### TECHNICAL DEGREE PROGRAMS

### **ASSOCIATE IN APPLIED SCIENCE PROGRAMS**

These programs are designed to prepare students for technical positions in business and industry. Upon the completion of a prescribed curriculum, an Associate in Applied Science degree (AAS)will be awarded to the graduate.

In order to receive an Associate in Applied Science (AAS)degree, it is necessary to complete a minimum of 64 semester hours including 15 semester hours of the general education core. The core must include 3 semester hours of course work in each of the following areas:

Written Communication: English Composition I (ENG 1113)

Mathematics or Science:(MAT 1313 or higher OR any BIO, CHE, or PHY course)

Social or Behavioral Science (Any ECO, GEO, PSC, PSY, or SOC course)

Fine Arts (ART 1113, MUS 1113, SPT 2233)

OR

Humanities (Any HIS, MFL, or PHI course OR ENG 2223, 2233, 2323, 2333, 2423, 2433)

Oral Communication: SPT 1113, SPT 2163

Students receiving an AAS degree will demonstrate competency in the basic use of computers by a high school transcript and/or computer usage through course work.

Although technical programs are designed for immediate employment upon completion, transfer credit toward a bachelor degree may be accepted from a four year institution in areas of technology and in industrial education. This should be verified by the senior institution.

PLEASE NOTE: Students applying for admission to allied health programs must do so between September 1 and May 1. Please refer to admission requirements in this catalog.

Pearl River Community College offers support services to ensure the success of all members of the special populations. Students who have disabilities, students with limited English proficiency, academically disadvantaged students, students from economically disadvantaged families, students enrolled in nontraditional fields of study, single parents and displaced homemakers will be eligible for services through the special populations department. A list of the services provided is available in the special populations department. Students can be identified through enrolling in a Career-Technical program, or a student can self-identify by contacting the special populations department.

Below is a list of technical programs and locations.

**Program** Location

Automation and Control Technology(MFT) Instrumentation Technology Option (INT) Poplarville Automotive Mechanics Technology(ATT)\*

Aviation Maintenance Technology(APT)\*\* Stennis International Airport

**Business and Office Techology** 

Accounting Technology Option (BOT)

Medical Office Billing and Coding

Technology Option (BOT) Medical Office Technology Option (BOT)

Microcomputer Technology (BOT) Office Systems Technology (BOT)

Business and Marketing/Management Technology (MMT)

Computer Information Systems Technology

Computer Network Support Technology Option (CNT) Computer Programming Technology Option (CPT)

Web Development Technology (WDT) Computer Servicing Technology (CST)

Construction Management Technology (CON)\*

Dental Hygiene Technology(DHT) Drafting and Design Technology(DDT)

Early Childhood Education Technology(CDT)

Electrical Technology(ELT)\*

Electronics Technology(EET)

Aerospace Electronics Technology Option (EET)

Biomedical Equipment Repair Technology Option(EET)

Heating, Air Conditioning,

and Refrigeration Technology(ACT)\*

Poplarville Poplarville

Poplarville

Poplarville Poplarville Poplarville

Forrest County Center/Poplarville

Poplarville

Poplarville Poplarville Poplarville

Forrest County Center

Poplarville

Forrest County Center

Poplarville Poplarville Poplarville

Forrest County Center/Poplarville

Poplarville

Forrest County Center/Poplarville

Forrest County Center/Poplarville

Machine Tool Operation/Machine Shop Technology(MST)*	Poplarville
Medical Laboratory Technology (MLT)	Forrest County Center
Medical Radiologic Technology (RGT)	Forrest County Center
Occupational Therapy Assistant Technology(OTA)	Forrest County Center
Physical Therapist Assistant Technology(PTA)	Forrest County Center
Respiratory Care Practitioner Technology(RCT)	Forrest County Center
Surgical Technology (SUT)	Forrest County Center

<sup>\*</sup>These programs can be taken as a two year certificate program at the Poplarville campus.

# AUTOMATION AND CONTROL TECHNOLOGY Associate in Applied Science Poplarville

The Automation and Control Technology program provides students with technical knowledge and skills necessary for gaining employment as an automated manufacturing systems technician in maintenance diagnostics, engineering, or production in an automated manufacturing environment. The program focuses on electricity/electronics, fluid power, motors and controllers, programmable controls, interfacing technology, and automated processes.

FRESHMAN	YEAR	SEMESTER HOURS	
		1st Sem.	2nd Sem.
MFT 1112	Introduction to Automation and		
	Controls	2	
EET 1114	DC Circuits	4	
	Mathematics/Science Elective	3	
	Computer Related Elective	3	
	Technical Elective	3	
EET 1123	AC Circuits		3
EET 1334	Solid State Devices & Circuits		4
ELT 1413	Motor Control Systems		3
INT 1214	Fluid Power		4
ENG 1113	English Composition I		3
SOPHOMOR	RE YEAR		
EET 1214	Digital Electronics	4	
ELT 2613	Programmable Logic Controllers	3	
INT 2114	Control Systems	4	
	Technical Elective	3	
	Social/Behavioral Elective	3	
MFT 1123	Electrical Wiring for Automation		
	and Control Technology		3
SPT 1113	Oral Communication		3 3
	Humanities/Fine Arts Elective		3
	Technical Electives		6

### **TOTAL CREDIT HOURS: 65-66**

#### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

### **TECHNICAL ELECTIVES:**

EET 2334 Linear Integrated Circuits

ELT 2424 Solid State Motor Control

ELT 2623 Advanced Programmable Logic Controllers

MFT 2614 Flexible Manufacturing Systems

MFT 291(1-3) Special Project in Automation and Control Technology

MFT 292(1-6) Supervised Work Experience in Automation and Control Technology

ROT 1113 Fundamentals of Robotics

ROT 1313 Industrial Robotics

**ROT 2613 Mechanical Systems** 

<sup>\*\*</sup>This program can be taken as a two year certificate program at Stennis International Airport.

# AUTOMOTIVE MECHANICS TECHNOLOGY Associate in Applied Science Poplarville

The Automotive Mechanics Technology program prepares individuals to engage in the servicing and maintenance of all types of automobiles. Instruction includes the diagnosis of malfunctions and repair of engines, fuel, electrical, cooling, brake systems, and drive train and suspension systems. Instruction is also provided in the adjustment and repair of individual components such as transmissions and fuel systems. The program is certified by the National Institute of Automotive Service Excellence.

FRESHMAN '	YEAR		SEMESTER HOURS
		1st Sem.	2nd Sem.
ENG 1113	English Composition I	3	
ATT 1213	Brakes	3	
ATT 1811	Introduction, Safety, & Emp. Skills	1	
ATT 1124	Basic Electrical/Electronic Sys.	4	
ATT 2334	Steering & Suspension Systems	4	
<del></del>	Math/Science Elective		3
ATT 1715	Engine Repair		5
ATT 1424	Engine Performance I		4
ATT 1134	Advanced Electrical/Electronic Sys.		4
SOPHOMORI	E YEAR		
	Humanities/Fine Arts Elective	3	
ATT 2434	Engine Performance II	4	
ATT 2614	Heating and Air Conditioning	4	
ATT 2325	Automatic Transmissions/Transaxles	5	
	Approved Electives		4
SPT 1113	Oral Communication		3
	Social/Behavioral Science Elective		3
ATT 2444	Engine Performance III		4
ATT 1314	Manual Drive Trains/Transaxles		4

**TOTAL CREDIT HOURS: 65** 

### **ACADEMIC ELECTIVES:**

See Technical Degree Programs in this section of the catalog for AAS degree general education core courses.

