Our Seven Goals

- 1. To meet the needs of a modern Technological society.
- To provide advanced educational and training opportunities for all people of our area.
- 3. To help those people who are out of school, upgrade their skills and consequently develop a better way of life.
- To help provide business and industry with the skilled craftsmen, technicians, and semi-professional people needed to maintain its modern operations.
- To help provide our area with useful, productive citizens, who will make a worthy contribution to their state, county, and town; a person who will take his job, church, and community seriously.
- 6. To develop an individual who can be easily retrained in the event of "technological unemployment" caused by some unforeseen form of automation in the future.
- 7. To help provide a progressive economy for the community.



Walker County Area

Technical School

Established 1966



Bulletin Volume IV

ROCK SPRING, GEORGIA 30739

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Walker County Area Technical School

OPERATED UNDER THE SUPERVISION OF THE GEORGIA STATE DEPARTMENT OF EDUCATION OFFICE OF ADULT AND VOCATIONAL EDUCATION

AND THE

WALKER COUNTY BOARD OF EDUCATION

ACCREDITED BY

THE SOUTHERN ASSOCIATION OF SCHOOLS AND COLLEGES

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General Information

The School Facility and Equipment

The Walker County Technical School, serving four counties, is a part of the public school system of Georgia and Walker County. The building is of functional and flexible design and is one of the finest and best equipped schools in the state of Georgia.

The school contains 45,000 square feet of floor space to provide facilities for thirteen different course offerings. School personnel, with the cooperation of technical advisory committees, evaluate each training program to insure that the latest techniques and latest equipment will be used for up-to-date training.

Faculty

Each instructor is a highly qualified specialist in his field. In addition, he, by professional preparation, is a state certified teacher. This means that an instructor must have worked a minimum of two years in the field that he will be teaching. He must also meet other special requirements set forth by the Department of Adult and Vocational Education of the State Department of Education.

The School Year

The school year at Walker County Area Technical School is divided into four quarters. Normally, students may enter school at the beginning of any new school quarter.

Students at Walker Tech observe all school holidays plus two weeks vacation during the summer.

Day Classes

Full-time day classes are six hours in length. Students spend approximately one-half day in the classroom for related subject matter and theory; the other half of the day is spent in the laboratory for practical application.

Evening Classes

Evening classes are held from 6:30 p.m. to 10:30 p.m. Monday through Thursday night. The following evening courses are offered: Electronics Technology, Drafting and Design Technology, Radio and TV Repair, Machine Tool, Heating and Air Conditioning, Automobile Mechanics, Welding, Appliance Servicing, Blueprint Reading, GED Preparation, Business Education, and Data Processing.

Extended Day Classes

Classes in Appliance Servicing, Automotive Mechanics, and Welding meet from 4:30 p.m. to 10:30 p.m. Monday through Friday. Students in these classes are classified as full-time.

Accreditation

Walker Tech is fully accredited by the Committee on Occupational Education of the Southern Association of Colleges and Schools.



Student Activities

Walker County Tech offers a wide variety of activities for its students. The school has a complete intramural athletic program for students who are interested in sports. There are social activities scheduled throughout the school year. The **TECH-TALK** is the school's newspaper. Also, Walker Tech has an active student council elected by the student body.



Adult General Education

Academic instruction is offered both on and off campus for adults. There are three divisions.

Adult Basic Education is designed to help those with less than an eighth grade education. Emphasis is on reading, math and language skills.

GED Preparation provides study in the five areas of the High School Equivalency examination.

A high school credit program is available to those who wish to pursue a course of study leading to a regular high school diploma. All instruction and materials are free of charge.

For more information contact the Coordinator of Adult General Education.



Off-Campus Training Program

Walker Tech has an off-campus training program designed to meet the specific training needs of business, industry, and the community which aren't already being met by the school's other programs.

Special courses ranging from 10 to 150 hours are conducted throughout the four counties served by the school.

Courses are offered for virtually any type of occupational training. For additional information concerning specific course offerings contact the office of the off-campus coordinator.

General Educational Development Test Program

Walker Tech has been designated as the GED test center for northwest Georgia. By passing the GED it is possible to obtain a high school equivalency certificate in lieu of the high school diploma.

Courses in GED preparation are offered in both the day and evening division.

Students who have not finished high school and who enter an occupational program are encouraged to try to obtain the high school diploma by the time they finish their occupational training.

Individualized Instruction

Some of Walker Tech's programs are individualized. What this means to the student, as well as the instructor, is greatly increased efficiency in use of room and materials and a much more effective learning process. The student works independently to complete each section of a course until the entire course is completed. He may go as fast or as slow as his individual capabilities permit.

In addition, the student can enter the course at any time during the quarter. He receives a set of programmed materials, which may range from tapes or slides to video tapes, along with step-by-step instructions on how to use them. A student in an individualized course works mainly on his own, but the instructor is always there to assist. As soon as the student successfully completes one section of the course, he can go to subsequent sections until the course is completed.

Goal Program

The Georgia Occupational Award for Leadership is sponsored jointly at the state level by the Georgia Department of Education and the Georgia Chamber of Commerce. At the local level the program is sponsored by the LaFayette Chamber of Commerce and Walker County Technical School. The purpose of the program is to give proper recognition to the dignity and importance of Vocational Technical Education in today's modern economy.

In the spring, four local winners will be selected by a screening committee. Each winner will be awarded a cash prize. Of the four local winners, one will be selected to represent Walker Tech in the state contest. The winner of the state contest wins a new automobile.

Grades, attitude, personal goals, poise, and self-confidence are considered in selecting GOAL winners.



Grading System

Directors and Merit List

At the end of each quarter, students who compile an average of 3.8 to 4.0 with 4.0 being an all "A" average, are placed on the Director's List. To qualify for the Merit List, one must have an average of 3.50 to 3.80.



The purpose of the Evaluation Center is to assist individuals in making vocational decisions. Evaluation is a personal assessment of one's capabilities by utilizing work sampling, counseling and testing. Each individual participates in a comprehensive evaluation so that he can better choose an occupation or area of training that is consistent with his capabilities.

In Work Sampling, "Hands On" activities are the focus of attention. Through the utilization of a work sample evaluation system, the evaluation center staff provides the student with an opportunity to perform actual work in his investigation of the occupational areas. He becomes familiar with the tools and terminology associated with each occupational area and thus enhances his opportunity to choose or enter a suitable and rewarding occupation.

Counseling sessions are provided on a scheduled but informal basis. These counseling sessions provide the student with information concerning job opportunities, training availability, and general attitude adjustment.

Tests and questionnaires are administered each individual and help indicate levels of interest, achievement, aptitude and dexterity. These inventories are not pass-fail tests; there is no student competition. The results of these inventories are used as a measuring device to aid in helping the individual formulate an Educational-Occupational Goal for himself.

For admission to the Evaluation Center, call or come by to see the recruiter at Walker County Area Technical School. The only requirement is that you must be sixteen years old. There is no cost for the evaluation or basic skills classes.

The length of evaluation varies with each person, averaging between twenty-five and thirty hours. Evaluations are scheduled five days a week between the hours of 8:30 and 3:30 p.m. At least a two-hour block a day should be scheduled.

Placement is the major objective of the Evaluation Center. We assist every student in obtaining training and employment. However, no person is guaranteed training or employment.

Basic Single Skills

This laboratory is organized to assist individuals in preparing to enter a regular program at Walker Tech. Training is also offered in the following areas: Cabinetmaking, Cash Register Operation, Carpentry, Drafting, Lawnmower Repair, Sheet Metal Construction, Ten Key Adding Machine Operation, and Typing.



Driver Education

The Driver Education program is open to anyone 15 years of age or older. The purpose is to give the non-driver an opportunity to learn the skills, rules and techniques required to drive a car properly. The course consists of 30 hours of classroom instruction, 12 hours of simulated driving procedures, and three hours behind-the-wheel instruction.



Since Walker County Tech is a tax-supported unit of the Walker County and Georgia State Department of Education, there will be no tuition charge for bona fide residents of Georgia. Each student will be required to pay a nominal supply fee and purchase his books. The supply fees are listed below by courses.

Appliance Servicing\$20.00*
Automotive Mechanics
Business Education 20.00*
Cosmetology 20.00*
Data Processing 20.00*
Drafting & Design Technology 20.00*
Electronics Technology 20.00*
Heating & Air Conditioning 20.00*
Machine Tool 20.00*
Practical Nursing 20.00*
Radio & TV 20.00*
Welding 20.00**
* per quarter ** per month

ALL FEES MUST BE PAID BEFORE A STUDENT IS FULLY ENROLLED.

