFORMATION:

No federal examinations are necessary, although scores on the National Teacher Examination and/or Graduate Record Examinations may be considered. Vocational teachers must have 24 hours of credit in the field, a completed apprenticeship, or a year of appropriate experience at the journeyman level. To apply, request Form 170-71, Filing Card Form 5001 BC, CSC Form 226, Standard Form 15, and the latest announcement from any Interagency Board of U.S. Civil Service Examiners.

FEDERAL PROGRAM PROFILE

HEAD START

Head Start is a program for the economically disadvantaged pre-school child. It is based on the philosophy that (1) a child can benefit most from a comprehensive interdisciplinary attack on his problems at the local level; and (2) the child's entire family, as well as the community, must be involved in solving his problems. Head Start programs offer learning experiences, medical and dental examinations, and, in some cases, medical treatment and proper nutrition.

Head Start is often carried out as a full-year program for pre-school children beginning at age 3, and as an 8-week summer program for children who will enter school for the first time in the fall. Parent and Child Care Centers, for infants and children under 3, and Follow Through programs, for children who have been in Head Start, are also funded. Head Start is often one program of a community action agency; in some localities funds are granted directly to this sponsoring organization.

National guidelines identify such staff roles as director of education, supervising teacher, teacher aide, nurse administrator, nurse, health aide, social services director, social worker, community aide, psychological services director, psychologist, nutrition director, parent activities coordinator, training and career development director, coordinator of volunteers. Actual project staff varies with the size of the program and the resources of the community; the staff is generally a mix of paid and volunteer workers, professional and non-professional, full-time and half-time.

A Head Start teacher is different from the traditional teacher in two ways. She is involved in much more home-school contact. And since there is usually an extra adult in the classroom, and since parents are welcome to visit and/or participate at any time, she must be able to work well with other adults.

An educational director in a Head Start program also differs from a traditional teacher trainer. She is much more concerned with "nuts and bolts." Besides knowing about young children, she must be aware of all aspects of relevant sociological conditions, like nutrition, health, and social services. Such a person generally has teaching experience and a master's degree.

It is important to note that a Head Start teacher may not even have a high school diploma. She must have some skill and training in early childhood education. Head Start thus recognizes the expertise of people who have had extensive experience working with young children, and values the human qualities of warmth, organization, and intellectual alertness. There is a shortage of teachers with both the professional training or experience and the human qualities needed.

FOR INFORMATION:
The Head Start Program has been shifted from the Office of Economic Opportunity to the new Office of Child Development in the Department of Health, Education and Welfare. Information concerning local programs is available from the Assistant Regional Director for Child Development at the HEW Regional Offices. Printed information available: *Head Start Child Development Programs* (OEO Manual 6108-1), *How to Apply for Head Start Development Programs, An Invitation to Help, Community Action Program Guide – Volumes I and II, The Staff for a Child Development Center*, and various other titles.

FEDERAL PROGRAM PROFILE

JOB CORPS

Job Corps is a program of basic education, skill training, and useful work experience for young men and women ages 16-21. It is aimed at those who need a change of environment and individual help to develop talents, self-confidence, and motivation to improve themselves. Enrollees reside at three types of Job Corps centers: 32 conservation centers for men, located in national parks and forests and usually operated by the Interior and Agriculture Departments; 4 training centers for men, located on unused federal military installations in or near urban areas and operated under contract by private and public agen-

cies, often industrial corporations; and 10 training centers for women, located on leased facilities and operated under contract by private and public agencies. Expansion will be through a new type of center: 30 projected small, urban, residential or community manpower-oriented projects, three of which are already in operation.

Some 6,500 center-located staff serve a total of about 20,000 young adults.

Corpsmen receive room and board, medical and dental care, work clothing, a nominal allowance for dress clothing, a monthly living allowance of $30, and a terminal allowance of $50 for each month in the Job Corps.

The Job Corps hires teachers in both academic and vocational subjects and guidance counselors. Teachers must work out techniques and curriculum appropriate to Job Corps students; most instruction is individualized or in small groups. Guidance counselors often live with the Corpsmen; they conduct group counseling sessions and try to keep motivation high. The 24-hour-a-day residential nature of most center programs makes special demands on all the staff.

A college degree and completion of an "approved" program of teacher training – or high scores on the National Teacher Examination – qualify one as a teacher. Guidance counselors must have a year of study in education, particularly psychology, sociology and related subjects. Persons who know the academic world of schools and the world of work and the world of the poor are particularly needed.

FOR INFORMATION:
This program has been shifted recently from the Office of Economic Opportunity to the Department of Labor. Information concerning local Job Corps Centers is available from the regional Department of Labor offices. Printed information available: *Job Corps Facts*, *Outline for a Job Corps Training Center* (Men or Women), *Guidelines for a Proposal for a Job Corps Center*, *Is Job Corps for You?*, *The First Three Years*.

FEDERAL PROGRAM PROFILE

MANPOWER TRAINING PROGRAMS

Many programs have been established under funds provided by the Manpower Development and Training Act of 1962, its subsequent amendments, and other programs under the Department of Labor. Basically, these provide subsidized occupational training for the hard-core unemployed. Basic education, when required, prepares trainees to undertake occupational training. Training programs under the MDTA are conducted in skill centers, schools, or similar sites. There are special programs for older workers, for inmates of correctional institutions, and for part-time training in occupations with critical skill shortages. Generally, trainees enter these programs without a definite job at the end, although placement services are available.

One major program funded under MDTA and the Economic Opportunity Act is JOBS: Job Opportunities in the Business Sector. Unlike MDTA, JOBS places its trainees in a definite job first, in situations where the employers must include supportive services such as basic education. This program is sponsored by the National Alliance of Businessmen, a government-industry partnership in which volunteer business executives take the initiative in finding other businessmen interested in training the unemployed. Since its inception in 1968 the number of cities with JOBS programs has expanded from 50 to 125; more than a thousand firms have signed contracts to hire and train over 80,000 persons.

Boston NAB now has a full technical assistance staff of about a dozen people to aid these manpower contractors. The staff has experts in adult basic education, contract development, and general manpower problems.

FOR INFORMATION:
Basic information is available from the Office of Manpower, Policy, Evaluation, and Research, Manpower Administration, U.S. Department of Labor, Washington, D.C. 20210; from the Manpower Administration in the Department of Labor Regional Offices; or from state employment service agencies. The Department of Health, Education,

and Welfare also administers these funds; information is available from the HEW Offices. National headquarters for the National Alliance of Businessmen is 726 Jackson Place, N.W., Washington, D.C. 20235. Look under National Alliance of Businessmen in the telephone directory for local information. *The Annual Manpower Report of the President* is useful. See also *An Employer's Guide to On-the-Job Training, Learning for Jobs; MDTA: Good Training, Good Jobs*. Write Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402.

FEDERAL PROGRAM PROFILE

NEW CAREERS PROGRAM

The New Careers Program is an adult work-training, employment program in the fields of health, education, welfare, neighborhood redevelopment, and public safety. It provides subsidies and supervision for unemployed or low-income adults to allow them to take entry-level jobs in these fields and to advance into higher-level positions.

New Careers trainees begin as aides in schools, welfare agencies, employment agencies, or similar situations. Their first-year salary is subsidized by New Careers. The employer must guarantee career advancement, released time for education, and employment at the end of the training period. Trainees have opportunities to work up the career ladder to become teachers, case workers, or interviewers. A major purpose of the program is to create new careers for the poor as paraprofessionals in public service.

Last year Boston's Community Action agency, ABCD, had 170 in the New Careers Program, of whom about 40 were in training as teacher aides or community education workers. Several were placed at a state experimental school, the Storefront Learning Center, the New School for Children, a number of suburban schools, and elsewhere.

The education director deals with funding, administration, and interagency coordination almost exclusively. The education specialists attached to the Boston New Careers Program must have at least a two-year college degree. They act as troubleshooters to be sure that the students are getting a fair deal on the job. They are also responsible for the students' core training – which explains what New Careers and the world of work are about, supports general professionalization and goal development, and offers refresher English and child psychology courses. There are also five training specialists, some of whom have guidance and curriculum development responsibilities as well.

This program is administered by the Department of Labor, which hires program directors, education specialists, and education aides to oversee local programs and keep records. Funds and technical assistance can go to any state or local organization, public or private, whose proposal is approved.

FOR INFORMATION:
General information is available from the Bureau of Work Programs, U.S. Department of Labor, Washington, D.C. 20036; or from the Regional Office of Manpower Administration of the Department of Labor. See also Pearl and Reissman, *New Careers for the Poor*, The Free Press, 1965, for the original rationale. The relevant government publication is *New Careers*.

FEDERAL PROGRAM PROFILE

OVERSEAS DEPENDENTS SCHOOLS

Americans abroad constitute approximately 1% of the total population of the United States – roughly as many people as live in the Washington, D.C., metropolitan area; and the number is growing steadily. Military personnel, civilian government workers, and private citizens in business abroad have dependents who need schools.

The largest single group of children – approximately 180,000 – attend the 327 schools operated by the Department of Defense. These schools employ nearly 7100 teachers and 500 administrators in Western Europe, Scandinavia, Pakistan, Libya, Morocco, Ethiopia, Japan, Taiwan, Okinawa, Korea, The Philippines, Midway Islands, the Azores, Bahamas, Bermuda, Newfoundland, Iceland, Labrador, and Guantanamo Bay, Cuba.

Over 45,000 children attend the 121 "American-sponsored" independent schools which receive assistance from the Office of Overseas Schools of the U.S. Department of State. Besides providing education for American children overseas, these schools often demonstrate American educational philosophy and methods to foreign nationals. The government contracts much of its overseas recruiting to *International School Services* (392 Fifth Avenue, New York, N.Y. 10018). ISS is the principal organization in this country for recruiting and placing Americans in schools of all types throughout the world.

Overseas dependents schools offer some interesting opportunities in international education. For example, a biology teacher on the staff of the American School in Japan at Tokyo serves as a consultant to a Ministry of Education committee for the adaptation of American biology materials for use in Japanese schools; the school's guidance counselor consults with the Tokyo city schools in the development of its student guidance program. Community relations consultants on the staff of the American International School of New Delhi have developed an extensive program of student activities for the study of local geography, history, archaeology, and current affairs.

Additionally, there are unusual administrative opportunities with the Office of Overseas Schools and its six regional educational offices or the Department of Defense. Requirements for teachers and administrators are similar to those at home. The Department of Defense has established a pilot program to recruit and train recent college graduates without full-time teaching experience.

FOR INFORMATION:

A good source of information is *The Mission Called OSS*, a booklet published by the American Association of School Administrators, 1201 Sixteenth Street, N.W., Washington, D.C. 20036. Further information is available from the AASA, or from the Office of Overseas Schools, U.S. Department of State, Washington, D.C. For Department of Defense Schools, write Overseas Dependents Schools, Directorate for Dependents' Education, OSD (MAND RA) (E), Pentagon, Washington, D.C. 20301.

The Department of Defense Overseas Dependents Schools has also published a booklet entitled *Overseas Employment Opportunities for Educators*, October 1968.

FEDERAL PROGRAM PROFILE

PEACE CORPS

The Peace Corps promotes world peace and friendship by sending American volunteers to help developing countries meet their needs for trained manpower. At the end of its sixth fiscal year, 14,968 volunteers were serving or preparing to serve in 50 developing nations. Volunteers serve for two years, receive a small living allowance, scaled to the area, and are given a terminal contribution at the end of their service.

Basic requirements are simple: volunteers must be at least 18, with no dependents under 18; a U.S. citizen; and in reasonably good physical health. In certain skill areas, like mechanics, men are being accepted with wives who do not have to volunteer; children may be included in such cases. In situations requiring certain esoteric skills, the 2-year requirement may be reduced.

Education is a traditional Peace Corps job, occupying about 1/4 of the volunteers in Latin America and North Africa, the Near East, and South Asia; and 3/4 of the volunteers in Africa, East Asia, and the Pacific. Volunteers teach varied subjects: English, social studies, physical education, biology, chemistry, horticulture, arts and crafts, farm mechanics, music, carpentry, geology, home economics.

A recent shift, however, keys occupations to more basic needs, such as increasing food supplies. The percentage of volunteers in teaching will drop over the next few years, with increases in agricultural projects and public health work, particularly family planning.

Experience in the Peace Corps often opens doors to the returning volunteer. At home, the Peace Corps puts two teachers back into the school system for every one it recruits. Schools have often waived certification requirements or made special arrangements to hire returned volunteers. Additionally, volunteers return home well-qualified to help run Peace Corps programs, to work in similar government agencies, and to direct special pro-

grams in poverty areas and schools. Some volunteers credit Peace Corps experience with focusing their career plans. A physical education teacher returned from Sierra Leone, for instance, interested in the problem areas of teaching and is now developing ways to work with underachieving seventh and eighth grade boys as chief counselor at the Pennsylvania Advancement School. Several Peace Corps returnees have been hired by the Worcester Public Schools in cooperation with the Center for International Education at the University of Massachusetts to develop an African curriculum.

FOR INFORMATION:
The Peace Corps is an independent governmental agency. National headquarters is 806 Connecticut Ave., N.W., Washington, D.C. 20525; there are regional offices in San Francisco, Chicago, Atlanta, and Boston (see Peace Corps in telephone directory).

Useful booklets are: *Teaching: Education Lays the Foundation for Human and Economic Development – Peace Corps,* the Peace Corps' *Seventh Annual Report,* June 1968; Peace Corps *Factbook,* 1970; and *Peace Corps Reader.*

FEDERAL PROGRAM PROFILE

TEACHER CORPS

Teacher Corps recruits and trains inexperienced teacher interns in teams under the direction of an experienced leader. While teaching, most interns are also working on a master's degree program including teacher certification. Grants to universities cover tuition and administrative costs. In some cases, experienced teachers desiring training may be assigned ex *officio* to a Teacher Corps team and participate in the program at their own expense. Other programs cover third, fourth, or fifth undergraduate years. A few begin in high school.

Teacher Corps teams serve in 150 school systems and study in about 50 universities in over 30 states, Puerto Rico, and Washington, D.C. About half the school systems are in the cities and about half in small towns and rural areas. At least one school in the district will draw 50% of its students from low income families. Many interns come from the communities they serve: black, Mexican-American, Indian, migrant. Over 30% are from minority groups. About two-thirds teach at the elementary, one-third at the secondary level.

Corpsmen are considered employees of the school systems in which they work, although the federal government pays up to 90 per cent of their salaries. They spend half a day or more in the school, work in the neighborhood on educational programs, and study at the sponsoring university.

This program has created the new role of team leader. The team leader acts as the interns' liaison between the school, the university, and the neighborhood. Team leaders have several years' experience working with children from low income families, at least five years' experience, and a master's degree. They are master teachers, counselors, and clinical professors. Filling new slots, too, are the school system project coordinator (part-time in a small system, full-time in a large) and the university program director.

FOR INFORMATION:
Teacher Corps is administered by the Bureau of Educational Personnel Development of the U.S. Office of Education, 400 Maryland Ave., S.W., Washington, D.C. 20202. Teacher Corps applicants must complete pre-service training of 6 to 13 weeks, during which they have provisional status. Up to 20 per cent may "wash out" before becoming full-fledged Corpsmen eligible to receive $75/week plus $15 for each dependent. Students, of course, are eligible for the usual college loans. Printed information available: *Futures in Education: Teacher Corps* (includes application blanks); *Teacher Corps Program Handbook, Fact Sheet on Teacher Corps.*

FEDERAL PROGRAM PROFILE

UPWARD BOUND

Upward Bound is a national pre-college program to motivate educationally and economically deprived high school students. Upward Bound gives these students a new chance to reach their academic potential. Most projects consist of an intensive six to eight week residential summer program and a follow-up program during the school year, in which the gains made in the summer are consolidated through after-school tutoring, Saturday classes, and cultural activities. The full-time summer residential program is usually on a college campus. Small classrooms, individual tutoring, personal counseling, medical and dental care, and small weekly stipends are common features. Academic study is supplemented by activities in art, music, drama, photography, journalism, and off-campus field trips.

In four years Upward Bound has grown from 18 pilot programs, 2,061 students, and a $2.2 million budget (1965-1966) to 298 programs, 26,000 students, and a $31.9 million budget (1968-1969). Seventy-seven per cent of the first year's group entering college have completed their third year. As of July, 1969, the program had involved 32,000 students (approximately 51% black, 33% white, 9% Spanish-American, 4% Indian, 1% Oriental, 2% Eskimo). By any standards it is a genuine success.

Demonstration projects add variety. Five universities are working with prisons in Oregon, New Mexico, Kentucky, Minnesota, and Pennsylvania. The first prison project, in Oregon, originally enrolled 62. Of the 38 from this group so far released, 24 are attending college, working part-time and avoiding criminal activity. An Indian Counseling Center is operating in Seattle.

This program has created new roles. College and university students work as volunteer tutor-counselors; each project has a director and often an assistant director (headquarters recommends a full-time person throughout the academic year); and the summer teaching staff generally has 1/3 regular secondary school teachers – preferably from schools of the students, 1/3 teaching faculty of the sponsoring college, and 1/3 psychologists, and social scientists. Emphasis is placed on excellent academic programs; the close supportive relationship of staff to each student implies a need for diversely talented, strong, and sensitive individuals.

FOR INFORMATION:

Applicants for teaching positions should contact the individual school in early fall for summer posts. Graduate students might consider tutoring during the school year to build experience and to become visible as a possible summer teacher.

The program is entrusted to the Office of Economic Opportunity, 1200 19th Street, Washington, D.C. 20506, but operation is subcontracted to Educational Associates, Inc., 1717 Massachusetts Ave., N.W., Washington, D.C. 20036. Printed information available: a list of Upward Bound projects in each region, *Upward Bound Fact Sheet*, *Upward Bound Guidelines*, *Upward Bound – The War on Talent Waste*.

FEDERAL PROGRAM PROFILE

VISTA – VOLUNTEERS IN SERVICE TO AMERICA

Since January, 1965, more than 8,000 VISTA volunteers have shown a direct concern for combating poverty within the United States, Puerto Rico, the Virgin Islands, and the U.S. Pacific Territories. Initially, the most important requirements for selection to VISTA were previous voluntary experience and a desire to serve. Today, still another factor is important: professional skill or trained talent. VISTA is enrolling an unusual number of lawyers, education specialists, business school graduates, health workers, architects, and planners. The majority of volunteers are college graduates between 20-24, but volunteers can range in age from 18-80, and some have a technical school education.

VISTA volunteers are sponsored by a variety of public and private non-profit organizations, including social welfare agencies, grassroots neighborhood and community organizations, city, county, and state poverty programs, and other groups whose aims are to assist the poor. Volunteers rarely work singly, but generally are placed in teams numbering as many as twelve. The degree of supervision that a volunteer receives varies with the project to which he is assigned.

The training period seeks to define volunteer roles and propounds a philosophy of responsiveness to community needs. It also seeks to show how previously acquired skills are applicable to anti-poverty efforts, and to the extent possible, provides skills and information specifically required by individual projects. VISTA volunteers receive six weeks of training, approximately four of which are spent in the project community. Volunteers serve for one year; with approval, they may re-enroll, and nearly 40% do.

Volunteers receive a basic living allowance, scaled to the area. They are given a monthly allowance for personal incidentals, and a monthly terminal contribution of $50 is set aside for the conclusion of service.

FOR INFORMATION:

Information is available from VISTA, Washington, D.C. 20506, or from the regional offices of the Office of Economic Opportunity. Applicants must be citizens or permanent residents of the U.S. or its territories. There are no entrance examinations, minimum education or experience requirements. Applicants fill out an extensive application-questionnaire. On the questionnaire, applicants may indicate general geographical and work assignment preferences; these are honored to the extent possible, although VISTA's primary concern is to match the skills of the volunteer to the needs of the people with whom he will serve. Married couples apply and serve together. Volunteers have been deferred from the draft, but the final decision is up to local draft boards.

Regional Educational Networks

A genuinely significant development has been the federal government's funding of three major regional educational networks: nine Research and Development Centers, fifteen Regional Educational Laboratories, and nineteen Educational Resources Information Centers are generating new roles in quantity.

The R&D centers and the regional labs both are administered by the Research Division of the Office of Education, although they have distinctive functions and staffing needs. Both were established in 1963. During 1969 the R&D centers were funded at $8.1 million, REL at $23.6 million, and ERIC at $3.4 million.

Jobs in these centers usually require more education and experience than those in other federal programs and they are more difficult to get. Candidates should have a master's degree, several years of teaching experience, and specialized skills or experience in the focus area of the center. Most program directors are university faculty members with doctor's degrees; research assistants are often graduate students.

RESEARCH AND DEVELOPMENT CENTERS

The research and development centers program was established in 1963, under the Cooperative Research Act. The program is administered by the Bureau of Research of the Office of Education. The intent is to attract research personnel from appropriate disciplines, consolidate more conclusive and cumulative results, and close the gap between educational research and educational practices.

