Based on a class in small engine repair, this document prepares teachers to help special needs students to enter the world of work. The paper contains an overview of the course, which teaches students repair skills while introducing them to safety habits, work habits, and characteristics that employers expect of entry workers. Strategies outlined include making the school shop a real workplace, varying teaching techniques, and keeping mind and body fit while passing such attitudes along to students. A list of seven resources is provided. (KC)
AVA-The Kaleidoscope

A. Presentation Title: Preparing Special Needs Students for The World of Work

B. Submitted: Kaleidoscope.

C. Population Served: Handicapped and/or disadvantaged students.

D. Presenter: Ricken, Heinz W.
Instructor of Small Engines
Union County Vocational-Technical School
1776 Rartian Road
Scotch Plains, N.J. 07076
1-201-889-2000 Ext. 390 (work)
1-201-272-3910 (home)

E. Chairperson: Same as above.

F. Proposal will not be submitted to any other AVA division.

G. Service Provided: New Technologies for Working & Learning
II Proposal

A. Presentation Title:
Preparing Special Needs Students for The World of Work

B. Presentation Objectives:
1. There will be an overview of a model Small Engines Program which has integrated the school experience with the world of work.
2. Participants in the workshop will develop an awareness of how to adapt standard teaching strategies to the shop experience.
3. The participants will develop strategies for designing the classroom as a work place to better facilitate the transition from the classroom to the work place.

C. Prospective Audience:
Vocational instructors, administrators, instructors of handicapped, disadvantaged students, secondary and post secondary level.

D. Abstract:
This workshop will present an overview of a Small Engine course designed to provide the student with theoretical and practical experience to obtain employment within this occupational area. The student is introduced to different methods of engine repair and types of tools used on both four-cycle and two-cycle engines. The student is exposed to job responsibilities both in the classroom and on-the-job. Emphasis is placed on student performance in repair procedures used in small engine repair shops.

The presentation will detail the methods used to achieve the specific objectives of the Small Engine Program listed below:

1. Student will develop specific skills and related knowledge associated with the Small Engine Repair occupation.
2. Student will develop occupational safety habits.
3. Student will develop pride in work and appreciation for craftsmanship.
4. Student will develop ability to cooperate with fellow workers in a small engine shop.
5. Student will develop individual initiative and responsibilities as a worker.
D. Abstract continued

This presentation describes how to prepare Special Needs students for the "World of Work". Although the techniques and suggestions discussed focus on a small engine shop setting, these ideas presented work well in a variety of vocational training programs.

Vocational education success is often measured in terms of the number of technical skills taught and learned, and the number of students placed in jobs for which they were trained. Effective preparation for work can be achieved when training is given using the same operations, the same tools, and the same machines as in the occupation itself. The education will be most effective when shop instructor has had successful experience in the operations and processes he undertakes to teach. Vocational educators must recognize conditions as they are in the field and train their students to meet the demands of the "market", although it may be known that better working conditions are highly desirable. There should be mutual respect between the instructor and students that will allow learning and fun at the same time.

Shop people need to get a job done! The tools and equipment in a program can enhance or restrict the training of the students. For the students and program to succeed, the tools and equipment "Must" be equivalent to those in the trade. Then employers will be eager to hire students who are able to use tools, equipment and perform serves quickly and professionally. Class shops should look like real shops and not just another school shop. As an instructor, you must make your shop look like a real shop.

As an instructor, you must keep abreast of your field in the "Real World of Work". This should be done by attending trade shows and factory service schools. This is where you meet factory representatives, see new items, and learn about updating and new service procedures.

"Variety Is The Spice Of Life". By changing your style, as well as the content of learning activities, you will draw the students attention and hold it. "Dare To Be Different---". The main objective of you, the instructor, is to mold the students into efficient and competent workers whose work is not only acceptable but shows quality and quantity according to company's standards for entry levels. As a classroom instructor, you should take personal responsibility to prepare work for students carefully. Remember, the most effective learning results when there is an immediate application of what has been taught. The more often the student uses what he has learned, the longer he will retain that skill. Pay special attention to even small improvements. The student is a reflection of the instruction. Your students' success is your success; their failure is your failure.
D. Abstract, continued

The Small Engines program described is currently offered to special needs students at Union County Vocational-Technical School, in Scotch Plains, New Jersey.

E. Program Description:

An overview of a Small Engines program for Special Needs students with emphasis on practical teaching strategies is presented by a Small Engines instructor.
STRATEGIES FOR TEACHING SPECIAL NEEDS STUDENTS

TO

PREPARE FOR THE WORLD OF WORK

BY

Heinz Ricken
The Small Engine course is designed to provide the student with theoretical and practical experience in methods of engine repair, tools used on four-cycle and two-cycle engines, and exposure to job responsibilities both in the classroom and on the job.

As an instructor, it is your responsibility to meet the needs of each student so that upon completion of the course the student will have:

A. Developed specific skills and related knowledge associated with small engine repair.

B. Developed pride in work, appreciation for craftsmanship and occupational safety habits.

C. The ability to cooperate with fellow workers.

D. The ability to solve problems in a small engine shop.

E. Develop individual and responsibility as a worker as well as an understanding of labor management.

F. A knowledge of career opportunities within the field of small engines.
This presentation describes the development of the Small Engine Course at Union County Vocational & Technical Schools, Scotch Plains, New Jersey.