Financial Aid

Veterans Financial Assistance

Walker County Area Technical School is approved by the State Department of Veterans Services for training under Public Law 89-358 (Cold War G.I. Bill) and Public Law 840634 (War Orphans Act).

Social Security

Qualified students may receive assistance from the Social Security Administration while attending Walker Tech. Contact your local Social Security Office for additional information.

Vocational Rehabilitation

Qualified students may receive assistance while attending Walker Tech. Contact your local Vocational Rehabilitation Counselor for additional information.

CETA

Whenever individual slots are available, unemployed and underemployed individuals may receive a weekly allowance plus cost of books and fees to attend school. Contact your local Georgia State Employment Service office for additional information.

Scholarships

Scholarships that cover the cost of fees, books and supplies are available from the Barwick Foundation. These scholarships are restricted to sons and daughters of Barwick employees or to employees of Barwick.

Two scholarships are awarded annually by the LaFayette Women's Club to female graduates of LaFayette High School.

College Work Study

Walker Tech participates in the College Work Study program. Students in need of financial assistance may work from ten to forty hours a week in jobs located both on and off campus.

Georgia Incentive Scholarship

This program is sponsored by the Georgia Higher Education Assistance Authority. This grant gives an eligible student from \$50 to \$150 per quarter to attend Walker Tech. Special provisions are made in this program for veterans, so it could be beneficial if you apply. This grant is for Georgia residents only.

Authority Direct Student Loans (Health Occupations Only)

This loan may be borrowed up to a maximum of \$1500 per academic year. This loan may either be repaid or may be deleted by a year's service to an institution that is approved by the Commission.

Basic Educational Opportunity Grant

The Basic Educational Opportunity Grant is a program administered by the U. S. Office of Education and is available to high school graduates who enroll at Walker Tech. This grant is based on financial need and is used to defray the cost of attending school. Students interested in this grant should contact their high school counselor or Walker Tech for additional information.





High School Senior Cooperative Program

The full-time senior co-op program is designed to allow a rising high school senior to earn his final six high school credits at an area technical school. This will give the "specialty oriented students" an opportunity to earn their high school diploma and at the same time to begin their training at a technical school. The following requirements and limitations are placed upon students entering the co-op program.

- 1. 180 quarter hours in grades nine through eleven are required to enter this program.
- There must be evidence that students are qualified to successfully pursue to completion the curriculum in which they are enrolled.
- 3. Admission of students will be based upon:
 - 1. Evaluation of high school records
 - 2. Interest
 - 3. Achievement
 - 4. Maturity and Responsibility
 - 5. Personal interview with the student and parents
- 4. The Student must identify his occupational objective.
- 5. Students must show evidence that they will complete the training program in the area technical school after graduation from high school if length of the training program exceeds the normal school year.
- 6. Walker Tech will assume responsibility for full-time students in the 12th grade (six hours per day).
- 7. No high school student may attend Walker Tech on a parttime basis and be mixed with students in full-time classes.
- 8. The student must have the approval of his high school principal before entering the senior year program.
- Students attending on the high school cooperative program cannot be counted on the high school's average daily attendance.

Admission Requirements

Age

A minimum age of 16 is required for all courses except practical nursing. The minimum age for practical nursing is $17\frac{1}{2}$.

Education

A sound educational background is a basic part of the preparation needed by students who plan to enter Walker Tech. To be admitted as a regular student, the applicant must possess a high school diploma or GED diploma. A student with less than a high school diploma will be admitted as a provisional student, provided he works toward obtaining his equivalency diploma while enrolled.

Interview

An interview with the Coordinator of Student Personnel is held with each applicant to assist the student in making a wise decision in his choice of study.

Health

All applicants must possess the minimum physical and mental standards necessary to carry out all requirements of the occupation for which he is preparing.

Admission Policies

- All applicants for day programs must file an application for admission, pay the \$10.00 registration fee, have a copy of school transcript or GED results sent to the school, take a placement test, and appear for a personal interview with the Coordinator of Student Personnel.
- All applicants for extended day classes must pay a \$10.00 registration fee prior to being admitted to class. Applicants for half-time day classes must pay a \$2.00 registration fee.

- 3. Applicants must apply specifically for day, evening, or extended day classes. Applications will be processed only for one course — the course that is listed first on the application. It is the responsibility of the applicant to notify the school if he desires to change his application from day to evening classes, or vice versa.
- Any student currently enrolled may not apply for another course until he has completed the course in which he is currently enrolled.
- 5. Filing an application for admission does not mean that an applicant will be accepted into a program. The applicant must complete all admission procedures and take the necessary steps to insure that his application remains in the active file.
- 6. Applicants may be placed on a waiting list if the program for which they have applied is full. Being placed on the waiting list does not guarantee a specific admission date, but precedence in admission is given in the order that applications are received. Each individual will be notified of his entrance date.
- 7. Those students who voluntarily drop out and those who are terminated must reapply for admission.
- 8. All applications for day classes must be approved by the Coordinator of Student Personnel. All applications for evening and extended day classes must be approved by the Coordinator of Evening Instruction. Any inquiries concerning admissions should be directed to these coordinators.
- 9. Applicants will be expected to provide assurances that they are applying for enrollment for the purpose of obtaining employment in the field for which they will be trained.
- 10. The applicant must meet minimum prerequisites for reading comprehension, computational skills and physical abilities established for the program to be entered.
- 11. Any individual desiring to enter a particular program who does not meet minimum entrance requirements established for that program may be provisionally accepted for future enrollment pending the attainment of those minimum standards.
- 12. Any individual who does not meet minimum standards for entry into a particular course or program will be considered as a student with special needs. Such students may be enrolled in the school but not in a program for which he or she cannot qualify.

Counseling

The school has a complete guidance and counseling program designed to assist each student in fulfilling his goals.

Job Placement

The school has a placement service whose primary objective is to place satisfactory students on jobs for which they have been trained. The placement service of the school maintains continuous contact with employers, both locally and statewide, and with the state employment office to assist students with employment opportunities available.

Course

Offerings



Automotive Mechanics



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Automotive Mechanics

Background Information

The value of the automobile as a dependable means of transportation has been proved many times. New automobiles are being produced in greater quantities than even before, and the changes are rapid and complete. Automotive mechanics is a pre-employment course designed to prepare the student for employment at entry level in the repair and maintenance of automobiles and light trucks. The program of instruction consists of theory and practice in the disassembly, assembly, and diagnoses of malfunctions in the various types of engines, carburetors, fuel pumps, generators, alternators, starters, ignition systems, clutches, transmissions, rear axles, front ends, and power and hydraulic brakes. Individualized instruction is used in the course. Students may enroll for any segment of the program, provided space is available.

Employment Opportunities

Employment opportunities are considered excellent. There will be a demand for good auto mechanics throughout the 1970's.

Length of Course:
Entrance Dates:Four Quarters or One Year (approximately)
Quarterly
Supply Fee \$20 per quarter; books \$50 for the
entire year
Student must provide a set of tools, which cost
approximately \$200

Prerequisites for Admission

- 1. The student must have a mechanical ability, and have the desire to become an Auto Technician and have concrete plans to work in the automotive industry upon completion of the course.
- 2. The student must have the ability to learn the use of hand tools and power tools such as drills, grinders, micrometers, etc.
- The student must be physically able, and have no handicaps which would restrict him or her from job opportunities and/or duties.
- 4. The student should always be able to understand and apply basic mathematical principles and have a mathematics level equal to the seventh grade.

- 5. The student must be able to read at least on the eighth grade level.
- 6. The student must be able to work with and get along well with a wide variety of people.
- The student must have or be willing to acquire a small hand tool set. Tools must be acquired no later than two weeks after enrollment.
- 8. The student must be willing to purchase required books at the beginning of each quarter.