Currently there are ten research and development centers in university settings from Athens, Georgia, to Eugene, Oregon. They are concerned with such diverse matters as cognitive learning, educational administration, the social organization of schools, and the learning process.

Staff size ranges from large – 160 at the Learning R&D Center at Pittsburgh and slightly fewer at the Center for R&D for Learning and Re-Education at Wisconsin – to small, as few as 50. A key person is the professional researcher, usually a university faculty member with a joint appointment spending half or more of his time in the center. Research associates are also at doctoral level; they may have faculty status or come from other academic institutions or research enterprises. Graduate students are often research assistants. An advanced graduate student sometimes commits a major portion of his time to the center, others work part-time or on short-term projects.

There are also technical assistants. At the top of the employment scale is a full-time technician, often on a senior level of employment and holding advanced degrees; he may be a computer technologist with a background in engineering or physics. Intermediate programmers with bachelor's or master's degrees and individuals familiar with educational technology, audio-visual techniques, communication and graphic arts, photography, or teaching machines might also appear on the staff.

Center for the Advanced Study of Educational Administration
School organization and administration in the societal context
University of Oregon, Eugene, Oregon 97403

Center for Research and Development for Learning and Re-Education
Learning efficiency for children and adults
University of Wisconsin, 1404 Regent St., Madison, Wis. 53705

Center for Research and Development in Higher Education
Organization, purposes, and outcomes of higher education
University of California, Berkeley, Calif. 94720

Center for Research and Leadership Development in Vocational and Technical Education
Research and development activities, including operation of ERIC clearinghouse on adult and vocational education
Ohio State University, Columbus, Ohio 43210

Center for Research, Development, and Training in Occupational Education
Research and development emphasizing southern needs in adult and vocational education
North Carolina State University, Raleigh, N.C. 27607

Center for the Study of Social Organization of Schools and the Learning Process
Influence of social and administrative organization of

schools on learning of students from diverse backgrounds
Johns Hopkins University, Baltimore, Maryland 21218

Center for the Study of the Evaluation of Instructional Programs
Study of evaluation processes and techniques
University of California, Los Angeles, Calif. 90024

Learning Research and Development Center
Learning research and instructional practices
University of Pittsburgh, Pennsylvania 15213

Research and Development Center in Educational Stimulation
Programs of early and continuous stimulation, 3- to 12-year-olds
University of Georgia, Athens, Georgia 30601

Research and Development Center in Teacher Education
Teacher education
University of Texas, Austin, Texas 78712

FOR INFORMATION:
Journal of Research and Development in Education, Volume 1, No. 4, Summer 1968 (Athens, Georgia), is entirely devoted to these R&D Centers. Back copies available for $2.00. See above address.

See also *The National Program of Educational Laboratories* referred to in the following section. Nine R&D Centers are described.

REGIONAL EDUCATIONAL LABORATORIES

Title IV of the Elementary and Secondary Education Act of 1965 provides for the establishment of a national program of educational laboratories. The laboratories are administered by the Bureau of Research of the Office of Education. Laboratory in this case does not mean just a building, but a center bringing together colleges and universities, state departments of education, schools, and other educational organizations to solve the educational problems of a geographical area.

At present there are fifteen laboratories, each an independent, non-profit corporation with its own governing board and staff. The program and organization of each laboratory are determined by its governing board. All but one began as totally dependent on federal funds, but a number have diversified so there is outside financial support.

In descending order the largest are the Center for Urban Education, Research for Better Schools, Southwest Regional Laboratory, Northwest Regional Educational Laboratory, Southwest Educational Development Laboratory, and Far West Laboratory for Educational Research and Development. Staff size scales down from a high of 73 at the Center for Urban Education to 30-40 at the Education Development Center, whose regional educational laboratory staff members represent only 10% of their total operation.

In terms of staff positions, laboratories have discovered a need for a multidisciplinarian who can systematically engineer a new concept or product for wide-scale application. This person needs skills in research, marketing, administration, and field work. He guides an idea from pilot project to national dissemination; he oversees the getting-the-bugs-out research phase, directs a progressively widening cycle of pilot testing, designs packaging and marketing, and establishes appropriate links with teachers and school systems. These talents are so rare that some laboratories are actually training

staff for this development role. In general, the labs are seeking a much wider range of talent, drawing particularly from the physical, life, and social sciences and less from the behavioral sciences of educational psychology and sociology. Labs are becoming more and more interdisciplinary.

Appalachia Educational Laboratory (AEL)
1414 Kanawha Blvd.
Charleston, W. Va. 25325

Focus: helping rurally isolated school districts upgrade the quality of education through the establishment of "educational cooperatives" so the districts may share technical equipment, mobile facilities, and other resources.

Center for Urban Education (CUE)
105 Madison Ave.
New York, N.Y. 10016

Focus: improving educational practice in northern metropolitan school systems through programs that insure literacy in the early grades, promoting teacher competence and morale, and assisting schools to integrate their facilities and use mass media more effectively.

Central Midwestern Regional Educational Laboratory (CEMREL)
10646 St. Charles Rock Rd.
St. Ann, Mo. 63074

Focus: developing curricula in mathematics and aesthetics for students in grades K-12; demonstrating computer assisted instruction for rural schools; designing teaching strategies for use with special student populations; developing computer applications to serve educators in regional and state school planning, administration, and instruction.

Eastern Regional Institute for Education (ERIE)
635 James St.
Syracuse, N.Y. 13203

Focus: developing a model of individualized instruction in which the total resources of a school are harnessed to support the program; designing a system for installing and monitoring a new curriculum in schools of diverse characteristics.

Education Development Center (EDC)
55 Chapel St.
Newton, Mass. 02160

Focus: developing programs designed to help pilot communities to improve the quality of their schools, including the establishment of resource teams which can help each community in such areas as curriculum development, pre- and in-service training of teachers, and community attitudes.

Far West Laboratory for Educational Research and Development (FWLERD)
Claremont Hotel, 1 Garden Circle
Berkeley, Calif. 94705

Focus: improving the instructional skills of experienced teachers by developing self-instructional course packages based on microteaching techniques; improving the means by which school personnel are informed about tested alternatives in dealing with educational problems.

Mid-Continent Regional Educational Laboratory (McREL)
104 East Independence Ave.
Kansas City, Mo. 61108

Focus: developing self-directed learning among a general student population, emphasizing the development of programs to train teachers in skills which foster self-directed learning in students.

Northwest Regional Educational Laboratory (NWREL)
400 Lindsay Building
710 Southwest Second Ave.
Portland, Oregon 97204

Focus. developing strategies for training leaders to instruct other professionals in the use of promising instructional practices; developing individualized course materials and guidance programs for small rural schools; developing model school programs for culturally different children.

Regional Education Laboratory for the Carolinas & Virginia (RELCV)
Mutual Plaza
Durham, N.C. 27701

Focus. training personnel to apply institutional research and planning processes within colleges and universities; selecting and installing new educational materials and methods in the elementary and secondary schools of the three states.

Research for Better Schools, Inc. (RBS)
121 South Broad St.
Philadelphia, Pa. 19107

Focus: field testing and further developing a system of individually prescribed instruction; developing "research implementation" personnel to assist school administrators in identifying and solving educational problems.

Southeastern Education Laboratory (SEL)
3450 International Blvd.
Hapeville, Ga. 30054

Focus: improving communication skills among educationally disadvantaged whites and Negroes in rural and urban schools; improving interpersonal relations in disadvantaged schools.

Southwest Educational Development Laboratory (SWEDL)
800 Brazos St.
Austin, Texas 78767

Focus: developing programs in which the teacher, the instructional program, materials, and activities are structured to meet the unique needs of Mexican-American, Negroes, and French Acadians; developing applications of computer technology which meet the management needs of individual schools and the instructional needs of individual students.

Southwest Regional Laboratory for Educational Research and Development (SWRL)
11300 LaCienega Blvd.
Inglewood, Calif. 90304

Focus: developing a coordinated primary grade curriculum that includes communication skills, problem solving, and humanities elements; developing a computer-managed instruction system to aid the teacher, and a computer-based planning system to assist the school administrator in decision-making; developing instructional materials to train school personnel to use SWRL-developed products.

Southwestern Cooperative Educational Laboratory (SWCEL)
117 Richmond Drive, N.E.
Albuquerque, N.M. 87106

Focus: developing an improved first-year school experience in the language arts with initial emphasis on oral language for Mexican-American and Indian children.

Upper Midwest Regional Educational Laboratory (UMREL)
1640 East 78th St.
Minneapolis, Minn. 55423

Focus: developing new methods of teacher training which will improve teacher competency; developing in-service programs to prepare school staffs to work more effectively with new curriculum and changing patterns of school organization.

FOR INFORMATION:

A 105 page paperback booklet by Francis S. Chase published in 1969 gives an independent appraisal of twenty Regional Educational Laboratories and nine Research and Development Centers. Write for *The National Program of Educational Laboratories*, U.S. Office of Education, Bureau of Research, Washington, D.C. 20202.

ERIC CLEARINGHOUSES

ERIC is the acronym for Educational Resources Information Center. ERIC is a nationwide information network for providing ready public access to current programs, materials, ideas, and research. It consists of a coordinating staff in Washington, D.C.; nineteen special-subject clearinghouses located at universities or with professional organizations across the country; a centralized computer facility in California; and a document reproduction subcontractor in Maryland. The clearinghouses are each responsible for a particular educational area – adult education, exceptional children, rural education and small schools, and so on. *Research in Education*, a monthly abstract journal, lists recent acquisitions.

Clearinghouses are located at universities or professional organization headquarters so that the director, a leader in his field, is not divorced from his specialty but has direct, continual contact with it. This liaison is also important for other staff members, inasmuch as the prime function of an ERIC center is to reflect the most current and substantial findings in a particular field. New centers for social studies and educational testing and measurement are being planned.

At the clearinghouses, indexers and abstracters review information from all over the United States and prepare it for microfiching and dissemination. The center also generates new products: bibliographies and monographs synthesizing and extending current information. The bimonthly ERIC newsletter from the Center for the Disadvantaged is an excellent example.

Most clearinghouses are small, having 10 or fewer full-time staff. There is usually a director, an assistant director, and a director of internal operations. At a university these are generally drawn from the faculty; at a professional organization there is more chance of an "outsider" participating. Abstracters and indexers are subject specialists and graduate students; they work part-time or full-time. Qualifications range from a bachelor's degree and a year of teaching experience to fluency in five languages with fifteen years of professional writing and field experience. The Director of ERIC has stated that "a scarcity of information science or documentation experts" makes adequate staffing "especially difficult."

Adult Education
Syracuse University
Syracuse, N.Y. 13210

Counseling and Personnel Services
University of Michigan
Ann Arbor, Mich. 48104

Disadvantaged
Teachers College
Columbia University
New York, N.Y. 10027

Early Childhood Education
University of Illinois
Urbana, Ill. 61801

Educational Administration
University of Oregon
Eugene, Oregon 97403

Educational Facilities
University of Wisconsin
Madison, Wis. 53703

Educational Media & Technology
Stanford University
Stanford, Calif. 94305

Exceptional Children
The Council for Exceptional Children
Washington, D.C. 20036

Higher Education
George Washington University
Washington, D.C. 20006

Junior Colleges
University of California at Los Angeles
Los Angeles, Calif. 90024

Library & Information Sciences
University of Minnesota
Minneapolis, Minn. 55404

Linguistics
Center for Applied Linguistics
Washington, D.C. 20036

Reading
Indiana University
Bloomington, Ind. 47401

Rural Education & Small Schools
New Mexico State University
Las Cruces, N. Mex. 88001

Science Education
Ohio State University
Columbus, Ohio 43221

Teacher Education
American Association of Colleges for Teacher Education
Washington, D.C. 20005

Teaching of English
National Council of Teachers of English
Champaign, Ill. 61820

Teaching of Foreign Languages
Modern Language Association of America
New York, N.Y. 10011

Vocational & Technical Education
Ohio State University
Columbus, Ohio 43210

FOR INFORMATION:

"ERIC . . . A National Network to Disseminate Educational Information," Harvey Marron, *Special Libraries*, December, 1968, pp. 775-782. Mr. Marron is Chief of ERIC.

JOBS IN STATE DEPARTMENTS OF EDUCATION

Little has been written about state departments of education nationwide, and most material is concerned with political rather than operational aspects. This section relies heavily on interviews and subjective data gathered from four departments: Massachusetts, Maryland, Pennsylvania, and Connecticut.

The clearest truth about state departments of education is that they are highly individual in scope and organization, in staffing patterns, qualifications and salaries, and in present and future emphases. The most accurate generalization is that departments are undergoing rapid changes due to an influx of federal funds, demands from urban areas, and the pressure from local schools to become less regulatory and more creative. Consequently, qualified applicants often find considerable internal fluidity and newly-created jobs or roles. This generalization is borne out by the experience of Pennsylvania's chief recruiter who returned recently after an eight year absence: "It's a completely different – and much better – department than I left."

Most departments have three to a dozen major divisions, each housing several appropriate bureaus. These divisions may include instruction (Md., Mass., Conn., Pa.); vocational education (Mass., Conn.); administrative services (all four); planning/research/development (Mass., Conn.); and finance (Mass.). Some states include higher education under the Commissioner (New York, Pa.); others have a separate board and a chancellor for higher education (Mass.).

Organizational charts of departments of education reveal a far wider sphere of activities than the average school of education student realizes. In many states the bureau or division dealing with vocational education has as many or more staff persons than those dealing with traditional elementary and secondary education curriculum. Passage of the Vocational Education Act of 1963 and the amendments of 1968 presage an intensification rather than a lessening of this trend.

Organizational charts will also reflect a concern for school building and school finance. State departments are trying to develop additional sources of revenue to avoid closing schools for fiscal reasons. Relating curriculum, methods, and school buildings at times of consolidation or construction is another problem. Adult education is a further important element. More than half a million persons over twenty-five in Massachusetts alone have no more than an eighth grade education. The implications for adult basic education as well as vocational education are staggering. Research and development divisions on the charts indicate the need for long-range planning skills.

Organizational charts are also useful for the philosophy they reveal. For example, Pennsylvania's career development section (separate from a personnel section) hints at the existence of a fine in-service program—which indeed is true. Among other things, the program provides that each year two percent of the staff may take a year's educational leave of absence at ninety percent salary plus tuition after only two years of service.

Thus one simple action we can recommend: write for samples of organizational charts and personnel policies. A comparison of them will be helpful. Locate bureaus you might be interested in exploring and arrange to speak with a staff person over the phone or in person. If your interest becomes serious, pay careful attention to the calibre of your future director and his immediate superior. Their excellence will relate directly to your ability to accomplish.

Virtually every state department has two categories of professional personnel. The first includes those in key management positions such as division and bureau directors. The former are often brought in from outside, the latter often promoted from within. The second category includes staff and field positions, the level usually being determined by salary rather than job definition. Category two constitutes forty to sixty percent of the staff and is the level most professionals start at. The following chart offers a basic comparison of category two positions in four states. As a general rule the higher the salary the more demanding the qualifications, although requirements are sometimes waived.

State and Job Titles	% of Staff	Salary Range	Basic Requirements
CONNECTICUT			
Service specialist	75	11,300-13,700	Master's/experience
Associate consultant		13,700-16,900	Doctorate/experience
Educational consultant		15,100-18,600	Doctorate/experience
MASSACHUSETTS			
Supervisor	30	8,977-11,239	Master's/1-3 yrs. teaching experience
Senior supervisor	30	10,202-12,870	Master's/experience often as superintendent or principal
MARYLAND			
Assistant supervisor	varies	10,213-13,417	Bachelor's
Educational supervisor	40–45	11,233-14,757	Master's
Supervisor		12,357-16,235	Doctorate
PENNSYLVANIA			
Advisors	50	12,075-15,387	Master's/4-8 yrs. varied experience

The number of doctorates varies tremendously. Of 100 central staff in Connecticut, about 85% have them. Of 300 in Massachusetts, less than 3% have them. Of 35 in the instruction division in Maryland (total staff, 300), half have them now and another quarter will by September, 1970. Of 600 in Pennsylvania, between a fourth and a fifth have them.

Who are state departments especially looking for? Pennsylvania's fastest growing area is higher education: the department is hard-pressed to find generalists with experience in curriculum development, administration, and planning at that level. The state is also "looking constantly for people in research and individuals with urban educational experience and sensitivity." Pennsylvania has bureaus for management information systems and for educational quality assessment, showing new talents needed. Maryland was forced to conduct a long search recently to find a doctoral level person in the psychology of education. This department has just brought in a new supervisor of early childhood education whose responsibility for state-wide education from birth to eight years will soon include related parent education. Like most states, Maryland is hard pressed to find vocational education staff, particularly with advanced degrees. Connecticut had to wait several months to locate a physical education person with a doctorate.

In the same vein, Massachusetts' bureau for curriculum innovation has hired two trained evaluators and is training a person in dissemination. This state's new equal educational opportunity unit has hired staff to assist with bussing programs and school integration problems. In addition, the department recently hired a Cornell University graduate in labor and management relations with four years of elementary teaching experience. She will work in personnel and assist the department with its own teacher association negotiations. The department's educational television unit plans and produces new programs for daytime classroom use.

The United States Office of Education has identified three important functions of state

departments of education: *leadership* – planning, research, consulting, coordinating, disseminating information, public relations; *regulatory* – general activities promoting the overall educational program, such as setting and enforcing minimum standards and regulating the spending of state funds; and *operational* – miscellaneous programs of service to individuals, and support where needed to local districts.

Both Connecticut and Maryland felt they were spending about 75% of their time on leadership activities. For example, Connecticut's vocational education section designed a series of "vocational program packages" suitable for comprehensive schools. Several supervisors travelled from school to school "selling" the programs. When a principal indicated an interest the field supervisor followed the "salesman" with further details. Two factors, a new commissioner and a major study of the department now in progress make Massachusetts worth watching. Even now the department is shifting to a cross-bureau task force approach to solving problems.

Often a department staff's accomplishments depend on its ingenuity in overcoming serious limitations. One of the greatest problems is money. In Massachusetts, the department does not have fiscal autonomy, even for personnel. Lack of staff to work out details has impeded implementation of a 1965 three hundred thousand dollar study of educational needs. The Willis-Harrington study required the state to set minimum standards in various areas, but virtually no money has been allotted to those now at work on this important task. Some units, like the Bureau of Curriculum Innovation, are limited by little or no state budget appropriation and exist only because of some administrative funds from federal programs. In short, it is a good idea to inquire about appropriations to the department generally and to the areas you are interested in specifically; this will give you some idea of how much impact your potential unit can make on the problems of the state.

Another problem state departments face is a long history of local autonomy, making it difficult to promote change. When the Massachusetts State Department mandated kindergarten recently, citizens filed bills to reverse that decision! Since all state departments of education depend on the legislature for their money, too much reform can boomerang back to the legislators and affect the education budget. On the other hand, Maryland's experiences represent a completely different situation. Since that state is organized educationally by counties rather than towns – 23 counties and Baltimore – the department of education has been able to work effectively with the counties and have genuine representation on all kinds of state-wide committees. County projects frequently use state supervisors as resource consultants in curriculum development projects. Consequently, guidelines are often in operation before they are in print. The material generally comes out under the aegis of the county, or jointly, county-state. Thus over a period of time the presence of a state department person provides continuity and cohesiveness without a sacrifice of local preferences or opportunities for growth.

It is also revealing to ask a state department of education what it sees as future emphases. Anticipating a need for evaluation skills, Maryland is hiring a team from Columbia to train every professional in the Division of Instruction in these skills. Because of increasing dissemination needs, the department also plans to hire writers and an editor. The department's work in curriculum development is definitely increasing, so that directors are looking for more people who combine supervisory experience with curriculum fields. Therefore, they are hiring fewer people on the basis of subject matter experience alone. Whereas in the past supervisors have done field work – that is, worked with leadership in local schools to improve a subject matter area, conducted inservice meetings, etc. – they now are spending as much as 50% of their time as curriculum resource people in local developmental situations.

Massachusetts' Associate Commissioner for Personnel foresees a real concern for urban education and a consequent need for staff sensitive to urban populations and their educational requirements. A five-year manpower projection by Pennsylvania has only emphasized how dependent their plans are on three factors: funding levels; some resolution of philosophical differences between "traditionalists" and "innovators;" and gubernatorial continuity.

We should also mention that state level educational jobs exist outside the departments of education. Unfortunately, it is very difficult to track them down except by carefully consulting a state government telephone directory or locating someone in state service with a broad orientation and time to advise. Education programs in prisons and youth service division centers require state level supervision. If a state does not have a regional OEO office, some wing of state government will probably have OEO services subcontracted to it. Such is the case with the Massachusetts Department of Community Affairs. Other states may have long-range planning offices which house a few education specialists.

In the end, perhaps the most appealing aspect of departments of education is their potential for service and changemaking, which is on the upswing. A person with ideas is increasingly able to put them into effect if he has the imagination to cut through bureaucratic limitations. Success takes patience, persistence, willingness to work quietly and without recognition, a sense of humor, administrative (even secretarial!) skills, ability to look at situations in a multidisciplinary way, political savvy, and a real commitment to education for everyone.

