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ABC's of the World of Work in Maine, 1982

Maine Occupational Information Coordinating Committee

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ABC'S
OF THE
WORLD OF WORK
IN MAINE
The ABC's of the World of Work in Maine

Maine Occupational Information Coordinating Committee
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Credits

The ABC's of the World of Work is published by the Maine Occupational Information Coordinating Committee (MOICC), State House Station 71, Augusta, Maine 04333. Additional copies may be purchased from MOICC.

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Organizations contributing photographs -
American Pulpwood Association, L.L. Bean Inc., Public Information Office and the Music Department of the University of Maine at Orono, Maine Central Railroad, Maine State Development Office, Maine State Planning Office, Maine Forest Service, Maine Earmuff Company, Kennebec Valley Medical Center, Augusta Fire Department, Maine Department of Inland Fisheries and Wildlife.

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Foreword

As both Chairman of the Maine Occupational Information Coordinating Committee and Commissioner of the Maine Department of Labor, I have a deep concern and responsibility regarding the issues of employment and unemployment in our State.

A few years ago a comprehensive study by a major university demonstrated that students who had access to timely and relevant career information had a tremendous advantage in finding secure and appropriate employment compared to students without such information. The Maine Occupational Information Coordinating Committee has been working hard to give all Maine students this important advantage.

"The ABC's of the World of Work in Maine" is another example of the effort to provide the best information available on careers and occupational opportunities to Maine citizens, in this case to the elementary school students of the State. These students are at an important formative stage in which they are developing attitudes toward the world of work.

We hope this guide will be useful in the formation of positive and informed attitudes toward employment. Ultimately, we hope this guide will assist students throughout their lives in obtaining gainful, secure and fulfilling careers.

By becoming exposed to the world of work early in life, these students will be far more able to cope with and advance in that world throughout their lives.

William R. Malloy
Commissioner
Maine Department of Labor
Chairperson MOICC

The people of Maine have acted through the Legislature to provide comprehensive vocational education opportunities for all of the young people in Maine. In addition, adult education opportunities include vocational training. With this in mind, it is imperative that every effort be made to inform all students and adults of the availability of a curriculum guide which offers the best information available on careers and occupational opportunities in Maine.

More than ever, it is imperative that individuals have opportunities to develop their skills and talents to earn a living in an increasingly technological world. Unskilled labor commands poor wages, insecurity, and uncertainty in the world of work. Nothing acts more quickly to develop a sense of belonging and a stake in society than a good job. This curriculum guide provides the information for teachers and elementary students to begin the process of considering careers and occupational opportunities. The curriculum guide deserves the attention of all those who teach and work with our elementary school students.

Harold Raynolds, Jr.
Commissioner
Maine Department of Educational and Cultural Services
Dedication

Since 1970 many dedicated and creative career educators have worked long and hard hours to spread the word about career education—its benefits to the teaching/learning process and to students. This guide is dedicated to all those career educators and, in particular, to Terry Sotiriou, Mary Cruise, Fred Freise, and Ruth Roberts.

Acknowledgements

Special thanks is given to the Augusta, SAD #11 (Gardiner), and SAD #16 (Hallowell and Farmingdale) for making available to project staff their elementary curriculums. Based on review of their curriculums, sample activities were designed according to the three grade level groupings of K-2, 3-4, 5-6.

In order to ensure that nontraditional careers were depicted, Ms. Jane Riley, Affirmative Action Officer of the Maine Department of Education and Cultural Services reviewed the occupations selected for the posters.

This curriculum represents the work of many individuals and the cooperation of many Maine workers who consented to be photographed on the job.

The Maine Occupational Information Coordinating Committee and its staff hope that you, the elementary school teacher, will use and enjoy this curriculum within your classroom.
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Introduction

The ABC’s of the World of Work in Maine curriculum represents the initial component in a comprehensive career information delivery system. The remainder of the system, comprised of the computerized and microfiche CAREER INFORMATION DELIVERY SYSTEM, serves school age youth and adults seeking career information and those participating in career decision-making activities.

The ABC curriculum contains twenty-six letter posters that depict seventy-four occupations. The front of each poster presents an artistic depiction of each occupation. The back of the poster contains photographs of actual workers and a brief description of typical job duties. The curriculum guide, which accompanies the posters, provides teachers with activities and ideas for using the curriculum within the classroom.

The guide integrates the delivery of career information with career education concepts. This integration with career education provides a conceptual framework that emphasizes the relationship between the worlds of education and work.

A study, conducted by Ohio State University in the mid 1970’s, revealed that individuals who had been exposed systematically to labor market information were more successful in the work force in terms of finding employment and attaining job satisfaction than those who were not exposed to career information. Studies relating to career education indicate a positive relationship between the infusion of career education into existing curriculums and individual academic performance.

In order to expose people to career information in such a way as to develop effective decision-making skills, one must begin early in the elementary grades. The ABC curriculum provides the elementary teacher with suggestions for developing a comprehensive and sequential approach to career education at the elementary level. This process will provide a firm foundation for students who will participate in career education activities at the secondary level.

Career Education Defined

Since its conception in the early 1970’s, career education has undergone many refinements. Prior to 1981, career education was defined as “an effort aimed at refocusing American education and the actions of the broader community in ways that will help individuals acquire and utilize the knowledge, skills, and attitudes necessary for each to make work a meaningful, productive, and satisfying part of his or her way of living.” This definition was further refined by the addition of the “ten basic career education skills.”

"As of 1981, the 'ten basic career education skills' to be imparted to persons through a comprehensive, developmental career education effort include:

1. The basic academic skills of mathematics and of oral/written communication
2. Skills in using and practicing good work habits
3. Skills in developing and employing a personally meaningful set of work values that motivate the individual to want to work
4. Skills in gaining a basic understanding of and an appreciation for the American system of private enterprise—including organized labor as part of that system
5. Skills in self-understanding and understanding of available educational/occupational opportunities
6. Career decision making skills
7. Job seeking/finding/getting/holding skills
8. Skills in making productive use of leisure time through unpaid work including voluntarism and work performed within the home/family structure
9. Skills in overcoming bias and stereotyping as they act to deter full freedom of career choice for all persons
10. Skills in humanizing the workplace for oneself"

These ten skills have been identified as the skills necessary for successful participation in the work force. In addition, consideration is given to use of leisure time, the family, and non-paid work situations.

Beginning in elementary school, children need to become aware of the entire world of work in a bias free manner so that they will be aware of as many careers as possible. During junior high school, students participate in career exploration activities that lead to greater understanding of the world of work as it relates to personal strengths, weaknesses, skills, aptitudes, and interests. At this time, students can develop tentative career plans that would be of assistance when selecting high school courses. During high school, students embark on specific courses of action that will lead either to employment upon graduation from high school, or entrance into post-secondary training/education. Diagram I illustrates the career education process, kindergarten through adulthood.

Chapter 1 discusses an approach towards attaining the basic career education skills utilizing the EIGHT ELEMENTS OF CAREER EDUCATION. Each element is discussed briefly and sample activities are provided. Remaining chapters focus on parental involvement in career education, using community resources, sample activities using the ABC cards, and identifying other resources that are supportive of career information dissemination efforts.
In the early 1970's, when career education was first introduced by the U.S. Education Commissioner Sidney Marland and later supported by Commissioner Terrell Bell, educators in the State of Maine were enthusiastic about the concepts of career education and its applicability to the classroom. Career education provided a medium for creative and meaningful instruction combining traditional learning with real life experiences. Early career educators from South Portland, Farmington, Bangor, and the University of Maine System provided the initial career education impetus in Maine.

The activities created by dedicated teachers and the comprehensive K-12 approaches initiated by these school systems, during the 1970's, created the models now being implemented throughout Maine under the Career Education Incentive Act.

Career education is an approach to education that views the school system along with the community and parents as partners in preparing their youth for the world of work and adult living. Career education, beginning at home and continuing with structured sequential learning experiences from kindergarten to graduation, will equip children with the essential basic skills and interpersonal behaviors for effective life/career decision-making and successful implementation of those decisions.

This chapter explains the essence of the career education experience—the infusion of the eight elements of career education into existing curriculums. Many teachers are pleasantly surprised when they discover that they are already carrying out many aspects of career education in their classrooms. The activities of career education are not new, but the sequential and developmental articulation of career education is new and needs to be understood by teachers.

To be a person who contributes to society and family through work, both paid and unpaid, and positive use of leisure time, it is necessary to possess a high degree of self-knowledge and skills. The eight elements of career education, when appropriately infused into the school curriculum, provide students with the experiences leading to the acquisition of such knowledge and skills. The accompanying chart depicts the eight elements of career education and their outcomes.
The 8 Elements of Career Education

The 8 elements and outcomes of career education provide the framework for a comprehensive career-related learning process. Each element directly relates to some aspect of career development. The chart below depicts the elements and their desired outcomes in the kindergarten through adulthood learning process.