### **APPROVED ELECTIVES:**

ATE 1113 Science and Technology

ATT 291(1-3) Special Problem in Automotive Technology

ATT 292(1-6) Supervised Work Experience in Automotive Technology

# AVIATION MAINTENANCE TECHNOLOGY Certificate of Proficiency/Associate in Applied Science\* Stennis International Airport

The Aviation Maintenance Technology program is a two-year program which offers a FAA certified curriculum designed to prepare the students for a career as aircraft, airframe, and powerplant mechanics. Upon completion of the program, students receive a Certificate of Proficiency and are qualified to take the FAA examination for certification as an Aviation Maintenance Technician. Students who complete the certificate of proficiency requirements may obtain an Associate of Applied Science degree upon completion of an additional fifteen semester hours of credit in the general education core courses. See special admission requirements for this program in the Admissions section in this catalog.

FRESHMAN YEAR SEMESTER HOURS

		1st Sem. 2nd Sem	
APT 1113	Aviation Applied Sciences	3	
APT 1123	Aviation Electricity I	3	
APT 1134	Aviation Materials/Processes	4	
APT 1143	Aircraft Servicing, Weight & Balance	3	
APT 1153	Maintenance Forms/Records	3	
APT 1162	Reciprocating Engine Theory		2
APT 1213	Reciprocating Engine Overhaul		3
APT 1222	Turbine Engine Theory		2
APT 1233	Turbine Engine Overhaul & Inspection		3
APT 1254	Lubrication & Fuel Metering Systems		4
APT 1262	Induction, Cooling/Exhaust Systems		2
SOPHOMORE	YEAR		
APT 1241	Powerplant Conformity	1	
APT 2114	Aviation Electricity II	4	
APT 2123	Propellers/Powerplant Review	3	
APT 2135	Structures I	5	
APT 2143	Structures II	3	
APT 2212	Aircraft Controls		2
APT 2222	Aviation Electricity III		2 2 3
APT 2232	Hydraulic/Pneumatic Power		2
APT 2243	Landing Gear/Protect Systems		3
APT 2251	Environmental Control		1
APT 2263	Aircraft Instrumentation Systems		3
APT 2271	Aircraft Fuel Systems		1
APT 2282	Airframe Inspection and Review		2

\*To receive an Associate in Applied Science Degree in Aviation Maintenance Technology a student must complete 15 additional hours of study, consisting of three (3) semester hours in each of the general education core areas. See Technical Programs in this section of the catalog for general education core courses.

# BUSINESS AND OFFICE TECHNOLOGY Accounting Technology Option Associate in Applied Science Poplarville

The Accounting Technology program prepares students for entry-level accounting positions in accounts payable, accounts receivable, payroll, and inventory. Upon successful completion, graduates should be prepared for accounting positions in business and industry, governmental agencies, and public accounting firms.

FRESHMAN		SEMESTER	HOURS
		1 <sup>st</sup> Sem.	2 <sup>nd</sup> Sem.
BOT 1433	Business Accounting	3	
BOT 1133	Microcomputer Applications	3	
BOT 1113	Document Formatting	3	
BOT 1313	Applied Business Mathematics	3	
BOT 1713	Mechanics of Communication	3	
BOT 1213	Professional Development	3	
BOT 1443	Advanced Business Accounting		3
BOT 1143	Word Processing		3
BOT 1123	Keyboard Skillbuilding		3
ENG 1113	English Composition I		3
BOT 1813	Electronic Spreadsheet		3
BOT 2813	Business Communications		3

# **SOPHOMORE YEAR**

BOT 2413	Computerized Accounting	3	
	Mathematics/Science Elective	3	
SPT 1113	Oral Communication	3	
BOT 2463	Payroll Accounting	3	
BOT 2323	Database Management	3	
BOT 2423	Income Tax Accounting		3
BOT 2833	Integrated Computer Applications		3
BOT 2133	Desktop Publishing		3
PSY 1513	General Psychology		3
	Humanities/Fine Arts Elective	;	3

### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# BUSINESS AND OFFICE TECHNOLOGY Medical Office Billing and Coding Technology Option Associate in Applied Science Poplarville

The Medical Office Billing and Coding Technology program of study is designed to prepare a student for office positions in hospitals, doctor's offices, health clinics, insurance companies, and other health-related organizations as a Medical Billing and Coding Specialist.

FRESHMAN	I YEAR	SEMESTER HOURS  1 <sup>st</sup> Sem. 2 <sup>nd</sup> Sem.
BOT 1613	Medical Terminology I	3
BOT 1133	Microcomputer Applications	3
BOT 1113	Document Formatting	3
BOT 1313	Applied Business Mathematics	3 3
BOT 1713	Mechanics of Communication	3
	Humanities/Fine Arts Elect.	3
	Word Processing	3
BOT 2813	Business Communication	3 3 3 3 3 3
BOT 1433	Business Accounting	3
ENG 1113	English Composition I	3
BOT 1623	Medical Terminology II	3
BOT 1413	Records Management	3
SOPHOMO	RE YEAR	
BOT 2523	Medical Machine Transcription I	3
BOT 2743	Medical Office Concepts	3
	Mathematics/Science Elect.	3
BOT 2643	CPT Coding	3
BOT 2653	ICD Coding	3 3
BOT 2413	Computerized Accounting	
BOT 2663	Advanced Coding	3
BOT 2753	Medical Information Management	3
BOT 2673	Medical Insurance Billing	3
PSY 1513	General Psychology	3 3 3 3 3
SPT 1113	Oral Communication	3
	Technical Elective	3

### **TOTAL CREDIT HOURS: 72**

# **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

## **TECHNICAL ELECTIVE:**

BOT 1813 Electronic Spreadsheet

### BUSINESS AND OFFICE TECHNOLOGY Medical Office Technology Option Associate in Applied Science Poplarville

The Medical Office Technology program of study is designed to prepare students to work in office positions in hospitals, doctor's offices, health clinics, insurance companies, and other health-related organizations. The student will develop skills using medical terminology, accounting, transcription, coding, and computer software applications.

FRESHMAN	I YEAR		SEMESTER HOURS
		1st Sem.	2nd Sem.
BOT 1113	Document Formatting	3	
BOT 1133	Microcomputer Applications	3	
BOT 1313	Applied Business Mathematics	3	
BOT 1713	Mechanics of Communication	3	
BOT 1613	Medical Terminology I	3 3	
BOT 1413	Records Management	3	
BOT 1143	Word Processing		3
BOT 2813	Business Communication		3 3
BOT 1123	Keyboard Skillbuilding		3
BOT 1433	Business Accounting		3
ENG 1113	English Composition I		3
BOT 1623	Medical Office Terminology II		3
SOPHOMO	RE YEAR		
BOT 2523	Medical Machine Transcription I	3	
BOT 2743	Medical Office Concepts	3	
	Mathematics/Science Elective	3	
BOT 2413	Computerized Accounting	3	
BOT 2643	CPT Coding	3	
BOT 2653	ICD Coding	3	
BOT 2533	Medical Machine Transcription II		3
BOT 2753	Medical Information Management		3
SPT 1113	Oral Communication		3
BOT 2823	Communication Technology		3
	Arts/Humanities Elective		3
PSY 1513	General Psychology		3

# **TOTAL CREDIT HOURS: 72**

#### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# BUSINESS AND OFFICE TECHNOLOGY Microcomputer Technology Option Associate in Applied Science Poplarville

The Microcomputer Technology program of study provides training in microcomputer operations in an office setting, including software configuration, troubleshooting, and systems operation.