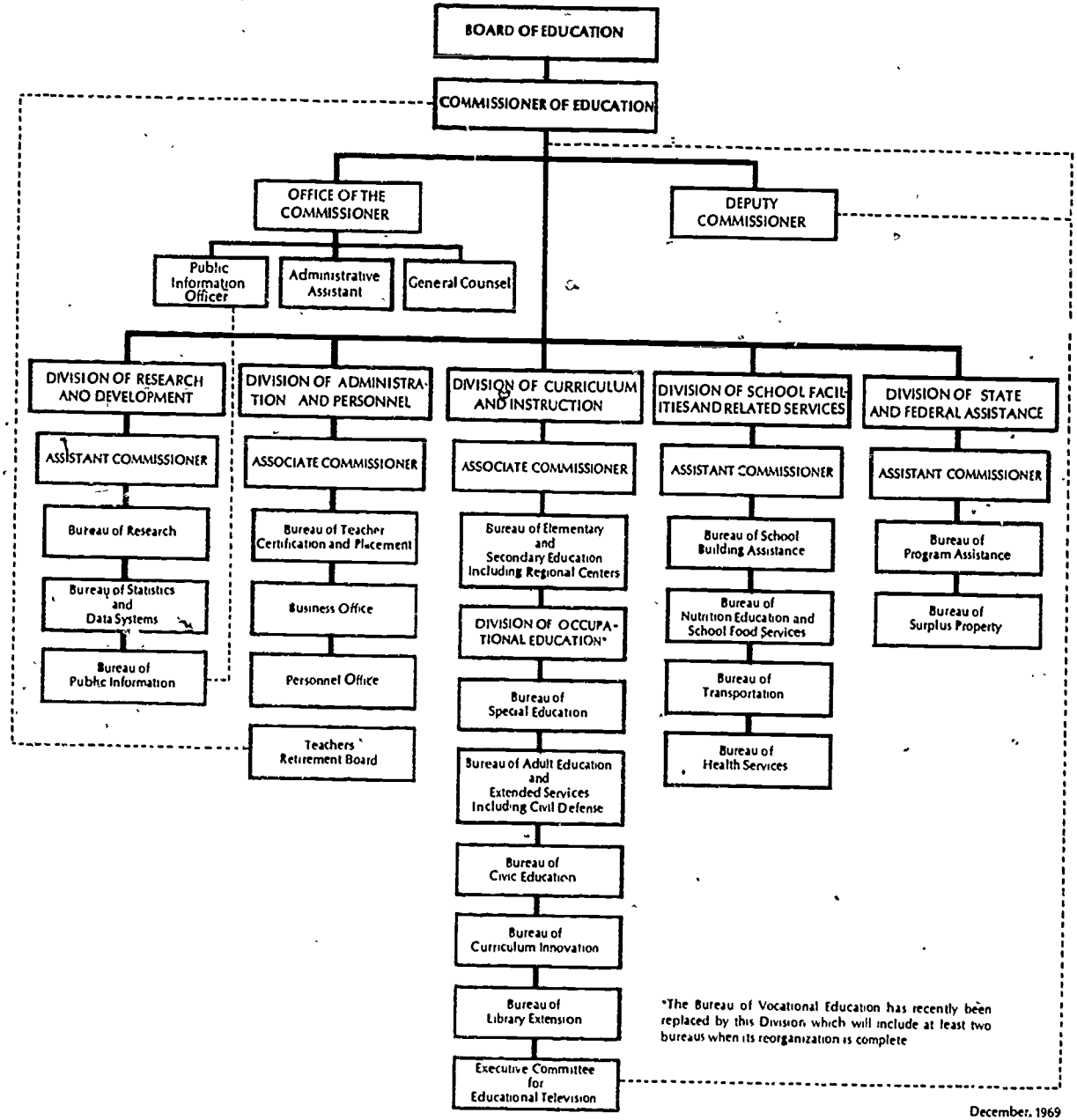
FOR INFORMATION:

An article by Lawrence Iannaccone on state departments of education and various other agencies is to be published by Macmillan in their new *Encyclopedia of Education.*

The U S Government Printing Office reprinted a 1960 edition of a resource booklet entitled *Curriculum. Responsibilities of State Departments of Education.*

Many useful facts and charts about the Massachusetts State Dept. of Education can be found in a *Report of the Special Commission Established to Make an Investigation and Study Relative to Improving and Extending Education Facilities in the Commonwealth of Massachusetts.* The Willis-Harrington Study was published in 1965.

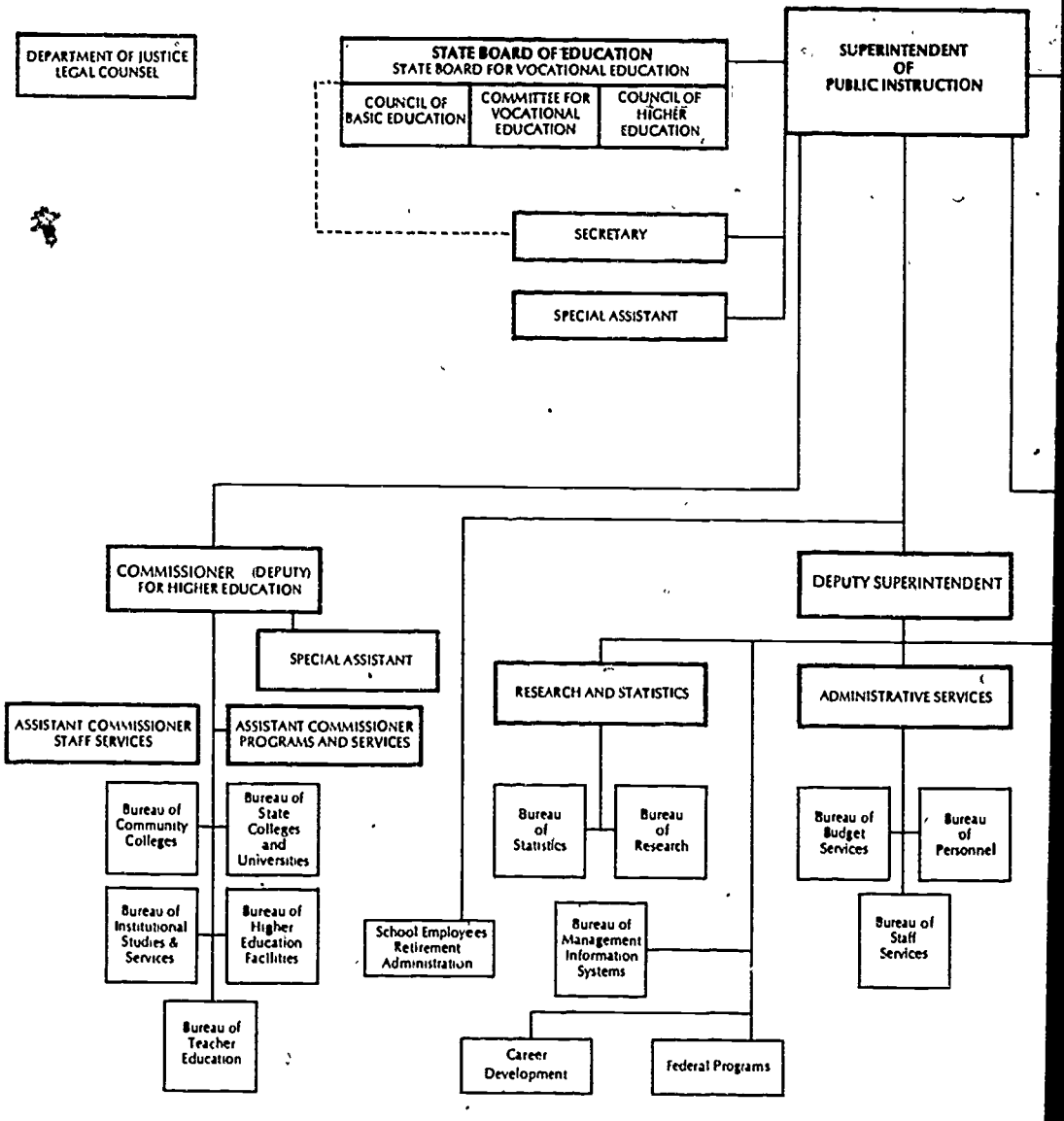
MASSACHUSETTS DEPARTMENT OF EDUCATION



*The Bureau of Vocational Education has recently been replaced by this Division which will include at least two bureaus when its reorganization is complete

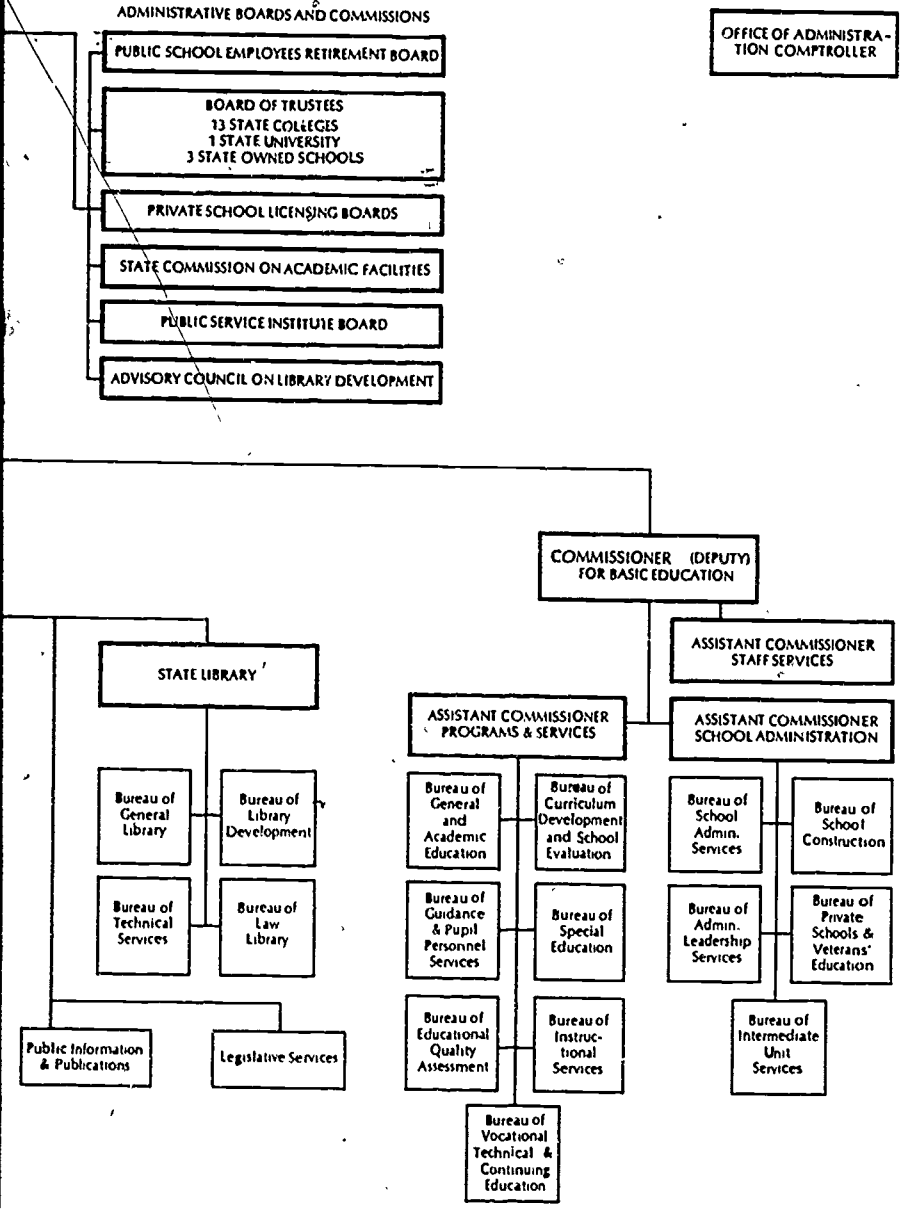
December, 1969

DEPARTMENT OF PUBLIC INSTRUCTION



December, 1969 *Note* The Department is currently undergoing some internal reorganization which may cause changes in bureau titles and alignments

OF THE COMMONWEALTH OF PENNSYLVANIA



Schools and Non-Profit Associations

Schools and Non-Profit Associations

More organizations and varieties of institutional arrangements are devoted to education than one might think. New roles can be found or created within the present structure of public school systems. They can be found in experimental schools established to provide alternatives to public school instruction. They exist in research centers, foundations, associations, and other non-profit educational organizations that are related to schools, teachers, and improved education.

This section identifies major new roles within the public schools, reports generically on experimental schools, describes a representative number of non-profit educational organizations, and outlines the employment picture in research centers, foundations, and associations. Although only a few examples illustrate each category, they are suggestive of the variety one can find nationwide, given some persistence in ferreting them out.

New Roles in Public Schools

There are few recognized paths of professional advancement open to a classroom teacher. Generally, the path up is also the path out of the classroom into administration, guidance, or supervision. One problem with this kind of career ladder is that classroom teaching is not necessarily the best preparation for these positions. Another problem is that most school systems lack time, resources, and vision for research and development, and – consequently – frequently lose their most talented teachers.

EXPERIMENTAL PROGRAMS

Recently, alternative paths of advancement have begun to be established as a result of increased federal funds for experimental programs. Many special programs are funded through various titles of the Elementary and Secondary Education Act of 1965, particularly Title III. Others are funded through foundation grants and other outside sources.

Projects run the gamut of topics from the production of teacher training films for kindergarten, to oceanographic education centers, to mobile learning labs, to parent awareness of child talent, to planning a regional media center, to urban-suburban cooperatives. In Massachusetts alone there are 75 Title III projects; there are more than 2000 nationwide. A typical project in a single school has a director and one or two assistants who administer a small to medium-sized grant over a three year period. District-wide programs or regional cooperatives often have larger staffs.

The Education Collaborative for Greater Boston (EdCo), for instance, includes seven school systems. Its programs are race relations training, a camp and living exchange, a work-study program for non-college students, an early childhood learning center, training for administrators in school-community relations, and a small grants program for innovative teachers. EdCo has a staff of 10 in positions ranging from secretary to director; for their staff, they look for people with knowledge of urban problems and

background experiences in community involvement, education, business, and politics, plus experienced and creative artists in the areas of drama, music, art, and photography.

Experimental programs have generated a host of new positions and have brought people with different skills into the schools to fill them. Offices and titles keep changing, but the new roles are recognizable, nevertheless. Within the last four years, many school districts have acquired an Office of Project Development or a Federal Projects Coordinator, whose task it is to prepare and submit proposals and serve as a clearinghouse for information concerning project funding. Once funded, projects must have staff. One Head Start/Follow-Through Program in the Berkeley, California, Public Schools had a coordinator, 2 program assistants, 19 teachers, 19 instructional aides, 4 social work assistants, a guidance teacher, a psychologist, a language specialist, a community liaison worker, a secretary, and a nurse. A Preschool Education Project employed a supervisor, a guidance consultant, a psychologist, a public health nurse, a supervising teacher, 5 teachers, 20 assistant teachers, 2 teacher aides, and 2 neighborhood workers, offering 20 classes in 8 locations in combination with parent nurseries.

Innovative projects require evaluation; hence the fairly new role of Evaluation Coordinator, often an advanced graduate student or recent Ph.D. or Ed.D. with competence in designing measures of effectiveness appropriate to a school setting. Other new positions are Director of Research, Director of Dissemination, Director of School-Community Relations, and Public Information Specialist.

Even relatively small programs tend to create new administrative roles. Schools have coordinators of student teachers, coordinators of volunteer mothers and teacher aides, directors of camping and outdoor education programs, coordinators of visits to nature centers, planetariums and museums, directors of desegregation and race relations programs, coordinators of school-to-school and teacher-to-teacher exchange programs with other communities and foreign countries, and so on.

What seems most evident is that these roles require persons with interdisciplinary skill, often with different skills than a teacher or superintendent. A public information writer needs to know about publication layout, press releases, and lining people up for pictures; the coordinator of a New Careers program training paraprofessionals as teacher aides needs to know how to relate to the poor and how to operate within the school system. People who know the schools *and* another social or business world outside the schools are needed. Social psychologists with skills in interpersonal relations are a case in point; so are social scientists with skills in research and interest in education.

At first, however, school districts tend to operate experimental programs with little outside help. As the programs multiply, personnel are reallocated, teachers are hired part-time or full-time, and outsiders – generally with doctorates or their equivalents in special skills – are recruited. It is probably easier to join the staff of a superordinate regional organization than to gain similar responsibilities as a newcomer to a school

district. Teaching positions in experimental programs also go first to teachers within a system who have seniority and demonstrated ability. These positions offer valuable experience that can provide access to a variety of jobs in other organizational settings.

TEACHER TRAINING AND SUPERVISION

Other trends, often accelerated by experimental projects, are creating new roles within the public schools. Several new roles are foreseeable in training and supervising teachers. Important concepts here are the idea of diversified roles for teachers and the role of a master teacher, a skilled, experienced teacher who is responsible for the performance and continuing education of teacher aides, teacher assistants or intern teachers. A master teacher may work in a single school, in one or two schools, throughout a school system, or with several school systems. This role exists presently, in limited fashion, when teachers in a local school system are paid by a college or university to supervise student or intern teachers.

In schools of the future, teachers may function more as resource persons, tutor-counselors and planning strategists. If they do, they will need assistance. While the future is not the present, there are indications of a growing interest in refining the job description of a teacher. Part of the impetus comes from the perennial shortage of good teachers, part from the need of urban schools to bring people from the community into the schools, and part because truly child-centered teaching simply requires more time and resources than one teacher in an ordinary self-contained classroom can muster.

Some states are revising certification requirements to provide for diversified teacher roles. A 1968 study of teacher preparation and certification undertaken for the Massachusetts Advisory Council on Education recommended licensing teachers on four levels: internship, for those in training; associate, for beginning teachers; professional, for teachers with demonstrated ability to handle assignments without supervision; and specialist, for high level teachers and those with specializations such as counseling, supervision, administration, or subject areas such as sociology, psychology or systems analysis.

Actually, some school districts have already taken steps in this direction. Schools are hiring teacher aides, lay readers, and lay learning center directors; some are incorporating volunteer mothers into school activities on a regular basis. The New Careers Program, sponsored by the Department of Labor, provides the structure and subsidy needed for the poor to find entry-level positions as teacher aides and then training for advancement. Diversified roles for administrators are also possible. In a foundation-sponsored project in inner-city New Haven, two elementary schools share two principals – one for administration and one for instruction.

CURRICULUM AND MATERIALS DEVELOPMENT

New roles are appearing in curriculum and materials development as schools and teachers become increasingly interested in curriculum reform. Large city systems usually have a district-wide curriculum development department, some have demonstration subsystems. Districts also have affiliations with innovative projects sponsored by universities, foundations, or the federal government. Schools can promote local initiative by arranging released time for teachers, hiring teachers to work full-time during the summer, giving small grants to teachers who want to try out an idea, or devoting 1% of the district budget to developmental purposes. Occasionally, small local foundations will provide grants of $500-$1,000 to teachers for work on individual projects.

The increasing popularity of multi-media and manipulative curriculum materials, plus concern for curriculum reform, has led to the creation of a growing number of instructional materials centers. Some local projects are sophisticated expansions of the district audio-visual center, others are federally supported and part of an intended national network of centers. Both offer new positions for teachers. For example, the New England Materials-Instruction Center (NEMIC), one of fourteen federally funded centers established to provide materials for handicapped students, has established 18 satellite centers in New England, all manned by local teachers with half-time appointments.

Sometimes a teacher with special interests or skills can create his own position. A Brookline, Massachusetts, teacher who developed skills in film-making, graphic arts and photography picked up specialized training in a summer institute and now works with students and teachers developing educational materials in these media.

SOURCES OF INFORMATION:

Probably the best sources of information regarding unusual roles within public schools are teachers and administrators. Newspapers and professional journals will help some, but there is no substitute for asking around. The directories below can only help a novice know where to ask.

Pace Setters In Innovation. This U.S. Office of Education publication has an abstract of every Title III project in the United States. Indexes are by topic and geography. Most education libraries have this book. Otherwise, write the U.S. Government Printing Office, Washington, D.C. 20402. $2.50.

Title III Coordinators. A list of current Title III projects in each state is available from that state's Title III Coordinator, State Department of Education.

Teaching Opportunities, A Directory of Placement Information This is an extremely valuable pamphlet describing placement agencies and services that help teachers locate unusual teaching opportunities in the United States and abroad, at elementary through college levels. Write the U.S. Government Printing Office, Washington, D.C. 20402. 25¢.

Directory of Educational Information Centers. This directory was compiled in 1969 by the Bureau of Research of the Office of Education. It lists, by state, Title III projects, research and development centers, instructional materials centers, regional educational laboratories, and appropriate units of state government. It is available in some specialized education libraries. Otherwise write the U.S. Government Printing Office, Washington, D.C. 20402. $1.25.