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A Message to the Teacher

It must be clearly understood that career education is not a separate program or course. It is a concept to be infused, when appropriate, into the existing curriculum. Some educators have shied away from career education thinking it to be another add-on to their already busy curriculums. However, appropriate use of career education concepts can enhance the credibility of what is presently being taught, make teaching easier, and, most importantly, make education more fun for both students and teachers.

No educational activities should be used in isolation, but should be an integral part of the overall educational process. Such is the case with all career education activities. All the sample activities in this guide are designed to be used in conjunction with what is already being done in the classroom. The activities simply provide different ways in which to provide good basic education using different instructional methods. Hopefully, the user of this guide will discover new, motivating techniques which will make his/her job more rewarding.

Following is a brief explanation of each career education element with sample activities for the grade level groupings, K-2, 3-4, and 5-6.
Element 1

Appreciation and Attitudes

In order to feel fulfilled by their career and social environment, people need:

1. Skills in developing and using leisure time through unpaid work including volunteer work performed within the home/family structure.

2. Skills in overcoming bias and stereotyping as they act to deter full freedom of career choice for all persons.

3. Skills in humanizing the workplace for themselves.

At the elementary level, the stage is set for fostering these attitudes. The focus of the element, APPRECIATION AND ATTITUDES, is placed developing these skill areas.

Sample Activities

K—2 Have the students create a play or story about what would happen if all the people in a particular occupation stopped working. An excellent resource for this activity is the song "The King and the Fireman" on the Sesame Street album, "The People in My Neighborhood."

Have the children draw pictures of the types of activities they and their families do after school, at meal times, in the evening, on weekends, etc. Allow each child to show and explain his/her picture to the class. Finish with a discussion of differences in ways people choose to use their time.

3—4 Have the students collect comic strips, newspaper pictures, or magazine pictures of people doing work. As the student describes the work being done, have a class recorder list on the board the jobs shown and label each job with an "M" (Mother shown doing work in the picture) or "F" (Father shown doing the work in the picture). Ask the students to analyze the jobs depicted one at a time and determine if the job can be done by a male only or be done by a female only. The children will discover that very few if any, jobs demand to be done by a particular sex.

5—6 Assign the students to read a short story involving a diver. With the students, prepare a list of rewards gained by working such as money, prestige, approval, security, service to others, etc. On the blackboard, make a circle with pie wedges for each reward. Let each student reproduce the circle including the pie wedges (work values) which appeal to him/her. Class discussion can follow.

Invite a hospital "Candy Striper" or other volunteer worker to your class to explain his/her work and the satisfaction gained from such work.
Element 2
Beginning Competencies

This element deals with basic skill development, specifically in the areas of mathematics and oral/written communication. These are essential skills for being successful in personal as well as work situations. Thus, any activities which make the student better able to communicate and compute are beginning competencies activities. In today's technological work, even computer literacy can be considered a beginning competency. At the elementary level, nearly all activities deal with this element. The three specific areas to focus on at the elementary level are (1) following directions, (2) speaking, reading, and writing, and (3) basic computation.

Element 3
Career Awareness

In order to develop one's career identity, one must first become aware of all the occupational opportunities available, then explore the options of particular interest, and, once a career path is decided upon, prepare for a specific job.

In grades K-6, the children become aware of all the career opportunities available. Primary years deal with occupational information centering on people who come in direct contact with the child—parents, school workers, and community helpers. As children progress through the elementary grades, teachers find ways to tie awareness of the work world to specific curriculum areas such as nutrition, dental health, city government, transportation, conservation, or other themes the students are studying at a particular time. In Chapter 4 of this guide, The ABC's of the World of Work in Maine has been divided into three suggested groupings to tie in with what children typically study at given grade levels. These suggested divisions were based on review of the curricula in four school systems in Maine. However, any system can study the cards in any grade level sequence which best meets its needs. All the activities in Chapter 4 deal with career awareness intertwined with the other seven elements. Following are sample career awareness activities.

Sample Activities

K—2 When students recite the ABC's, ask the class to name a job which begins with each letter of the alphabet.

3—4 Have the students play "What's my line?" Designate three or four students to think up a job title and then allow the rest of the class twenty questions to determine each of the designated student's jobs.

5—6 Present to the class materials relating to the fifteen occupational clusters. After the students understand what each of the clusters include, have them pick one cluster to study further and either give a written or an oral report on their findings.
Element 4
Decision Making

The goal of this element is for students to become effective personal and career decision makers. In order to accomplish this, one must first learn the steps of making effective decisions and then have plenty of opportunities to practice making them, both individually and in groups. As the child grows and develops likes and dislikes, he/she needs to develop the ability to select alternatives most consistent with his/her goals and to implement effective courses of action.

Since many children do not get the chance to make decisions for themselves, the more practice teachers can give students in the elementary years the better. Even making unwise decisions, within a controlled situation, provides good learning if the students are able to see the consequences of their actions. Following are some sample activities relating to the element of decision making.

Sample Activities

K—2 Prepare a life-size paper doll with a variety of outfits. Have the children select the appropriate clothing for a variety of weather conditions.

3—4 Discuss Mark's problem with the children and indicate on a 1-5 scale the pupil's position on commitment to a promise.

"Mark promised his mother that he would help at home by doing dishes all week. The second day he did not do the dishes for one of the following reasons. Was he doing the right thing to break his promise?"

A. The house burned down.
B. His mother asked him to go to his grandmother's on an errand instead of doing dishes.
C. Someone else in the family offered to do the dishes for him.
D. His friends came over to visit.
E. He had some homework to do.
F. His favorite TV program all week was on.
G. He felt like watching TV instead of doing the dishes.
H. He didn't want to do them anymore.

5—6 Have a class debate on the following:
"The mountains of Maine should be set aside as areas to remain forever wild with limited public access."

Review the decision making process and recall the importance of gathering and assessing data before making a decision.

The Decision Making Process
1. Identify the problem.
2. Gather relevant data.
3. Evaluate the data.
4. Plan a course of action.
5. Reassess and evaluate the action taken.
Hall-Dale Middle School students learn about the Free Enterprise System and careers relating to nutrition.
Element 5

Economic Awareness

The field of economics is very broad. Thus, in career education, the goal of economic awareness is to provide students with the basic understanding and appreciation for the American system of private enterprise—including organized labor as part of that system.

In grades K-6, students need to develop an understanding of money and its uses through the exchange of goods and services and the idea of how to satisfy material needs and wants. Following are sample activities relating to economic awareness.

Sample Activities

K—2 Plan a trading day. Students bring a toy or possession (with parental approval) to trade in class, bringing out the idea of barter before money was available. Discuss how the barter process can be used today.

Set up a store and have children make purchases and make change.

3—4 Have each student write about a favorite possession he/she had as a young child and tell why he/she no longer needs or wants it. The students could then discuss what they think they will want most at 20, 30, and 50 years of age, and why they think they will want these things.

5—6 Have students consider how they would spend $10 received from an uncle the day before the State Fair opened. Categorize the expenditures into various groupings for discussion.

Have the students study various natural resources and the final products made from them. The students can follow the production of the product up to sale to the public. Note the need of facilities and utensils (capital), land and raw materials (natural resources), and all labor (human resources).
Element 6

Educational Awareness

Education, time spent learning, makes up a significant portion of one’s life. Since so much time in children’s lives is spent on this endeavor, it is important that they understand the relationship between skills and knowledge learned in school and the use of such skills and knowledge in the world of work and family. To make wise decisions about a career, the individual needs to be aware of all educational opportunities available, and the different types of training required for different occupations.

Sample Activities

K—2 Have the students construct five learning trees (reading, writing, speaking, listening, and using numbers) and put the names of workers on the trees according to the skills they use.

Imagine a day without math, no one could use any math skills. What would your day be like? (Do this with reading, writing, music, art, etc.)

3—4 Invite high school students in business, distributive, and industrial arts education classes to visit your class and explain: (1) What job they are training for, (2) How school is helping them to prepare for work, both now and in the future, and (3) Describe the training they are receiving.

5—6 Have the students organize a puppet show or play on the subject of a person who had dropped out of high school. In the play, deal with this person’s problems trying to get a job for which he/she was not prepared.

Element 7

Employability Skills

In order to be successfully employed, one must have effective work habits, know how to get a job, and know how to keep that job. At the elementary level, teachers need to help students develop good work habits in all phases of their school work and make them aware of the steps involved in finding a job. Following are sample activities relating to employability skills.