Vocational Education success is often measured in terms of the number of technical skills taught and learned, and the number of students placed in jobs for which they were trained.

Nearly 2.5 million students leave the schools each year without adequate preparation for work. Effective preparation for work can be achieved when training is given using the same operations, the same tools, and the same machines as in the occupation itself. The education will be effective in proportion as the instructor has had successful experience in the application of skills and knowledge to the operations and processes he undertakes to teach. Education must recognize conditions as they are and train individuals to meet the demands of the "market" although it may be known that better working conditions are highly desirable. There should be mutual respect between the instructor and students that will allow fun and learning to happen at the same time.

"SHOP PEOPLE NEED TO GET A JOB DONE"

Does your classroom look like a real shop or just another school shop? Is the equipment up to date? The tools and equipment used in a program can enhance or restrict the training of the students. Unless the tools and equipment are up to date, students will fail on the job. For a program to succeed, the tools and equipment MUST be equivalent to those in the field. Then employers will be eager to hire your students who are able to use the tools, equipment and perform services quickly and professionally.
Work areas and workbenches should be designed to look like those in trade shops. Each student should have their own set of tools to use, and be responsible for them. In the real world of work, trades people have their own tools. These could be in a large roll around tool chest or small mechanics tool boxes. There are no tool cribs in shops in the real world of work.

Visit the local shops in your trade area to see what they look like. Talk with the owners and ask their help in setting up your shop. Don’t forget to take along a camera for some pictures of their shops. Advisory board members can be a big help to you in setting up your shop.

Teach your students to become comfortable with tools and their proper use. Efficiency and productivity in a shop demand that tools are intelligently used. Students must also learn to operate test equipment in their trade area correctly.

One of the most important books your students will use in his trade are Factory Service Manuals and Service bulletins. It is important that students learn to use the Parts Manuals and Micro-fiche Reader. Today, modern shops use Micro-fiche readers in their service shops and parts departments. No text books teach students how to use these items. Use of these materials must become second nature to your students. Keep the parts books and Micro-fiche reader out in the open, or on a shelf, and remind your students to use them. In conjunction with parts manuals and micro-fiche, students should learn how to write and fill out job tickets. Job tickets should be used
in your shop.

As instructors you must keep abreast of your field in the Real World. How do you do this?

1. Attend Factory Schools and Clinics.
2. Attend Trade Shows.

This is where you meet factory representatives, see new items, learn about updating and new service procedures. It's also a good place to receive "Free Bees".

An important part of learning for students are guest speakers and field trips. In your shop maintain bulletin boards and trade magazines for your students to read. Students don't like to read text books but they do enjoy reading magazines. Allow them to read these while they are in your shop. Models in your shop help students to learn.

"VARIETY IS THE SPICE OF LIFE"

By changing your style, as well as the content of learning activities, you will draw the students' attention and hold it. Basic techniques such as visual and audio aids, picture and posters are fine, however, use movement, interact with your students, have them interact with each other. Changing your voice tone, hesitating, pausing .... a brief silence can be amazingly attention getting. Don't be afraid to use humor, examples, analogies, stories, and questions to facilitate the active participation of each student in lectures and demonstrations.

"DARE TO BE DIFFERENT"
The main objective of the instructor is to mold the student into an efficient and competent worker whose work is not only acceptable but shows quality and quantity according to company's standards for entry levels. The most effective learning is a result of logical planning and related instruction. Remember, the most effective learning results when there is an immediate application of what is taught. The more often the student uses what he has learned, the longer he will retain that skill.

As a classroom instructor, you should take personal responsibility to prepare work for the students carefully. Be sure students practice the skill they are taught and move toward perfecting their skills. Pay special attention to even small improvements. The student is a reflection of the instructor. Your students success is your success; their failure is your failure. Happy teaching!
Critical Question:

If you feel successful, will you be successful?

Psychologists who have researched the traits of successful people say feeling successful is an important prerequisite to actual success. How can you build a feeling of success within yourself and your students?

Try these suggestions:

1. Be well informed. Being knowledgeable about your career helps you build more self-confidence.

2. Write your goals. Having written goals gives you a "target" to aim for. Your goals are your own personal definition of success.

3. Get feedback and advice. Find a mentor in your field; someone you can trust who is willing to give advice and feedback on your efforts.

4. Keep a healthy self image. Find and associate with people who appreciate you. Regular praise from others helps confirm your own good opinion of yourself.

5. Enjoy your life and work. Maintain a sense of humor --- it's an important way to keep your self-confidence and feel successful.
Some techniques for keeping refreshed .... all day long.

Most people experience their highest energy level during the morning hours. Why? Management experts say it's because we're refreshed from a good night's sleep, and the pressures of the day haven't had a chance to take their toll.

These are some techniques to keep that refreshed morning feeling throughout the whole day:

1. Seek closure --- "Closure is a psychological term that refers to your mind's natural desire to want things completed. You can provide closure by dividing long projects into short term parts that can be completed in a day or less.

2. Want to do the things you have to do --- Most people have responsibilities they don't like to do. Try thinking of these as opportunities rather than duties. For example, you might look at a dull daily chore as a way to learn patience and attention to detail.

3. Exercise regularly --- Many medical studies indicate exercise can improve your performance both mentally and physically. Walk a few blocks, or climb stairs to get some exercise during the day.
BIBLIOGRAPHY