Types of Experimental Schools

Experimental schools offer alternatives for students, teachers and parents. Some experimental schools exist within the public school structure; most exist outside it hoping to influence it by providing working models that deal successfully with people or problems often neglected by the public schools. Experimental schools run the gamut of institutional ties. Teaching in these schools offers more than usual opportunities to try out ideas and gain valuable experience.

Most closely allied with the public schools are experimental schools supported by a local school system. Two examples are the *Parkway School* in Philadelphia, where about 550 high school students use the whole city as their classroom, and the *Murray Road Annex of Newton High School* in Newton, Massachusetts, an experimental school begun in 1967-1968 by a group of teachers, parents and students who wanted to break the traditional mold. At Murray Road students and faculty decide matters of curriculum, scheduling, and rules; the school is reorganized continually to reflect the concerns of its members.

The *Pennsylvania Advancement School* represents another kind of institutional arrangement; the school is a private non-profit corporation under contract to the Philadelphia Board of Education to act as a developmental arm of the school system. The Advancement School is, broadly, a research project, a curriculum development center, and a school for about 200 underachieving 7th and 8th grade boys sent to the school by the Philadelphia public and diocesan schools. The staff at the Advancement School works to motivate and teach the boys. Successful approaches and materials are field-tested by regular public school teachers and then made generally available. The Advancement School also functions as a teacher training center.

The C.A.M. *(Christian Action Ministry) Academy*, formed from an alliance of 8 Catholic and Protestant churches in Chicago, also began with the express intention of effecting change in the Chicago public schools. The aim was to provide a successful "second chance school" for dropouts, proving that public school rejects can learn, given the appropriate environment. The Academy recruits 17-25 year olds, provides a fairly individualized program of instruction, and gives job training, high school, and college preparatory certificates. It has deliberately run its program with the kind of budget and class size feasible for public schools. It has involved officials of the Chicago school system and representatives from 5 universities, and is in touch with the superintendent of schools and the board of education.

Still another genre of experimental school is private, independent, and community-sponsored. In New York City a private educational system for dropouts has grown up alongside the public school system. It consists of 16 storefront schools, 2 academies of transition, and *Harlem Prep*, which is college preparatory. The Urban League, the Ford Foundation, and eleven corporations have provided financial support. In Boston, the black community has begun three elementary schools: the *New School for Children*, the *Highland Park Free School*, and the *Roxbury Community School*.

The *CCED School or Apollo School* illustrates yet another type of experimental school, a metropolitan area school supported by state funds. The acronym stands for Committee for Community Educational Development. It is the first of three schools approved by the Massachusetts legislature. The school opened in September, 1969, ungraded, K-5, and located in Hecht House, Dorchester, Mass. Its 150 students, half white and half black, are drawn from Boston and 23 surrounding communities.

SCHOOL PROFILE

THE CCED SCHOOL – COMMITTEE FOR COMMUNITY EDUCATIONAL DEVELOPMENT.
Hecht House
150 American Legion Highway
Dorchester, Massachusetts 02122
(617) 265-7279

"Students, teachers, parents, and community in cooperative union educate the child and each other." This principle guides the state's first experimental school, now operating in Hecht House, across from Franklin Park in Boston. Various groupings of the 150 elementary children emphasize the importance placed on human relationships. One arrangement divides the children into 15 family groups, each including children of all ages. Family groups meet for a discussion, lunch, and a period at the end of the day. Here children learn responsibility to each other and explore alternatives in solving problems of relationships. Another arrangement places the children into one of three units by age: 5-6, 7-8, and 9-10. Each unit has 5 teachers and 5 work areas for English, social studies, science, math, and creative arts – modified Leicestershire. The curriculum stresses development of basic educational skills (reading, numbers, expression) as well as concepts like "one can effect positive changes in his environment" and "we should perceive differences in fellow humans as a potential source of enrichment rather than as a threat." In science, math, and reading a number of nationally-developed curricula are being tried out. One CCED-developed program links oral and written expression with dance and physical education. Throughout, special attention is being given to the child's adjustment from a traditional, authoritarian school setting to an open school. Two hundred in attendance at a monthly parent meeting is not unusual. Five committees reflect their concerns: legislation, transfer of power (from the planning board to a parent board), communications, volunteers, and curriculum. Two years of planning by the Committee for Community Educational Development resulted in legislation permitting three experimental schools to be funded by and responsible to the state rather than to a local school committee. (Decisions about the other two have yet to be made.) State fiscal and civil service regulations have complicated the early days of the school and aspects of arranging transportation, obtaining supplies, and hiring staff. However, after moving from Roxbury to the Science Museum to Hecht House, the school is pulling together and already planning its expansion budget for next year, when 350 students are scheduled to be added.

Some businesses are establishing experimental schools. *The Thirteenth Year* is a private school begun in September, 1969, by two Boston psychologists and counselors in business together for twenty years in a firm called Guidance Associates. The Thirteenth Year provides individual help and vocational orientation and counseling for high school graduates who are uncertain about college or career. The school is in an urban setting and has a two semester day program with classrooms, but it does not resemble

a formal school experience either in curriculum or in teaching methods. Emphasis is on personal growth and development through independent study, group dynamics, and intensive personal counseling. The Thirteenth Year is the first of several human resources and educational counseling programs planned by its founders, now associated in a new enterprise called The University Center, Inc.

Additionally, in the United States and Canada a "free school" movement is growing rapidly. Names and locations are constantly changing as over half have a life span of less than three years. The majority are elementary and are on the east and west coasts. Most "free schools" involve 20-40 children and 2-5 adults who live and work in the school community. Other adults volunteer part-time teaching. Salaries are minimal or non-existent. Tuition is low and in several schools not charged; parent donations maintain most schools.

Settings are child-centered and highly experimental. "Free schools" try to develop an atmosphere where children can be themselves, free from what their teachers consider the coercive, fearful, and manipulative aspects of public school environment. There are few rules, punishments or pressures; children choose which classes they will attend. Most schools have no exams, homework, report cards or grades. Typically, policy and problems are settled by community vote.

Examples of free schools are the *Warehouse Coop School* in Watertown, Massachusetts, a school run by a cooperative of families of varied income and ethnic backgrounds; the *Early Learning Center* in Stamford, Connecticut, an elementary school blending Montessori, Summerhill and Leicestershire traditions; the *Cambridge Free School*, a tuition-free nursery school where the children define what's going on; the *Boston School for Human Resources*, a school that offers self-governing communal living and a curriculum focused on personal growth to high school graduates not yet ready for career or college; and the *Little School of Seattle*, an elementary school.

SOURCES OF INFORMATION:

The New Schools Exchange This is the only clearinghouse for information about "free" experimental schools: free schools, free universities, community schools, commune schools. The Exchange publishes a monthly forum and newsletter, individuals can send in comments or advertise for a school or position. Subscriptions to the newsletter are $10/year. Recently the Exchange began "A Continuing Directory of New, Innovative Schools and Educational Reform Groups." This should be the most complete listing available. Write 2840 Hidden Valley Lane, Santa Barbara, California 93103.

This Magazine is About Schools This Magazine is a radical magazine about schools published by a group of friends involved in the free school movement as teachers, social workers, and child care workers. Back issues are a good way to gain perspective. Subscriptions are $3.50/year. Write P.O. Box 876, Terminal "A," Toronto 116, Canada.

American Montessori Society (AMS) People looking for teaching jobs outside the public school system might be happy in the Montessori schools. There are about 600 known Montessori schools or classes in America, and there are Montessori schools in Mexico, Canada, and Europe. The AMS maintains a list of these schools and approves training programs that certify qualified Montessori teachers; it is possible to get a master's degree with a specialization in Montessori methods and philosophy. For information, write AMS, 175 Fifth Avenue, New York, N.Y. 10010.

Research Centers

Educational research is difficult to keep up with. Some research is done in industrial settings. For example, Westinghouse Learning Corporation has a Measurement Research Center in Iowa City and a Behavior Systems Division and Education Advancement Center in Albuquerque. Research opportunities present themselves in the day-to-day work of research and development firms and management consulting organizations. But most educational research opportunities are found in the "non-profit" context of university-related research institutes, centers, foundations, laboratories, bureaus, curriculum projects, and experimental stations. The federal government supports networks of research and development centers, regional educational laboratories, and ERIC Clearinghouses.

Most of these centers are closely connected with a college or university. There is the School Planning Laboratory at Stanford University, the Urban Child Center at the University of Chicago, the Center for the Study of Educational Innovation at the University of Massachusetts, the Earth Science Curriculum Project at the University of Colorado, the Committee on School Mathematics at the University of Illinois, the Learning Institute of North Carolina at the University of North Carolina, the Institute of Administrative Research at Teacher's College, Columbia University, the Harvard University Computer-Aided Instruction Laboratory at the Harvard Graduate School of Education, the Georgia Center for Continuing Education at the University of Georgia, and hundreds of others, large and small.

Staff size at these centers ranges from a total of two at the Creativity and National Schools Project at Macalester College in St. Paul, Minnesota; to twenty-nine at the Communication Sciences Research Center at Howard University in Washington, D.C.; to seventy-three at the Center for Urban Education in New York, a regional educational laboratory affiliated with the New York State Department of Education and with seven other educational institutions in New York City. Approximately one center in ten has a staff larger than thirty.

A greatly expanded section about university research centers might be useful. They are exciting places where faculty have the resources and personnel to create significant new roles. An important point to state in this book, however, is that although outsiders generally assume that jobs in university research centers are plentiful and easy to get, this is *not* true. Staff positions usually go to graduate students and to lower ranking faculty. Only persons with specialized knowledge or an appropriate combination of skills can easily find a place. Access is generally through departmental offices and chairmen rather than through most university placement offices.

SOURCES OF INFORMATION:

Research Centers Directory Outside of personal knowledge and a close reading of newspapers, newsletters, college catalogs and educational journals, this is the best source of information concerning research centers. The directory gives the names, addresses, institutional affiliations, principal fields of research, and size of professional and supporting staff for research centers in every field,

listing approximately 300 centers under "Education." New centers and centers in the process of formation are reported in *New Research Centers*, a periodic supplement issued 3-4 times a year. The *Research Centers Directory* is available in the reference section of most libraries. Or write Gale Research Corporation, Detroit, Michigan 48226.

Cooperative Research Projects. This is an announcement of research projects initiated by the Office of Education. It includes the names of project directors, sponsoring institutions, and the probable duration of studies in progress. Check the library or write the U.S. Government Printing Office, Washington, D.C. 20402. 45¢.

Foundations

The foundation field as a whole is a very limited one from the standpoint of employment opportunities. Although one sees references to 15,000 to 20,000 foundations, many concerned with some aspect of education, probably less than one percent have even one full time professional staff member. However, some of the larger, more active foundations – the Ford Foundation, the Carnegie Corporation, the Danforth Foundation – do have a professional staff who are the "eyes" of the foundation in seeking and evaluating new ventures and handling the actual operations of the organization.

Foundation jobs are rarely first jobs; being a program officer in the Ford Foundation is something to plan for 5, 10, or 15 years into a career. Staff members are usually solicited personally. Working in a foundation-sponsored project is one way to become known; another is working in an office that obtains or coordinates foundation grants.

Despite the limited number of positions, foundations are important to watch because they control the flow of money to other educational organizations. They are a source of information about interesting projects and a source of funds for people who want to pursue their own ideas. One can learn of grants in areas of interest by scanning appropriate newspapers and journals and by subscribing to foundation newsletters like the *Carnegie Quarterly*. Agencies receiving grants will often have new positions; persons interested in the project can then apply directly to the organization receiving the grant.

SOURCES OF INFORMATION:

Foundation Directory. This is a source of information nationally and locally. It gives name, address, donors, purpose and activities, and financial data regarding 6,803 organizations that fit the definition of foundation. Listings are by state, with indexes by field of interest, persons active, and foundation name. The directory is available in the reference section of most libraries; otherwise, write the Russell Sage Foundation, New York, N.Y. 10017, or The Foundation Center (see next entry).

Foundation News. A bi-monthly newsletter published by The Foundation Center, including articles reflecting current trends in foundation perspectives and action. Also lists grants by subject areas and changes in foundation personnel. Subscription is $6.00 annually. Write The Foundation Center, 444 Madison Avenue, New York, New York 10022.

Attorney General's Office. Authorized non-profit organizations must register with the Attorney General in each state. This office is a source of information concerning small local foundations.

Annual Register of Grant Support. Persons looking for funds might scrutinize this guide to the grant support programs of governmental agencies, foundations, busi-

nesses, and professional organizations Grants are listed by subject and indexed by organization and geography. Check the library, or write Academic Media, Inc., Los Angeles, California 90053.

Annual Reports and Quarterly Newsletters. Persons interested in a particular foundation can write for an annual report, subscribe to the quarterly newsletter, or ask to be placed on the mailing list.

Associations

Educational associations tend to be of two types: those which are national in scope and draw a large, widely representative professional membership; and those which are smaller, more specifically concerned with particular educational interests or approaches.

PROFESSIONAL ASSOCIATIONS

Professional associations work to enhance the interests of their members; a salaried staff generally coordinates research, publications, public relations, lobbying, conferences and committees, and field services to members. Such positions offer an opportunity to gain visibility and overall perspective in a field. The Association for Supervision and Curriculum Development (ASCD), for example, employs several young professionals, generally as associate or executive secretaries. A person taking one of these positions can expect to travel widely in American education and gain a great deal of visibility. He will typically be working with a half dozen commissions and councils. His duties will often include planning and making arrangements for conferences. Tenure is kept brief; associate secretaries are employed for a three year term, possibly renewable for one additional year.

The National Education Association (NEA) is the major membership organization of the teaching profession; it has a professional staff of 200 in Washington, D.C., and looks for experienced specialists in teaching, administration, research, and communications. One significant new role is that of a field person who is primarily engaged in collective bargaining advisement. Another role, more expected than actual, is that of a field person helping local associations exert leadership in curriculum change. The NEA has 11 regional offices and 50 state education association affiliates whose professional staff ranges from 1 or 2 to 50-60, depending on the size and scope of the organization's activities.

National associations generally hire people who are already recognized experts in a given field, particularly people who have been active as lay members or elected officers of the association and already know the leadership ropes.

For higher level positions, one generally enters as an expert and works his way up. There are junior level entry positions as editors and research assistants, but it is difficult

to move up from these slots. This tends to make association work a mid-career or end-career stop, with exceptions for people who are unusually forceful or skilled or have an interesting perspective to add to the staff. One disadvantage is that most positions are open only in Washington, D.C. National associations often hire the staff or elected officers of state affiliates; state and regional organizations follow the same process.

EDUCATION-RELATED ASSOCIATIONS

Most of the work of associations like the National Congress of Parents and Teachers, the Council for Basic Education or the Association for Childhood Education International is done by volunteers. But each organization maintains at least a small professional staff at national headquarters, and some associations have regional, state, and even local staff members. Staff roles are those of coordinator and advocate; they sometimes include research, teacher training, curriculum development and evaluation, and services to schools and teachers.

Subject matter associations, for example, are often interested in developing and evaluating curriculum and in training teachers as a means of achieving their goals. Such program staffs are small; however, people with specialized subject knowledge and teaching experience are needed. These associations offer a framework in which to help create new educational roles.

For instance, the Foreign Policy Association, School Services Division, has conducted a major study of courses in world affairs for the Office of Education. It has encouraged the use of simulation games in teaching international relations, and has begun a series of pamphlets for teachers demonstrating classroom implications of recent research in the social sciences. The Joint Council for Economic Education helps train teachers through its affiliated councils and centers; in 1968, there were 55 summer workshops in 28 states enrolling 2,355 teachers and administrators. The Joint Council has also sponsored an experimental curriculum project called DEEP (Developmental Economics Education Program). Thirty school systems have been involved in DEEP over a five-year period; the experience of DEEP schools is reported in *A Handbook for Curriculum Change*, which blueprints a step-by-step approach for introducing economics into the curriculum K-12.

Special interest associations have educational projects. The Massachusetts Audubon Society provides and trains roving teachers of environmental education for over 500 public school classes on a biweekly basis. The Conference on World Affairs, in cooperation with the New York State Education Department, is sponsoring an Educational Materials Project (EMPathy) dealing with non-western cultures. The National Humanities Faculty brings outstanding practitioners and scholars in the arts and letters into a working relationship with selected school systems; at the moment, the NHF has humanities projects in 15 school systems across the United States. The American Historical Association maintains a Service Center for Teachers of History which aids secondary teachers through publications and conferences.

SOURCES OF INFORMATION:

Encyclopedia of Associations This is a three-volume directory of national organizations in the United States. There are 128 pages of "Educational and Cultural Organizations" – some but not all of them sources of paid positions – listed in Volume I; Volume II contains a geographic and executive index; Volume III lists new associations. The directory is usually available in library reference sections; it is published by the Gale Research Corporation, Detroit, Michigan 48226.

Professional Journals. Activities and personalities of professional associations are revealed in their journals: eg. *Today's Education* (National Education Association), and *Changing Education* (American Federation of Teachers). Education libraries usually subscribe to a multitude of state and national journals, many of which provide helpful information.

Contact Washington, An Educator's Directory. This is a directory of major national organizations and associations concerned with education that maintain a headquarters in Washington, D.C. The Appendix contains a brief bibliography of other sources of information. Single copies are available free from Washington Internships in Education, 2000 L Street, N.W., Washington, D.C. 20036.

Profiles of Non-Profit Educational Organizations

These organizations illustrate the variety and quality of non-profit educational organizations. NESDEC and the METRO EDUCATIONAL SERVICES CENTER are service arms of school administrators' organizations. THE TEACHERS INCORPORATED and the BOSTON AREA TEACHING PROJECT are teacher's cooperatives, focused on constructive educational change. ASSOCIATES FOR HUMAN RESOURCES is a consulting association of behavioral scientists. I/D/E/A and EDUCATIONAL FACILITIES LABORATORIES are foundations with operating programs. EDUCATIONAL TESTING SERVICE is a non-profit corporation formed to continue services begun by three other educational associations. The BOARD FOR FUNDAMENTAL EDUCATION and MANPOWER ASSISTANCE PROJECT are federally-assisted non-profit corporations helping other groups with manpower programs. PORTOLA INSTITUTE is a private organization concerned with its own innovative projects.

ORGANIZATION PROFILE

ASSOCIATES FOR HUMAN RESOURCES – AHR
387 Sudbury Road
Concord, Massachusetts 01742
(617) 369-7810

A non profit educational consulting organization that uses its experience in the behavioral sciences and related fields to help individuals, organizations, and community groups. AHR has a special Educational Development team which works with all types of educational institutions. In schools, AHR has helped in the development of team teaching; in faculty-student-administration relationships; in making classrooms more democratic; in preparing a course in sex education and human values; in parental involvement; in defining the role of the school in the community; and in a program for preventing the suspension or expulsion of troublesome students.

ORGANIZATION PROFILE

BOARD FOR FUNDAMENTAL EDUCATION – BFE
Suite 512, LaSalle Building
1028 Connecticut Ave. N.W.
Washington, D.C. 20036
(202) 223-0935

A private non-profit corporation, chartered by the United States Congress, that provides remedial education for under-educated adults in industry. BFE hires instructors and counselors for positions in most areas of the United States, starting at different intervals throughout the year.

ORGANIZATION PROFILE

BOSTON AREA TEACHING PROJECT – BATP

94 Prescott Street
Cambridge, Massachusetts 02138
(617) 868-7600 x2958

Six teachers, four from the Boston schools and two from suburban areas, have formed a collaborative effort to develop teaching methods and a curriculum with social value. The group grew out of a series of Thursday night discussion groups for teachers and a textbook writing project on Vietnam in the summer of 1967. This resulted in a 4-volume paperbound *Vietnam Curriculum* published by the *New York Review of Books* and currently selling for $10.

In the summer of 1968 the group obtained funds from the Coalition for Youth Action of the United States Department of Labor and worked with a junior staff of 20 black and white high school students to develop a curriculum in social identity. The students themselves produced materials from original interviews, tapes, writings, photographs, and films, centering on three concepts: success, progress, and America as a melting pot. The whole group explored life in schools from the students' point of view: the classroom process, success in school, school as a microcosm of society.

During the 1968-1969 school year the BATP teachers continued to meet with the students, once each month, and also met with teachers who had similar concerns in informal workshop situations. They prepared a 20-minute slide-tape of the last week of the social identity summer, which they show to others as their time permits.

Members of the group have arranged their commitment to classroom teaching and educational reform in a variety of ways. Some teach full-time, others teach only part-time. Two have a partnership teaching arrangement.

ORGANIZATION PROFILE

EDUCATIONAL FACILITIES LABORATORIES, INC. – EFL
477 Madison Avenue
New York, N.Y. 10022
(212) 751-6214

EFL is an operating foundation that helps schools and colleges with their physical problems. It is the only foundation devoted solely to the improvement of education's environment, its goal being to speed the application of known technology to education. To help spread its idea, EFL publishes free, attractive publications.