Sample Activities

K—2 Give children opportunities to care for materials and equipment in the classroom. Discuss the relationship between this responsibility and similar responsibilities in the world of work.

Provide a variety of activities whereby students have the opportunity to practice following directions.
3—4 Whenever speakers visit the class, have the children inquire about how they found and obtained their positions and what types of interpersonal skills are needed to hold the job.

Have the students discuss what difference it makes whether people are on time at their work; Whether they do their best; Whether they have good health; Whether they get along well with other people.

5—6 Invite a personnel manager of a local business (possibly a parent of one of your students) to speak to the children about the process of looking for and obtaining jobs.

Element 8

Self Awareness

To gain self-knowledge, children must be aware of their feelings about themselves in terms of abilities, wishes, interests, values, and life goals. In grades K-6, it is especially important for children to learn to feel good about themselves. Any opportunity to develop a positive self concept in students should be implemented. Helping the students discover strengths and likes and dislikes will help them understand themselves better so they can make better choices for their lives. Following are sample activities relating to the element of self awareness.

Sample Activities

K—2 Make "Me Badges." Run off badges on tag board. Place positive, descriptive adjectives on each student's tag.

3—4 At the end of each day, have the children tell what they have done well that day.

Assign each child one week in the year during which his/her picture is posted on the bulletin board and surrounded by things that mean a lot to him/her. Parents can be asked to submit materials for the bulletin boards. Others in the class can finish statements about the student (I like ____________ because ____________.)

5—6 Explain to the students that each of us is more than just skin and bones—that some of the things that make us different are called traits, abilities, and interests. Have the students try to learn more about themselves by studying their own traits and abilities so they can see how their interests affect what they do and how they do it. Explain to the students that understanding themselves can help them know more fully what they can and cannot do.

Have the students begin making a scrapbook of pictures and clippings from old magazines and newspapers that they feel reflect their personalities (their favorite sports, style of clothing, hobbies, their ambitions or goals, etc.).
Involving Parents in Career Education

Parents as Resource People

At the elementary level, parents are a valuable resource to the classroom and benefits are gained by the class, teacher, students, and parents.

Consider the student who does not excel academically yet can do a great deal in the craft area. During a classroom factory simulation activity, he leads the class in the tasks involving manual dexterity. He is so happy with himself and his achievements that he gets his mother to visit class twice to see him in action. The mother has never visited the school before, so she and the teacher get to discuss her son’s progress in a positive, non-threatening atmosphere. The teacher feels she has gained ground with the student because she understands him better after talking with his mother, and, because the ice has been broken, she feels she can have more interaction with the parents during the remainder of the school year.

This series of events took place in a Maine school five years ago. Many career education activities lend themselves to involving parents in a number of ways.

If you have canvassed the parents of your class early in the year, as you are following your curriculum, you may see places in your program where involving parents may be a real help. For example, if you are studying community helpers, inviting parents who would be categorized as community helpers would enhance this unit. (A sample letter to parents asking for their assistance is included later in this chapter).

Ways of Utilizing Parents as Resource People

1. As guest speakers within the classroom.
2. As hosts for field trips.
3. As models for job shadowing.
4. As helpers in supervising special activities, or in classroom instruction.
Benefits of Utilizing Parents

To the Student

Students Will
1. Gain a sense of pride at having their parents teach something to the class.
2. See parents as workers and contributors to society as well as being Moms or Dads.
3. Form a closer bond between their parents and themselves from having worked together on the same goal.
4. View their school work as being quite important since their parents willingly gave time to come to the class.

To the Teacher and Class as a Whole

The Class/Teacher will
1. Receive additional concrete knowledge of occupations.
2. Realize the credibility of what is learned in school and its relevance to working.
3. Benefit from additional human resources through supervision, transportation, and instruction.
4. Gain a more thorough understanding of students from viewing the interaction between parents and students during learning activities.
5. Encourage the active participation of typically reluctant parents in the classroom.
6. Through demonstration and discussion, be able to teach effective work habits as well as career information and the idea that work at home and school is good training for work preparation.

To the Parents

Parents will
1. Become more involved in their child's education by working together to achieve a common goal.
2. Have contact with the child's teacher, thus keeping more current with the child's activities and progress in school.
3. Have an opportunity to view their child interacting within a group.
(Sample Letter)

Dear ____________________:

The students in our class are studying about the importance of all types of work. We want to learn more about the work of each of the parents of all the boys and girls in (Child’s name) class.

Would you answer these questions for us and send it to school with your child? We will study how your job affects our lives.

1. What is your job?

2. What are some of your duties?

3. Is there anything about your work which the children in our class would enjoy seeing, such as pictures, materials, tools, or uniforms?

4. Would a field trip to your place of employment be beneficial at this grade level?

Thank you for your consideration and cooperation.

Sincerely yours,

Name of Teacher
Parental Involvement in Career Education

- Chaparenes on Field Trips
- Guest Speakers
- Community Resource Persons
- Academic Tutors
- Advisors
Helping Parents to Become Career Educators with their Own Children

Most parents are very interested in the career development of their children, yet many have little idea of how to help their children in this process. The elementary teacher or school counselor can offer parents and students a great service by explaining to them the goals of the elementary career awareness program and by offering simple activities and guidelines parents can use with their children. Parents should try not to force on their children their aspirations for the child, but allow the child to explore all his/her options in the world of work. While this is difficult for many parents, it is essential if one is to truly help a child's career development.

Since a great deal of actual learning takes place outside of school, parents can capitalize on this fact by guiding their children to view what they see in ways which will help them to become more aware of the variety of jobs around them. For example, when shopping with their children or eating in a restaurant, parents can simply ask questions like, “Where did this hamburger come from? Who do you suppose made it?” When driving, a parent can point out, to a child, a construction crew working on the road and say, “Look at those people building the bridge. Do you think they are having fun? Do you think you would ever like to do what they are doing?” (developing self-awareness in regard to work). Or, in the same situation, a parent could ask, “What would our community be like if no one built bridges?” (developing appreciation of the value and dignity of all work). Keeping the discussion simple, at a level the child can understand, can be fun and productive for both parent and child and develop within the child an inquisitive manner of viewing the world of work.

All parents can expose their children to their own work—outside and inside the home. Children need to recognize the worth of child caring and home making activities, as well as paid endeavors. They can explain to the child what they do and how they feel about it. Hopefully, parents will pass on to their children a positive attitude toward working, since work makes up a large portion of all our lives.

Parents can help children assess their own likes and dislikes and how they relate to play and work. If a child prefers to do things alone, he/she will probably not enjoy teaching school. For example, children can begin early to discover whether they prefer to work with ideas, people, or things. Parents can help children learn that cooperation or ability to work inter-dependently is necessary to reach home goals (like going on a family trip) or in the work setting (running McDonald’s).

Parents need to understand that career development is a continuing process throughout one's life. As children near adolescence, they begin breaking away from the home influence and start making decisions and explorations on their own. Although children need to do this, they also need a lot of support and help from parents in their decision making. One of the great benefits in participating with children in the early years of career awareness and development is that such participation lays the groundwork for communication with them during the stormy adolescent years. If a foundation of communication and trust has been developed early, then children will have a greater willingness to discuss with their parents their career aspirations and concerns when they are actually making career decisions. A caring parent who is as objective as possible is probably the best asset a child can have when clarifying his/her values about career choice.
Using Community Resources Effectively

As educators, we are constantly looking for new resources and techniques to use in our classrooms. We often overlook the obvious—utilization of the community in the education of our students. Learning can take place within a variety of settings. Very often, many of our most valued learning experiences did not occur in the classroom. Recognizing this fact is critical to the effective delivery of career education and career information at the elementary level. It is through the community resource person that students can see that what they learn in school is important and has practical application in the work world. Parents and representatives of business, labor, and industry can be important resources and provide the stimulus for new learning activities. Furthermore, many community agencies such as Kiwanis, the Rotary, the Lions, and other public service agencies are willing to work with the public schools to develop and maintain a community resource file. Other youth-oriented agencies such as the Girl Scouts, Boy Scouts, and 4-H could be of assistance.

Following are suggestions for the incorporation of the community into the education of children in your classroom.

Developing A Community Resource File

If you are going to invite workers to your class, or are going to visit actual work sites, you need to keep a record of involvement. Then you have a running record of interested, supportive, resource people who can be called upon again. Maintaining a card file in a central place, such as the library or principal's office, where it is accessible to everyone allows for updating the file and maximum use. The types of information helpful to include on a file card for the resource file are:

- Name
- Address
- Telephone
- Work title and brief description of duties
- Type of activity the person will provide
  (job shadowing, guest speaker, host a field trip, etc.)
- Approximate number of times per year the person is willing to participate
- Running log of how often the resource person has been used, in what capacity, and by whom

Once a record like this is kept, it is surprising to see how many community workers are being used already. As you bring others into your program, through many of the activities in this guide, your work will become easier in terms of involving the community.