Auto-Mechanics Course Outline

Fall Quarter:	Quarter Hours Credit
AMCH 104 — Automotive Engines	20 10
	30
Winter Quarter:	
COM 101 — Communication Skills	5
AMCH 204 — Transmissions	20
ELEC 201 — Basic Electricity	5
	30
Spring Quarter:	
BUS 501 — Consumer Finance	5
AMCH 301 — Engine Tune-Up	15
AMCH 302 — Automotive Electricity	5
AMCH 304 — Electrical Accessories	30
Summer Quarter:	
AMOUL 400 Front End Alignment	10
AMCH 402 — Front End Anglinent	5
AMCH 412 — Automotive Air Conditioning	10
MA 101 — Mathematics	5
	30
24	

Automotive Mechanics

Description of Courses

- AMCH 104 AUTOMOTIVE ENGINES presents the basic fundamentals of internal combustion engines. The course consists of engine principles and construction, engine overhaul, and troubleshooting.
- AMCH 312 AUTOMOTIVE BRAKES gives the student an understanding of fundamentals of brakes, making him thoroughly familiar with automobile brakes systems and enabling him to perform complete brake system overhauls.
- AMCH 204 TRANSMISSIONS is a presentation of troubleshooting, removal, replacement and adjustment of automatic and manual transmissions.
- ELEC 201 BASIC ELECTRICITY is a presentation of the fundamentals of electricity as it applies to auto mechanics.
- AMCH 301 ENGINE TUNE-UPS presents the fundamental principles of ignition and service procedure. Laboratory assignments help develop the student's skills and knowledge needed to tune the automobile engine.
- AMCH 304 ELECTRICAL ACCESSORIES presents the procedures for troubleshooting and performing minor service on electrical accessories.
- AMCH 401 WHEEL BALANCING consists of the correct techniques of balancing wheels of an automobile.
- AMCH 402 FRONT END ALIGNMENT introduces the student to the principles, problems and use of equipment in front end alignment.
- AMCH 412 AUTOMOTIVE AIR CONDITIONING is designed to familiarize the student with the basic fundamentals of air conditioning. Specific addition will be devoted to the various components in the air conditioning system, their function, installation and repair.



Clerical



Aerical

Background Information

The clerical program is a one-year program designed to train students for positions in the clerical field. The clerk-typist performs a wide range of general office duties such as typing, compiling reports and records, tabulating and posting data, recording orders for merchandise and service and answering the telephone.

Employment Opportunities

Numerous opportunities exist for clerk-typists in private and public enterprises of practically every kind — particularly in manufacturing firms, banks and insurance companies and governmental agencies.

Length of Course:	One Year
Entrance Dates:	Quarterly
Cost:	Supply Fee \$20 per quarter; Books \$100 (approximately) for the entire course

Prerequisites for Admission

- 1. Must have mathematics level equal to the eighth grade.
- 2. Must have reading level equal to the eighth grade.
- Must have a high school diploma or the equivalent, be a senior co-op student, or be working toward obtaining the high school equivalency diploma.

Clerical Course Outline

First Quarter:		Quarter Hours Credit
BUS 110 — Typewriting I BUS 113 — Business Math BUS 114 — Business English BUS 211 — Business Machines		10 5 5 5 25
Second Quarter:		
BUS 210 — Typewriting II BUS 214 — Business English II BUS 115 — Secretarial Procedures I (Filing, tele		10 5
techniques and office job simulation;)	10
		25
Third Quarter		
RUS 210 - Typowriting III		10

BUS	310 — Typewriting III	10
BUS	105 — Machine Transcription I	5
BUS	116 — Secretarial Procedures II (Reprographics and	
	office simulation)	10
BUS	501 — Consumer Finance	5
		30

Fourth Quarter:

BUS	410 — Typewriting IV	10
BUS	416 — Preparing for Employment Testing	5
BUS	205 — Machine Transcription II	5
BUS	417 — Legal or Medical Office Procedures	5
BUS	117 — Secretarial Procedures III	5
		30

BUS 142 — Field Project may be taken in lieu of BUS 117, 205, 410, 416, 417

COURSE DESCRIPTIONS

(See descriptions under Secretarial Science)



Cosmetology



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Cosmetology

Background Information

Cosmetology includes a thorough study of all phases of beauty culture in both classroom theory and shop practice. Students are prepared to perform all the services usually available in beauty salons. Ethics and charm, safety practices, sanitation, anatomy and physiology, chemistry, electricity, salon management and salesmanship are among the subjects provided in classroom instruction. Laboratory instruction covers shampoos and rinses, hair styling, hair cutting, finger waving, permanent waving, scalp treatment, hair conditioning, hair coloring, facial treatments and manicuring.

Upon satisfactory completion of the course, the student is eligible to take the State Board examination for a beautician's license.

Employment Opportunities

Excellent employment opportunities are available for licensed cosmetologists. They may work as general operators in large and small salons, or they may establish their own shops. Many cosmetologists specialize in certain phases of beauty culture by becoming lecturers, demonstrators, teachers or hair stylists.

Length of Course:Approximately One YearEntrance Dates:Quarterly, or whenever a vacancy occursCost:Supply Fee \$20 per quarter; Books \$25; Kit
\$40. Additionally, the student must purchase
uniforms and white shoes.

Prerequisites for Admission

- 1. Must have a mathematics level equal to the seventh grade.
- 2. Must have a reading level equal to the eighth grade.
- 3. Must have formally completed the ninth grade or the equivalent of the ninth grade on the General Educational Development Test.

Cosmetology Course Outline

First Quarter:

- MA 101 Mathematics
- COS 101 Orientation
- COS 102 Customer Relations
- COS 103 Shop Hygiene
- COS 104 Shampooing COS 105 Scalp Treatments COS 106 Basic Haircutting
- COS 107 Roller Curls
- COS 108 Hair Shaping

Second Quarter:

- COS 201 Cosmetology Theory
- COS 202 Reception

COS 203 - Shampoo/Sets

- COS 106 Haircutting
- COS 204 Permanent Waving COS 205 Hair Coloring and Bleaching
- COS 207 Tint Removal and Lash and Brow Tint
- COS 208 Facials

Third Quarter:

- COS 201 Cosmetology Theory
- COS 202 Receptionist COS 203 Shampoo/Sets COS 106 Haircutting
- COS 204 Permanent Waving
- COS 205 Hair Coloring and Bleaching
- COS 207 Tint Removal and Lash and Brow Tint
- COS 208 Facials and Manicures

Fourth Quarter:

- COS 201 Cosmetology Theory
- COS 202 Reception COS 203 Shampoo/Sets
- COS 106 Haircutting
- COS 205 Hair Coloring and Bleaching
- COS 207 Tint Removal and Lash and Brow Tint
- COS 208 Manicures and Facials

1500 hours of instruction are required before the student is eligible to take the State Board Examination.

Cosmetology Course Descriptions

- COS 101 ORIENTATION provides the student with an overview of the requirements, rules, regulations and policies of the cosmetology program.
- COS 102 CUSTOMER RELATIONS is a course designed to present to the student the importance of good ethics in relation to their customers.
- COS 104 SHAMPOOING is designed so that the student becomes familiar with the difference between shampoos and the procedures of shampoo manipulations.
- COS 105 SCALP TREATMENTS is a course designed to present to the student the basic scalp manipulations and scalp treatments that assist in overcoming and combating disorders of the scalp.
- COS 201 COSMETOLOGY THEORY presents the theory and practice of all required areas of cosmetology in the following subjects: Anatomy, electricity, chemistry, ethics, hygiene, and personality.
- COS 205 HAIR COLORING AND BLEACHING involves the correct procedures for applying color rinses, bleaches, retouches, and dye to the hair.
- COS 204 PERMANENT WAVING instructs the student in the proper use of cold waving and chemical hair relaxing.
- COS 208 MANICURES AND FACIALS focuses on the proper use of implements and procedure for manicures and facials using scientific manipulations.







Data Processing

Background Information

Data Processing is the process of taking data from the source (such as an invoice); putting it into some type of computer media (such as punched cards); making computer calculations on the data; and creating meaningful information in the form of a printed report to management.

The purpose of this one-year program is to prepare students who plan on a data processing career. The unit record equipment and the role it plays is stressed in the early stages of this program. The machines included in the course of instruction are the keypunch, the sorter, the collator, the reproducing punch, the accounting machine and the computer. The student will take related courses in accounting and mathematics. The latter portion of the course is concentrated in the area of computers and computer programming.

Employment Opportunities

The use of electronic data processing equipment is expected to continue to increase very rapidly throughout the 1970's, thus creating a demand for computer trained people. Graduates of Walker Tech's data processing program are qualified for the following positions: (1) Keypunch Operator, (2) Computer Operator, (3) Computer Programmer, (4) Accountant and/or Bookkeeper, and (5) Unit Record Equipment Operator.

Length of Course:Four Quarters (One Year)Entrance Dates:Fall Quarter OnlyCost:Supply Fee \$20 per quarter; Books \$110 for
entire course.

Prerequisites for Admission

- 1. Must have a mathematics level and reading level equal to the ninth grade.
- 2. Must possess a high school diploma or GED, be working toward GED, or be a co-op student.
- 3. Must be able to type.
- 4. Must have use of both arms and hands.