"EFL's personnel requirements are peculiar. Because our charter confines our program to the 'solids' of education – its buildings, equipment, and general environment – we need people who care about environment and hopefully have had training and experience in such disciplines as architecture, engineering, planning, urbanology, or whatever brings to education the insights which have meaning for educational facilities. But, above all, our personnel must be literate and have more than passing acquaintance with 'the noble English sentence.' After all, if we know something but can't communicate it, we might as well not know it." EFL has a staff of approximately 17, about 5 are writers and researchers.

ORGANIZATION PROFILE

EDUCATIONAL PRODUCTS INFORMATION EXCHANGE (EPIE) INSTITUTE
527 Lexington Avenue
New York, N.Y. 10017
(212) 758-2358

The EPIE Institute is a non-profit cooperative conducting impartial studies of educational products. Its purpose is to provide its members – educational institutions and associations – with information on the availability, use, and effectiveness of educational products. The EPIE Institute collects and provides reports, publishes a monthly magazine, *Educational Product Report*, and plans to offer more specialized information services.

ORGANIZATION PROFILE

EDUCATIONAL TESTING SERVICE – ETS
Princeton, New Jersey 08540
(609) 921-9000

ETS is a non-profit educational organization working primarily through measurement and research. It was founded in 1947 by the American Council on Education, the Carnegie Foundation for the Advancement of Teaching and the College Entrance Examination Board, to conduct testing activities that had outgrown their parent organizations. Basically ETS conducts testing programs – among them the College Entrance Examination Board tests, the Graduate Record Examinations, and the National Teachers Examination – publishes and scores tests, and provides testing and administrative services to help institutions administer scholarship programs. ETS also conducts basic research in measurement theory and methods – more than 150 studies are underway in any one year – and participates in special research projects with other educational groups or foundations. ETS also sponsors seminars, workshops, conferences, fellowships, summer internships, and has a post-doctoral training program.

ETS has more than 1200 permanent employees, most of them in Princeton, New Jersey. There are 100 persons in regional offices; the Western Office in Berkeley, California, the Midwestern Office in Evanston, Illinois; the Southeastern Office in Durham, North Carolina; and smaller offices in Austin, Texas; Los Angeles, California; and Washington, D.C. Temporary workers are hired when test applications and scorings are at their peak. One out of 5 permanent employees holds a master's or doctor's degree. Members of the professional staff have had experience in the fields of teaching, guidance, educational administration, psychology, statistics, psychometrics, and test development. In the test development division, there are specialists in various subject fields such as the sciences, mathematics, languages, social studies and the humanities. They are frequently former secondary school teachers.

ORGANIZATION PROFILE

INDEPENDENT EDUCATIONAL SERVICES – IES
80 Nassau Street
Princeton, New Jersey 08540
(609) 921-6195

IES is a non-profit consulting organization that provides reading, testing, and teacher placement services for independent schools across the nation. IES runs a summer reading institute that trains teachers in developmental reading and conducts in-service training programs in reading instruction. IES was formed in 1968 from MacBrien Educational Consultants, a profit-making consulting firm.

At the same time, IES took over the files of the Cooperative Bureau for Teachers, a non-profit placement clearinghouse.

IES has a professional staff of approximately 25, working as placement counselors, instructors, reading specialists, and directors of various services. IES employs liberal arts graduates with successful teaching experience. They seek innovative, creative teachers with understanding and appreciation for independent school education. Programs are offered for staff members to pursue professional graduate training in their areas of specialty.

ORGANIZATION PROFILE

INSTITUTE FOR THE DEVELOPMENT OF EDUCATIONAL ACTIVITIES – I/D/E/A
Suite 300, 5335 Far Hills Avenue
Dayton, Ohio 45429
(513) 434-7300

I/D/E/A was born out of the 1965 Kettering Foundation review of grants made and change accomplished, which revealed that isolated grants made little impact on public education. I/D/E/A was conceived as an operating foundation working between the university and the public school system to find ways to actually achieve constructive change.

I/D/E/A's major research interest is how educational change comes about. A poll taken by the Institute shows that nearly everyone agrees that things should be changed. But very little change occurs. I/D/E/A is identifying the forces that work against constructive change and attempting to counteract them by providing a supportive environment for people who want to innovate. I/D/E/A arranges meetings and sponsors summer institutes, releases publications on crisis issues, and provides consulting services to schools, some through a corps of outside consultants organized on a fee-plus-expenses basis. Educators have shown so much interest that I/D/E/A activities are already beginning to exceed resources.

Nearly 85 people are connected with I/D/E/A officially; 35 are professional educators, nearly all with doctorate degrees. Others are research assistants and secretaries. Most of the staff is drawn from universities or from public school systems. Staff members from public schools are "pacesetters," experienced teachers and administrators. I/D/E/A is a good place to end up in mid-career. There are, however, a few places for relatively inexperienced people with fresh and realistic perspectives. I/D/E/A has 3 divisions: Research and Development (Suite 950, 1100 Glendon Ave., Los Angeles, Cal. 90024); Innovative Programs (Dayton office), Informational Services (P.O. Box 446, Melbourne, Fla. 32901).

ORGANIZATION PROFILE

INTERNATIONAL SCHOOLS SERVICES – ISS
392 Fifth Avenue
New York, N.Y. 10018
(212) 695-8520

ISS is an organization serving some 200 civilian overseas American schools. ISS advises schools on curriculum and administrative matters and locates, screens and nominates professional personnel for the overseas schools at their request. Its staff people visit most overseas schools periodically and help to plan conferences and workshops all over the world.

ISS has a staff of 7 with fairly high level backgrounds in school administration and experience in overseas teaching; all have master's or doctorate degrees.

ORGANIZATION PROFILE

INTERUNIVERSITY COMMUNICATIONS COUNCIL, INC. – EDUCOM
100 Charles River Plaza
Boston, Mass. 02114
(617) 227-1805

EDUCOM, a non-profit consortium of institutions of higher education, acts as a forum and an operational arm for over 100 American colleges and universities. It addresses itself to technical and social problems of interest to member universities that are national rather than local or individual in scope. Representative projects are the creation of 20,000 volume core microfiche libraries for community colleges through computerized management information systems; interactive television; national information networks involving many universities; experiments in practice-oriented information systems; and the creation of community learning centers for dense urban and diffused rural communities.

EDUCOM has a professional staff of 20, is flexibly organized and expanding rapidly. "We are interested in people who are highly original, creative, positive, and tough. Their skills, backgrounds, and formal education now range and will range from less than high school graduate to the post-doctoral level."

ORGANIZATION PROFILE

MANPOWER ASSISTANCE PROJECT – MAP
1025 Connecticut Avenue, N.W.
Washington, D.C 20036
(202) 296-1312

11412 Washington Plaza West
Reston, Va. 22070
(703) 471-4517

MAP is a private non-profit corporation founded in 1968 and financed by the Department of Labor and the Ford Foundation. Under the guidance of these agencies, MAP offers assistance to governmental, community, labor, or business groups operating manpower projects. MAP trains local staffs to operate the programs and trains a limited number of Manpower Interns, both formally and on-the-job. MAP Manpower Specialists also help agencies plan projects, prepare proposals, negotiate subcontracts, hire staff, acquire and renovate facilities, buy and lease equipment, and initiate accounting and information systems.

ORGANIZATION PROFILE

METRO EDUCATIONAL SERVICES CENTER – CAPITAL REGION EDUCATION COUNCIL
200 Bloomfield Avenue, University Hall
West Hartford, Conn. 06117
(203) 243-0395

Education often needs a missing "someone" who can examine what's going on, suggest new ideas, and help make them realities. METRO provides this service for approximately 30 public, private, and parochial schools in the greater Hartford metropolitan area.

The METRO Educational Services Center disseminates information, plans projects, and operates programs that promote educational planning and implementation on a regional basis. Major areas of current interest are program and curriculum planning, in-service training, and effective use of television and media.

Sample projects include a monthly newsletter; a telephone-recorded news events bulletin; a lecture service and materials bank on Negro history and culture; an Area Resource Center where educators can duplicate, produce, and evaluate a host of multi-media materials; television utilization workshops, in-service institutes, seminars, workshops and courses; a program to encourage visits to successful programs in Hartford area schools; "Project Outdoors" where teachers use a nature center and the out-of-

doors to present natural science concepts; "Operation Software" where the program of a new private planetarium is being planned to supplement the curricular offerings of local school systems; and so on.

Initially a Title III project established under the Elementary and Secondary Education Act of 1965, METRO became in 1968 a program of the Capital Region Education Council (CREC), a voluntary organization of Boards of Education of the greater Hartford region. The union of METRO and CREC provided METRO with a policy-making board composed of representatives of member school systems while simultaneously CREC received a working program with staff and resources. The community gained a cooperative education agency that is politically responsive, decentralized, and familiar with the needs of the region.

METRO Educational Services Center is located on the campus of the University of Hartford. It has a professional staff of 8, working as project directors ($14,000-$18,000), specialists ($10,000-$13,000), and technicians ($7,500-$9,900). The staff is chosen according to the following characteristics: master's degree, experience in education, excellent manner with the public, energy, creativity.

ORGANIZATION PROFILE

NEW ENGLAND SCHOOL DEVELOPMENT COUNCIL – NESDEC
55 Wheeler St.
Newton, Mass. 02109
(617) 969-1150

NESDEC is a study council with nearly 300 member school systems. Membership has just been extended to non-public schools, institutions of higher learning, and other non-profit educational organizations in an effort toward closer cooperation. Most of NESDEC's work is done through committees and commissions made up of administrators from member school systems.

One past project was NEEDS: New England Educational Data Systems. NEEDS was developed to provide computer services to New England schools, public and private. Its chief uses were for grades, attendance records, and scheduling. NEEDS has been purchased by Westinghouse Learning Corporation, to be used as a model for developing similar services throughout the country.

NESDEC has a permanent staff of 3 and occasionally hires graduate students and professionals with specific talents on an *ad hoc* basis for field studies or other council projects.

ORGANIZATION PROFILE

PORTOLA INSTITUTE, INC.
1115 Merrill Street
Menlo Park, Calif. 94025
(415) 323-5155

Portola Institute is a private organization established in 1966 as a non-profit corporation to encourage, organize and conduct innovative projects. The Institute's projects are funded by private foundations and public agencies to whom specific project proposals are submitted.

It has conducted inquiry training workshops for teachers, worked on educational simulation games, published *The Whole Earth Catalog* of resources for self-learners, and opened the Whole Earth Truck Store in Menlo Park, California. Programs are conducted cooperatively with schools and colleges as well as other established institutions, primarily in the San Francisco Bay Area.

The staff numbers 8, all of whom are independent contractors who work on a project basis or obtain their own funding. New project groups are encouraged to become legally separate so that the organization can stay small and responsive to constant change. Because there is no need to guarantee "success" the staff experiments with unusual projects that would be difficult to administer in a more structured organization.

ORGANIZATION PROFILE

THE TEACHERS INCORPORATED
35 Market Street
New York, N.Y. 10002
(212) 267-5470 x5471

The Teachers Inc. is a private, non-profit corporation recruiting, training and supporting teachers in community-based educational experiment and political action. The corporation places teachers in selected public schools and helps principals and community leaders in their efforts to provide quality education for inner-city and suburban children. One representative project is in the Two Bridges Model School District in New York City, where 50 teachers and para-professionals in five schools are supporting the community control movement, developing teaching styles, skills, and curriculum together, working with parents and kids out of a storefront office, and collectively determining project policy.

The Teachers Inc. was started by 3 former Peace Corps Teacher-Trainers and the President of the Old Westbury College of the State University of New York. It was founded with the belief that fundamental structural and philosophical changes are needed in the public education system; it operates on funds from several foundations.

The corporation began work in September, 1968. In September, 1969, there were 90 active teachers (paid at regular public school salaries) and a corporation staff of 3 teacher trainers ($10,000) and 4 administrators ($7,000-$13,000). Projects were in Harlem, New York City; Chapel Hill, North Carolina; and Washington, D.C.

The corporation recruits teachers with strong social activist and/or teaching backgrounds, those eligible are experienced teachers, graduates of M.A.T. programs, and college graduates with extensive experience teaching children or working in programs of direct action for social change (e.g. experimental schools, Teacher Corps, VISTA, SNCC, Peace Corps). Applicants are expected to make at least a two-year commitment to the project. The Teachers Inc. offers new teachers the chance to learn to teach outside the traditional teacher training institutions, and experienced teachers an opportunity to demonstrate, implement, and spread ideas they have had for a long time. Experienced teachers are hired as leaders during summer training and as year-round teacher trainers.

"On a year-round basis, The Teachers Inc. offers teachers an activist role while preserving the high priority placed on work in the classroom. It unites teachers who would otherwise remain isolated in their school systems, encouraging them to exert collective pressure for change in public schools."

SOURCES OF INFORMATION:

A Directory of Individuals, Programs and Agencies Engaged in the Study of Change. This directory was compiled in 1967 by the National Institute for the Study of Educational Change, 825 East 8th St., Bloomington, Ind. 47401. This book is available in most school of education libraries.

Education Directory This is a standard reference work prepared annually in the Office of Information of the Office of Education, in four parts 1) State Governments, 2) Public School Systems, 3) Higher Education, and 4) Education Associations. Check the library, or write the U.S. Government Printing Office, Washington, D.C. 20402.

Guide to American Educational Directories. This is a directory of directories with many possible uses. It cites educational publications of federal, state, and municipal governments, directories of American and foreign teachers' associations; directories of educational publishers and education-related associations, and so on. It is available in the reference section of most education libraries, the publisher is the McGraw-Hill Book Company, 330 West 42nd St., New York, N.Y. 10036.

Community Organizations

Community Organizations

Education work in an urban community can mean various things, depending upon one's definition of community. For the most part it means the ghetto or inner city area where grassroots organizations spring up to meet locally felt needs. Community action and similar federally-funded programs serve throughout the city, with variations from section to section. Social service agencies such as those assisted by the United Fund serve city-wide. Local educational institutions such as museums and centers of adult education draw from a very broad audience in the greater metropolitan area.

Although community programs are sources of a limited number of paid positions, they do have a much greater number of volunteer positions that can provide valuable expertise. Frequently the experience gained may lead to a paid position. Anyone from outside the community should be aware of the need to proceed with caution and humility until he has proved his merits. It takes time to understand the people, programs, organizations, goals, and social history which make up a community and to define one's place within it. Those entering community work should also understand that some job descriptions give preferences to members of the immediate community; further, local politics also affect staff selection.

While the community material focuses on one city, Boston, the range of organizations is typical of almost any city. The first section outlines the feelings of some community people about community workers, especially in relation to the universities; the second discusses representative examples of grassroots organizations, community action-federally funded programs, general social service and educational organizations, adult education centers, and museums.

COMMUNITIES AND UNIVERSITIES

Conversations with urban community educators in Boston make one point very clear. typical school of education graduates will find few jobs. With some justification community people feel that schools of education and universities in general are not giving their students even remotely appropriate preparation for working in urban areas. Such preparation must go beyond survival training for an urban classroom. It involves sensitivity to the strengths and constraints of a different life style. It means expressing humility before a different set of excellences. It means realizing that work in the "community" includes sacrifice and unselfishness for the group. Few colleges, if any, now have a way to convey these insights. Few programs bring community expertise into the university or the university into the community. Success in the community is measured by the degree of understanding which precedes any kind of giving. The average graduate of an education program is left empty-handed unless he comes from an urban community himself.

A second reason for community distrust is that university impositions on community agencies often outweigh their real services. Without briefing, some students walk into an agency looking for free thesis and term paper material. At the same time their professors are charging consulting fees to the very agencies which are supposed to help their students for nothing. The great irony is that most professionals require community orientation of some magnitude before they can function as consultants. For example, a group of neighborhood workers who wanted college courses in such areas as urban law asked a college to provide them. The group raised the $6,000 the college requested for this service only to have some of the professors ask *them* to supply the curriculum outline! It is little wonder that many agencies are becoming wary, even resentful, of this situation.

This distrust has substantial implications for university policy. A step forward would be for universities to indicate their awareness of the urgent demands for community talent by setting up an in-house office to coordinate field activities. This office would be responsible for seeing that any university person going into the community – for field work, student teaching, a job, or consulting – received appropriate briefing. It might require working out a businesslike arrangement with a community group for such a service. In a large university it might take one person just for the education-related jobs; and a new role would be created. Industry has moved in this direction faster than most universities.

Universities must also realize that education in the community has a broader definition than academic activities alone. An acceptance of what is meant by "training" is absolutely essential to the newcomer. Training means imparting specific skills for specific tasks. Much, if not most, education in the community is of this sort. It is closer to guidance and vocational education than to conventional curriculum majors. Few university liberal arts graduates possess – or appreciate – specific vocational skills. Part of understanding the community is realizing the need for such skills.

Is there, then, anything a student can do to prepare for work in local communities if he is the "victim" of a middle-class education? He can seek experiences which will increase his expertise. A black faculty member at one graduate school of education offered a weekly afternoon walking tour and lecture of areas of Boston – at no credit. This is a valuable way to learn about the city. Students can also cultivate skills needed in the community: good typing ability; ability to teach reading and adult basic education; facility with Spanish and English as a second language; knowledge of small business management and accounting. This may seem a long way from Chaucer and calculus, but such skills are badly needed. A year or two of devoted practical work may establish some sincerity – tutoring, VISTA, Teacher Corps, volunteer work in the central office or field centers of poverty program agencies. At the very least, students should insist on the college providing a thorough briefing before descending on community agencies to explore or fulfill assignments.

Community Program Profiles

Specific community programs vary from those which evolve gradually from the community itself to those which federal and state governments propose to communities as a framework for action.

GRASSROOTS ORGANIZATIONS

Grassroots organizations reflect the perceived needs of local communities. Most educational organizations center around supplementing the work of the public schools or providing alternative educational opportunities. Tutoring programs, scholarship programs, bussing programs, storefront learning centers, vocational training centers, community-run nursery schools or elementary schools, curriculum development centers, educational resource centers – these are typical components of grassroots programs.

COMMUNITY PROFILE

EXODUS
378 Blue Hill Avenue
Roxbury, Mass. 02119
(617) 445-1600

Created in 1965 to permit an alternative to public schooling in Roxbury, Massachusetts, Exodus has bussed over 1,000 children to empty seats elsewhere in the Boston schools and acted as an early rallying point for the educational reform efforts of the black community. Until September, 1969, Exodus operated purely on donations of interested people and organizations, and was generally in a state of perpetual fiscal crisis. Now the state reimburses transportation costs, enabling Exodus to expand its other educational services.

A permanent staff of 8 administers its programs: tutoring, counseling, parent education, teacher education, research, cultural enrichment, vocational education, and a library. The research department has published two books on the bussing experiences of Exodus students and their families.

Plans for an institute for teachers just starting in college are underway. The Roxbury Community School Board is made up of parents who visit in the homes of other parents, explaining the crisis in the schools and seeking their active involvement in solving it. Twenty-five to thirty volunteers assist in the office; on any day you may find parents typing or running off materials.

These activities demonstrate the purpose of Exodus: to promote quality education. Staff and parents are aware that bussing reaches only a small number of children and that significant efforts must be made to improve education for those who remain. Improved curricula and elementary guidance counselors in the public schools are among pressing priorities. Their definition of education is broad: they consider often social services they perform, like helping a family burned out of their home, as educational.

Without question the staff of Exodus is drawn from those in the community. They look for those who can relate to people – both young people and adults – and who have the flexibility to jump back and forth between age groups and types of problems.

OPPORTUNITIES INDUSTRIALIZATION CENTERS

OIC started in 1964 when Philadelphia's Reverend Leon Sullivan led a successful black boycott of basic commodities industries, won, and was faced with the dilemma of preparing workers to fill the jobs created. The self-help concept at the core of the OIC

philosophy caught hold, and in the past five years the number of OIC centers has grown to 70 across the United States. These vocational training centers are usually funded through Title I of the Manpower Development and Training Act with contracts negotiated nationally by the Department of Labor Manpower Administration in Washington, D.C. Each center is autonomous; methods and character vary widely. One source of information about local OIC's is the regional offices of the Department of Labor.

COMMUNITY PROFILE

BOSTON OPPORTUNITIES INDUSTRIALIZATION CENTER
186 Dudley St.
Roxbury, Massachusetts 02119
(617) 442-2424

In Boston, OIC is part of the Concentrated Employment Program (CEP) funded by the Department of Labor. OIC funds are channeled directly through ABCD, Boston's Community Action Program, thus OIC operates fiscally as part of the poverty program. Its recent drive for independent funding was only partially successful.

Essentially, OIC puts its 1,200 students a year through a training program which includes a week of basic orientation and 12-15 weeks of training in a variety of occupations (offset printing, drafting, general clerical, business machines, banking, electronics, telephone operators, keypunching). This course is followed by substantial counseling and follow-up help. OIC goes after the person in deep need who is not reached by conventional programs. Some manpower training programs leave the placement function to the recruiting agency, an organization like OIC stands in the middle and does the training. However, OIC has found it best to take substantial responsibility for both recruitment and placement.