BOT 1133 Microcomputer Applications 3 BOT 1113 Document Formatting 3	FRESHMAN Y	EAR	1st Sem.	2nd Sem.
BOT 1713 Applied Business Mathematics 3 BOT 1713 Mechanics of Communication 3	BOT 1113 BOT 1313	Document Formatting Applied Business Mathematics	3 3 3 3	

BOT 1213	Professional Development	3	
	Humanities/Fine Arts Elective	3	
BOT 1123	Keyboard Skillbuilding		3
BOT 1143	Word Processing		3
CPT 1214	Visual Basic Programming		4
BOT 1433	Business Accounting		3
ENG 1113	English Comp. I		3
BOT 1813	Electronics Spreadsheet		3
SOPHOMORE	YEAR		
	Mathematics/Science	3	
BOT 2413	Computerized Accounting	3	
SPT 1113	Oral Communication	3	
BOT 2323	Database Management	3	
BOT 2823	Communication Technology	3	
	Computer Related Elective	3	
BOT 2833	Integrated Computer Applications		3
CPT 1353	Database Design Fundamentals		3
BOT 2133	Desktop Publishing		3
BOT 2813	Business Communications		3
PSY 1513	General Psychology		3

#### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

COMPUTER RELATED ELECTIVE: Any CSC, CNT, CPT or WDT course

# BUSINESS AND OFFICE TECHNOLOGY Office Systems Technology Option Associate in Applied Science Poplarville and Forrest County Center

The Office Systems Technology program of study provides training in administrative office procedures, integrated computer applications, business financial systems, communication, and related technologies. The student will develop skills using a wide variety of microcomputer software applications including word processing, electronic spreadsheets, database management, and desktop publishing. The curriculum prepares a student for office positions such as administrative assistant, word processing operator, receptionist, general clerk or accounting clerk.

FRESHMAN YEAR SEMES		SEMESTER	HOURS
		1st Sem.	2nd Sem.
BOT 1113	Document Formatting	3	
BOT 1133	Microcomputer Applications	3	
BOT 1413	Records Management	3	
BOT 1213	Professional Development	3	
BOT 1313	Applied Business Mathematics	3	
BOT 1713	Mechanics of Communication	3	
BOT 2813	Business Communication		3
BOT 1143	Word Processing		3
BOT 1433	Business Accounting		3
ENG 1113	English Composition I		3
BOT 1123	Keyboard Skillbuilding		3
BOT 1813	Electronic Spreadsheets		3

### **EXIT POINT FOR CERTIFICATE OF PROFICIENCY**

# SOPHOMORE YEAR

SOPHOWORE TEAR		
	Mathematics/Science Elective	3
BOT 2413	Computerized Accounting	3
SPT 1113	Oral Communication	3

BOT 2323	Database Management	3	
BOT 2823	Communication Technology	3	
BOT 2133	Desktop Publishing	3	
BOT 2833	Integrated Computer Applications		3
BOT 2723	Administrative Office Procedures		3
BOT 1513	Machine Transcription		3
PSY 1513	General Psychology		3
	Humanities/Fine Arts Elective		3

## **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# BUSINESS MARKETING AND MANAGEMENT TECHNOLOGY Associate in Applied Science Poplarville

The Business Marketing Management Technology program is designed to provide specialized occupational instruction in all phases of marketing management including e-business, international marketing, and multimedia presentations. The program prepares students for careers as managers/supervisors in the marketing field. The curriculum includes a combination of classwork and practical experience.

FRESHMAN YE	AR	SEMESTER HOUR 1st Sem.	S 2nd Sem.
ENG 1113	English Composition I	3	Ziid Geiii.
MMT 1113	Marketing I	3	
MMT 1313	Salesmanship	3 3	
	Computer Related Elective	3	
	Social/Behavioral Science	Ğ	
	Elective	3	
MMT 1753	Marketing Seminar I	3	
MMT 1413	Merchandising Mathematics	•	3
MMT 1123	Marketing II		3
SPT 1113	Oral Communication		3
	Accounting Elective		3 3 3
MMT 1323	Advertising		3
SOPHOMORE Y	'EAR		
MMT 2213	Management	3	
MMT 2613	International Marketing	3	
	Mathematics/Natural Science Elective	3 3	
MMT 2513	Entrepreneurship	3	
	Elective		
MMT 2523	Event Marketing	3 3	
MMT 2233	Human Resource Management		3
BAD 2413	Legal Environment of Business		
MMT 2323	Internet Marketing		3
	Elective		3 3 3 3
	Humanities Elective		3

# **TOTAL CREDIT HOURS: 66**

#### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# **TECHNICAL ELECTIVES:**

BOT 2413 Computerized Accounting
BFT 1213 Principles of Banking
MMT 291(1-6) Supervised Work Experience

# **COMPUTER INFORMATION SYSTEMS TECHNOLOGY**

# Computer Network Support Technology Option Associate in Applied Science Poplarville

Computer Network Support Technology is a two-year program which offers training in telecommunications, network administration, and client/server systems. The curriculum enables students to achieve certifications from Cisco, Microsoft, Network+, and A+.

FRESHMAN YEAR		SEMESTER HOURS 1 <sup>st</sup> Sem. 2 <sup>nd</sup> Sem.	
CNT 1414 CPT 1214 WDT 1123 CPT 1333 CNT 1524 CNT 1624 ENG 1113 SPT 1113 BOT 2813 BOT 1213	Fund. of Data Communication Visual Basic Programming Web Development Concepts Operating Platforms Technical Elective Network Components Network Admin. Using Windows Server English Composition I Oral Communication Business Communication or Professional Development	4 4 3 3 3-4	4 4 3 3 3
SOPHOMORE	YEAR		
CNT 2644 CNT 2533 CNT 2423 CPT 2284 MAT 1313 CNT 2544 CPT 2424 CPT 2434	Adv. Network Admin Using Windows Server Network Planning & Design System Maintenance C Programming College Algebra Network Implementation Adv. C. Programming or Adv. Visual Basic Programming Humanities/Fine Arts Elective Social/Behavioral Science Elective Approved Elective	4 3 3 4 3	4 4 3 3 3

**TOTAL CREDIT HOURS: 68/69** 

### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# **TECHNICAL ELECTIVE:**

CPT 1323 Survey of Microcomputer Applications

CNT 2553 Network Security

Any instructor approved course from Computer Programming Technology or Electricity/Electronics Technology

#### **APPROVED ELECTIVE:**

Any instructor approved related technical or academic course

# COMPUTER INFORMATION SYSTEMS TECHNOLOGY Computer Programming Technology Option Associate in Applied Science Poplarville

Computer Programming Technology is a two-year program of study that offers training in business applications development using microcomputers. Emphasis is placed on database development and web-based activities that can be found in a small to mid-size information systems department. Programming languages offered include Visual Basic, C and database programming using Microsoft Access.