The important thing to remember is to coordinate use of the file. If a resource person has already given as much time as he/she is willing, be sure to inactivate that card until the person has time to participate again. In working with the community it is very important not to over-involve people so that they lose interest in cooperating with you.

If you want to expand the resources in your file, you can make a concerted effort by involving staff members as part of an in-service program or perhaps a sixth grade class project centered on fifteen occupational clusters. Either way, the process is the same. Divide the group into fifteen teams or individuals to canvass the community for interested workers from each of the clusters. This could be done through written, telephone, or on-the-spot surveys of the community.
Preparation and Follow-Up—
Responsible Techniques for Recruiting and Maintaining Resource Persons

Every good teacher knows that most activities should not be isolated experiences, but continued over a period of time in an integrated series of experiences for students to get the most benefit. Before being exposed to a resource person, the children need to know why the person is being involved in their class and decide what exactly they want to learn from that person. The students must decide whether they will individually ask the person questions or will appoint a class interviewer. The more the children are prepared for the guest speaker or field trip, the more they will gain from that experience.

Follow-up is equally important. The students need to have a chance to talk about what they have experienced. How did they feel about it, what was learned? Writing a thank-you letter to the person involved teaches good manners. A classroom simulation of the work seen gives the children a chance to test out how they might like it. Students could do additional research and write a report about the type of work they've seen performed.

Tying the resource person’s involvement into a sequence of activities helps the children gain more from having seen that resource person.

Field Trips

Field trips allow several students at a time to be exposed to a community resource. Careful planning prior to visiting a resource person is essential. The class members need to determine what they want to learn so they can write their questions. Then they must decide how the questions will be asked—by appointed interviewers, individuals one-at-a-time, etc. The teacher should visit the site prior to the trip to determine safety factors, logistics, and to talk with the trip host/hostess.

The resource person needs to be prepared, also. He/she needs to know what it is that the students want to see and learn. A list of helpful guidelines for student questions and for resource people to consider prior to field trips is included at the end of the chapter.

Guest Speakers

Community workers make excellent speakers for children—to make them more aware of the job market, to relate school work to jobs, and to talk to them about what is required to be a good worker. Often they are listened to much more readily than teachers. As in a field trip, prior to a guest speaker’s visit, both the students and the speaker need to be prepared. Some specific things for the speaker to know are:

- The topic to be covered
- The age and attention span of the children
- The time of the visit as well as the amount of time devoted to the talk
- A list of questions likely to be asked (This can serve as a good framework for the resource person’s talk)
- The location of the talk and directions to the school

Job Shadowing

One very effective way for an older student to gain first-hand information about a particular occupation is to job shadow. In this activity, the student locates a worker in the job of interest and gets the worker's permission to follow him/her through a day's work (or part of a day, if more appropriate to the student's ability and maturation). The worker should be encouraged to follow a typical work day without dressing up on the job or trying to show the student a fun time.
Good Rules of Thumb

For purposes of good public relations and common courtesy, it is important to show appreciation for the time a community resource person has given. A thank you note from the student and/or counselor/teacher following the activity is imperative. It is also important to let the person know exactly what is expected of him/her to insure effectiveness. Such preparation also helps lessen possible anxiety on the part of the worker. After initial contact and plans for an activity are made, a letter of confirmation should follow, detailing exactly what is expected and anything unusual which the resource person should know about the students involved, such as physical handicaps or limited ability, which might affect the content of the activity.

Examples of Questions
Students Can Use in Interviews

1. What do you do on the job?
2. How long have you worked on this job?
3. What tools do you use?
4. Was this your first job choice? How many times did you change your mind about what you wanted to be before you went to work? Why?
5. Would you say you work primarily with people, things, or ideas?
6. What part of your job do you like best? Why? What part of it do you wish you didn’t have to do? Why?
7. Who depends upon your work? Upon whom do you depend for your work?
8. What kind of job security do you have? Is your work seasonal?
9. Is special training required? If so, how do you get that training? Did you get paid during the training period?
10. What experiences and training on this job might prepare you for some other kinds of jobs should you ever want to change?
11. What did you learn in school that helps you in your present job?
12. Is there a special way of talking about your job, i.e. are there words that are unique to your job?
13. As you see it, what are some of the advantages to your job? Some of the disadvantages?
14. How does your job affect your personal life? Do you have to work nights? Are you tired when you get home? Do you have noise during the day?
15. What inventions could put you out of work?
16. Are people with your kind of skills usually needed—even when business may be bad? Is your kind of work limited to geographical areas?
17. What kind of education is necessary for this kind of work? Apprenticeship? Trade school? College? Advanced degrees? Is there any outstanding personal quality required for this job?
18. About how much money can a person earn in this kind of work? Beginning? Advanced?
19. When does your employer compliment you? (Or when do you compliment your employees?) When are people fired?
Things for A Resource Person to Consider Prior to Visitation

Take a moment to consider these questions about your own job:

1. How did you get involved in your present occupation?
2. What work experience did you have before you started your present job?
3. Why did you take this job?
4. What do you like about this job?
5. What are some things you do not like about your job?
6. Who depends on your work? Upon whom do you depend?
7. Are there opportunities for advancement in this job? If so, what are the requirements for advancement?
8. How does your job affect your personal life? Do you have to work nights or weekends? Are you tired when you get home? Do you have to travel? What kinds of people do you meet?
9. Do you work mainly with “people” or “things”?
10. Do you work a lot with ideas?
11. Does your job offer opportunities to be creative?
12. Are people with your kind of skills usually needed—even when business may be bad? Is your work at all seasonal?
13. Could you briefly describe the personal qualities one would need to do your job—strength, agility, ability to think rapidly, ability to make decisions, ability to deal with minor details, ability to deal with other people, etc.?
14. About how much money can a person earn in this kind of work? Beginning? Advanced?
15. Would you recommend this kind of work for your children?
16. How do you spend your time after work? When you are on vacation?
17. If you could have any job in the world, what would you like to be?
Confirmation Letter To A Resource Visitor
(Use School Letterhead Stationery)

Date
Inside Address
Dear __________________:

Thank you for planning to visit with us on ____________ at _________ a.m./p.m. You can be a valuable contributor to our school's career-oriented curriculum by planning your presentation to the class according to the following guidelines:

1. Explain the nature of your career. If possible, wear the type of uniform or clothing you would wear on the job.
2. Show kinds of job tasks you, yourself, perform. (It would be interesting for students if you could demonstrate some tool peculiar to your occupation—this could even be paperwork duties performed.)
3. Provide students with an activity that combines career awareness and academic skills.
4. Emphasize how school subjects have been helpful to your job performance.
5. Allow time for students to ask questions.

If you believe a meeting with me would be helpful in gearing your presentation to the level of students, please do not hesitate to call me.

Please check in at the office of the school upon arrival and you will be given assistance in locating my room.

Very truly yours,

Name of Teacher
Grade Level

Attachments:
Typical student question list.
Using The ABC Posters

The ABC's of the World of Work posters are designed to be used in a variety of ways. Specific activities at each grade level are delineated in this chapter. Grade level groupings were based on review of the grade level goals and objectives of the curriculums of the Augusta, Gardiner, and Hallowell school systems.

Some general types of activities, however, can be used effectively at any grade level. Following are some suggestions.

1. **Teaching the Alphabet**—The cards can serve as motivators and examples to teach children their ABC's. Used as flash cards, the children can practice identifying the letters as well as careers which begin with each letter.

2. **Addressing Bias and Stereotyping**—Each card is designed to reduce bias and stereotyping in regard to career awareness and choice. Since by grade one children have stereotyped occupations according to sex, the teacher should point out at every opportunity that bias has nothing to do with career decision-making. Whenever possible, invite non-traditional representatives of occupations (male nurse, female truck driver), to class to speak. A school project could involve inviting non-traditional workers from a variety of occupations to speak to several classes. Group discussions should follow, giving students the opportunity to explore their feelings regarding bias and stereotyping.

3. **Creating Bulletin Boards**—The posters can be used to develop career awareness by developing themes and using the appropriate cards to develop those themes. The teacher could give the students a particular theme and have the students select the appropriate cards to develop the bulletin board. Examples would include:
   - A. Careers in a particular occupational cluster
   - B. Careers involving data, people, or things
   - C. Occupations relating to specific subject areas
   - D. Occupations relating to Maine's natural resources
   - E. Urban careers—rural careers

4. **Expanding Career Awareness**—Using each poster as a flash card, hold up a letter and ask each student in the class to think of a job beginning with that letter. When students run out of spontaneous answers, with the teachers help they can refer to the Dictionary of Occupational Titles, the Occupational Outlook Handbook, or else the computerized or microfiche Career Information Delivery System for more titles.