On the teaching staff at OIC are 15 teachers of reading, math, minority history, and English as a second language, and 10 full-time vocational teachers. The average teacher has two years of college and some teaching experience in schools or other poverty programs. OIC took two untrained teachers and schooled them on the job. Important characteristics of successful teachers include being "people-oriented," being objective (life histories of students should not interfere), and having the capacity to establish good rapport with the students. Teachers leaving OIC have not gone to the public schools but to similar jobs in industry and manpower training.

OIC also has several counselors and job developers. The concept of job developer, a role present in many manpower programs, is an extension of the regular guidance function and is key to the success of the program. The job developer is OIC's contact with business and industry. He must know jobs available, trends in the job market, equipment being used, current salaries, and a host of similar facts. To be successful, he must be aggressive in creating or locating jobs and in conversing with businessmen. Information he learns goes to the OIC curriculum staff; in turn, the curriculum staff transmits needs to the vocational teachers who then explain academic ramifications to the basic education teachers.

Currently, OIC is also housing an experimental project with a staff of 7, who are on the payroll of the Massachusetts State Department of Education. The staff includes a counselor and six reading instructors, only two of whom have college degrees. Computer-aided instruction is being used in the teaching of literacy. The Harvard University Computer-Aided Instruction Laboratory is writing the computer curriculum; staff from Boston University is preparing the accompanying classroom material. One project is preparing an occupational kit to make basic education more vocationally oriented.

COMMUNITY PROFILE

THE STORE-FRONT LEARNING CENTER
90 West Brookline Street
Boston, Massachusetts 02118
(617) 267-1166

Launched in August, 1968, by a small group of black and white people in Boston's racially-mixed South End, the Store-Front Learning Center is a wide-open educational resource center aimed at what its founders feel is the number one problem in urban education: teacher distrust and parent opposition. The center brings together black and white, adult and child, parent and teacher, in an innovative, cheerful, and unthreatening atmosphere. The center is not attempting to compete with the public schools but to influence them by providing an educational resource center for teachers, future teachers, parents, and neighborhood children all under the same roof, creating a meeting-ground for people who are frequently in opposition.

The center itself is in a three-story warehouse building donated rent-free by the City of Boston. It is stocked with a 7000-book paperback library donated by publishers, and filled with manipulative science and electronic learning games, logic, math, strategy puzzles and films; it is equipped with browsing and meeting areas and study centers: it is open on a drop-in basis from early morning until late at night. It is governed by parent-directors and run by a staff of fourteen: black parents, white teachers, and young black adults, teenagers who have dropped out of school and are working as assistants to the parents and teachers. Tutoring goes on at the center, but people are not there primarily for tutoring. They come to absorb, look at the newest school materials, and get to know each other informally across the lines of race and age. Teachers can borrow materials or bring their classes during the day if they choose.

More important than its apparent emphasis on educational materials is the Store-Front Learning Center's concern with reaching teachers and future teachers. The Center's staff is working to convey a style of informality in teaching and learning that matches the bright-colored walls of its learning warehouse.

COMMUNITY PROFILE

CIRCLE ASSOCIATES
2401 Washington Street
Roxbury, Massachusetts 02119
(617) 427-6522

Circle Associates is a good example of a group which identifies itself and its primary purpose with the community. It operates a consulting firm of black professionals experienced in community organizing and social planning. It also functions as an investment corporation to stimulate black entrepreneurship and amass profits which can be used by the collective community to meet its special needs.

The emphasis is primarily economic: Circle Associates is launching the Roxbury Institute of Business Management, is doing economic development research, and is serving as a business development center to assist local businessmen. But the organization has educational enterprises as well. It operates Hilltop Nursery School. It is setting up a curriculum development center which will focus on the black experience. This curriculum center will include a resource library, a teacher training program, and curriculum development projects, and have a core staff of about four people, plus a number of part-time teacher trainers.

COMMUNITY PROFILE

THE COMMUNITY-UNIVERSITY CENTER
FOR INNER-CITY CHANGE
90 Warren Street
Roxbury, Massachusetts 02119
(617) 427-2005

What began as a joint venture between Boston College and the Urban League in 1967 has become independent of both. The Community-University Center is now creating ties with other universities and a number of community agencies, using its original experiences as guidelines.

Under the Project Leader Development Program, 22 community groups have affiliated with the Center for two years of training and related service. The groups are predominantly from the black community – Roxbury, North Dorchester, and the South End – although one is a white organization concerned with white racism. Seven are strongly educational: the three independent community schools and Exodus, Bridge, Urban League, and the Store-Front Learning Center. (Other groups are using the Center's services without this formal affiliation.)

These agencies are indicating to the Center what kind of training and support they desire. The Center is creating curriculum, courses, and experiences to meet their demands in areas such as leadership, community organization, fund-raising, and research. Each affiliate sends at least one person to weekly training sessions further enriched by active counseling.

Some agencies have asked for aid in defining their educational priorities and long-range goals. Others have needed help in setting up an office, in which case a Center secretary has taught them basic organization. The range of assistance is wide.

Funded by foundation and government grants, the Center has 17 full-time staff positions. About a fourth of the staff is concerned primarily with education, although the director noted that a large proportion of the Center's activity is directly or indirectly educational. There is an associate director in charge of training; she has a training specialist and an assistant. A research director has a university counterpart as well as an administrative assistant.

The Center director cited two qualifications as important for those seeking employment there. "Ability to teach" is vital: can the individual involve people in an educational process, and is he willing to learn as well as teach in a constant give-and-take situation? "Experience in working in the community" is also valued: does he have both the practical know-how and the ideological commitment to community goals such as self-determination?

Their research has two unique features. First, a great deal of time is spent in training others to do research. This has resulted in the creation of a new role: the community research assistant. At present several community workers are receiving research training in education and other fields. It is a full-time job; they are paid $7,600 annual salary by the Center. After their two-year training period they will be hired by community organizations as their community researchers. Some part-time university research assistants are also receiving training.

Second, the community has learned that traditional research has no advantage to them and often comes close to exploitation. Hence Center procedure includes a critical condition: the community organization retains complete control over data of any research it may commission. If it decides the data should not be released to anyone, that decision is honored.

This Community-University Center probably comes closer than any existing agency in Boston to mediating between community and university on mutually acceptable terms. It is educating both groups as part of the process. It is an important example of the new kinds of structures which must be created to lessen the gap between needs and resources.

FOR INFORMATION:

Generally, the best way to find out about local grassroots organizations is to read newspapers, particularly black community newspapers such as Boston's Bay State Banner, to make persistent inquiries, and to become involved in the work of one of the organizations.

Information is available from the Center for Community Planning, Office of the Secretary, Department of Health, Education and Welfare, Washington, D.C. 20201. Locally, information is available from the Assistant Regional Administrator for Model Cities at the regional offices of the Department of Housing and Urban Development, or from the City Demonstration Agency Director of local programs.

FEDERAL GOVERNMENT PROGRAMS

Many federally supported programs based in local communities have education components. Any community might include programs such as VISTA, Upward Bound, New Careers, Manpower Development and Training Act programs, the Job Corps, Teacher Corps, and Head Start. Information about local programs can be obtained from the regional offices of the U.S. Government. Within the Department of Health, Education and Welfare, two useful persons are (1) the Community Services Coordinator in the Office of the Regional Director and (2) the Director of Urban and Community Education Programs in the Regional Office of Education. Information about Head Start programs can be obtained from the Assistant Regional Director for Child Development in the Regional HEW Office. Two specific federal programs, Community Action Programs and Model Cities Programs, are described below.

COMMUNITY ACTION PROGRAMS

Community Action Programs, funded through the Office of Economic Opportunity, are intended to mobilize community resources to help families combat such problems as poor health, inadequate education, unemployment, and dilapidated housing. Federal grants up to 90% of the cost of a program are available for program development, project administration, research and pilot programs, training, and technical assistance. For purposes of funding and without regard to political boundaries, a "community" can be any sufficiently homogeneous urban or rural geographic area – a state, metropolitan area, county, city, town, multi-city unit, or neighborhood. Typical components of Community Action Programs include Upward Bound, Head Start, neighborhood health centers, neighborhood multi-service centers, legal services, foster grandparents, aid to migrant workers, and so on. The federal government intends the poor people in each area to have a major role in planning, policy-making, and operation of all programs.

COMMUNITY PROFILE

ACTION FOR BOSTON COMMUNITY DEVELOPMENT, INC. (ABCD)
150 Tremont Street
Boston, Mass.
742-5600

Action for Boston Community Development is Boston's community action agency. It has a central office, eleven decentralized agencies, a total staff of about 1,200, a budget of about $20 million, and an annual staff turnover rate of 70%.

ABCD has five major program areas, each of which has some education components: (1) Head Start; (2) Manpower programs, which include four orientation centers for remedial education and vocational training, a Neighborhood Youth Corps Skill Center-Laboratory School at Northeastern University, and New Careers; (3) Family and Community Services which house an education division with a staff of two or three, (4) Economic Opportunities Division, which includes Model Cities and at least one central staff member concerned with education; and (5) a Training Division, which creates courses to meet the in-house training needs of the ABCD staff ("How To Do Vocational Counseling," "Fundamentals of Community Organization").

Educational positions exist in the central office and in the field. In the central office are the coordinator for Head Start, education specialists for New Careers, and the staff of the training division. What the training division looks for in its staff holds true for many of the other jobs: flexibility, patience, pragmatism, and an ego strong enough to respond to "How can you teach us anything when you don't know yourself?" Two kinds of people are particularly valuable: those having a specific technical competency such as bookkeeping, and those having genuine human relations skills which enable them to act as facilitators, helping other people to learn from each other.

Education positions also exist on the field staff in the four manpower orientation centers and as education directors in ABCD's decentralized sub-centers. One of these orientation centers, for example, serves about 120 students every cycle, four cycles a year. Seven shop instructors teach specifics such as upholstery and secretarial skills. Each shop has two trainer-coaches (counselors). Since about half the student population is Spanish-speaking, there are four teachers of English as a second language. In addition to the director and assistant director, each center has a curriculum and program coordinator for the language segment. Until recently this position was filled by a former Latin America Peace Corps returnee whose undergraduate major was English and linguistics. An important part of her job was developing a Spanish-English curriculum that was linguistically sound and which incorporated vocational vocabulary and concepts.

Sensitivity to people and experience in the community are two important qualifications for work in the orientation centers. One language teacher was a former housekeeper trained as a teacher. Another was a former factory worker with a South American high school diploma. He came to the center for English, moved into teaching, and is now coordinating the program. Practically no one in the center has a degree in what he is now doing.

Each of ABCD's regular satellite centers has an education specialist, whose activities vary tremendously depending on the needs of the immediate community and the style of the individual director. One specialist in a white, immigrant neighborhood remarked that overt radical social commitment was not a critical qualification because the parents there were not radically committed. In fact, these parents think the schools are fine. Instead of having a job, the specialist has a life in the community, and to progress must maintain a constant level of service. It is easier to rally black parents around the issues than white parents, the specialist noted, for these parents see the schools as inadequate and even harmful. As this educator pointed out, community action workers are not put there by a foundation to change the schools, but to act as an ear to the community – and to take their lead from the community. It's a slow process of encouraging self-discovery towards action, so the mother will protest the school's

not having heat instead of sending her daughter off with an extra sweater.

Another dimension of the job is talking to everybody – mothers in their kitchens and grandparents on park benches. Patience, more patience, and the ability to listen are essential The education specialist works with the local schools whose responsiveness ranges from enthusiastic to apathetic. He may form an area-wide parents group. ABCD's specialist prepared for the job by working in Washington poverty agency offices and in a university Upward Bound program, with a masters in child development sandwiched in after a BA in humanities. The specialist must be willing to move ahead with little support or reaction, and for a low salary, since the well-paying jobs are in the central office, rather than in the field.

MODEL CITIES PROGRAMS

Model Cities is something of a misnomer, for over 150 cities across the United States are involved in some phase of this program. Furthermore, it involves neighborhoods rather than entire cities. Essentially, a Model Cities program is not a "program" but a vehicle for coordinating local social change. Most Model Cities projects need an educational planner to coordinate aspects relating to education, but only a few have one. This person needs experience in working with poverty groups in education, good knowledge of the organization of educational institutions, and facility in working within a bureaucracy.

COMMUNITY PROFILE

CAMBRIDGE MODEL CITIES (EDUCATION)
40 Inman Street
Cambridge, Mass 02139
(617) 876-9575

Eight full time administrators make up the education staff of Cambridge Model Cities They work in the areas of educational research and development, guidance, communications, teacher aides, training, work-study (and possibly adult education). They also work closely with the related areas of day care, health, and social work. Their activities center around a community learning center with a potential audience of 15,000.

The center's philosophy is based on the belief that learning cannot be confined to one place, even a center, or one time, nine to five. It is a whole way of life. Ultimately their philosophy may even lead to total decentralization and learning in the home. The center will show that education can be easy and fun. And if someone wants "traditional" education, there will be room for that, too.

Duties and talents of the staff vary. The Educational Executive Director is a former English teacher, a Chairman of the National Commission on Teacher Education and Professional Standards, a consultant in teacher training for the Teacher Corps, and former past president of the Massachusetts Teachers Association. She is responsible for hiring staff, arranging subcontracts, shepherding development, and particularly for coordinating relations between the community and the various Model Cities boards.

The Community Learning Center will have a work-study component which will begin with 18 students – high risk teenagers looking for a third and fourth chance. Work-study coordinators are responsible for working with students, school officials, and job overseers. One work-study director is a Teacher Corps graduate with a year of teaching experience in Lowell, Massachusetts, another has a year of teaching in upstate New York and directed a summer program for the Spanish-speaking in Connecticut.

The Research and Development director comes from the Harvard School of Design, where he helped write proposals for the Department of Housing and Urban Development. He knows research and evaluation, and will also function as a general resource person. Although he has no teaching experience, he has written a humanities curriculum for Temple University and for two Massachusetts communities, and once designed the educational component for a "new city."

Three jobs have yet to be filled. As primary liaison with the community, business, and academic worlds, the Communication Coordinator must encourage input and feedback from each of them. The Guidance Director will work directly with the teenagers and assist with work-study placement. And the Training Director, who will be in charge of the learning center and have general administrative responsibilities, will need to work closely with work-study and adult education aspects of the program.

Who applied for these jobs? Candidates were plentiful – 78 for the guidance position, to cite one example. A large number were near-Ph.D.s with residency requirements behind them in psychology, philosophy, and political sciences. Surprisingly few came from schools of education. Those with languages usually had French and German, but not the badly-needed Spanish and Portuguese. Persons with skills in adult education and adult basic education were hard to find. Applicants with day care experience were scarce. Someone who had trained teacher aides was also difficult to locate.

In effect, each of these roles is new in this broad and special context; and one, in communications, is unique. The Model Cities experience is representative of what many community agencies are doing: redefining "old" titles in "new" terms – with major ramifications for those who educate educators.

SOCIAL SERVICE AND GENERAL PROGRAMS

United Fund agencies, Boy Scouts, Girl Scouts, YMCA's and YWCA's, camps, settlement houses, boys' clubs, regional improvement organizations like the Council of the Southern Mountains, radical job clearinghouses like Vocations for Social Change – these agencies often have unexpected, significant educational concerns. The Greater Boston Chapter of the American Jewish Committee, for example, is joining with the Massachusetts Commission Against Discrimination to provide in-service training in race relations for North Shore Massachusetts school teachers as a means of realizing its own goal – improved intergroup relations.

COMMUNITY PROFILE

UNITED COMMUNITY SERVICES
14 Somerset Street
Boston, Massachusetts 02108
(617) 742-2010

United Community Services of Metropolitan Boston is not only the voluntary health and welfare planning council for sixty-five cities and towns; it is also the central coordinating, budgeting, planning, and research agency for the Massachusetts Bay United Fund. It serves more than 325 agencies and institutions, of whom 175 benefited from the 1969 United Fund $6.4 million allocation because of their financially-participating member status. (The latter are listed in the useful "Handbook, Massachusetts Bay United Fund" for the current year.)

UCS deals with such community and regional concerns as eliminating needless duplication of health, social welfare, and related services; providing necessary services where lacking, anticipating needs for new, improved, and ex-

panded services; and maximizing the health and welfare dollar. It is concerned with problems of juvenile delinquency, public housing, "hard-to-reach" youth, mental health, recreation, drug use and abuse, referral and health information systems, and the need for year-round, full-time use of community schools as social service centers.

A recent position paper on the last issue includes statements such as "Accumulated schooling is considered to bear a direct relation to human welfare . . . community schools seek the economical combining of public and private community resources in a condominium. . . . Schools under this concept employ resources not used in the traditional systems." The planning director noted that until recently UCS was mainly concerned with health and welfare problems: the organization expected the universities to handle problems of the schools. Now one staff member is working almost full-time on the issue of community schools.

Sixteen per cent of United Fund money was allocated to the inner city in 1969. To what extent can the allocation be raised – and the balance between high priority needs of the core city and needs of the remaining metropolitan area be kept? A newly-defined organizational structure places fresh emphasis on the planning and research aspects of UCS to assist with this and similar difficult decisions. Under the revised plan, professional staff members are divided among planning and resources (24), research (5), and budgeting and allocating (2). UCS is moving from being departmentalized to having task-oriented staff, from being agency-oriented to being problem-oriented, and from being specialists to being generalists.

These shifts reflect UCS's growing realization that distinctions between education, recreation, and social service are becoming increasingly fuzzy. The real focus is a concern with the totality of a growing person's needs. The planning director stated that the key quality required of staff members is a "concern with the needs of people, a generalist approach – being able to view problems and issues in their total context."

COMMUNITY PROFILE

ROXBURY BOYS' CLUB
Education Department
115 Warren Street
Roxbury, Massachusetts 02119
(617) 427-6050

The present education director of the Roxbury Boys' Club is black and is a graduate of Dartmouth College. He chose to work with young people because "they are more receptive to new ideas and change than older people. And it's a time when much change is needed." He gained counseling experience in college and worked for another youth program before coming to this one.

His job: trying to establish programs for 2,100 black student members between the ages of 6 and 21. He has established an after-school instructional program with paid advisors which instead of tutoring offers students instruction in small groups of four or five. It runs Tuesday-Friday from 3:00 to about 8:00 P.M. Staff for this project is drawn from Afro-American groups in Boston area colleges. He designed a summer program with both academic and vocational experiences which will be expanded in the summer of 1969. He does a great deal of counseling about opportunities for further education, including scholarship aid. This means maintaining good contacts with financial aid officials in Boston area schools. He anticipates hiring a full-time guidance person, who together with the audio-visual librarian and instructors constitute the education staff.

The latter responsibilities have been aided by his college experience, he admitted, but he feels the job could be equally well filled by someone with a year or two of college. The most essential qualification is that the director be black (or able to relate to the group, depending on the part of the city involved), and that he have gone through some of the same experiences his clientele are going through. The job also requires administrative talent; he learned a great deal from working under good administrators. The director must also be able to speak well with both community people and college people. There is field

work: agencies must be contacted, colleges called on.

Although South Boston and Charlestown have libraries, tutorial programs, and some incidental counseling, the Roxbury Boys' Club is virtually the only one in New England with an education department, even though the philosophy of the clubs stresses education. The Roxbury Club made a policy decision in February, 1969, to invest more heavily in education since, in their opinion, the schools were failing so badly in the area. Because of the department's initial success, other Boston Boys' Clubs may adopt expanded educational programs, given a person with talent and desire to direct the program.

FOR INFORMATION:

United Fund Agency Handbooks. The Massachusetts Bay United Fund publishes a handbook describing the programs and services of affiliated agencies. Other states publish similar handbooks. This is a preliminary source of information about volunteer activities and supervisory jobs, especially appropriate for a newcomer. Check the telephone directory for local United Fund organizations; for the Boston area, write 14 Somerset St., Boston, Mass. 02108.

Vocations for Social Change. VSC is a nation-wide clearinghouse for information about jobs related to social change in basic American institutions. Every other month VSC puts out a publication containing listings of social change groups that need (and can hire) new staff; the guidebook also contains essays about how groups and individuals have found support in the past, about job precedents that can serve as models for others, and about unimplemented ideas of things that need to be done. Many of the jobs and ideas are educational in nature.

VSC's files are continuously updated and are available free to people seeking employment. The VSC periodical is sent to placement agencies, to local contacts who publicize it in their own areas, and is available upon subscription. Write VSC, Canyon, California 94516, (415) 376-7743.

Council for the Southern Mountains. The Council is a non-profit organization devoted to the welfare of the people of Appalachia. The Council works primarily in the area of community development, assuming projects in research, education, manpower training, enterprise development, communications, local housing, urban affairs – whatever seems to be needed.

The Council maintains a *Talent Bank* which recruits and places professional people from all over the nation in leadership positions in Appalachian communities. Talent Bank services are free and include a newsletter listing current job openings. Write Council of the Southern Mountains, Inc., College Box 2307, Berea, Kentucky 40403, (606) 986-3187.