FRESHMAN YEAR		SEMESTER HOURS	
	1st Sem.	2nd Sem.	
Programming Development Concepts	3		
Visual Basic Programming	4		
Survey of Microcomputer Applications	3		
Operating Platforms	3		
Web Development Concepts	3		
Database Design Fundamentals		3	
System Maintenance		3 3	
Adv. Visual Basic Programming		4	
Principles of Accounting I or			
Business Accounting		3	
English Composition I		3	
SOPHOMORE YEAR			
C Programming	4		
Database Programming	4		
Network Elective	4		
Oral Communication	3		
College Algebra	3		
Systems Analysis & Design		4	
Advanced C Programming		4	
Business Communications or			
Professional Development		3	
Humanities/Fine Arts Elective		3 3	
Social/Behavior Science Elective		3	
	Programming Development Concepts Visual Basic Programming Survey of Microcomputer Applications Operating Platforms Web Development Concepts Database Design Fundamentals System Maintenance Adv. Visual Basic Programming Principles of Accounting I or Business Accounting English Composition I  E YEAR C Programming Database Programming Network Elective Oral Communication College Algebra Systems Analysis & Design Advanced C Programming Business Communications or Professional Development Humanities/Fine Arts Elective	Programming Development Concepts Visual Basic Programming Survey of Microcomputer Applications Operating Platforms Web Development Concepts Database Design Fundamentals System Maintenance Adv. Visual Basic Programming Principles of Accounting I or Business Accounting English Composition I  E YEAR C Programming Database Programming Network Elective Oral Communication College Algebra Systems Analysis & Design Advanced C Programming Business Communications or Professional Development Humanities/Fine Arts Elective	

#### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

### **NETWORK ELECTIVE:**

CNT 1414 Fundamentals of Data Communications CNT 1624 Network Administration Using Windows Server

**NOTE**: Students who have not successfully completed a Typing Course in high school or college will be required to take Keyboarding

# COMPUTER INFORMATION SYSTEMS TECHNOLOGY Web Development Technology Option Associate in Applied Science Poplarville

The Web Development Technology program of study will provide a student with the knowledge and skills necessary to obtain employment as a website development specialist. Instruction includes training in website design, e-commerce development, Internet programming and server administration. Students will also acquire skills using microcomputers, networks, and mid-range computer systems.

FRESHMAN Y		SEMESTER HOURS		
		1st S	Sem.	2nd Sem.
CPT 1333	Operating Platforms	3		
CNT 1414	Fundamentals of Data Communications	4		
CPT 1143	Programming Development Concepts	3		
WDT 1123	Web Development Concepts	3		
CPT 1214	Visual Basic Programming	4		
ENG 1113	English Composition I			3
WDT 1414	Web Design Applications			4
	Humanities/Fine Arts Elective			3
WDT 1314	Client-Side Programming			4
CPT 1353	Database Design Fundamentals			3

SOPHOMORE YEAR			
College Algebra	3		
Server-Side Programming I	4		
Business Communications or			
Professional Development	3		
Web Server	3		
Survey of Microcomputer Applications	3		
Server-Side Programming II		4	
Website Development		4	
E-Commerce Strategies		3	
Oral Communication		3	
Social/Behavior Science Elective		3	
	College Algebra Server-Side Programming I Business Communications or Professional Development Web Server Survey of Microcomputer Applications Server-Side Programming II Website Development E-Commerce Strategies Oral Communication	College Algebra 3 Server-Side Programming I 4 Business Communications or Professional Development 3 Web Server 3 Survey of Microcomputer Applications 3 Server-Side Programming II Website Development E-Commerce Strategies Oral Communication	

## **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# COMPUTER SERVICING TECHNOLOGY PROGRAM Associate in Applied Science Forrest County Center

Computer Servicing Technology students will receive classroom and laboratory instruction for the repair and operation of current personal computer and related systems. Electronic components, networking systems, operating platforms, utilities, applications and other areas are integrated into the program to provide the fundamental skills for a well-rounded curriculum. Students will be prepared to install, operate, maintain, service, and diagnose computer systems that are found in business and industry.

FRESHMAN YEAR			SEMESTER HOURS
CST 1114	Electronics for	1 <sup>st</sup> Sem.	2 <sup>nd</sup> Sem.
	Computer Servicing	4	
CST 1333	Operating Platforms	3	
CPT 1113	Fundamentals of Microcomputer		
	Applications	3	
ENG 1113	English Composition I	3	
	Mathematics/Science		
	Elective	3	
CST 1123	Basic Computer Systems		3
CNT 1513	Internet Concepts		3
CST 1413	Fundamentals of Data		
	Communication		3
	Technical/Related Academic		
	Elective		3
	Humanities/Fine Arts		
	Elective		3
SOPHOMOR	E YEAR		
CST 2113	Computer Servicing Lab I	3	
CST 1523	Network Components	3	
EET 1214	Digital Electronics	4	
CST 2913	Special Projects	3	
	Social/Behavioral Science		
	Elective	3	
CST 2123	Computer Servicing Lab II		3
CST 2134	Diagnosing and Troubleshooting		4
EET 1324	Microprocessors		4
SPT 1113	Oral Communication		3
	Technical Elective		3

# **TOTAL CREDIT HOURS: 64**

#### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

#### **TECHNICAL ELECTIVES:**

EET 1123	AC Circuits
EET 1713	Drafting for Electronic/Electrical Technology
EET 2514	Interfacing Techniques
CST 2923	Supervised Work Experience

# CONSTRUCTION MANAGEMENT TECHNOLOGY Associate in Applied Science Poplarville

The Construction Management Technology program is designed to prepare technicians for employment in businesses and firms within the construction industry in mid-level management operations as estimators, material specialists, planner, project managers, layout specialists or other construction operations. Students also learn how to identify safety hazards and notify proper authorities. Through an internship program, students have the opportunity to work in a position related to construction management.

FRESHMAN YEAR		<b>SEM</b> 1 <sup>st</sup> Sem.	ESTER HOURS
CON 1113	Survey of Modern Construction	3	2 00
CON 1213	Construction Materials	3	
	Mathematics/Science Elective	3	
DDT 1114	Fundamentals of Drafting	4	
	Computer Science Elective	3	
CON 1222	Plans and Document Interpretation		2
CON 1233	Construction Systems I		3 3 3 3
DDT 1313	Principles of CAD		3
DDT 1413	Elementary Surveying		3
MAT 1323	Trigonometry		3
ENG 1113	English Composition I		3
SUMMER TERM CON 261(3-6) Internship in Construction Engineering Technology 3-6			
CON 262(3-6) Internship in Construction Engineering Technology		3-6	
SOPHOMORI	E YEAR		
CON 2313	Construction Layout	3	
CON 2123	Construction Cost Estimation	3	
	Oral Communications Elective	3	
CON 2233	Construction Systems II	3	
	Humanities/Fine Arts Elective	3	
CON 2113	Construction Job Site Mgmt.		3
CON 2413	Construction Safety Standards		3 3 3 3
00110540	Behavioral/Social Science Elective		3
CON 2513	Leadership and Organization		3
	Technical Elective		3

# **TOTAL CREDIT HOURS: 69/75**

### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# **TECHNICAL ELECTIVES:**

ACC 1213	Principles of Accounting
CON 2243	Constructions Systems III
CON 261(3-6)	Internship in Construction Engineering Technology
CON 291(1-3)	Special Problem in Construction Engineering Technology
CON 292(1-6)	Supervised Work Experience in Construction Engineering Technology
DDT 2253	Statics and Strength of Materials

# **COMPUTER SCIENCE ELECTIVES:**

ATE 1113	Science and Technology
CPT 1113	Fundamentals of Microcomputer Applications
CSC 1113	Introduction to Computer Concepts

## DENTAL HYGIENE TECHNOLOGY Associate in Applied Science Forrest County Center

The dental hygienist, working under the direct supervision of a licensed dentist, provides oral health care to patients by scaling and polishing teeth, takes and processes dental x-rays, applies caries preventive agents (fluoride and sealants) and provides advice and instruction concerning oral hygiene. Most hygienists are employed in private dental offices. Others are employed in public schools, state and local health clinics, hospitals, industry, and voluntary health agencies.