Data Processing Course Outline

First Quarter:	Quarter Hours Credit
ACCT 111 — Accounting I	10
DP 114 — Punched Card Data Processing	10
MA 113 — Business Math	5
COM 123 — Communication Skills	5
	30
Second Quarter:	
ACCT 121 — Accounting II	10
DP 125 — Punched Card Data Processing	5
DP 106 — Introduction to Computer Programming	10
BUS 501 — Consumer Finance	5
	30
Third Quarter:	
ACCT 131 — Accounting III	10
DP 134 — Cobol Programming II	10
COM 133 — Technical Report Writing	5
BUS 116 — Business Machines	. 5
	30
Fourth Quarter:	
DP 141 — Systems and Procedures	. 10
DP 144 — Cobol Programming II	. 10
MA 122 — Math of Finance	. 5
	25
*DP 142 may be taken instead of DP 141, DP 144 and M	A 122.

Data Processing Description of Courses

- ACCT 111 ACCOUNTING I consists of the following units: Basic accounting theory and principles, recording transactions, ledger, financial statements, sales, cash receipts, purchases, cash payments, inventories, receivables and payables, adjusting and closing entries. deferrals and accruals, trial balance, and post closing trial balance.
- MA 113 - BUSINESS MATHEMATICS consists of fractions, decimals, percentages, weights and measures, interest, discounts, markup, net profit and loss, payroll and taxes, and time payment plans and commercial loans.
- DP 114 - PUNCHED CARD DATA PROCESSING I is a basic course in unit record data processing. It is an introduction to the field of unit record equipment and consists of keypunch operation, sorter operation, and interpreter panel board and panel board wiring operations. Major emphasis is placed on keypunch operation.
- **BUS 116** - BUSINESS MACHINES is a basic course on the electronic printing calculator, electronic display calculator, ten-key adding machine, and printing calculator. The course introduces correct machine operation and the use of verification procedures necessary for accurate work.
- ACCT 121 ACCOUNTING II is a continuation of Accounting I. This course consists of the following units: Payroll systems, systems and control, systems design and automated data processing, concepts and principles, partnerships; corporations - organization and operation, corporations - stockholder's equity, earnings, and dividends corporations - long-term liabilities and investments.
- MATH OF FINANCE includes essential algebraic operations, in-MA 122 troduction to statistical measurements, ratio, proportion, percent, discounts, taxes, interest, annuities, and extinction of debt.
- COMMUNICATION SKILLS is organized to meet the needs of COM 123 students developing their ability with written and oral communications, and increase comprehension and study skills.
- PUNCHED CARD DATA PROCESSING II is designed to acquaint DP 125 the student with control-panel wiring and operation of the reproducer, collator, and accounting machine.

- ACCT 131 ACCOUNTING III is a continuation of Accounting II. It consists of the following units: Departments and branches, manufacturing and process cost accounting systems, job order cost systems, budgetary control and standard cost systems, management reports and special analyses, income taxes, cost and revenue relationships for management, statement of changes in financial position, consolidated statements and other statements, and financial statement analysis.
- DP 106 INTRODUCTION TO COMPUTER PROGRAMMING is a basic course in the functions, logic, and programming methods of modern digital computers. Emphasis is placed on flowcharting.
- COM 123 TECHNICAL REPORT WRITING is designed to teach data processing students appropriate ways to communicate with other technical persons and with the public.
- DP 141 SYSTEMS AND PROCEDURES is designed to guide the student through the stages of a system which includes analysis of present information flow, system specifications and equipment selection, and implementation of the system.
- DP 142 FIELD PROJECT enables the students to apply the principles of data processing and/or accounting by working in jobs of these types in business and industry.
- DP 134 COBOL PROGRAMMING I includes flowcharting and coding in Cobol language business problem solutions as well as compiling and testing these written programs.
- DP 144 COBOL PROGRAMMING II involves the same activities as DP 134: however, the difficulty of the programs is generally greater.


Drafting and Design Technology



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Drafting and Design Technology

Engineering drawing is a graphic language that expresses and conveys ideas of shape, size, and construction in all phases of industrial and engineering work. Consequently, draftsmen translate the ideas, rough sketches, specifications and calculations of engineers, architects and designers into work plans which are used by skilled craftsmen in making a product.

Employment Opportunities

Employment of draftsmen is rising rapidly as a result of the increasingly complex design of modern problems and products and processes. As the engineering and scientific occupations grow, more draftsmen will be needed.

Length of Course:	Seven Quarters
Entrance Dates:	Quarterly
Cost:	Supply Fee \$20 per quarter; Books \$75 for entire course; Equipment \$30

- 1. Must have mathematics level equal to ninth grade.
- Must have completed one year of algebra prior to enrolling in Drafting.
- 3. The student should have a high school diploma or the equivalent (GED) or be a senior year co-op student.
- All students must possess the minimum physical and mental standards necessary to carry out all requirements of the Drafting program.
- 5. Should have above average spatial aptitude.
- 6. Must have reading level equal to eighth grade.

Drafting and Design Course Outline

First Quarter:	Quarter Hours Credit
MA 101 — Technical Math I BUS 501 — Consumer Finance DDT 104 — Engineering Drawing I	5 5 20 30
Second Quarter:	
MA 211 — Technical Math II COM 201 — Communication Skills I DDT 214 — Engineering Drawing II	5 20 30
Third Quarter:	
MECH 301 — Machine Shop MA 301 — Applied Math DDT 324 — Engineering Drawing III	5 20 30
Fourth Quarter:	
ELEC 401 — Basic Electricity DDT 402 — Structural Steel Detailing I DDT 433 — Engineering Design I (Design Drafting)	5 10 15 30
Fifth Quarter:	
COM 511 — Communication Skills II DDT 512 — Structural Steel Detailing II DDT 543 — Engineering Design II (Architectural)	5 10 15 30
Sixth Quarter:	
MECH 601 — Statics SURV 601 — Basic Surveying DDT 651 — Descriptive Geometry DDT 653 — Engineering Design II (Schematics)	5 5 15 30
Seventh Quarter:	10
DDT 712 — Statics and Strength of Materials DDT 764 — Engineering Design IV	20 30

Drafting and Design Technology Description of Courses

- MA 101 TECHNICAL MATH I begins with a review of arithmetic and progresses through elementary algebra and trigonometry.
- BUS 501 CONSUMER FINANCE is a course designed to help the students become better informed consumers.
- DDT 104 ENGINEERING DRAWING I is a beginning course for students who have little or no previous experience in drafting. The student will be introduced into the field of graphic representation. Emphasis is placed on correct line work, geometrical construction, and lettering.
- MA 211 TECHNICAL MATH II is a continuation of MA 101 involving algebra, slide rule, and plane geometry.
- COM 201 COMMUNICATION SKILLS I is organized to develop the student's ability in written communications, and to increase comprehension and study skills.
- DDT 214 ENGINEERING DRAWING II is a continuation of DDT 104. The student gains further skill in methods of graphic representation and a better working knowledge of standards used in industry. Emphasis is placed on orthographic projection, primary/secondary auxiliary views, and lettering.
- MECH 301 MACHINE SHOP is an introduction to basic machine shop operations and setups.
- MA 301 APPLIED MATH is a continuation of MA 211 with emphasis placed on trigonometry involved in practical situations.
- DDT 324 ENGINEERING DRAWING III is a continuation of DDT 214 with emphasis placed on working drawings. The student further develops his understanding of the graphic language.
- ELEC 401 BASIC ELECTRICITY is the study of fundamental concepts of electricity.
- DDT 402 STRUCTURAL STEEL DETAILING I is a study of basic structural steel detailing. The student gains experience in detailing simple beams, columns, and bracing (including the "sizing" of gusset plates). The AISC Handbook and the "Smoley's" Handbook are used extensively.
- DDT 433 ENGINEERING DESIGN I is a course of study involving basic general design.

- COM 511 COMMUNICATION SKILLS II is a course that utilizes the fundamentals of COM 201 to introduce the aspects of preparing reports, techniques for collecting and presenting technical data, job interviews, and resumes.
- DDT 512 STRUCTURAL STEEL DETAILING II is a course that gives the student experience in detailing sloped/skewed beams, girts, purlins, stringers, handrailing, trusses, and miscellaneous steel.
- DDT 543 ENGINEERING DESIGN II is a continuation of DDT 433 with emphasis on architectural drafting.
- MECH 601 STATICS is the study of forces and their effects, as found in structures and machines under conditions of equilibrium.
- SURV 601 BASIC SURVEYING is a course which includes survey theory, leveling, taping, precision, and checks.
- DDT 651 DESCRIPTIVE GEOMETRY enhances the student's ability to visualize and measure objects when viewed in directions of sight, other than basic orthographic views.
- DDT 653 ENGINEERING DESIGN III introduces the schematical phase of drafting, which includes piping and electrical SCHEMATICS. The student also is introduced to intersection and development.
- MECH 712 STATICS AND STRENGTH OF MATERIALS is an extension of MECH 601.
- DDT 764 ENGINEERING DESIGN IV offers the student the opportunity to spend his entire time in the area of specialization he has selected for himself.