Another placement service of the Council is CAPSTAFF which recruits executive level talent for positions as directors of community action programs. Write CAPSTAFF Office, 1346 Connecticut Avenue, N.W., Room 720, Du-Pont Circle Bldg., Washington, D.C. 20036.

ADULT EDUCATION CENTERS

Adult education centers are offering increasing numbers of programs: education for leisure and personal fulfillment (pottery, jewelry-making, architectural walking tours, workshops on creative aggression); continuing education courses for professional and occupational training (estate planning for the family, innovation in food engineering, real estate, credit management); and courses in basic education (grammar, English composition, mathematics). Some centers are private community enterprises; others are related to college and university education extension programs; still others are connected with state departments of education. A limited number of positions exist in the administration of adult education programs; there are many more opportunities for teaching.

COMMUNITY PROFILE

BOSTON CENTER FOR ADULT EDUCATION
5 Commonwealth Avenue
Boston, Massachusetts
(617) 267-4430

Permanent staff at the Boston Center for Adult Education includes an executive director, an associate director, a registrar-house manager, some assistant registrars, and a cadre of teachers – or leaders as they are called. The present executive director possesses a doctorate in library science and came to the post from college library work. He directs policy in coordination with the governing board and committees, handles finances and fund raising, and generally oversees center affairs. The associate director has been with the center since 1941 and has worked her way up through a variety of positions. She selects curriculum and leaders, schedules the classes, plans the descriptive booklet, and in general handles the educational aspects of the center. She attributes the center's success in serving a large audience with a small central staff in large measure to a feeling on the part of even the secretarial and housekeeping staff that they are directly and importantly contributing to education.

FOR INFORMATION:

Handbook of Adult Education in the United States This 624 page handbook assembled by the Adult Education Association of the U.S.A. (743 North Wabash Avenue, Chicago, Illinois) gives an overview of areas and issues in the field, organizations and associations, including a directory of national organizations. Although it was published in 1960, it is useful for someone new to the field.

MUSEUMS

Museums, children's museums, planetariums, nature centers – these have educational programs and are providing an increasing number of services to students, teachers, and schools. The Boston Museum of Science (Science Park, Boston, Mass. 742-1410), for example, hosts school tours, holds week-end Science Explorer classes for children 4-16, has offered teachers a course in science projects for elementary school children, and participated in Head Start summer projects and Project Eye-Opener, which gave tours and demonstrations to children from hard-core poverty areas to motivate interest in science. The museum was even temporary home for the CCED School, an experimental metropolitan area school supported by the Commonwealth of Massachusetts. The Boston Museum of Fine Arts (465 Huntington Avenue, Boston, Mass. 267-9300) holds art classes for children and adults, offers gallery talks for adults, provides talks and tours for all fifth graders in the Boston public schools, maintains a multi-media Children's Room, has Saturday talks and demonstrations for children, holds special youth events such as snow sculpturing, chalk-ins and pumpkin decorating parties, has a loan collection of 100,000 slides, and provides a free lecturer to area schools on request. The Boston Children's

Museum (57 Eliot Street, Jamaica Plain, Boston, Mass. 522-4800) has gone even further in offering services to schools. Aside from tours and talks, the museum loans curriculum materials, and has pioneered in the use of manipulative materials with children, developing collections of materials and ways to use them through a MATCH BOX project funded in 1964 by the U.S. Office of Education. The museum's Workshop of Things offers teacher workshops and a browsing-information service regarding manipulative curriculum materials which has served over 3,500 teachers and parents.

There are other examples, but basic to all is the concept of a teaching museum. Needed in such museums are people who understand its subject specialty – art, science, nature, history – who can establish quick rapport with children, and who know the needs and procedures of the public schools. Needed especially are persons with the ability to demonstrate objects enthusiastically and make a point dramatically in a single presentation. Most museums have an Education Department to handle school tours and youth programs; many are expanding into more cooperative arrangements with local schools and other educational organizations. Museums generally pay less than teaching, but the atmosphere can be invigorating.

FOR INFORMATION:

Museums Directory of the U.S and Canada. The American Association of Museums publishes this directory, which lists all member museums and describes their activities Write AAM, 2306 Massachusetts Avenue, N.W., Washington, D.C. 20008, or check the local library.

American Association of Museums Professional Placement Service This service is available to members only (regular membership is $15/year). Services include a monthly *Placement Bulletin* that lists both positions open at institutions and positions wanted by individual members. Recent bulletins list such openings as Museum Education Coordinator, Museum Education Assistant, and Curator of Art Education Write the AAM at the above address.

How to Find New Careers

DEVELOPING A NEW CAREER

People in education today face an increasing number of choices. There are new roles to fill: publisher-consultant in educational change, curriculum writer for manpower training; management consultant for school administration; education specialist with New Careers; director of education or career development and training for Head Start; team leader for the Teacher Corps; information technologist for an ERIC clearinghouse; product development director for a regional educational laboratory; public information writer for a school district; evaluation coordinator in a dropout prevention project; teacher in an experimental school; collective bargaining adviser for a professional association; community worker for a street academy, among many others. Additionally, there are new roles to create. And there are opportunities for talented people to do exciting things in old jobs, given a new perspective in facing the tasks.

In developing a new career, four things are important: initiative, planning, patience, and visibility. Few positions in organizations described in this book are "open" in the usual sense. New roles require extraordinary persistence to develop. They must often be "created" by someone who sees a need and has an idea for filling it, tries out a hunch, applies for a grant, writes a small book, talks with a friend and then finds himself with a new job and a new career. One must be willing to develop a wide range of contacts, knock on doors, talk with people, exchange ideas, follow up leads, and take advantage of uncertain opportunities. A promising approach is to interview for information rather than specific job opportunities; thus each contact closes with increased information.

Planning means starting where you are and using your present job to build stepping

stones to other jobs. It means taking on tasks and arranging experiences so that doors are opened and one project leads to another. For a teacher, the beginning may be initiating a curriculum project, organizing a visiting scholars program, helping establish an experimental school, directing an after-school tutorial program, or becoming active in the statewide affairs of a professional organization. The next step might be attending – or organizing – a summer institute to develop a related but new skill, perhaps media or photography for an English teacher or aerodynamics for a mathematician. Another route might be taking a year off to study research and evaluation techniques in conjunction with educational innovation. Whatever the vehicle, demonstrated skills and uncommon experiences are the foundations of a new career.

Patience is important because of the uncertainty involved, the frustration of waiting, the need to consider three, four, five, six, or twelve alternative courses of action for every one that materializes, and the time required for a potential employer to "discover" the job you are creating. Patience in adjusting to a new setting also helps, for a change in institutions sometimes changes basic assumptions about what is important. Pressures outside the schools are not the same as those inside.

Visibility comes from venturing forth to do useful things and doing them well. In the public schools there are many people with basically the same qualifications: an academic degree and teaching experience. To be visible a person must have something to distinguish him from all the others. A wide range of specialized interests, skills, and experiences – in research, business, government, community, or school – stands one in good stead in developing new careers.

A word of encouragement: everyone in an innovative role had to begin somewhere. These individuals enjoy sharing their life histories where appropriate. They are "self-made" people in the best sense of the word. As a rule they are the best sources of information not only about "what jobs exist" but how to find them.

KEY AREAS OF EXPERTISE

One problem in finding new careers is knowing what skills are marketable in a particular situation. The list below identifies important areas of expertise; in parentheses are some settings where the skill is often needed.

Adult basic education. (Community action programs, National Alliance of Businessmen JOBS programs, industrial training.)

Affective education. (Consulting, materials development.)

Computers: knowledge of computer languages, computer programming. (Large corporations, research centers, school administrators' organizations.)

Counseling. (Remedial programs, community action programs, youth centers, adult education programs, national and local youth programs.)

Curriculum and/or materials development: knowledge of curriculum design, learning theory and teaching techniques, in-depth acquaintance with curricula in a particular field, wide knowledge over all fields and grade levels. (School districts, experimental schools, publishers, materials developers, regional laboratories, associations.)

Early childhood education. (Research centers, community agencies.)

Editing: writing, editing and designing reports, newsletters, pamphlets, directories, and other publications. (Publishers, associations, research centers, governmental agencies, regional research centers and laboratories, private industry, universities.)

Education in urban areas. (Experimental schools, publishers, research centers.)

Educational technology: skill in using the "hardware" and/or writing the "software" for computer-aided instruction, programmed instruction, educational television, films, film loops, multi-media presentations, etc. (Publishers, education and training consultants, research and development organizations, research centers, large corporations.)

Graphics: ability to draw, paint, photograph, illustrate, arrange exhibits, design publications. (Museums, publishers, materials developers; universities.)

Information and dissemination. (School systems, committees and boards of education, instructional materials centers, state and federal agencies, ERIC centers, regional research centers and laboratories, foundations.)

Languages: particularly the Spanish language (Community education projects, materials development) or the languages of developing countries (Industrial training, Peace Corps.)

Management techniques and procedure. (Industry, consulting firms, state and federal governments.)

Manpower and industrial training. (Industry MDTA programs, anti-poverty programs.)

Proposal Writing Techniques. (Universities, schools, planning agencies, federal and state departments of education, boards of education.)

Research design, techniques and procedures. (Innovative programs in schools, research centers, regional educational laboratories.)

Simulation games. (Schools, materials development.)

Statistics and techniques of mathematical analysis. (Research centers, consulting firms.)

Testing and evaluation. (Innovative programs generally, industrial training, adult basic education, state and federal educational research bureaus.)

Vocational education. (Schools, community programs, state and federal departments of education.)

JOB HUNTING STRATEGIES

Teachers changing from a school setting to one in industry, government, or community often find that "looking for a job" requires a different kind of looking. The strategies described below are alternative ways to proceed.

DON'T GET DISCOURAGED. Be prepared to spend a half year or so looking for the kind of job you want. Job hunt half-time; work half-time. Don't just ask *for* a job; ask *about* jobs.

DEVELOP EXPERTISE IN SEVERAL AREAS. Use your experiences as entrance cards. Become an expert on educational simulation games, take a course in publishing procedures, teach at the local adult education center, tutor a handicapped child, teach in an Upward Bound program. Do something that distinguishes you from the mass of job hunters.

GET TO KNOW PEOPLE. Most interesting jobs never show up in the Personnel Office. They are filled by staff members who have friends who know colleagues who know someone who can write well, think straight, or help teachers develop a curriculum in African pottery. Don't be embarrassed to follow up leads or use friends' names. Knock on doors. Find out who is doing something that excites you. Exchange ideas. Then talk about jobs. Go to the Personnel Office last.

EXPERIMENT. Look for short-term, free-lance projects first. That will give you a wider range of experiences and more reliable information about the type of thing you really want. Don't expect to be hired for ongoing projects or vacant positions. Suggest a project. Raise funds for your own salary.

BE SPECIFIC ABOUT WHAT YOU WANT TO DO. Know what the agency does and how it is organized. Say what your interests are and suggest where you could fit in. "I have an idea for an oceanography curriculum for elementary schools" is much stronger than "Do you have any openings?"

DO NOT BE OVERLY MODEST. Say what you believe you can do and would like to be doing a year from now. But be yourself – don't change your personality for an interviewer.

TAKE THE INITIATIVE. Design an attractive resume and make 50 Xerox copies. Send a letter ahead saying you'd like to call in a day or two if convenient. Have illustrations of your work and educational philosophy ready to show. Establish a home base placement file. Have several references easily accessible by phone. Have stamps, postcards, business envelopes and stationery handy. Use them.

KEEP YOUR EYES AND EARS OPEN. Ask questions. Telephone friends. Browse through *Education Today* and *Educational Technology* in the nearest school of education library. Join the Association for Supervision and Curriculum Development. Put yourself on the Center for Urban Education mailing list. Read the Education Section of the Sunday newspaper. Visit Title III projects, children's museums, the state department of education, and so on.

TRY TO GET SOMETHING PUBLISHED. Write an article for *Social Education*, submit a manuscript to *The Massachusetts Teacher*, design a pamphlet listing local educational agencies, write a *Parent's Guide* to experimental schools. Pay special attention to having a bright, attractive format.

CONSIDER THE FUTURE. Keep options open. Avoid being classed as only a "reading specialist" or "programmed instruction writer."

CONSIDER ALL SEASONS. Things happen all year round in industry and government. Organize time by day, week, month, year, not just the school year and summer vacation.

CHOOSE WORDS CAREFULLY. Words are short cut signals to a person's orientation. Words like "computer-aided instruction" turn some people on and turn others off. A reading specialist, the author of a programmed instruction reading series, called a firm to explore new areas, mentioned programmed instruction and was told, "I am happy to announce that we do no programmed instruction here." End of conversation.

BUILD COMMUNITY TIES. Work just as a volunteer. Get to know the community, acquire some experience; then apply to teach at an Opportunities Industrialization Center which can lead to a position such as an assistant to the Education Director of a Model Cities Program.

CHECK OUT SOURCES OF INFORMATION. Visit the local National Alliance of Businessmen's Office to find out what firms are involved in manpower training projects. (Check your phone book to see if you live in an NAB target city.)

USE THE TELEPHONE. Many industries have an Education and Training Division. Call up. Ask for an interview. Suggest something that you can do.

NO LEADS? Look in the white pages of the telephone directory under *Children* or *Edu-*. Look in the Yellow Pages under *Educational Research* or *Publishers* or *Management Consultants*. For government programs, look under *United States Government*, or *New Jersey, State of*; or *Hartford, City of*; or *Contra Costa, County of*.

SALARIES CAN BE NEGOTIATED if you are well-qualified. Negotiate.

Individual Profiles

GERALD AND LYNDA BENNETT
Management Interns, Department of Health, Education and Welfare

WILLIAM DAVIES
President, City Schools Curriculum Service, Inc.

PAUL DeKOCK AND DAVID YOUNT
Teaching and Business Partners, Interact, Inc.

MARY GOODE
Community Coordinator for CCED, a State Experimental School in Boston

PAUL E. MARSH
Education Consultant, Massachusetts Governor's Office of Planning and Program Coordination

JOHN NEAL
Department Head, Ginn and Company

ROBERT SINCLAIR
Director, Center for the Study of Educational Innovation

ISA K. ZIMMERMAN
Director of Research in Curriculum, Meadowbrook Junior High School

INDIVIDUAL PROFILE

GERALD AND LYNDA BENNETT
Management Interns, Department of Health, Education and Welfare

"I didn't really know what to expect," said Lynda Bennett. "But I can't imagine any other way I could have spent two years and gotten as much," remarked Jerry Bennett. They were commenting on their experiences as management interns just prior to leaving the HEW regional office in Boston to begin the fourth and final nine-month cycle of their three-year internship. It had taken them from San Francisco to Washington to Boston and finally back to Washington. During this period Lynda worked in turn for the Social Security Administration, the Public Health Service, Model Cities, and – on the horizon – the National Institute of Health. Jerry had been on the staff of the regional director during both of his field stints, and had worked for the Food and Drug Administration in a financial capacity. He anticipated assignment to the Center for Community Planning – HEW's Model Cities coordinating office – when he returned to Washington.

What led them to federal service? Lynda was a sociology major and political science minor who took the FSEE (Federal Service Entrance Examination, an aptitude test) with an intern option. "I didn't really have much hope of winning an internship." These are restricted to the top three per cent of those taking the FSEE. On the other hand, Jerry came out of an undergraduate English major inconclusive about the next step. Neither graduate school in sociology and anthropology nor counseling for the Youth Service Board in Philadelphia was it; he decided, after trying both. He began teaching, found he really liked it, and was thinking very seriously about making it a career when he took the FSEE "because a friend had taken it."

So July, 1967, found them meeting for the first time as two of eighteen beginning interns. HEW has one of the better intern programs. It runs three years, instead of six months to two years as others do. It also includes a guaranteed raise each year. Interns move either from GS 7 to GS 12 ($7,369 to $13,389), or from GS 9 to GS 13 ($9,320 to $15,812). Most don't travel, but the Bennetts found they liked the regional office experience so much they requested a second tour outside Washington.

Informal negotiations determine what interns do. HEW tries to avoid having them stay in one type of job (personnel, budget, general administration, program management) or any single agency. Lynda mentioned three major projects. In one case, she assisted with a career days program to recruit people for government service. Not only did she help train some of the two hundred recruited, but she designed and administered a follow-up study of individuals hired outside normal civil service channels. In a second instance, she helped put together a compendium of laws being enforced by Consumer Protection and Environmental Health Service. This took much time and meant digging into the U.S. Code plus extensive library research. In the third situation, she coordinated a summer education program for underprivileged youth, ages 16-21. She set up and attended meetings between local, state, and federal officials; and was responsible for making reports to Washington.

In San Francisco Jerry was involved with the Neighborhood Services Program, assisting with the development of a comprehensive service center in West Oakland. He also participated in a study group where representatives from five federal departments looked at the impact of federal programs on Oakland. The task force developed a joint city-federal problem statement and strategy for meeting the problems. In Washington he was assistant to the Director of Financial Management for the Food and Drug Administration. A major part of his time was spent preparing position papers to support budget requests. In Boston, he considered himself a "hot projects man." Besides doing research and filling in on this or that, he planned a two-day conference between HEW and the American Hospital Association. He also reviewed pieces of legislation sent from other states for review of compatibility with federal legislation.

Both agreed they have gained much, and plan to remain with the federal government when their internship concludes. "Management itself never sounded interesting," said Jerry. "Now I find I rather enjoy it and have some

ability to make things operate well. It's been fascinating to work at all management levels, top to bottom – to get a view of each person's perspective and of the whole from different levels."

"I enjoyed most the breadth of information an intern gets, and being involved rather than standing by," noted Lynda. "It has brought into realistic terms things I had only studied, like Congressional hearings."

They sounded one warning. The basic intent of such jobs is to support service agencies through fiscal management and technical assistance. There is not a great deal of social contact. What is needed above all else is tact. Interns are comparatively young and may have a low status, but they frequently perform important tasks at high levels. "It's a thin line between tactful staff assistant and fresh kid," said Jerry. It seems that people who are adaptable, flexible, and generalists at heart will be right at home. The Bennetts obviously are.

INDIVIDUAL PROFILE

WILLIAM DAVIES
President, City Schools Curriculum Service, Inc., Boston

Bill Davies is president of City Schools Curriculum Service, Inc. (CSCS), a small publishing and consulting firm which he helped establish in the fall of 1968. CSCS publishes innovative programs – particularly student-centered materials which allow teachers and kids to participate in the making of their classroom materials – and provides curriculum materials tailor-made for specific school populations.

Previously, Bill taught college English ("where the most successful career man saw students for a half-hour per week") and high school English, and worked as a senior editor for a major textbook publisher. He found it frustrating to work in a large publishing house. For one thing he felt insulated from the schools. "Most of the Language Arts department hadn't been in a classroom for at least a decade, and some never; the company would send us to conventions instead." He also found that the opportunity for developing and disseminating new ideas, which had attracted him to publishing, was severely limited by "the state-adoption mentality which dictated that books be directed at a common denominator student who doesn't exist," and which strove to eliminate any ideas that might offend anyone anywhere.

Such materials, he felt, imposed a narrow and artificial culture on all kids, and deprived many people who are actually in the classroom of materials that fit their specific needs. A proposal he made to the company to explore ways of working with inner-city schools was rejected. When, later, he was asked to take down the posters on his office walls and cut his hair shorter, he quit and began planning CSCS.

The plan that has evolved is based on "participation publishing" – involving students in making their own books (like *I Know a Place*, "a book that kids can talk back to"), or involving students and teachers in the making of a program tailored to a specific school district. Davies sees this approach as contrasted with that of the conventional publisher, who "produces a book and sends out a fleet of salesmen to convince teachers that they want it; the trappings of this system are cocktail parties, company cars, crates of free samples, and huge warehouses, and the result is four-pound, four-color, four-dollar books."

In the company's first book (*I Know a Place*), each child creates a person, a place, and a society. Because the student creates the content of the book, there is no culture bias in the material and it is a useful book in any kind of school. For example, a Spanish translation for eastern cities has also been published, and another for use in the Southwest is in the works. "We believe," say Bill and his partner, Bob Clawson, "that children become more engaged by the lives of real people – themselves and other children – and that they come to read and write with gusto by writing their own books and reading other kids' books."

Their second title, *Mother, these are my friends*, is a collection of Harlem kids' wishes, expressed into a tape recorder and transcribed for use as a natural-dialect reader in city schools, blank pages are provided so that kids can

add their wishes or illustrations. A course in photography in which the student helps create the text is due soon, as is another natural-dialect reader (*Ah, Man, You Found Me Again*). CSCS is also currently testing units in a comprehensive drug education program aimed at the 7th grade.

Because CSCS is small, it can focus on special needs; it can move quickly to produce materials while the need is current, and can revise within weeks. Touching on a basic difference between CSCS and his old job, Bill notes, "The series I was hired to work on in June of 1966 is still not out—but it will be called NEW when it does appear, and it won't be revised until those warehouses are empty four years from now."

Another difference is that in the CSCS office on Commercial Wharf the posters are back up on the walls.