	0014140000111
ENG 1113	English Composition I (3)
ENG 1123	English Composition II (3)
BIO 2923	Microbiology (3)
BIO 2921	Microbiology Laboratory (1)
BIO 1513	Anatomy & Physiology for Allied Health I (3)
BIO 1511	Anatomy & Physiology for Allied Health I Lab (1)
BIO 1523	Anatomy & Physiology for Allied Health II (3)
BIO 1521	Anatomy & Physiology for Allied Health II Lab (1)
CHE 1213	General Chemistry I Elective (3)
CHE 1211	General Chemistry I Lab Elective (1)
CHE 1314	Principles of Chemistry I & Lab

General Psychology (3)

Introduction to Sociology (3)

SPT 1113 Oral Communication (3) FCS 1253 Nutrition (3) MAT 1313 College Algebra (3)

PRE-PROGRAM CURRICULUM

**TOTAL HOURS: 37** 

PSY 1513

SOC 2113

FRESHMAN YEAR		SEMESTER HOURS  1st Sem 2nd Sem.	
DHT 1116 DHT 1212 DHT 1314 DHT 1911 DHT 1222 DHT 1415 DHT 1232 DHT 1513 DHT 2612 DHT 1921	Fundamentals of Dental Hygiene Dental Anatomy Dental Radiology Seminar I Head and Neck Anatomy Dental Hygiene Clinic I Oral Histology and Embryology Periodontics Dental Materials Seminar II	6 2 4 1 2	5 2 3 2 1
SOPHOMORE Y DHT 2426 DHT 2233 DHT 2712 DHT 2931 DHT 2436 DHT 2813 DHT 2 922 DHT 2941	PEAR Dental Hygiene Clinic II General Oral Pathology Dental Pharmacology Seminar III Dental Hygiene Clinic III Community Dental Health Dental Ethics/Law Seminar IV	6 3 2 1	6 3 2 1

TOTAL CREDIT HOURS (included within program): 52 (total including prerequisites): 89

# DRAFTING AND DESIGN TECHNOLOGY Associate in Applied Science Poplarville

The Drafting and Design Technology program is designed to provide specialized occupational instruction in all phases of drafting and design. Students will obtain skills and knowledge related to several fields of the drafting and design industry. A major emphasis is placed upon the CAD software that is used by the majority of the drafting industry. Basic applications in Geographic Information Systems (GIS) and Global Positioning Systems (GPS) are included in the curriculum.

FRESHMAN YEAR SEMESTER HOURS

DDT 1114	Fundamentals of Drafting		4	
DDT 1313	Principles of CAD		3	
ENG 1113	English Composition I		3	
ATE 1113	Science & Technology		3	
	Mathematics/Science Elective		3	
DDT 2523	Pipe Drafting			3
DDT 1323	Intermediate CAD			3
SPT 1113	Oral Communication			3
DDT 1123	Computational Methods			3
	Humanities/Fine Art Elective			3
SOPHOMOR	RE YEAR			
DDT 1613	Architectural Design I		3	
DDT 2343	Advanced CAD		3	
DDT 2233	Structural Drafting I		3	
DDT 1213	Construction Materials		3	
DDT 1133	Machine Design I		3	
	Soc./Behavioral Science Elect	.•	3	
DDT 1413	Elementary Surveying			3
DDT 2163	Machine Drafting II			3
DDT 2623	Architectural Design II			3
DDT 2913	Special Projects			3
GIT 2123	Fundamentals of GIS			3
				-

### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

### **TECHNICAL ELECTIVES:**

DDT 2243	Cost Estimating
DDT 2353	CAD Management
DDT 2253	Statics & Strengths of Materials
GIT 2113	Database Construction and Maintenance
GIT 1253	Fundamentals of Cartography
GIT 2273	Fundamentals of Remote Sensing
GIT 2133	Principles of Image Processing

# EARLY CHILDHOOD EDUCATION TECHNOLOGY Associate in Applied Science Poplarville

The Early Childhood Education Technology provides preparation for a professional career in the discipline of Early Childhood Education spanning a variety of career options. Instructional programs include classroom instruction and supervised laboratory/collaborative center or work experience. Students will develop competencies which enable them to provide services, teach, and guide young children as related to various child development professions. Jobs are available in public, private or parochial Early Childhood Education centers including commercial, industrial, institutional centers; and recreational and hospital childcare centers. See special admission requirements for this program in the Admissions section in this catalog.

FRESHMAN YEAR		SE 1st Sem.	MESTER HOURS
CDT 1113	Early Childhood Profession	3	Zila Gelli.
CDT 1314	Creative Arts for Young Children	4	
CDT 1214	Child Development I	4	
CDT 1343	Child Health and Safety	3	
ENG 1113	English Composition I	3	
CDT 1224	Child Development II		4
CDT 1713	Language Literacy for Young Children		3
CDT 2714	Social Studies, Mathematics and Science		
	For Young Children		4
ENG 1123	English Composition II		3
	Humanities/Fine Arts Elective		3
SOPHOMORE YEAR			
CDT 2233	Guiding Social & Emotional Behavior	3	
CDT 1513	Nutrition for Young Children	3	

CDT 2915	Student Teaching I	5	
CDT 2613	Methods and Materials	3	
	Mathematics/Science Elective	3	
CDT 2925	Student Teaching II		5
CDT 2413	Atypical Child Development		3
CDT 2813	Administration of Programs for Young		
	Children		3
SPT 1113	Oral Communication		3
	Social/Behavioral Science Elective		3

### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# **ELECTRICAL TECHNOLOGY Associate in Applied Science Poplarville**

The Electrical Technology program prepares individuals to install, operate, maintain, and repair electrically-energized systems such as residential, commercial, and industrial electric wiring, and DC/AC motors, controls, and electrical distribution panels. Instruction in the use of test equipment is included.

FRESHMAN YEAR			SEMESTER	HOURS
		1s	t. Sem.	2nd Sem.
ELT 1192	Fundamentals of Electricity	2		
EET 1144	AC and DC Circuits	4		
ELT 1274	Switching Circuits	4		
ENG 1113	English Composition I	3		
ELT 2613	Programmable Logic Controllers			3
ELT 2424	Solid State Motor Control			4
EET 1133	Introduction to NEC			3
ELT 1124	Commercial Industrial Wiring			4
	Math/Science Elective			3
SOPHOMOR	E YEAR			
ELT 1334	Solid State Devices	4		
ELT 1413	Motor Control	3		
ELT 1223	Motor Maintenance	3		
ELT 1114	Residential Wiring	4		
ELT 1253	Branch Circuits Serv. Cal	3		
	Humanities/Fine Arts Elect.	3		
ELT 1213	Electrical Power			3
ELT 2913	Special Project			3
SPT 1113	Oral Communication			3
	Social/Behavioral Science Elev.			3
	Technical Elective			3

**TOTAL CREDIT HOURS: 65** 

### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

#### **TECHNICAL ELECTIVES:**

EET 1713	Drafting for Electronic/Electrical Technology
EET 2423	Fundamentals of Fiber Optics
EET 1613	Computer Fundamentals for Electronics/Electricity*
CPT 1113	Introduction to Computers*
FI T 292(1-6)	Supervised Work Experience

Approved Computer Programming Language\*
ELT 1283 Estimating the Cost of a Residential Installation

ATE 1113 Science & Technology

<sup>\*</sup> May be selected as computer related elective

# ELECTRONICS TECHNOLOGY Associate in Applied Science Poplarville and Forrest County Center

Electronics Technology prepares individuals to support electrical engineers and other professionals in the design, development, and testing of electrical circuits, devices and systems. Included is instruction in model and prototype development and testing; systems analysis and integration, including design, development of corrective and preventive maintenance techniques; application of engineering data; and the preparation of reports and test results.