The remainder of this chapter deals with suggested activities by the three grade level groupings for integrating career information with classroom activities.
K—2 Activities

Mail Carrier

After viewing the mail carrier (M) poster in the ABC’s, the following activities could be initiated:

Have the students make a flow chart depicting the various steps a letter goes through from mailing to receiving. Then the students can play a sequence game showing this process or create a bulletin board depicting the flow chart.

Make a field trip to the local post office, preferably with a parent of one of the students as host. Have students prepare ahead of time by discussing the questions they would like to ask the mail carrier. If they decide they each want to ask their own questions, have each question written on a separate card with a number on it from 1 to whatever number of students there are in the class. This way, each child will have an opportunity to interact with the mail carrier and ensured time to speak with him/her. In this phase, the students should become aware of the variety of occupations that exist in the postal service.

After talking with the mail carrier, the students could make their own post office and take turns role playing postal workers and people mailing letters or packages. Part of this activity would include the practice of writing one’s own name and address on an envelope and printing a simple letter. The class as a unit should write a thank you letter to the mail carrier.

As part of the simulated post office, the students can practice math skills by using play money to purchase play stamps the children design (integrated art activity). Children can practice addition and subtraction skills by “purchasing” stamps and making change with play money.

As part of language arts, the students can write new words such as mail carrier, route, and post office in a vocabulary notebook. Students as a group could create a story about a mail carrier delivering mail.
Hair Stylist

As part of a hygiene or personal care lesson, talk with the students about the wider variety of occupations dealing with personal care—hairdressers/barbers, cosmetic salespersons/demonstrators, soap and toothpaste manufacturers, and dog groomers. Discuss what a hairdresser or cosmetologist does. Develop a list of questions the children would like to learn about a hairdresser’s work. Invite a hairdresser (preferably a parent of one of the students) to speak to the class about his/her work, bringing along tools and equipment used on the job and wearing a uniform worn while working. Appoint two students to interview the worker, using the list of questions the class developed. The teacher can tape record the talk, so the children can review it again later. Interview the worker and ask him/her to do some sample work on a wig before the class—rolling hair, combing out etc. Ask the worker to tie in good hygiene practices as part of the talk and demonstration.

When the talk is over, as part of language arts, have the students write a letter of thanks to the speaker. Then, plan with the students a simulated beauty parlor. Following are guidelines for developing a beauty parlor simulation activity:

1. Divide the class with half serving as operators and half as patrons.
2. The operators should make signs for their stations in the beauty parlor such as “Quick Curl by Mr. Mark” or “Cute Clip by Ms. Cheryl”.
3. Decide which services will be provided by the beauty shop—cuts, curls, manicures, permanents, hair tints, facials, etc.
4. For Economic Awareness, decide which services will cost the most, the least. Students should reach the decision that services which require more time and expectation are more costly.
5. Have the students bring in curlers and nail polish from home. The teacher may have to provide these and hair spray.

Once all is ready, the beauty shop can open. Operators can put rollers in the patrons’ hair and put nail polish on fingernails. To give the hair stylists a little effect, the teacher can spray hair spray on the rollers when set. Students should not spray the hair due to the potential hazard to the eyes.

When operators are finished with the patrons, they will write up the bill and add the costs. The patrons will count out the appropriate amount of play money to pay the bills. Once the activity is completed, the students can discuss how they felt about being hairdressers, if they think they like working with people, etc.

Note: This unit also ties in nicely with a science unit on mammals. Hair being a distinctive factor, study of dog groomers could also be done.

Earmuff Maker

At Christmas time, the students in a history lesson could study Chester Greenwood of Farmington who invented earmuffs. A general discussion of inventions could ensue including the ways climate affects choice of inventions. The teacher could devise a simple process for making earmuffs and have the children construct a pair as a Christmas present for someone.
Baker

Ask the students to think of how many types of bakers there are and where they work. Examples could include: Mom or Dad at home, school lunch baker, pastry bakers, bread bakers, restaurant bakers, Nissen or Country Kitchen bakers, and bakery shop bakers.

After the students have discussed what bakers do, a nutrition lesson could be taught involving the concepts of (1) empty calories, (2) whole wheat flour as opposed to refined flour in products, (3) sugar versus honey in cooking, and (4) sweets in the diet and how they affect teeth and the body.

Invite a baker to class and have him/her dress exactly as he/she does on the job, show the tools used, and demonstrate making something, preferably a nutritious food such as bread. The baker could show how important it is to be able to follow directions exactly when using a recipe and explain why good math skills are really important when measuring ingredients and doubling recipes.

On the following day, let the students become bakers and make bread. Emphasize the importance of following directions in the recipe and measuring ingredients accurately. When the bread is completed, ask them how they felt working with their hands and creating something to eat. Would this type of work interest them as a vocation? Have them branch out and think about lots of other jobs which involve food preparation such as restaurant workers, caterers, and food processing workers.

Janitor

Before the children arrive in class, arrange to have water spilled on the floor near your desk. When the children enter the room, they will notice the water. Caution them to be careful!

Ask them, “Who can we get to clean this?” The children will say “the janitor”, and you will ask him/her to come with a mop to clean the floor. Invite the janitor to tell the children the work he/she does in the school and what he/she uses for tools at work. (This will, of course be planned ahead of time so the janitor has had an opportunity to prepare.) While the janitor is there, encourage the children to think of ways in which they can assist this school helper, e.g. throwing papers in the wastebasket, putting toys away, being neat in the lunchroom, etc.

When it is time for milk, it will be late because you have pre-arranged it to be. Send for a kitchen helper. The lunch room helper will explain a reason for the lateness and then describe his/her job to the class.

Once the students have met two workers, ask them to tell of others who help at school. Once they have listed all the school personnel, ask them what would happen if the principal, secretary, janitor, teacher aide, or others were absent. Have them discuss the implications and draw the conclusion that the school needs all of its helpers to make it operate efficiently.

Children could then develop a thank you song for all the people who help at school. It could be written to the tune, “London Bridge”. Following is a sample version:

"Thank you for your help today, 
Help today, help today. 
You were very kind to us 
To clean the mess away."

Students could add new words they learn in their vocabulary notebooks such as custodian, elementary guidance counselor, speech therapist, psychologist, and secretary.
Kennel Keeper & Veterinarian

Since the curriculum in most primary programs involves a good deal of study of the animal kingdom, it will enhance the children's career awareness to tie in the people who work with animals whenever possible.

A kennel keeper who is in business for himself/herself could explain the work involved with the dogs and what it is like to be in business for oneself as opposed to being an employee of a larger organization.

A veterinarian could share his/her work, as well as explain proper care of pets to the students. The students could then think of all the occupations which tie in with animals.

Nurse

Since students develop stereotypic attitudes toward work by the time they reach first grade, a good way to start them thinking about expanding their options would be to invite a male nurse to class to discuss his work. In addition to learning about the occupation, the students would also gain a better understanding of the folly of sex role stereotyping. A discussion of traditionally sex role stereotyped occupations could follow. Hopefully, the outcome would be that very few, if any, jobs should be limited to one sex or the other.
Police Officer

As part of a unit on workers who help us (firefighters, the medical profession, and social workers) build an activity around the police officer.

Discuss how the police are portrayed on television and the duties real police do in our community. Since some people do not appreciate the work the police do, ask the students to think about how our communities would run if there were no police officers.

Invite a police officer to class and ask him/her to tell what the job is really like (as opposed to the television image) and focus on ways in which the police help children, particularly when a child becomes lost.

When the activity is over, discuss with the children steps they could take if they should ever become lost. Talk together about other situations which could arise when children might require assistance from a police officer.

3—4 Activities

Work and the Assembly Line

Welder
Lathe Operator
Quality Control Technician

A common theme in grades 3-4 is the idea of independence/interdependence. In addition to looking at the uniqueness of each of these jobs through use of guest speakers or field trips to their places of work, it would be a good idea to study, in depth, the concept of interdependence. An excellent way to teach interdependence is to develop and operate a classroom factory simulation which will produce, for profit, a particular product. A sample, involving all the elements of career education, follows:

1. Discuss with the students the difference between creating something independently and creating a product as a group. Ask them how they think it would feel to be part of an assembly line. Could they get the same feeling of achievement and satisfaction working as a group as they would completing something independently? (The element of self awareness).