INDIVIDUAL PROFILE

PAUL DeKOCK AND DAVID YOUNT
Teaching and Business Partners, Interact, Inc.

Paul DeKock and David Yount teach together. They are also partners in Interact, Inc. (P.O. Box 262, Lakeside, Calif.), a company they established to market the social science simulation games they have designed for high school classes. Their experience over nearly ten years at El Capitan High School in Lakeside, California, is a model of professional accomplishment and creative survival.

Mutual educational philosophies have brought and held them together. They are both self-confessed radicals, dissatisfied with the way schools are organized. The role of education, says Paul, is to create an environment where a person finds himself. The teacher of tomorrow will be a person "who organizes environments and facilitates learning." The amazing thing is that they did not sit in the teachers' lounge and talk about change; they moved. When Paul came to the district ten years ago fresh from a master's degree in American Studies, he came on the condition that after a year he be allowed to teach interdisciplinary American history and literature. When Dave arrived not long after with a similar interdisciplinary orientation, the two gravitated together. Their search for better ways of cooperating led to experiments in large and small group teaching. Their persistent persuasion was one factor in El Capitan's switch to flexible scheduling in 1966.

An important impetus to their endeavors was Paul's John Hay Fellowship year at Harvard, in 1961-1962. While in Cambridge he investigated team teaching and case study construction. A turning point came during the summer of 1965 in which Dave attended a summer workshop in simulation games at the Western Behavioral Science Institute in La Jolla, California, and then talked Paul into trying them. They found that simulations incorporated both case study and role playing and, importantly, put students into circumstances where working out their role caused their real values to surface for crystallization or modification. It was a way to combine studying an institution with experiencing it.

Accepting the concept of simulation, they questioned the methods they had been using. They began developing their own simulation games. The first one, *Disunia*, dealing with the ideas and events leading to the formation of the Constitution, took many hours to work out. They learned, however, how to incorporate traditional subject matter and the traditional grading system into simulation patterns. Next came *Sunshine*, an inter-racial simulation based on a unit of Negro literature and history; *Division*, based on Lincoln's election in 1860; and *Panic*, depicting economic conditions in the 1920's and 1930's. They began to get requests for the materials. At first letters went into the wastebasket. When the volume grew to several a day, they decided to organize a response: "Wait until fall and we'll have something for you."

When the materials were published in the fall of 1968, they were attractive, inexpensive, and well-tested in classrooms by their creators. Interact's partners have sold more than 3200 kits in 49 states and 4 foreign countries. Undoubtedly, the multiple talents of both teachers has been a factor in Interact's success. Paul is a serious amateur photographer, good enough to have had photographs in the finals of the national newspaper contests of 1965 and 1968. They use over 1200 color slides to illustrate large

group lectures – and Paul is anxious to expand the materials accompanying Interact kits to include audio-visual presentations. Dave's initial career interest was law; his law training was helpful in setting up the company.

Each teacher has his own philosophy for maintaining balance in a public school situation: "Get dreams and work for them," says Paul. "The teacher needs a specialized way of looking at himself. In my case, first it was fusing history and literature; then team teaching; now developing materials that will change both teachers and students."

Dave, English department chairman at El Capitan, advocates group organization. "To start curriculum change, there are two basic ways to go. There's the faculty assembly route, which we have here." It should be noted that he helped organize this senate, which makes basic decisions about curriculum and budget. "Or you can work for a strong department which will act as a body in creating policy for itself." If neither of these works, he recommends going somewhere else to teach.

Paul and Dave credit their partnership with keeping their interest in teaching keen, and with greatly expanding it. What of the future? Interact is growing rapidly, and they are often asked to speak or consult with groups interested in curriculum change. They both feel it is imperative to keep teaching. "Otherwise," says Paul, "It's like the theologian never really meeting God!"

INDIVIDUAL PROFILE

MARY GOODE

Community Coordinator for CCED in Boston, a state experimental school

Urban parents have been contributing to educational reform for a long time. But only recently have "professionals" begun to admit openly that "non-credentialed" laymen have unique, valuable, and relevant knowledge to offer.

In the past five years or so several events in Boston have added to the supply of talented parents: the community action programs; the formation of three community elementary schools with parent boards and parent participation; Model Cities and its necessary educational components; the development of CCED, a state experimental school (see page 64); the King-Timilty Advisory Council; the formation of the Community-University Joint Center for Inner-City Change; and so on.

In such settings parents have learned in the field, not in the classroom, from the situation, not from a textbook, and many have learned their lessons well. One of these is Mary Goode.

She began her formal education in the South and finished it as a graduate of Girls' High in Boston. In those days scholarships were scarce. So instead of moving from her college course into a university, she started doing piece work at a factory. Many of her observations about how management did things in a piecework situation with checkpoints was useful to her later.

Not much more serious thought was given to the educational world until several years later, when her daughter protested against taking the practical business course her mother recommended. This required a more careful parental investigation of the merits of various schools, an investigation which coincided with a need to find out why her first grader was having difficulty in school.

As a consequence of her findings, Mrs. Goode began part-time work at a nearby community center, Norfolk House, under the wing of an Alinsky-trained community organizer. She was soon meeting with parents at the center to discuss what could be done about such issues as lack of new or sufficient textbooks, need for busing students, and inadequate school bathroom facilities. Parent persistence made it possible for one particularly needy school to come under Title I and thus receive additional resources. This organizing work led directly to participation by Timilty Junior High School parents in Central Cities Task Force activities. Here parents are helping administer $1.5 million under a special ESEA Title III grant.

When money for this job ran out, Mrs. Goode continued as a volunteer until the center was able to rehire her as a part-time educational person. To her previous activities

she added others, such as investigating private schools to locate scholarships for core city children. Norfolk House remained her base while she branched out into other areas – working as a parent volunteer at the New School for Children, taking a course in computer programming at night, serving on the Model Cities Neighborhood Board's educational committee. The last she regards as a particularly valuable experience. She learned much about the total city educational system. And she had a chance to help develop the first year of an operational plan for educational change. These changes include two programs now funded: a school communications program which will mean expanded parent involvement in Model Cities area schools; and a more comprehensive adult education program to be run by the Urban League.

Part of her education at this time was travel – to New York for a visit to IS 201; to Detroit for a Central Cities gathering; to Denver for a Model Cities-Career Opportunities Program conference.

Under the New Careers program, she was finally able to move into a full-time educational position at Norfolk House, where she remained until becoming community coordinator for the new state experimental school. She now spends most days at the CCED school, where her responsibilities include acting as a resource person to the five operational parent committees for volunteers, curriculum, transfer of power, transportation, and legislation. She sees that minutes get out, answers questions about day-to-day operations, and gives general assistance. In addition, she helped recruit students and is presently working out transportation patterns – no small job, since students in the school come from twenty-three different metropolitan communities.

She agrees there is a trend in the direction of more parent involvement. "Parents are beginning to question much more than before," she comments. "The system isn't all bad, but we need to weed out some of the old ways and try new methods."

The most valuable outcome of her new career, she feels, is further destruction of the belief that a person needs a degree to accomplish anything. "People can make contributions without degrees. What parents don't have is the confidence to apply their life experience to given situations." The confidence she has gained through her experiences continue to benefit education in Boston.

INDIVIDUAL PROFILE

PAUL E. MARSH
Education Consultant, Massachusetts
Governor's Office of Planning and Program Coordination

"I have a screwy background," says Paul Marsh, "but then, it's a screwy job." Mr. Marsh is a Senior Education Consultant in the Massachusetts Governor's Office of Planning and Program Coordination. In a state government modernization project he has been responsible for all aspects dealing with education. He has visited some thirty state agencies from the Department of Education to the Council on Arts and Humanities and worked with them to formulate basic goals and relationships. Now that the reorganization is official, he will help implement the ideas.

This is not overly formidable for a man who has been senior research associate and primary editor of a study to recast tax-supported education in Massachusetts; written a case study of the Boston School Committee's political-economic actions to increase state aid; co-authored two monographs, *Schoolmen and Politics* and *Federal Aid to Science Education;* consulted on the design of management systems for the Jefferson County, Colorado, school district; and helped mobilize a task force to write the background report establishing the Education Development Center, a regional educational laboratory.

The combination of political science (M.A.), education (Ed.D.), and management systems has worked well for Mr. Marsh, who taught history in private schools for nine years before he began work for other agencies. What propelled him out of teaching and into work with the Physical Science Study Committee was a desire to make better ways of teaching "more available to more kids." Later, his doctoral thesis was a case study of nationwide curriculum reform – the PSSC. It was not far from curriculum reform to educational management and a year's consulting work

with Arthur D. Little, Inc., a research and development firm. This led him to his current position.

The old ways of getting ahead – moving into administration for more money or more academic scope – are less and less appropriate to the management tasks that must be done, he believes. In their preoccupation with academics, school administrators neglect enormous areas of management, making them vulnerable to criticism from parent and politician alike. He is an advocate of integrating theory and practice. "Even though I work in the field," he says, "I stay close to the academic and intellectual world. I read something and test it against reality."

Is teaching essential to a career like this? Paul Marsh says no. "Many of the ablest people I work with directly in education have had no classroom experience. I am still working off one harmful effect of that experience: speaking sloppily and loosely as I do to students because I could get away with it." Since teaching, he has "poked around looking for the right thing, and (has) found increasingly interesting and profitable jobs." He believes strongly in accident and stubbornness – that people can find "niches" off the beaten track" and make an impact if they are willing to persist.

INDIVIDUAL PROFILE

JOHN NEAL
Department Head
Secondary Social Science Publications
Ginn and Company, A Xerox Company,
Boston, Massachusetts

John Neal decided to become a teacher while on a troopship. It was a decision born of retrospection out of a desire to be of service. It was unforeseen – "Many things I thought of in school, but teaching was not one of them." The decision meant abandoning his original intention to be a businessman like his father and expand the family food market. It also meant losing a year of prior college work when he shifted from Northeastern University's Institute of Retailing to Worcester State College following service in the Marine Corps. Fortunately, a longstanding love of history made his choice of a teaching major simple.

The pattern was fairly traditional for a while thereafter: two years teaching junior high school social studies and English in Framingham; two years as an elementary teacher in Sudbury; five years in Newton – the last four in high school social studies. But the development over the years was not commonplace.

He started his teaching career late – at 27. Having to work after hours as a post office mail clerk to support his family was a concern. Even more, "that schools were seemingly run more for administrators, teachers, and parents than for kids" was disturbing. "The conflict between the individual teacher and the educational superstructure" caused him to give serious thought to going into business after all. He even resigned his first teaching job without another teaching position. What finally evolved was a try at the elementary level – "some of the best teaching I ever had." He worked out strategies and materials; his skills were sharpened. And on merit pay, he did well financially.

The mystique of Newton was an irresistible attraction, and he shifted locale. Soon he was in a secondary social studies curriculum group. "The place was a beehive. I loved it. Great atmosphere. In Newton ideas must run a pretty sophisticated gauntlet." He felt he was polishing his craft.

"You can't hide in Newton," he commented. John became one of ten teachers in the United States paired off with university counterparts to improve the teaching of geography. He was released from teaching a full year to develop curriculum and to teach two experimental classes in Newton High School. During two summers and an academic year he went around the country, learning what happens in the coordination of human resources.

Then a new burst of educational reform came to Massachusetts via the Willis-Harrington Commission. Prior to leaving for advanced seminars in geography at the University of Iowa, he applied to the State Department of Education for the newly-created position of geography

supervisor, intrigued by the possibilities of acting as broker between needs and resources. He was subsequently appointed to this position. Again, reality. A bureaucratic structure tends to inhibit professional autonomy and growth. Threading through legalisms took away from time to grow professionally.

At this point, he quoted Cecil Rhodes: "So much to do; so little done." After three years, he left, having found a company with sufficient social consciousness where he could do things difficult to achieve in a bureaucracy. "It's a search for the right thing. On paper the Department of Education should have been the best job." In his present position as secondary social science publications head for Ginn-Xerox, he is exhilarated at being able to initiate, orchestrate, and travel.

He initiates and coordinates projects from creation to publication. He must conduct talent searches to form development teams. "The fun and fascination of it is advancing in all directions simultaneously." His department is preparing paperbacks on drugs, materials on juvenile delinquency, new materials for the slow learner keyed toward reflective thinking. Considering the nature of this man, the last project should surprise no one.

Which leads to more introspection. A constant factor in his progress has been his geographer's view of people as resources. To him, "A resource does not exist; it becomes. The Pennsylvania coal fields were not valuable to pre-Columbus Indians. If people are to be validated as persons, they must continue becoming, continue being used – in a good sense. To become and to be used, to remain active, is important.

"I've taught every year of my career, from adult foreign born evening classes to Northeastern University. All through is a search for self-validation; or feedback that what you are doing is of worth. In the classroom you can get some. Backs are straighter when it's a good lesson. But there it's difficult to affect curriculum, and hard to do the developmental tasks you feel need to be done. At the other end is all the pleasure of doing, but not of being with the kids. Contemplating this role, these are the tradeoffs."

INDIVIDUAL PROFILE

ROBERT SINCLAIR
Director, Center for the Study of Educational Innovation
University of Massachusetts, Amherst

Those beginning work now will still be going strong in the twenty-first century. How, then, can training institutions respond to new needs created by new roles opening up rapidly? In most cases the burden of career planning rests on the individual; and its appropriateness depends on his vision, imagination, and talent. Robert Sinclair is a good case in point.

Originally intending to be a professor of curriculum theory, he ended up almost immediately after doctoral work as director in a center where students consider change through its various phases: conceptualization, implementation, dissemination, research. "A 'theoretical practitioner' such as we are training here," he explains, "is an educational practitioner who must be aware of what is going on, understand why change is difficult, know research and be able to interpret it. He must be able to select from the wide field of new knowledge and make transitions between theory and practice. He must synthesize, interpret, analyze, use judgment. He finds problems in schools, then locates and applies research that will help solve these problems."

These convictions have their roots in experience. During his undergraduate years at Miami of Ohio he put together a triple major: comprehensive social studies, education, and the behavioral science aspects of business.

The next years were spent in refining curriculum-instructional skills. First, he assisted the director of the experimental college lab school while earning a master's in education. Next, he taught his first year in such an unorthodox fashion that his classroom was used for inservice teacher training. All he did was to let students take over and educate themselves; they moved from just receiving to actively participating. Between his first two years of teaching, he spent a summer in a program at Harvard de-

signed to create specialists in curriculum development and instructional theory; the group studied particularly team teaching and school changes. (The next summer he was on the faculty of this program.) In his second year of teaching he moved to an experimental, non-graded elementary school where the staff constructed and ran the program.

Then he was one of seven chosen nationally as Washington Fellows in Education, enabling him to work at the NEA Center for the Study of Instruction with teachers and school systems interested in changing education. This led to California, where he worked with John Goodlad as a demonstration teacher in an experimental school designed to produce change agents. Besides working on several research studies dealing with childhood and schools, he directed an inservice program dealing with curriculum and change for the Center for Cooperative Education. During doctoral work at UCLA he was a Kettering Foundation Fellow and staff associate at the Institute for Development of Educational Activities.

Non-institutional experiences contributed to his understanding, too. He worked on a trailer assembly line to understand how social-technological systems influence people. He spent time with youth during the Sunset Strip riots. While in college, he worked with a farming family – and liked it. "I was a custodian in a school to see why schools were constructed in particular ways," he added. "I discovered they were designed to meet the needs of custodians instead of children."

His interdisciplinary bias is a reflection of the experiences he sought. "At the centers I worked with economists, historians, scientists. This exposure was valuable because it revealed the importance of taking a multi-dimensional point of view toward problem-solving." He sees education in the next decade as a true discipline, a new way of looking at man, which will involve even more knowledge of other disciplines. Personnel will be more differentiated, with more roles for educators than before – and not necessarily in classroom and school situations. Teachers will spend time in different places. New coalitions and networks will be formed within and without education to solve its problems.

Albert Einstein is quoted as saying, "Imagination is more important than knowledge." Robert Sinclair would likely paraphrase, "Imagination and knowledge are both important" – and set out to put them to work.

INDIVIDUAL PROFILE

ISA K. ZIMMERMAN
Director of Research in Curriculum, Meadowbrook Junior High School

It's a rare kind of person who can create a new role within a school, but Isa K. Zimmerman is doing that at Meadowbrook Junior High School in Newton, Massachusetts. As Director of Research in Curriculum, she assists with curriculum development and evaluation in a school offering about 200 courses a year to its 880 students. She suggests ideas for courses and helps teachers find appropriate materials, such as helping design a course called "School Days" which asks students to consider the assumptions about education in books like *Up the Down Staircase;* or investigating the theory behind simulation games in order to help a teacher construct a game around the Middle East crisis. As the person in the school most in touch with all classes, she has found herself acting as an intermediary between the teachers and the citywide curriculum consultants. Additionally, she is responsible for the activities of the school's four learning centers, the theoretical (but not yet actual) heart of the school. "Meadowbrook could use two like me," she notes. "In a way, I am a consultant to the principal, as well as to the rest of the faculty, on matters of curriculum and in-service training."

What personal factors made such a role possible? After graduation from Cornell University (English and medieval history), nearly a year of travel in Europe and the Middle East, and a year of writing for a housewares magazine, a chance vi to Cambridge led to enrollment in a master's program in teaching. Happily, her teaching internship was in a school committed to team teaching; her first job was at Meadowbrook, a Title III demonstration school where change is the primary constant. She taught four years at

Meadowbrook, including time as department chairman and informal team leader. The fifth year she returned to graduate school for a doctorate. Halfway through her first graduate year, she initiated a course project re-involving her with Meadowbrook. Why? "I felt learning about education without children was irrelevant." At the end of the year she told her principal she would like to return to Meadowbrook – if she could have a position which would complement her doctoral thesis. His response was to offer her the job of Director of Research in Curriculum.

"Even though the job is officially part of a Title III grant, it has itself evolved," she remarks. The first person to hold it concentrated on statistics and attitudes. Isa's interests are in curriculum and teacher training. She has found that the role requires four kinds of expertise: constant current knowledge of what is happening in education in the "outside world" – for perspective; ability to sit through meetings and act as a quiet catalyst; background experience gained through four years "in the ranks" at the school; and creative, pragmatic curriculum development and problem-solving talent.

Meadowbrook would undoubtedly support her role even without the presence of Title III, she feels. The school has constantly given its teachers a great deal of freedom and responsibility, and administrative experiences to as many as possible. It is an intellectual environment with strong social rapport among the teachers. But these facts, Meadowbrook's great assets, also limit the potential for new roles. The developmental demands – meetings and preparation – are tremendous, and still take place within the 8 a.m.-3 p.m. classroom lockstep. "Until this structure is broken," she declares, "creation of new roles in the school will be inhibited."

GEOGRAPHICAL INDEX

TOPICAL INDEX

READER RESPONSE FORM

We hope this book has been useful and we welcome your comments and suggestions in the space below for possible future editions.

ORDER FORM

PLACEMENT OFFICE

To: Harvard Graduate School of Education
~~Publications Office~~
Longfellow Hall, Appian Way
Cambridge, Massachusetts 02138

New Roles for Educators

Please send_____ copies at $3.50 each. Total $_____

Name_____

Address_____
Street City State Zip

Check enclosed for $_____

A check payable to Harvard University for the total amount must accompany the order.

TRY TO GET SOMETHING PUBLISHED. Write an article for *Social Education*, submit a manuscript to *The Massachusetts Teacher*, design a pamphlet listing local educational agencies, write a *Parent's Guide* to experimental schools. Pay special attention to having a bright, attractive format.

CONSIDER THE FUTURE. Keep options open. Avoid being classed as only a "reading specialist" or "programmed instruction writer."

CONSIDER ALL SEASONS. Things happen all year round in industry and government. Organize time by day, week, month, year, not just the school year and summer vacation.

CHOOSE WORDS CAREFULLY. Words are short cut signals to a person's orientation. Words like "computer aided instruction" turn some people on, and turn others off. A reading specialist, the author of a programmed instruction reading series, called a firm to explore new areas, mentioned programmed instruction and was told, "I am happy to announce that we do no programmed instruction here." End of conversation.

BUILD COMMUNITY TIES. Work just as a volunteer. Get to know the community, acquire some experience, then apply to teach at an Opportunities Industrialization Center which can lead to a position such as an assistant to the Education Director of a Model Cities Program.

CHECK OUT SOURCES OF INFORMATION. Visit the local National Alliance of Businessmen's Office to find out what firms are involved in manpower training projects. (Check your phone book to see if you live in an NAB target city.)

USE THE TELEPHONE. Many industries have an Education and Training Division. Call up. Ask for an interview. Suggest something that you can do.

NOTE ADS! Look in the white pages of the telephone directory under *Children* or *Education*. Look in the Yellow Pages under *Educational Research* or *Publishers* or *Management Consultants*. For government programs, look under *United States Government* or *New Jersey, State of* or *Hartford, City of*, or *Contra Costa County of*.

SALARIES CAN BE NEGOTIATED if you are well-qualified. Negotiate.