FRESHMAN YEAR		SEMES	SEMESTER HOURS		
		1st Sem.	2nd Sem.		
EET 1114	DC Circuits	4			
EET 1334	Solid State Devices and Circuits	4			
EET 1123	AC Circuits	3			
ENG 1113	English Composition I	3			
	Technical Elective	3			
	Computer Related Elective		3		
EET 1214	Digital Electronics		4		
	Mathematics/Science Elective		3		
SPT 1113	Oral Communications		3		
	Technical Elective		3		
SOPHOMO					
EET 2334	Linear Integrated Circuits	4			
EET 1324	Microprocessors	4			
	Technical Elective	4			
	Humanities/Fine Arts Elective	3			
EET 2414	Electronics Communication		4		
	Social/Behavioral Science Elective		3		
	Technical Electives		9		

### **TOTAL CREDIT HOURS: 64**

#### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# **TECHNICAL ELECTIVES:**

ATE 1113	Science & Technology
CST 2123	Computer Servicing Lab II
EET 1113	Mathematics for Electronics
EET 1182	Introduction to Photonics
EET 1192	Fundamentals of Electronics
EET 1713	Drafting for Electronic/Electrical Technology
EET 2423	Fundamentals of Fiber Optics
EET 291(1-3	) Special Project
EET 292(1-6	) Supervised Work Experience in Electronics Technology
ELT 2424	Solid State Motor Control
ROT 1113	Fundamentals of Robotics
ELT 2613	Programmable Logic Controllers
ROT 1213	Industrial Hydraulics

# ELECTRONICS TECHNOLOGY Aerospace Electronics Technology Option Associate in Applied Science Poplarville

The Aerospace Electronics Technology program provides individuals with a comprehensive education that will enable them to establish productive careers in aerospace and related industries. Specialized training in aerospace topics and technical training in fundamental engineering principles are provided through classroom and laboratory instruction.

FRESHMAN YEAR		SEMESTER HOURS	
		1st Sem.	2nd Sem.
EET 1101	Introduction to Aerospace Technology	1	
EET 1192	Fundamentals of Electronics	2	
EET 1114	DC Circuits	4	
EET 1214	Digital Electronics	4	
DDT 1114	Fundamentals of Drafting	4	
MAT 1113	College Algebra	3	
EET 1334	Solid State Devices and Circuits		4
EET 1123	AC Circuits		3
ENG 1113	English Composition I		3
MST 1113	Introduction to Machine Technology		3

INT 1413	Motor Control	3
SPT 1113	Oral Communication	3

#### SOPHOMORE YEAR

INT 2214	Calibration and Measurement Principles	4	
ELT 1123	Commercial and Industrial Wiring	3	
ELT 2613	Programmable Logic Controllers	3	
	Humanities/Fine Arts Elective	3	
EET 2334	Linear Integrated Circuits		4
INT 1214	Fluid Power		4
INT 2114	Control Systems		4
	Social/Behavioral Science Elective		3

### **TOTAL CREDIT HOURS: 65**

### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

# ELECTRONICS TECHNOLOGY Biomedical Equipment Repair Technology Associate in Applied Science Poplarville and Forrest County Center

Biomedical Equipment Repair Technology is an instructional and field service program that provides students with technical knowledge and skills necessary for gaining employment as a Biomedical Equipment Technician. These persons are technical specialists with broad-based electro-medical skills who are familiar with electronic repair of hospital health care equipment. They are field technicians who can install, set up, troubleshoot, integrate, program, test, operate, and repair systems and components. Upon completion of the program, the student will be qualified to apply for the Biomedical Equipment Technician Certification Examination.

FRESHMAN YEAR		SEMESTER HOURS		
		1st Sem.	2nd Sem.	
BIO 2513	Anatomy and Physiology I	3		
BIO 2511	Anatomy and Physiology I Lab	1		
EET 1114	DC Circuits	4		
	Mathematics/Science Elective	3		
EET 1111	Orientation to Biomedical Careers	1		
ENG 1113	English Composition I	3		
EET 1123	AC Circuits		3	
<del></del>	Oral Communication Elective		3	
EET 1214	Digital Electronics		4	
DIO 0500	Social/Behavioral Science Elective		3	
BIO 2523	Anatomy & Physiology II		3 1	
BIO 2521	Anatomy & Physiology II Lab		I	
SOPHOMORE '	YEAR			
EET 1334	Solid State Devices & Circuits	4		
EET 1324	Microprocessors	4		
	Humanities/Fine Arts Elective	3		
	Technical Elective	4		
EET 211(3-6)	Supervised Work Experience in			
	Biomedical Equip. Repair I	3-6		
	Technical Elective		4	
EET 2334	Linear Integrated Circuits		4	
EET 222(3-6)	Supervised Work Experience in			
FFT 0.400	Biomedical Equip. Repair II		3-6	
EET 2423	Fundamentals of Fiber Optics		3	

# **TOTAL CREDIT HOURS: 64/70**

#### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

#### TECHNICAL ELECTIVES:

I LOTHING AL LL	2011120:
ATE 1113	Science & Technology
CPT 1113	Fundamentals of Microcomputer Applications
EET 1113	Mathematics for Electronics
EET 1192	Fundamentals of Electronics
EET 1613	Computer Fundamentals of Electronics/Electricity

EET 2414 Electronics Communication
EET 2514 Interfacing Techniques
EET 291(1-3) Special Project
INT 1214 Fluid Power

# HEATING, AIR CONDITIONING, AND REFRIGERATION TECHNOLOGY Associate in Applied Science Poplarville and Forrest County Center

The Heating, Air Conditioning and Refrigeration Technology program prepares individuals to work in engineering departments or private firms installing, maintaining, and operating small or medium air conditioning, heating and refrigeration systems. Instruction prepares individuals to work in a commercial setting preforming special tasks relating to designing ductwork, assembly, installation, servicing, operation, and maintenance of heating and cooling systems according to the standards of the American Society of Heating, Refrigeration, and Air Conditioning Contractors of America (ACCA), and Air Conditioning Refrigeration Institute (ARI). Instruction includes air conditioning, heating, and refrigeration devices; equipment, techniques, and systems; and maintenance and operation of these systems.

FRESHMAN YEAR		SEMEST	ER HOURS
		1st Sem.	2nd Sem.
ACT 1124	Basic Compression Refrigeration	4	
ACT 1713	Electricity for Heating,		
	Ventilation, Air Conditioning		
	and Refrigeration	3	
	Technical Elective	3	
ACT 1133	Tools and Piping	3 3 3	
ENG 1113	English Composition I	3	
ACT 1313	Refrigeration System Components		3
ACT 1812	Professional Service Procedures		2
ACT 1213	Controls		3 3 3
	Technical Elective		3
	Mathematics/Science Elective		3
SOPHOMORE	YEAR		
ACT 2414	Air Conditioning I	4	
ACT 2513	Heating Systems	3	
ACT 2624	Heat Load and Air Properties	4	
	Oral Communication Elective	3	
	Humanities/Fine Arts Elective	3	
ACT 2424	Air Conditioning II		4
ACT 2324	Commercial Refrigeration		4
ACT 2433	Refrigerant, Retrofit and Regulations		3
	Social/Behavioral Science Elective		3 3
	Technical Elective		3

### **TOTAL CREDIT HOURS: 64**

### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

#### **TECHNICAL ELECTIVES:**

ACT 291(1-3) Special Project in Heating and AC Technology

ACT 292(1-6) Supervised Work Experience in Heating and AC Technology

ATE 1113 Science and Technology

CPT 1113 Fundamentals of Microcomputer Applications

DDT 1114 Fundamentals of Drafting

ELT 1213 Electrical Power

ELT 1223 Motor Maintenance and Troubleshooting

# AUTOMATION AND CONTROL TECHNOLOGY Instrumentation Technology Option Associate in Applied Science Poplarville

The Instrumentation Technology program provides students with technical knowledge and skills necessary for gaining employment as an instrumentation systems technician. The program focuses on preparing students to understand, calibrate, and install

industrial instrumentation, to align and tune controllers and adjust valves.