2. As a group, have the students decide what they will make, what they will do with the money they earn, and how much money they need to make. Sample items to produce could be necklaces, bracelets, and paper flowers. (The element of decision making).

3. Once the product has been determined, decide what materials need to be purchased. Do comparison shopping to determine the best buys for your money. (The element of economic awareness).
4. Once the comparison shopping has been done, figure the amount of money needed to buy the materials. Take out a loan from the bank. A way to do this would be to talk with a banker ahead of time, and then have a small group of students talk with the banker to finance the loan. Of course, you will have to teach the group about obtaining bank loans, interest rates, etc. (The elements of career and economic awareness).

5. Once the loan is arranged and the materials are purchased, the assembly line and other departments of the factory must be established. The departments could include advertising and order taking, bookkeeping, packaging, and management (usually the teacher). A wide variety of occupations will exist in the assembly line, such as cutters, sewers, gluers, and assemblers. (The element of career awareness). All students in the class must apply for and be interviewed for the various jobs. (The element of employability skills).

6. Put the factory in operation. You will probably need one-hour blocks of time at scheduled periods throughout one or two-week periods in order to complete the activity.

7. While operating the factory, ask the students what type of education is necessary to be able to perform the various tasks. (The element of educational awareness). Ask them if they consider some jobs to be more prestigious than others. What would happen if one person neglects his/her job or is absent? (The element of appreciation and attitudes).

8. Once the factory experience is completed, the loan has been paid, and the profit has been spent, ask the students how they felt about working interdependently. Would they like work that involved them to be interdependent on other workers? How many types of jobs or places of work can they think of where one must work interdependently? (The elements of self and career awareness).
Work and Independence

The flip side to the concept of interdependence is, of course, independence. Both the occupations of clam digger and farmer fit this category. In looking at both occupations, the students should look for the advantages and disadvantages of being independently employed.

Clam Digger

As part of a science unit on natural resources, particularly in Maine, the occupation of clam digging could offer many interesting sidelights. The problems clam diggers encounter such as severe cold, red tide, depletion of clam flats could be studied in conjunction with climates, disease, and conservation.

A clam digger could visit the class and explain what it is like to be independently employed. The digger should be encouraged to stress both advantages and hardships. After the visit, the students could discuss what types of personality traits are necessary to become a clam digger, i.e. perseverance, physical endurance, determination, and willingness to take risks.

Farmer

For years, children have visited farms, basically to see the animals and see how they live. This same activity can be enhanced by looking at the occupations in farming—dairy, vegetable growers, sheep farmers, potato farming, as examples. The children could discuss ahead of time as part of a social studies unit (1) why Maine farmers in the late 1800's moved to the midwest to farm, and (2) the potato growing industry in Aroostook County—how small farmers have been pushed out and only the large growers can make a living now. In reading, the students could read stories about farming today and in the past.

Prior to the actual visit to the farm, the students could plan a list of questions for a career interview with the farmer. After the trip, the students should write a thank you note to the farmer. They could write a report about the occupation of farming and their feelings about it, and enter new words they have learned (i.e. husbandry, herdsman, foal, etc.) in their vocabulary notebooks.
Utility Worker
Telephone Operator

Public careers involve a wide range of services people perform for the good of others as opposed to producing a particular product for consumption. At the third and fourth grade levels, the New England Telephone Company has equipment and lesson plans for classroom use free of charge. The teacher merely needs to contact the local telephone business office to reserve a time for its use.

In conjunction with this activity, (or accompanying a lesson on telephone etiquette), the students could study careers involving telephones. A telephone operator could visit the class to describe his/her job with students. A utility worker who installs and repairs telephone lines could also visit the class and describe outdoor work as opposed to indoor. Related occupations and utilities could be shown, such as jobs in electrical companies, gas companies, and water companies. To foster appreciation for this type of work, students could write a story about a utility worker who helps people on a stormy night or a telephone operator who gets help for a family when their house catches fire.

X—Ray Technician Interpreter for the Deaf

Helping professions make up a large portion of the work force and their numbers are growing. The medical profession is one of the fastest growing areas of employment and has more job openings than most.

X—Ray Technician

In a science class concerning parts of the body, an X-ray technician could visit the group to describe his/her work with the body and the technology involved in making X-rays. Students could look at the wide realm of occupations related to an X-ray technician both in and out of the health field.
Interpreter for the Deaf

To develop an understanding and appreciation for handicapped people, the teacher could lead a discussion on contributions handicapped people make to society despite their handicaps. Have the students read the biography of Helen Keller, and invite an interpreter for the deaf to visit the class. Hopefully, the students will learn to see the handicapped as people with strengths and weaknesses and needs just like the rest of us, as well as learn about occupations which deal with helping handicapped people. The teacher can also point out that sign language is an alternative communication method. Other areas of study could include research on how technology can help the handicapped.

Surveyor

The surveyor also works with natural resources and is often involved in map making. Study of this occupation could be aligned with study of topography in science and development of map reading skills in social studies. Students could visit a surveyor on location or invite one to class to discuss his/her work and relate it to what the students are studying. Special math lessons could be designed that relate to the work of a surveyor.

Zoologist

As the farmer deals with animals, so does the zoologist. However, this occupation requires a great deal more formal education and training than does farming. The teacher could compare and contrast the occupations of farmer and zoologist in terms of working with animals, working conditions, and the types of educational programs leading to various careers.
5—6 Activities

Quarry Worker

As part of a social studies unit, the students could investigate the granite quarry workings of the 1800's. It would be fun for them to discover what famous buildings throughout the United States were constructed with granite from Maine. Then compare the work of the past with the quarry work that is done today. What are the products that are quarried today used for? What is the life style of a quarry worker today compared to workers in the 1800's? If possible, invite a quarry worker to class or visit a quarry worker on site.

Guide

As the students study history, particularly the periods when wilderness had to be explored and tamed, discuss with them the vast amount of wilderness areas that still exist in Maine. Hopefully, the students will appreciate this Maine heritage and want to help preserve and conserve this resource. One career which relates to this is, of course, the guide. A Maine Guide could talk with the class about his/her occupation stressing the importance of maintaining our wilderness areas for generations to come. Once the visit is completed, the students could write about their feelings towards the Maine wilderness and how they, themselves, can help preserve it.
Diver

Have students read a short story about a diver.

Many people think a diver leads a glamorous life diving for sunken treasures or pearls. Have students practice research skills by investigating the occupation of a diver through the Occupational Outlook Handbook and the Dictionary of Occupational Titles.

After reporting their findings, if possible, invite a diver to class. After the visit, have the students write compositions describing their reactions to this occupation.

Truck Driver

As part of a transportation unit in social studies, the students could investigate how trucking, to a great extent, has replaced the railroad system in America as a means of transporting goods. Have students practice map reading skills by giving them a series of starting places and destinations for which they must plan routes for a truck driver to reach as efficiently as possible. Ask a truck driver to bring his/her 18-wheeler to school to do a demonstration for the students as well as talk with them about his/her career. The truck driver should stress safety procedures and the responsibilities truck drivers have on the road. Following the demonstration, the students could write a report describing how trucking affects American economics and/or how the trucking lifestyle appears to them.
Airplane Pilot

As part of the same transportation unit, invite an airplane pilot to visit the class to talk about his/her work, stressing personality characteristics required and the education and training necessary to be a pilot. Have the students investigate related occupations and give oral presentations on careers in air travel.

Radiologist

In a science unit involving parts of the human body, invite or visit, on site, a radiologist to learn about his/her career as well as techniques in radiology for ridding the body of disease. Upon completion of this activity, the students could investigate, as a group, the wide range of medical occupations that exist. One way to start would be to look for each medical occupation in the ABC cards. Then, have each student write his/her feelings about working in a helping profession, including the advantages and disadvantages.
**News Reporter**

In a language arts project, the students could study careers related to writing, focusing, in particular, on the news reporter. Once they have researched this occupation, they should interview a news reporter about his/her career just as if they were actually conducting a news interview. When the interview is completed, they should visit a newspaper, a radio news station, and a television news station to look at the variety of occupations in the news field. After the visits, the class could divide into two groups, one simulating a newspaper staff and one simulating a television news stations. This would be a good opportunity to use video tape recording equipment.