Electrical Appliance Servicing



Electrical Appliance Servicing

The appliance serviceman must be able to install, maintain and service all major home appliances, which include washing machines, clothes dryers, water heaters, ranges, refrigerators, freezers and window air conditioners. In order to service the modern appliance, one must be able to read cycle charts, wiring schematics, to use hand tools and test equipment and to understand house wiring.

Employment Opportunities

Upon graduation, students are eligible to be employed by appliance dealers, department stores, private repair shops, or with gas or electric companies. Appliance manufacturers are employing more and more servicemen to adjust and inspect new appliances and to work in repair centers opening in most large cities. The recent increase in coin-operated machines offers other possibilities for employment. Some students will go into business for themselves.

Length of Course:Four QuartersEntrance Dates:QuarterlyCost:Supply Fee \$20 per quarter; Books \$60 for the
entire course

- Must posses a high school diploma or GED equivalency diploma, be working toward obtaining GED, or be a high school co-op student.
- 2. Must have a mathematics and reading level equal to the eighth grade level.
- 3. Should have the ability to lift and move heavy objects.
- Should have manual and finger dexterity and be mechanically inclined.
- 5. Should be emotionally stable.
- 6. Should be able to drive a truck or van.

Electrical Appliance Servicing

Course Outline

Fall Quarter:		Quarter Hours Credit
MA 101 — Basic Math		5
FLAS 102 — Basic Electricity		10
ELEC 102 — House Wiring		10
SD 101 Schematic Diagram		5
		30
Winter Quarter:		
COM 201 — Communications Skills		5
BPAS 201 — Blueprint		5
SD 201 — Schematic Diagram		5
ELAS 203 — Major Appliances		15
		30
Spring Quarter:		
BUS 501 — Consumer Finance		5
BPAS 301 — Blueprint	•	. 5
REF 213 — Basic Refrigeration		15
SD 301 — Schematic Diagrams		. 5
		30
Summer Quarter:		
MA 401 — Small Business		. 5
BPAS 401 — Blueprint		. 5
ELAS 412 — Applied Electricity		. 10
ELEC 402 — Troubleshooting		. 10
		30

Electrical Appliance Servicing Description of Courses

- ELAS 102 BASIC ELECTRICITY relates electrical fundamentals to modern appliances of electricity. The course includes electric motors and familiarization with hand power tools.
- ELEC 102 HOUSE WIRING presents methods of installations and pertinent code requirements for wiring the modern home.
- SD 101; - SCHEMATIC DIAGRAMS is organized to develop the student's
- SD 201: skill in operation and troubleshooting of an electrical appliance. The SD 301 student will be able to check, diagnose and replace defective com-
- ponents effectively.
- BPAS 201; BLUEPRINT READING develops the necessary skills to interpret
- BPAS 301; conventional trade drawings and to understand electrical symbols
- **BPAS 401** and abbreviations.
- **REF 213** - BASIC REFRIGERATION is organized through laboratory and classroom experience, to enable students to locate failures in domestic refrigeration appliances, to determine the cause of the failure and to make the necessary repairs.
- MAJOR APPLIANCES includes the repair, installation and main-ELAS 203 tenance of clothes washers, dryers, dishwashers, ranges and garbage disposals.
- SMALL BUSINESS is designed to enable the student to establish BPAS 401 the fundamentals of keeping a set of books in a business of his own. Wages, payroll, taxes, and insurance are included.
- APPLIED ELECTRICITY instructs the student in applying theory ELAS 412 of electricity to the repair of electrical appliances.
- TROUBLESHOOTING consists of diagnosing malfunctioning ELEC 402 appliances.



Electronic Technology



Electronic Technology

The student who successfully completes the electronic technician course will have demonstrated a proficiency in applying procedures, engineering mathematics, physics, and related subjects to layout, build, test, troubleshoot, repair, and modify development and production electronic equipment including computers, missile-control, instrumentation, and machine tool numerical control.

The electronic technician will be able to install, test, calibrate and operate electronic devices and equipment. He will be required to apply all of the principles of alternating and direct currents; to locate and identify component parts by referring to associated circuit diagrams; and to troubleshoot and make temporary and permanent repairs of the malfunctioning equipment.

The electronic technican must be experienced in recognizing the applicability of electronic test equipment; must be able to interpret and record test data; and must be able to relay facts and concepts mathematically, graphically and orally. He may be required to work singly or in support of engineering and scientific personnel. He must be able to perform layout work, draw schematic diagrams, and fabricate design or production models or equipment. He may be required to specify and order component parts, equipment or systems; modify equipment; contrive test jigs; make experimental operational suitability tests; maintain parts and equipment inventory; and perform routine maintenance. He should have a thorough knowledge of safe working habits and practice them at all times. He also may be required to apply first aid procedures.

Employment Opportunities

Currently, job opportunities are excellent for Electronic Technicians. Graduates of Walker Tech's Electronics program have the background to enter the industrial electronics field, the rapidly growing medical electronics field, communications or computers.

Length of Course:Seven QuartersEntrance Dates:QuarterlyCost:Supply Fee \$2

Supply Fee \$20 per quarter; Books approximately \$100 for the entire course

- 1. Must possess a high school diploma or GED certificate, be working toward obtaining GED, or be a senior year co-op student.
- Must have good mathematics background including at least one year of algebra and equal to the ninth grade level.
- 3. Should be able to read and interpret technical manuals.
- Should be able to apply and understand principles of higher math and physics.
- 5. Must be able to read on the ninth grade level.

Electronic Technology

Course Outline

Ouarter

First Occurrent	Hours
MA 101 — Math I MA 111 — Math II ELEC 101 — Shop Practice ELEC 103 — D. C. Circuits	5 5 10 10 30
Second Quarter: MA 221 — Technical Math III	5 5 15 5 30
Third Quarter: COM 101 — Communication Skills PHY 331 — Physics I ELET 352 — Electronic Devices II ELET 362 — Semiconductor Circuit Aanalysis I	5 5 10 10 30
Fourth Quarter: BUS 501 — Consumer Finance	5 10 10 5 30
Fifth Quarter: COM 221 — Technical Report Writing ELET 553 — Industrial Electronics I ELET 592 — Introduction to Computers	5 15 10 30
Sixth Quarter: ELET 661 — Transmission Fundamentals ELET 662 — Industrial Electronics II ELET 603 — Computers II	10 10 10 30
Seventh Quarter: ELET 712 — Hydraulics and Pneumatics ELET 713 — Introduction to Instrumentation ELET 714 — Applications of Instrumentation	$10 \\ 10 \\ 10 \\ 30$

Electronic Technology Description of Courses

- TECHNICAL MATH I begins with a review of arithmetic and MA 101 progresses through elementary algebra and trigonometry.
- SHOP PRACTICE emphasizes the proper use of the basic tools of **ELET 101** the electronic technician and stresses safety precautions.
- BASIC ELECTRICITY AND DC CIRCUITS presents the funda-**ELET 103** mentals needed in the study of all electronics. Beginning with electron theory, the course progresses through magnetic fundamentals.
- **ELET 221** - TECHNICAL MATH II is a continuation of Technical Math I.
- ELECT 233 AC CIRCUITS is a study of alternating current circuits which analyzes the behavior of alternating current components.
- COM 221 - TECHNICAL REPORT WRITING utilizes the fundamentals of Communication Skills I. Emphasis is placed on techniques for collecting and presenting technical data.
- CIRCUIT ANALYSIS covers application and operation of vacuum **ELET 311** tube and semiconductor devices in electronic circuits.
- PHY 331 PHYSICS is a study of mechanics and vector forces.
- **ELET 323** - BASIC ELECTRONICS is a continuation of circuit analysis on vacuum tube and semiconductor circuits.
- SEMICONDUCTOR ANALYSIS is an analysis of transistor cir-**ELET 472** cuits, network theorems and equivalent circuits which are used to evaluate total circuits performance and to design reliable circuits.
- **ELET 481** - PULSE CIRCUITS is a study of number systems, computer logic, circuit design and construction and memory devices.
- SEMICONDUCTOR ANALYSIS is an analysis of transistor cir-**ELET 482** cuits, network theorems and equivalent circuits which are used to evaluate total circuits performance and to design reliable circuits.
- INDUSTRIAL ELECTRONICS covers circuit theory, components, **ELET 553** systems and devices used in electronic control systems. A study is made of servo-mechanisms, switching devices, and power supplies.
- INTRODUCTION TO COMPUTERS is a study of electronic cir-**ELET 592** cuits used extensively in computers, industrial controls, radar systems and guided missiles.
- TRANSMISSION FUNDAMENTALS is a course which studies gen-**ELET 611** eration and transmission of electrical energy at radio frequencies.
- COMPUTERS II covers the operation of modern digital and **ELET 603** analog computers and emphasizes their usage.
- HYDRAULICS AND PNEUMATICS is a study of control princi-**ELET 712** ples, valve operation and general types of control systems.
- ---- INSTRUMENTATION is an introduction to the field of instrumen-**ELET 713** tation, covering the installation, maintenance and troubleshooting of process measuring instruments.