FRESHMAN Y	/EAR		STER HOURS
MFT 1112	Introduction to Automation and	1st Sem.	2nd Sem.
IVIFI IIIZ	Introduction to Automation and Controls	2	
EET 1114	DC Circuits	4	
	Mathematics/Science Elective	3	
	Computer Related Elective	3	
	Technical Elective	3	
EET 1123	AC Circuits	•	3
EET 1334	Solid State Devices & Circuits		4
ELT 1413	Motor Control Systems		3
INT 1214	Fluid Power		4
ENG 1113	English Composition I		3
SOPHOMORE	YEAR		
EET 1214	Digital Electronics	4	
ELT 2613	Programmable Logic Controllers	3	
INT 2114	Control Systems	4	
	Technical Elective	3	
	Social/Behavioral Elective	3	
MFT 1123	Electrical Wiring for Automation		
	and Control Technology		3
SPT 1113	Oral Communications		3
	Humanities/Fine Arts Elective		3
	Technical Electives		6

**TOTAL CREDIT HOURS: 65-66** 

#### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

#### **TECHNICAL ELECTIVES:**

EET 2334 Linear Integrated Circuits

ELT 2424 Solid State Motor Control

ELT 2623 Advanced Programmable Logic Controllers

INT 1113 Fundamentals of Instrumentation

INT 2124 Control Systems II

INT 2214 Calibration and Measurement Principles

MFT 2614 Flexible Manufacturing Systems

MFT 291(1-3) Special Project in Automation and Control Technology

MFT 292(1-6) Supervised Work Experience in Automation and Control Technology

# MACHINE TOOL OPERATION/MACHINE SHOP TECHNOLOGY Associate in Applied Science Poplarville

The Machine Tool Operation/Machine Shop Technology program prepares individuals to shape metal parts on machines such as lathes, grinders, drill presses, and milling machines. Instruction in making computations related to work dimensions, testing, feeds, and speeds of machines; using precision measuring instruments such as layout tools, micrometers, and gauges; machining and heat-treating various metals; and laying out machine parts is also included. Also included is instruction in the operation and maintenance of computerized equipment.

FRESHMAN YEAR		HOURS
	1st Sem.	2nd Sem.
Machine Tool Mathematics	3	
Blueprint Reading	3	
Power Machinery I	5	
English Comp I	3	
Technical Elective	3	
Power Machinery II		5
Precision Layout		3
Advanced Blueprint Reading		3
Mathematics/Science Elective		3
Science and Technology	3	
Power Machinery III	5	
	Blueprint Reading Power Machinery I English Comp I Technical Elective Power Machinery II Precision Layout Advanced Blueprint Reading Mathematics/Science Elective  Science and Technology	Machine Tool Mathematics  Blueprint Reading  Power Machinery I  English Comp I  Technical Elective  Power Machinery II  Precision Layout  Advanced Blueprint Reading  Mathematics/Science Elective  Science and Technology  3  3  3  3  3  4  5  5  5  6  7  7  8  7  8  7  8  7  8  7  8  8  8

MST 2714	Computer Num. Cont. Op. I	4	
	Humanities/Fine Arts Elective	3	
MST 2144	Power Machinery IV		4
MST 2725	Computer Num. Cont. Op. II		5
MST 2813	Metallurgy		3
SPT 1113	Oral Communication		3
	Social/Behavioral Science Elective		3

### **ACADEMIC ELECTIVES:**

See Technical Programs in this section of the catalog for AAS degree general education core courses.

#### **TECHNICAL ELECTIVE:**

CPT 1113 Fundamentals of Microcomputer Applications

DDT 1114 Fundamentals of Drafting

DDT 1313 Principles of CAD

MST 1113 Introduction to Machine Shop Technology

MST 291(1-3) Special Problem in Machine Tool Technology

MST 292(1-6) Supervised Work Experience in Machine Tool Technology

# MEDICAL LABORATORY TECHNOLOGY Associate in Applied Science Forrest County Center

The medical laboratory technician is a mid-level worker who functions under the supervision of a medical technologist or laboratory supervisor. Responsibilities include performance of a wide range of tests and laboratory procedures ranging from the collection of blood specimens to microscopic examinations of body fluids. Employment opportunities are available in hospitals, independent laboratories, physicians' offices, clinics, public health agencies, pharmaceutical firms, and research.