**Newspaper Simulation Procedure**

1. Identify the jobs necessary to produce a class newspaper
2. Have students apply for the various jobs; teacher and/or resource people in the newspaper field will do the hiring
3. Have the news reporters and editor decide what news will be included in the newspaper
4. Do interviews and write articles
5. Print the class newspaper in the most similar way possible to actual practice, but feasible for your school (If your school has a word processing micro computer, this could be used to type right-justified columns)
6. Distribute papers to the class
7. Have students describe their reactions to the class

**Television News Station**

1. Identify the jobs necessary to produce a television news show
2. Have students apply for the various jobs; teacher and/or resource people in television news should do the hiring
3. Have the station manager and anchor person decide what news will be featured
4. Do interviewing and, if possible, video-tape material for the news broadcast
5. Do the news broadcast with the rest of the class observing
6. Have the students discuss their reactions to the simulation
Shipfitter

One of Maine's largest industries is Bath Iron Works. If travel is possible, a field trip to this major industry would expose children to a variety of industrial careers. Before going, have the children study "shipfitter" and other occupations represented at BIW such as welder, yard worker, and others in the Occupational Outlook Handbook and the Dictionary of Occupational Titles. They should decide which type of workers they want to interview and what questions they want to ask. When they get to the Iron Works, they could interview the workers in mini groups or as a whole class. Once they return from the trip, they can summarize their findings by creating a bulletin board on careers at Bath Iron Works.
Dear Bernie and Darlene,

Thank you very much for letting us visit your Wine and Cheese Shop.
I liked it. I liked it when Bernie ran the dough through the Dutchess. It was fun when we made rolls. But, Bernie, why did you smooch the pretty rolls?
The French bread was fun, too.
I thought it was fun, too, when we watched Darlene use her cash register. If your shop I am going to be mad at her!

Again, thank you very much.

Sincerely,

Tessa Joseph.
Additional Elementary Resources

The availability of up to date resources for use in the elementary classroom is essential for the development of creative and stimulating lessons. Following is a list of key government publications that should be housed in your building for reference by professional staff and, when appropriate, students.

**Government Publications**

1. *THE DICTIONARY OF OCCUPATIONAL TITLES*
2. *THE OCCUPATIONAL OUTLOOK HANDBOOK*
3. *EXPLORING CAREERS*
4. *THE MAINE OCCUPATIONAL MICROFICHE LIBRARY*
5. Publications From The Research And Analysis Unit Of The Maine Department Of Labor

These publications will allow teachers to gain insights and understandings regarding employment opportunities and their relationship to individual interests, aptitudes, skills and the state/national economy.

**The Dictionary of Occupational Titles (D.O.T.)**

*THE DICTIONARY OF OCCUPATIONAL TITLES* contains information about over 25,000 occupations. This resource allows for the analysis of occupations based upon relationships to data, people, and things. Basic job duties are provided for each occupation.

**The Occupational Outlook Handbook (O.O.H.)**

This document developed by the federal government takes the D.O.T. one step further. In addition to job descriptions, the *OCCUPATIONAL OUTLOOK HANDBOOK* provides its readers with information relating to employment projections. This would be an excellent resource for developing bulletin boards.

**Exploring Careers**

*EXPLORING CAREERS*, a set of federal publications, is a companion to the D.O.T. and the O.O.H. This resource provides various strategies for career exploration and introduces readers to the occupational clusters. Although geared for junior/senior high school students, this publication would be a useful resource to elementary teachers.

**The Maine Occupational Microfiche Library**

*THE MAINE OCCUPATIONAL MICROFICHE LIBRARY* presents information on over 1,000 occupations that are performed in the State of Maine. The library consists of (1) *THE COUNSELOR’S GUIDE*, (2) *THE SEARCH GUIDE*, (3) *THE ALPHABETICAL INDEX OF OCCUPATIONS*, (4) *THE CAREER CLUSTER INDEX OF OCCUPATIONS*, (5) *THE SEARCH CODE INDEX*, (6) Two Wall Posters, and (7) A Box of Microfiche Aperature Cards Containing Career Information. Access to this resource at the elementary level would provide teachers with timely and accurate information relating to jobs in Maine.
Department of Labor Publications

THE RESEARCH AND ANALYSIS DIVISION OF THE MAINE DEPARTMENT OF LABOR has been a leader in the development of useful publications in the field of labor market information. These materials are available for a minimal charge.

Non—Government Publications

In addition to the publications made available through the federal and state governments, commercial publishing companies have developed many useful materials, both in print and audio/visual formats that support career information dissemination efforts.

The Maine Occupational Information Coordinating Committee houses Maine's WORK EDUCATION RESOURCE CENTER. This center was established in 1980 in collaboration with the Department of Educational and Cultural Services and the State Employment and Training Council. The center contains materials available to educators throughout Maine that relate to career education concepts. Following is a listing of those materials appropriate for the elementary classroom.

WORK/EDUCATION RESOURCE CENTER  
STATE HOUSE STATION 71  
AUGUSTA, MAINE 04333  
289-2331

Elementary Title List  (fs/c)* Filmstrip and cassette

Addition: A High Interest Workbook in Mathematics and Language  
Bread and Butterflies  
But It Isn't Yours (fs/c)*  
Career Awareness Program, K-6—South Portland  
Career Cluster Guide  
Career Education Activities for You  
Career Education: An Idea Book  
Career Education Curriculum Guide, K-6  
Career Education Exchange Curriculum Guides: Kindergarten; Grade 1  
Grade 3—Self Awareness; Grade 5—Communication  
Grade 4-6—Women in Maine  
Career Education Program, v.1, K-6  
Career Education: Some Essential Learner Outcomes-Primary grades  
Intermediate grades
Career Search
Creative Options for Children of the 80's
Decision Making Dimension Guide, K-6
Geranium on the Windowsill
Guess Who's in a Group? (fs/c)*
How Can You Work Things Out? (fs/c)*
How Do You Know What's Fair? (fs/c)*
How Do You Know What Others Will Do? (fs/c)*
How Would You Feel? (fs/c)*
I Can: Ideas for Teachers
Introducing the World of Work
Kindergarten Curriculum for Conceptual Language Development
Learning About Others (fs/c)*
Learning to Solve Problems (fs/c)*
Learning to Use Your Mind (fs/c)*
Lifestyle Dimension Guide, K-6
Magic Carpet Grades 3-4
People Working Today
Self Development Dimension Guide, K-6
Teacher Developed Curriculum Modules: Basic Curriculum, K-3; 4-6
Grades 4-6, All Subjects
Teacher Developed Infused Curriculum Modules: K-3 All Subjects
4-6 All Subjects
Teacher Training—A Strategy for Teaching Values
Teacher Training—A Strategy for Teaching Social Development
That's Not Fair! (fs/c)*
The Trouble With Truth (fs/c)*
What Do You Do About Rules? (fs/c)*
What Do You Expect of Others? (fs/c)*
What Happens Between People? (fs/c)*
Who Do You Think You Are? (fs/c)*
You Got Mad: Are You Glad? (fs/c)*
You Promised! (fs/c)*
*fs/c - Filmstrip and cassette
Listings, Dictionary of Occupational Titles:

APPLE PICKER
   (See Supervisor) 409.131-010
AIRPLANE PILOT 196.263-014
AUCTIONEER 294.257-010
BAKER 526.381-010 and 313.381-010
BOTANIST 041.061-038
BOAT BUILDER 860.381-018
CARPENTER 860.381-022 and 860.381-042
COMPUTER PROGRAMMER 007.167-018
CLAM DIGGER 446.684-014
DANCER 151.047-010
DENTIST 072.101-010
and 807.381-010
DIVER 899.261-010
and 899.664-010
EARMUFF MAKER 784.687-022
EDITOR 132.067-014
   (See Alphabetical Index for others)
ENTOMOLOGIST 041.061-046
FARMER 421.161-010
FIREFIGHTER 373.364-010
FORESTER 040.061-034
GEOLOGIST 024.061-018
GUIDE 353.161-010
GYM TEACHER
   (See Recreation Specialist) 187.137-010
HAIR STYLIST 332.271-082 and 332.271-018
HAND SEWER 788.684-054
HORSE TRAINER 419.224-010
ICE CREAM MAKER
   (See Ice Cream Chef) 313.381-034
INDUSTRIAL TRUCK DRIVER 921.683-050
INTERPRETER FOR THE DEAF 137.267-014
JANITOR 382.664-010
JEWELER 700.281-010
JUDGE 111.107-010
KENNEL KEEPER 410.674-010
KEYPUNCH OPERATOR 203.582-030
LATHE OPERATOR 690.680-010/690.685-322
   (See Alphabetical Index for others)
LOBSTER FISHER 441.684-014
LOGGER 454.684-018
MAIL CARRIER 230.367-010
MASON
   (See bricklayer) 861.381-018
MECHANIC 620.261-010
NEWS REPORTER
   (See News Writer) 131.267-014
NURSE 075.374-010
   (See Alphabetical Index for others)
OPERATOR (Telephone) 235.462-010
   (See Alphabetical Index for others)
OPTOMETRIST 079.101-018
OFFSET PRESS OPERATOR 851.685-018/651.482-010
PHOTOGRAPHER 143.062-030
   (See Alphabetical Index for others)
PLUMBER 862.381-030
   (See Alphabetical Index for others)
POLICE OFFICER 375.263-014/375.367-010
   (See Alphabetical Index for others)
QUALITY CONTROL TECHNICIAN 012.261-014
   (See Alphabetical Index for others)
QUARRY WORKER 939.667-014
QUICK SKETCH ARTIST 149.041-010
RADIO ANNOUNCER 159.147-010
RADIOLOGIST 070.101-090
RECEPTIONIST 237.367-038
SHIPFITTER 806.381-046
SHOEWORKER 788.381-014
   (See Alphabetical Index for others)
SURVEYOR 018.167-018
   (See Alphabetical Index for others)
TAILOR 785.261-014
TRUCK DRIVER 905.663-014/906.683-022
TYPIST 203.582-066
UNIVERSITY PROFESSOR 090.227-010
UPHOLSTERER 780.381-018
UTILITY WORKER 821.361-018
VETERINARIAN 073.101-010
VIDEO CAMERAPERSON 143.062-022
VIOLINIST 152.014-010
WALLPAPER HANGER
   (See paperhanger) 841.381-010
WELDER 810.384-014/811.482-010
WHEEL Wright 706.381-046
X-RAY TECHNICIAN 199.361-010/078.362-026
XYLOGRAPHER
   (See Hand Carver) 761.281-010
YARD WORKER 929.133-010/910.664-010
   (See Alphabetical Index for others)
YARN WEAVER 683.682-038
YEOMAN (Not Listed)
ZOO KEEPER 412.674-010
ZOOLOGIST 041.061-090
Words and Phrases