Heating and Air Conditioning



Heating and Air Conditioning

Heating and Air Conditioning is a pre-employment course designed to prepare the student for employment at entry level in installation and service of residential heating and air conditioning systems. The program of instruction covers both theory and practice, and includes installation and service of refrigeration components used in air conditioning, electrical devices used both in heating and air conditioning, and residential gas and oil furnaces.

Employment Opportunities

The growing demand for air conditioning and heating systems throughout the nation is providing many job opportunities for skilled men who install, service and design such equipment.

Length of Course:One YearEntrance Dates:QuarterlyCost:Supply Fee \$20 per quarter; Books \$50 for the
entire course.

- 1. Must be able to read and comprehend on the eighth grade level.
- Must be able to understand and apply basic mathematical principles equal to the eighth grade level.
- 3. Should have a high mechanical aptitude.
- 4. Should have good finger and manual dexterity.

Heating and Air Conditioning

Course Outline

First Quarter:	Quarter Hours Credit
MA 101 Basic Math	. 5
REF 101 — Basic Refrigeration	. 5
REF 102 — Principles and Practices of Refrigeration	. 10
REF 111 — Cycle Components	. 5
COM 101 — Communication Skills	. 5
	30
Second Quarter:	
BLPR 201 — Blueprint Reading	. 5
ELET 202 — Basic Electricity	. 10
ELET 223 — Electric Motors and Controls	. 15
	30
Third Quarter:	
HA 301 — Heating Fundamentals	. 5
HA 311 — Oil Heating	. 5
HA 321 — Gas Heating	. 5
HA 331 — Piping and Venting	. 5
ACON 331 — Air Conditioning Fundamentals	. 5
BUS 501 — Consumer Finance	. 5
	30
Fourth Quarter:	
ACON 232 — Residential Air Conditioning	. 5
ACON 233 — Air Conditioning Systems Repair	. 15
ACON 234 — Heat Pumps	. 10
	30

Heating and Air Conditioning Description of Courses

- REF 101 BASIC REFRIGERATION covers the knowledge of basic refrigeration fundamentals for entry and advancement into air conditioning.
- REF 102 PRINCIPLES AND PRACTICES OF REFRIGERATION enables students to develop skills and knowledge of materials, devices and practices common to general area of mechanical refrigeration.
- REF 111 CYCLE COMPONENTS includes the study of the major components of the refrigeration system which includes compressors, condensers, evaporators and metering devices.
- ELET 202 BASIC ELECTRICITY relates electrical fundamentals to modern applications of electricity. Experience with testing devices, hand power tools, wire splicing and soldering techniques is stressed.
- ELET 223 ELECTRIC MOTORS AND CONTROLS is the study of the design, application, and repair of electric motors and controls used by the refrigeration and air conditioning industry.
- HA 301 HEATING FUNDAMENTALS is a theoretical approach to heating (the combination of combustion of gases and fuels with proper air circulation and humidity conditions to provide comfort).
- HA 311 OIL HEATING provides the basic knowledge and laboratory experience in diagnosing, servicing, and determining operational efficiency of oil burning equipment.
- HA 321 GAS HEATING introduces the student to the procedures for safety, lighting, testing, and determining, repairing and adjusting gas burning equipment.
- HA 331 PIPING AND VENTING is a study of the national and local standards of pipe fitting and venting.
- ACON 331 AIR CONDITIONING FUNDAMENTALS is an introduction to the installation and service of air conditioning units.
- ACON 341 RESIDENTIAL AIR CONDITIONING is an analysis of the design and assembly of the various units used for residential comfort cooling.
- ACON 233 AIR CONDITIONING SYSTEMS REPAIR is a study of the diagnosing and repairing of air conditioning systems.
- ACON 234 HEAT PUMPS is a study of the theory and mechanical practices of the heating cycle of the compression refrigeration system.



Machine Tool



Machine Tool

Increased emphasis on precision machinery demands that the machinist be thoroughly trained in all phases of machine shop practices. The machinist plans and carries out all operations needed in production of machined products. He selects tools and materials required for each job and plans cutting and finishing operations.

The machine shop course is a program of pre-employment training designed to prepare the student for employment at entry level in the machine shops of industries. The program of instruction covers both theory and practice, and includes installation, care, and repair of machines found in machine shops; job interpretation, set-up and operation required to complete work in a manner acceptable to industry; and tool care, repair, and basic tool and die making.

Employment Opportunities

After graduation, students find work in industries keeping mechanical equipment in good operating order, or in the production department of metal-working industries producing parts.

An important advantage of this occupation is that work can be found in all localities and in all industries. Skilled machinists are in great demand wherever tools and machines are utilized. This is a vital skill because the breakdown of one machine might place many others out of operation.

Length of Course: Four Quarters (One Year) Entrance Dates: Quarterly

Cost: Supply Fee \$20 per quarter; Books \$30 for the entire course; Tools approximately \$100.

- Have a high school or GED diploma or work toward obtaining a GED diploma while enrolled.
- 2. Must be able to read on the seventh grade level. Must possess ability to learn to read blueprints.
- 3. Must have mathematical level equal to the eighth grade.
- 4. Must be mechanically inclined and have a strong desire to learn to work with machinery.

Machine Tool

Course Outline

First Quarter:	Quarter Hours Credit
MA 101 — Mathematics	. 5
MDR 101 — Blueprint Reading	. 5
MT 104 — Basic Machine Tool Practice	. 20
	30
Second Quarter:	
MT 214 — Intermediate Machine Operations	. 25
MDR 215 — Blueprint Reading	. 5
	30
Third Quarter:	
MA 211 — Mathematics	. 5
MT 325 — Advanced Machine Tool	. 25
	30
Fourth Quarter:	
MT 434 — Special Problems	. 20
BUS 501 — Consumer Finance	. 5
COM 101 — Communication Skills	. 5
	30

Machine Tool

Description of Courses

- MA 101 MATHEMATICS enables the student to re-establish the funda-& 211 mentals of mathematics and to develop mathematical skills required of a machinist.
- MDR 101 BLUEPRINT READING develops the necessary skills in visuali-211 zation plus a thorough understanding of the symbols and other representations which commonly appear on machine trade blueprints.
- MT 104 BASIC MACHINE TOOL PROCESSES is a course designed to aid the students who have had little or no experience in the machine trade. The student will be instructed in basic machine shop operations and setups, which include measuring tool precision, bench tools, drill press and lathes.
- MT 215 INTERMEDIATE MACHINE OPERATIONS consists of the study of various operations that are common, but with more emphasis on ACC.
- BUS 501 CONSUMER FINANCE is a course designed to help the students become better informed consumers. Budgeting, credit, and taxes are included in the course.
- COM 101 COMMUNICATION SKILLS is organized to develop the student's ability in written and oral communications, and to increase comprehension and study skills.
- MT 324 ADVANCED MACHINE TOOL is designed for students who are ready to go into advanced machine tool processes and operations. Accuracy will be stressed in all machining operations.
- MT 436 SPECIAL PROBLEMS is designed to permit students to complete advanced machine tool projects.



Practical Nursing



Practical Nursing

The practical nursing program leads to eligibility to take the examination given by the State Examining Board for a licensed practical nurse. It prepares the student to work as a member of the nursing team under the direction of a physician or a registered nurse. The student is also instructed to give safe, intelligent and competent bedside care to selected patients and to assist the registered nurse with the care of the more seriously ill. Part of the trainee's time is spent at the school with emphasis on theory and basic nursing principles. The remainder of the course is spent in arranged clinical facilities for actual on-the-job experiences under a qualified supervisor.

Employment Opportunities

Licensed practical nurses are expected to be in good demand during the 1970's. The need for more workers in this occupation has been due in large part to the greater utilization of licensed practical nurses for certain kinds of patient care which do not require the skills of a registered professional nurse.

Length of Course:	One Year
Entrance Dates:	March and September
Cost:	Uniforms \$55-\$75; Books \$90 year; Supply Fee \$80 year; Registration Fee \$10; Miscel- laneous Expense \$75.

- 1. Minimum age of $17\frac{1}{2}$.
- 2. Completion of tenth grade or equivalent on high school equivalency test.
- 3. Must have mathematics and reading level equal to the ninth grade level.
- 4. Interview with instructors.
- 5. Physical condition and emotional maturity to fulfill satisfactorily the duties of an LPN as certified by a physician.
- 6. An admissions committee formally evaluates each applicant and makes recommendations concerning acceptance.