Certain words and phrases are unique to the World of Work. Therefore, vocabulary study is important when one is exploring the work world. Following is a sample listing of words and phrases found within the text on the ABC cards. Students can use this listing and other words on the cards to understand (1) words that relate to work settings and (2) the variety of tools associated with occupations.

<table>
<thead>
<tr>
<th>Occupation</th>
<th>Related Words and Phrases</th>
</tr>
</thead>
<tbody>
<tr>
<td>Airplane pilots</td>
<td>freight</td>
</tr>
<tr>
<td>Apple pickers</td>
<td>bushel</td>
</tr>
<tr>
<td>Auctioneers</td>
<td>bidder, bid</td>
</tr>
<tr>
<td>Bakers</td>
<td>recipes, measure</td>
</tr>
<tr>
<td>Boat builders</td>
<td>drawn plans, celebrate</td>
</tr>
<tr>
<td>Botanists</td>
<td>environment, atmosphere</td>
</tr>
<tr>
<td>Carpenters</td>
<td>hand vs. power tools, building materials</td>
</tr>
<tr>
<td>Clam diggers</td>
<td>clam rake</td>
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<tr>
<td>Computer programmers</td>
<td>symbols</td>
</tr>
<tr>
<td>Dancers</td>
<td>emotion, instructor, mood</td>
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<tr>
<td>Dentists</td>
<td>hygienists, assistant</td>
</tr>
<tr>
<td>Divers</td>
<td>services, propellers</td>
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<tr>
<td>Earmuff makers</td>
<td>patent, invention, factory</td>
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<tr>
<td>Editors</td>
<td>designers</td>
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<tr>
<td>Entomologists</td>
<td>pollinate</td>
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<tr>
<td>Farmers</td>
<td>specialized, soil</td>
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<tr>
<td>Fire fighters</td>
<td>community, artificial respiration, techniques</td>
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<tr>
<td>Foresters</td>
<td>manage, recreation</td>
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<tr>
<td>Geologists</td>
<td>government</td>
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<tr>
<td>Guides</td>
<td>wilderness</td>
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<tr>
<td>Gym teachers</td>
<td>supervise, posture, physical growth</td>
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<tr>
<td>Hair stylists</td>
<td>features, solutions</td>
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<tr>
<td>Hand sewers</td>
<td>craft</td>
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<tr>
<td>Horse trainers</td>
<td>thoroughbred, breed</td>
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<tr>
<td>Ice cream makers</td>
<td>decorate, chefs</td>
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<tr>
<td>Industrial truck drivers</td>
<td>device, booms, clamps, industry</td>
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<tr>
<td>Interpreters</td>
<td>language, broadcasts, translate, impaired</td>
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<tr>
<td>Janitors</td>
<td>general appearance</td>
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<tr>
<td>Jewelers</td>
<td>polishing wheel</td>
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<tr>
<td>Judges</td>
<td>testimony, open-minded, evidence</td>
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<tr>
<td>Kennel keepers</td>
<td>schedule, disinfect</td>
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<tr>
<td>Keypunch operators</td>
<td>punch cards, magnetic tape, automatic, data processing equipment</td>
</tr>
<tr>
<td>Lathe operators</td>
<td>lathe, intricate</td>
</tr>
<tr>
<td>Lobster fishers</td>
<td>distinctly</td>
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<tr>
<td>Loggers</td>
<td>cord</td>
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<tr>
<td>Mail carriers</td>
<td>vehicles, readdress</td>
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<tr>
<td>Masons</td>
<td>mortar, trowel</td>
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<tr>
<td>Mechanics</td>
<td>customers, install</td>
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<tr>
<td>News reporters</td>
<td>assignment</td>
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<tr>
<td>Nurses</td>
<td>responding, treatment</td>
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<tr>
<td>Offset press operators</td>
<td>printing plates</td>
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<tr>
<td>Operators</td>
<td>reversed, emergency, switchboard</td>
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<tr>
<td>Optometrists</td>
<td>examine, prescribe</td>
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<tr>
<td>Photographers</td>
<td>personality</td>
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<tr>
<td>Plumbers</td>
<td>hydraulic, company</td>
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<tr>
<td>Police officers</td>
<td>communities, investigate</td>
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<tr>
<td>Quality control technicians</td>
<td>products, reliable, manufacturing, electronics equipment</td>
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<tr>
<td>Quarry workers</td>
<td>extract, monitor, remote control panels, principal, monument</td>
</tr>
<tr>
<td>Quick sketch artists</td>
<td>pastels, medium</td>
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<tr>
<td>Radio announcers</td>
<td>duties, announce, pronunciation, usage</td>
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<tr>
<td>Radiologists</td>
<td>diagnose, fluoroscope, radioactive isotopes, therapeutic, technologists</td>
</tr>
<tr>
<td>Receptionists</td>
<td>arrangements, distribute, appointments</td>
</tr>
<tr>
<td>Shipfitters</td>
<td>fasteners, welded, riveted, foundation, assemble</td>
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<tr>
<td>Shoe workers</td>
<td>decorations</td>
</tr>
<tr>
<td>Surveyors</td>
<td>techniques, determine, boundaries, compile, aerial</td>
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<tr>
<td>Tailors</td>
<td>garment</td>
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<tr>
<td>Truck drivers</td>
<td>transport, maneuvering, distance</td>
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<tr>
<td>Typists</td>
<td>stencil, clerk, combine, transcribing, dictation</td>
</tr>
<tr>
<td>University professors</td>
<td>encourage, exams, closed circuit, literature, research</td>
</tr>
<tr>
<td>Upholsterers</td>
<td>fabric, antiques, preserved</td>
</tr>
<tr>
<td>Utility workers</td>
<td>erect, transmits, high voltage</td>
</tr>
<tr>
<td>Veterinarians</td>
<td>advise, research</td>
</tr>
<tr>
<td>Video camerapersons</td>
<td>specialize, settings</td>
</tr>
<tr>
<td>Violinists</td>
<td>professional, symphonies, orchestras, quartets, practice</td>
</tr>
<tr>
<td>Wallpaper hangers</td>
<td>seams</td>
</tr>
<tr>
<td>Welders</td>
<td>permanently, partially</td>
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<tr>
<td>Wheelwrights</td>
<td>discs, pry bar</td>
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<tr>
<td>X-ray technicians</td>
<td>diseases, technician, supervision</td>
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<tr>
<td>Xylographers</td>
<td>impressions</td>
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<tr>
<td>Yard workers</td>
<td>employed, instructions</td>
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<tr>
<td>Yarn weavers</td>
<td>textile</td>
</tr>
<tr>
<td>Yeomen</td>
<td>clerical, compared, organize, nautical, executive</td>
</tr>
<tr>
<td>Zoo keepers</td>
<td>transfer, locations, exhibits</td>
</tr>
<tr>
<td>Zoologists</td>
<td>behavior, species, conduct, specimens, body processes, fields</td>
</tr>
</tbody>
</table>
Notes and Ideas