Practical Nursing Course Outline

First	t Quarter:	Quarter Hours Credit
PN	101 — Nursing Fundamentals I	10
DN	102 — Personal and Vocational Relations	3
PN	102 — Personal and Community Health	2
PN	104 — Nutrition	5
DN	105 — Anatomy and Physiology	10
	100 Anatomy and Physiclegy Presented	30
Sec	ond Quarter:	
PN	211 — Maternity Nursing	6
PN	212 — Pediatric Nursing	3
PN	201 — Nursing Fundamentals II	6
PN	213 — Pharmacology	5
PN	214 — Clinical-Maternity	15
		35
Thi	rd Quarter:	
PN	311 — Conditions of Illness	6
PN	312 Clinical-Surgical	25
PN	313 — Clinical-Pediatrics	. 6
		37
Fou	urth Quarter:	
PN	411 — Conditions of Illness	. 6
PN	412 — Clinical-Medical	. 34
		40

Practical Nursing Description of Courses

PN 103 - PERSONAL AND COMMUNITY HEALTH

A course designed to help the student achieve an understanding of health as it relates to the individual and the community. It explores home nursing, disaster nursing, fire plans, health agencies, and public health. Lectures, class projects and discussions, audio-visual aids and field trips are used. Microbiology, terminology, and safety are incorporated.

PN 102 — PERSONAL AND VOCATIONAL RELATIONSHIPS

A course designed to help the student formulate her personal philosophy and her personal objectives in Practical Nursing Training. Personality development, relationship of the individual to self, patient, and co-workers and basic elements of psychology are explored. Methods of teaching will include lectures, class discussions, audio visual aids and reference readings. Legal aspects, nursing organizations and publications, job opportunities and obligations, letters of application and resignation are planned within the fourth quarter.

PN 101 — FUNDAMENTALS I

This course combines theory and application of nursing arts beginning with basic nursing care and including the special and therapeutic procedures for patient care. Included are instructions in safety and first aid. References, textbooks, audio-visual aids, nursing arts laboratory, lectures, class discussions, and clinical experience will be used.

PN 201 — FUNDAMENTALS II

An introduction to medical-surgical nursing, this course is directed toward helping the practical nurse student to understand the classification and ediology of disease, body disorders, signs and symptoms of illness related to nursing care, diagnostic procedures and the nurse's responsibility in their administration. Nursing care of the medical, surgical, geriatic, and chronically ill patient and rehabilitation with emphasis on the basic needs of man are included. These subjects will be covered in the medical-surgical course (Conditions of Illness). Nursing arts, audio-visual aids, clinical and laboratory facilities, texts, and references are used.

PN 105 - ANATOMY AND PHYSIOLOGY

A basic and concentrated course dealing with the structure and function of the body to enable the practical nurse student to gain insight concerning the normal body as a basis for understanding variations from normal. With such an understanding she will be able to give more intelligent care to the sick. Lectures, textbooks, reference readings, class discussions, audio-visual aids, charts, and human skeleton will be used.

PN 104 - NUTRITION

A course designed to give the practical nurse student a workable knowledge of good nutrition and diet therapy. Instruction in basic food nutrition, diet therapy, basic food requirements, adaption of family menu to prescribed diet for the sick, and the dietary treatment of the more common diseases are given. Textbooks, references, demonstrations, and films are used.

PN 213 — PHARMACOLOGY

A foundation for preparing and administering medications is the basis for this course, beginning with basic concepts. Conversion within and between systems (household, metric and apothecary), calculation of dosage problems, accuracy, and the moral and ethical responsibility of drug administration will be emphasized. Classification, effects and usage, contraindications, and adverse reactions will be incorporated throughout the course. Lectures, texts, drug cards, charts, audio-visual aids, laboratory, and equipment for drug administration are used.

PN 311 - CONDITION OF ILLNESS

Based on concepts learned in Fundamentals II, this advanced course deals with disease processes and/or illness as related to the body systems. Special emphasis will be placed on cardinal signs and symptoms, specific treatment and nursing care, and psychological implications as related to specific illnesses and disorders. Care plans, texts, references, audio-visual aids, varied clinical experiences, lectures, and class discussions will be used.

PN 213 — MATERNITY NURSING

This course deals with the physiological, psychological, and pathological aspects of pregnancy. Nursing care during the prenatal, labor and delivery, and post partum periods will be emphasized. Care of the newborn will include normal and abnormal conditions, care of the premature infant and neonate. Clinical experience will be allotted for labor and delivery, post partum, nursery and clinics. In addition, texts, references, case studies and audio-visual aids will be used.

PN 212 — PEDIATRICS

In this course the student is introduced to diseases and disorders associated with the particular age in which they are most frequently seen or in which the disease or disorder has a greater physical and emotional impact on the child and his family. Growth and development are incorporated. The way a child reacts to and copes with stress, separation from family, treatment processes, and the child's developmental level are stressed. Clinical experiences, case studies, texts, references, field trips, and audio-visual aids are used.



Radio and Television Repair



- 64 -

Radio and Television Repair

Radio and television repair is a pre-employment course designed to prepare the student for employment at the entry level in the repair, servicing, and installation of radio receivers (including transistors), television receivers (including color and closed circuit), high fidelity and stereophonic sound reproduction systems, and related electronic equipment.

Employment Opportunities

The continuing growth of the radio and television industry insures trained personnel in this field excellent employment opportunities. Increases in transmission and reception of color television and electronic control appliances for radio equipment provide an expanding field for job opportunities to develop.

Length of Course:	Eight Quarters
Entrance Dates:	Quarterly
Cost:	Supply Fee \$20 per quarter; Books \$100 for the entire course.

- 1. Must be able to read and comprehend on the eighth grade level.
- 2. Must be able to perform basic mathematical operations equal to the eighth grade level.
- 3. Must have good finger and manual dexterity.
- Must be mechanically inclined.
- 5. Should possess the ability to learn to read schematic diagrams.

Radio and Television

Course Outline

Quarter

First Quarter: RTV 102 — Direct Current Fundamentals RTV 112 — A.C. Fundamentals RTV 101 — Shop Practices MA 101 — Basic Mathematics	Hours Credit 10 10 5 5 30
RTV 222 — Complex Direct-Current Circuits RTV 223 — Complex Alternating Current Circuits COM 201 — Communication Skills	10 15 5 30
Third Quarter:RTV 324 — Semiconductor Circuit AnalysisRTV 311 — Vacuum Tubes and Circuit AnalysisRTV 321 — Basic Transistor Amplifier Circuits	20 5 5 30
Fourth Quarter:	15
RTV 423 — Complex Transistor and Tube Circuits	5
RTV 421 — Hi-Fi and Stereo Amplifiers	10
RTV 422 — Troubleshooting Procedures	30
Fifth Quarter:	5
RTV 511 — Color TV Servicing	10
RTV 512 — Monochrome Television	10
RTV 513 — Closed Circuit TV	5
BUS 501 — Consumer Finance	30
Sixth Quarter:	20
RTV 626 — Color TV and Transistor Circuits	10
RTV 622 — Test Equipment	30
Seventh Quarter:	15
RTV 626 — Color TV and Transistor Circuits	15
RTV 322 — Troubleshooting	30
Eighth Quarter	15
RTV 623 — Antennas and Distribution Systems	15
RTV 823 — FM Multiplexing for Stereo	30

Radio and Television Repair Description of Courses

- RTV 101 SHOP PRACTICES emphasizes the proper use of the basic tools of the radio and television technician.
- RTV 102 DIRECT CURRENT FUNDAMENTALS presents fundamentals needed in the study of all electronics. Beginning with the electron theory, the course progresses through magnetic fundamentals.
- RTV 112 A. C. FUNDAMENTALS provides a thorough coverage of A. C. fundamentals. Sufficient time is devoted to laboratory work to insure practical knowledge and skills in A. C. circuitry.
- RTV 311 VACUUM TUBES & CIRCUIT ANALYSIS is a study and construction of circuits and the operation and application of most types of vacuum tubes.
- RTV 324 SEMICONDUCTOR CIRCUIT ANALYSIS is an analysis of transistor circuits.
- RTV 421 HI-FI AND STEREO AMPLIFIERS is the study of high quality audio or sound producing systems.
- RTV 622 TEST EQUIPMENT is designed to acquaint students with electronic measuring devices, such as volt meter, ammeter, oscilloscopes and signal generators.
- RTV 626 COLOR TV AND TRANSISTOR CIRCUITS is a continuation of RTV 511.
- RTV 623 ANTENNA SYSTEMS is designed to teach students theory of wave reception on all commercial frequencies. Antenna design and installation is stressed.
- RTV 612 CLOSED CIRCUIT TV is designed to acquaint the student with the operation and maintenance of closed circuit television equipment.
- RTV 422 TROUBLESHOOTING PROCEDURES is designed to give the student the manipulative practice needed to understand the operation of test equipment and to troubleshoot. He must be able to check, diagnose, and replace defective components with a minimum of time.
- RTV 323 AM AND FM CIRCUITS is designed to cover theory of wave propagation and reception in the AM and FM radio signals.
- RTV 511 COLOR TELEVISION SERVICING presents the fundamentals of color television and develops skills in troubleshooting receivers.
- RTV 512 MONOCHROME TELEVISION is a study of the fundamental of black and white television.
- RTV 823 FM MULTIPLEXING FOR STEREO is designed to teach students the theory of frequency modulation.



Secretarial Science



Secretarial Science

The Secretarial Science curriculum is designed to develop the necessary skills in typing, dictation, transcription and office procedures for employment in the business world. Secretaries handle a variety of business details on their own initiative. Secretaries often handle tasks such as scheduling appointments for their employers, taking care of correspondence and handling private or confidential records.

Employment Opportunities

Employment opportunities for workers who have stenographic skills are expected to be very good through the 1970's. Openings for secretaries are expected to total more than 230,000 annually.

Length of Course:	Four Quarters
Entrance Dates:	Quarterly
Cost:	Supply Fee \$20 per quarter; Books approxi- mately \$100 for entire course.

- 1. Must have mathematics level equal to the eighth grade.
- 2. Must have reading level equal to the ninth grade.
- Must have a high school diploma or the equivalent, be a senior co-op student, or be working toward obtaining the high school equivalency diploma.

Secretarial Science Course Outline

First Quarter:										Hours Credit					
BUS	101 — Shorthand I									 					10
BUS	113 — Business Math									 					5
BUS	114 — Buiness English I .									 					5
BUS	110 — Typewriting									 					5
BUS	211 — Business Machines									 					5
															30

Quarter

Second Quarter:

BUS	210 — Typewriting II	5
BUS	214 — Business English II	5
BUS	201 — Shorthand II	10
BUS	111 — Accounting	5
BUS	115 — Secretarial Procedures I	5
		30

Third Quarter:

BUS	301 — Shorthand III	10
BUS	310 — Typewriting III	5
BUS	105 — Machine Transcription	5
BUS	116 — Secretarial Procedures II	5
BUS	501 — Consumer Finance	5
		30

Fourth Quarter:

BUS	401 — Shorthand IV	10
BUS	410 — Typewriting IV	5
BUS	416 — Preparing for Employment Testing	5
BUS	417 — Legal or Medical Office Procedures	10
000		30

BUS 142 - Field Project may be taken in lieu of BUS 215, 216, 416 or 417.

Secretarial Science

Description of Courses

- BUS 101 SHORTHAND I presents the basic principles of shorthand.
- BUS 114 BUSINESS ENGLISH is a basic English course, principally dealing with parts of speech, sentence structure, capitalization, using words effectively, and forms of business letters.
- BUS 110 TYPEWRITING I is a beginning course for students. The keyboard is introduced and drilled while the basic theory of typewriting is taught and reinforced. Special attention is devoted to the learning of proper techniques.
- MA 113 BUSINESS MATHEMATICS is a fundamental course for the business student, which introduces some of the more common arithmetical computations used in the business world today. Basic mathematical processes are learned, practiced, and then applied to such areas as percentage, interest, insurance, payroll, tax areas and financial statements.

BUS 201, — SHORTHAND II AND III is an extension of Shorthand I.

- BUS 301,
- BUS 211
- & 311
- ENG 214 BUSINESS ENGLISH II provides the student with a comprehensive program tailored to develop the communication needed to enter and to progress in the business world. Different types of business letters are covered by instruction.
- BUS 210 TYPEWRITING II develops the advancement of correct techniques, all forms of business correspondence, intricate tabulation, rough drafts and manuscripts.
- BUS 310 TYPEWRITING III AND IV consists of the mastery of advanced & BUS 410 and more complex typing skills.
- ACCT 111 ACCOUNTING I is a basic course concentrating on one elementary accounting system. Collecting, summarizing, analyzing and reporting information are stressed.
- BUS 142 FIELD PROJECT enables the student to obtain experience in the business field of his choice by working in an office.
- BUS 105 MACHINE TRANSCRIPTION is a course utilizing voice recorded media or dictation as a source of impulse-to-type. Consideration will be given to correspondence, memorandums, reports and other documents.
- BUS 211 BUSINESS MACHINES is designed to acquaint the student with the skill and use of adding machines, ten-key adding machines, calculators and other office machines used in an office of business.

- BUS 115 SECRETARIAL PROCEDURES I & II includes correspondence, & responsibilities, modern office methods and practices, functions of
- BUS 116 the private secretary, receptionist and telephone techniques, filing, use of transmittal services and procedures for preparing business reports and speeches of different types.
- BUS 417 LEGAL OFFICE PROCEDURES revolves around the calendar, where the secretary keeps a record of work to be done, court dates and appointments, and work that has been accomplished. It gives the student practice in typing legal documents, and introduces procedures that the legal secretary is expected to follow on the job.

— LEGAL OFFICE PROCEDURES offers a comprehensive program for the legal secretary touching on four fields of law, i.e., real estate and property transfer, litigation, wills and estates, and corporations and partnerships.

BUS 417 — MEDICAL OFFICE PRACTICE provides specialized training and practice for the student interested in preparing for a position as a medical office assistant.



Welding


Welding

Background Information

The welding course is designed to prepare the student for employment at entry level in the occupational field of welding and to improve the skills of persons presently employed in the field. Instruction includes an understanding of the welding processes and their possibilities; a study of composition of various metals and the practical methods of identifying and welding them; skill in working and handling the equipment with confidence and a proper regard for safety; the practice of economy; preparation and execution of welds; testing of completed work; and recognizing defects and helping to correct them.

Employment Opportunities

Many welders are employed in such manufacturing industries as automobile, shipping and aviation. Other graduates are employed by construction firms or repairs servicing. Increasing metalworking industries and wider use of welding processes will continue to create positions for trained welders.

Length of Course:	Three Quarters
Entrance Dates:	Quarterly
Cost:	Supply Fee \$20 per month; Books \$25. Stu- dents must purchase gloves and welding helmet at an additional cost of approximately \$20. Supply fee is due the first of the month.

Prerequisites for Admission

- 1. Must be in good physical condition.
- 2. Must be free of any respiratory or eye ailments.
- 3. Must have the ability to learn to read blueprints.
- 4. Must be able to read on the sixth grade level.

Welding

Course Outline

First Quarter:		Quarter Hours Credit
WDR 201 — Blueprint Reading		. 5
WLD 104 — Arc Welding		. 20
WLD 101 — Oxyacetylene Welding		. 5
		30
Second Quarter:		
WLD 202 — Metallic Inert Gas Welding		. 10
WLD 212 — Advanced Arc Welding		. 10
WLD 101 — Blueprint Reading		. 5
MA 101 — Mathematics		
		30
Third Quarter:		
WLD 312 — Pipe Welding		. 10
WLD 321 — Tungsten Inert Gas Welding		. 10
WLD 331 — Weld Testing		. 5
BUS 501 — Consumer Finance		. 5
		30

Welding Description of Courses

- WLD 101 - OXYACETYLENE WELDING includes study of lighting and adjusting torch; welding positions; flat, vertical, horizontal and overhead.
- WLD 404 ARC WELDING is widely used in construction of many products, & 212 steamships, tanks, locomotives, automobiles, aircraft and missiles. Learning the essentials of arc welding requires a knowledge of metals, electrodes, power source, and welding techniques.
- WDR 101 - WELDING BLUEPRINT READING develops the necessary skill to interpret conventional trade drawings, plus a thorough understanding of abbreviations and symbols.
- WLD 202 - MIG WELDING (Metallic Inert Gas) uses a continuous consumable wire electrode molten welded puddle completely covered with a shield of gas. The welding can be either automatic or semiautomatic.
- PIPE WELDING is designed to give the students practice in join-WLD 312 ing pipe sections. Pipelines may be constructed by rolling the pipe under the arc so as to permit the operator to weld always in a flat position, called roll-welding, or in the fixed position either horizontal or vertical.
- TUNGSTEN INERT WELDING was developed primarily to weld WLD 321 corrosion resistant and other difficult weld metals, including aluminum, magnesium, stainless steel and other exotic metals.
- WELD TESTING is designed to show the students what may WLD 331 happen if defects in welding aren't eliminated.