MLT 1112	FRESHMAN YEAR		SEMESTER HOURS		
MLT/Phlebotomy			1st Sem.	2nd Sem.	3rd Sem.
ENG 1113	MLT 1112	Fundamentals of			
Chemistry Elective   With lab   4		MLT/Phlebotomy	2		
WAT 1313       College Algebra       3         BIO 1513       Anatomy and Physiology for Allied Health I       3         BIO 1511       Anatomy and Physiology for Allied Health I Laboratory       1         MLT 1212       Urinalysis/Body Fluids       2         MLT 1314       Hematology I       4         BIO 1523       Anatomy and Physiology for Allied Health II       3         BIO 1521       Anatomy and Physiology for Allied Health II       1         MLT 2612       Parasitology       2         MLT 1413       Immunology/Serology       3         BIO 2923       Microbiology Lab       3         SPT 1113       Oral Communication       3         Social/Behavioral Science Elective       3         Humanities/Fine Arts Elective       3         MLT 2615       Pathogenic Microbiology       5         MLT 2424       Immunohematology       4         MLT 1515       Clinical Chemistry       5         MLT 1324       Hematology II       4         MLT 2916       Clinical Practice I       6         MLT 2926       Clinical Practice III       6	ENG 1113	English Composition I	3		
MAT 1313       College Algebra       3         BIO 1513       Anatomy and Physiology for Allied Health I       3         BIO 1511       Anatomy and Physiology for Allied Health I Laboratory I       1         MLT 1212       Urinalysis/Body Fluids       2         MLT 1314       Hematology I       4         BIO 1523       Anatomy and Physiology for Allied Health II       3         BIO 1521       Anatomy and Physiology for Allied Health II       3         MLT 2612       Parasitology       2         MLT 1413       Immunology/Serology       3         BIO 2923       Microbiology       3         BIO 2921       Microbiology Lab       3         SPT 1113       Oral Communication       3         Social/Behavioral Science Elective       3         Humanities/Fine Arts Elective       3         SOPHOMORE YEAR         MLT 2424       Immunohematology       4         MLT 2424       Immunohematology       4         MLT 1324       Hematology II       4         MLT 2916       Clinical Practice I       6         MLT 2926       Clinical Practice III       6		Chemistry Elective			
BIO 1513		with lab	4		
Health	MAT 1313	College Algebra	3		
BIO 1511 Anatomy and Physiology for Allied Health I Laboratory I 1  MLT 1212 Urinalysis/Body Fluids 2  MLT 1314 Hematology I 4  BIO 1523 Anatomy and Physiology for Allied Health II 3  BIO 1521 Anatomy and Physiology for Allied Health II 3  BIO 1521 Anatomy and Physiology for Allied Health II 1  MLT 2612 Parasitology 2  MLT 1413 Immunology/Serology 3  BIO 2923 Microbiology 3  BIO 2921 Microbiology 4  SPT 1113 Oral Communication 3  Social/Behavioral Science Elective 4  Humanities/Fine Arts Elective 3  SOPHOMORE YEAR  MLT 2615 Pathogenic Microbiology 4  MLT 1515 Clinical Chemistry 5  MLT 1324 Hematology II 4  MLT 2916 Clinical Practice II 6  MLT 2926 Clinical Practice III 6  MLT 2936 Clinical Practice III 6	BIO 1513	Anatomy and Physiology for Allied			
Health   Laboratory   1   1		Health I	3		
MLT 1212       Urinalysis/Body Fluids       2         MLT 1314       Hematology I       4         BIO 1523       Anatomy and Physiology for Allied Health II       3         BIO 1521       Anatomy and Physiology for Allied Health II Lab       1         MLT 2612       Parasitology       2         MLT 1413       Immunology/Serology       3         BIO 2923       Microbiology Lab       3         SPT 1113       Oral Communication       3         Social/Behavioral Science Elective       3         Humanities/Fine Arts Elective       3         SOPHOMORE YEAR         MLT 2615       Pathogenic Microbiology       5         MLT 2424       Immunohematology       4         MLT 1515       Clinical Chemistry       5         MLT 1324       Hematology II       4         MLT 2916       Clinical Practice I       6         MLT 2926       Clinical Practice III       6         MLT 2936       Clinical Practice III       6	BIO 1511				
MLT 1314       Hematology I       4         BIO 1523       Anatomy and Physiology for Allied Health II       3         BIO 1521       Anatomy and Physiology for Allied Health		•			
BIO 1523 Anatomy and Physiology for Allied Health II 3 BIO 1521 Anatomy and Physiology for Allied Health II 1  MLT 2612 Parasitology 2  MLT 1413 Immunology/Serology 3 BIO 2923 Microbiology 3 BIO 2921 Microbiology Lab 1  SPT 1113 Oral Communication 3  ———————————————————————————————————			2		
BIO 1521 Anatomy and Physiology for Allied Health II Lab I	-			4	
II Lab			3		
MLT 2612       Parasitology       2         MLT 1413       Immunology/Serology       3         BIO 2923       Microbiology       3         BIO 2921       Microbiology Lab       1         SPT 1113       Oral Communication       3	BIO 1521				
MLT 1413 Immunology/Serology BIO 2923 Microbiology BIO 2921 Microbiology Lab SPT 1113 Oral Communication Social/Behavioral Science Elective Humanities/Fine Arts Elective  SOPHOMORE YEAR MLT 2615 Pathogenic Microbiology MLT 2424 Immunohematology MLT 1515 Clinical Chemistry MLT 1524 Hematology II MLT 2916 Clinical Practice I MLT 2926 Clinical Practice II MLT 2936 Clinical Practice III  MLT 2936 Clinical Practice III  SPT 1143  1 3  3 3  1 1  1 3  1 1  1 2 3  3 3  3					
BIO 2923       Microbiology       3         BIO 2921       Microbiology Lab       1         SPT 1113       Oral Communication       3         Social/Behavioral Science Elective       3         Humanities/Fine Arts Elective       3         SOPHOMORE YEAR         MLT 2615       Pathogenic Microbiology       5         MLT 2424       Immunohematology       4         MLT 1515       Clinical Chemistry       5         MLT 1324       Hematology II       4         MLT 2916       Clinical Practice I       6         MLT 2926       Clinical Practice III       6         MLT 2936       Clinical Practice III       6					
BIO 2921   Microbiology Lab   1   SPT 1113   Oral Communication   3	_			3	
SPT 1113 Oral Communication 3 Social/Behavioral Science Elective 4 Humanities/Fine Arts Elective 3  SOPHOMORE YEAR  MLT 2615 Pathogenic Microbiology 5 MLT 2424 Immunohematology 4 MLT 1515 Clinical Chemistry 5 MLT 1324 Hematology II 4 MLT 2916 Clinical Practice I 6 MLT 2926 Clinical Practice II 6 MLT 2936 Clinical Practice III 6		<b>3</b> ,			
Social/Behavioral Science Elective Humanities/Fine Arts Elective  SOPHOMORE YEAR  MLT 2615 Pathogenic Microbiology 5  MLT 2424 Immunohematology 4  MLT 1515 Clinical Chemistry 5  MLT 1324 Hematology II 4  MLT 2916 Clinical Practice I 6  MLT 2926 Clinical Practice II 6  MLT 2936 Clinical Practice III 6					
Humanities/Fine Arts Elective  SOPHOMORE YEAR  MLT 2615 Pathogenic Microbiology 5  MLT 2424 Immunohematology 4  MLT 1515 Clinical Chemistry 5  MLT 1324 Hematology II 4  MLT 2916 Clinical Practice I 6  MLT 2926 Clinical Practice II 6  MLT 2936 Clinical Practice III 6	SPT 1113				3
SOPHOMORE YEAR  MLT 2615 Pathogenic Microbiology 5  MLT 2424 Immunohematology 4  MLT 1515 Clinical Chemistry 5  MLT 1324 Hematology II 4  MLT 2916 Clinical Practice I 6  MLT 2926 Clinical Practice II 6  MLT 2936 Clinical Practice III 6					3
MLT 2615 Pathogenic Microbiology 5 MLT 2424 Immunohematology 4 MLT 1515 Clinical Chemistry 5 MLT 1324 Hematology II 4 MLT 2916 Clinical Practice I 6 MLT 2926 Clinical Practice II 6 MLT 2936 Clinical Practice III 6		Humanities/Fine Arts Elective			3
MLT 2424       Immunohematology       4         MLT 1515       Clinical Chemistry       5         MLT 1324       Hematology II       4         MLT 2916       Clinical Practice I       6         MLT 2926       Clinical Practice II       6         MLT 2936       Clinical Practice III       6	SOPHOMORE Y	EAR			
MLT 1515 Clinical Chemistry 5 MLT 1324 Hematology II 4 MLT 2916 Clinical Practice I 6 MLT 2926 Clinical Practice II 6 MLT 2936 Clinical Practice III 6	MLT 2615				
MLT 1324       Hematology II       4         MLT 2916       Clinical Practice I       6         MLT 2926       Clinical Practice II       6         MLT 2936       Clinical Practice III       6	MLT 2424				
MLT 2916 Clinical Practice I 6 MLT 2926 Clinical Practice II 6 MLT 2936 Clinical Practice III 6					
MLT 2926 Clinical Practice II 6 MLT 2936 Clinical Practice III 6					
MLT 2936 Clinical Practice III 6			6		
				6	
MLT 2714 Cartification Fundamentals for MLT					
	MLT 2714	Certification Fundamentals for MLT			4
MLT 2712 Seminar 2	ML Γ 2712	Seminar			2

**TOTAL CREDIT HOURS: 86** 

# MEDICAL RADIOLOGIC TECHNOLOGY Associate in Applied Science Forrest County Center

Radiographers use ionizing radiation imaging equipment to record images of human anatomy. Registered technologists are employed in hospitals, medical clinics, imaging centers, and physicians' offices. Specialty areas of access for registered technologists are CT, MRI, special procedures, mammography, ultrasound, nuclear medicine, radiation therapy, surgery radiography, administration, and education.

FRESHMAN YEAR				TER HOURS
		1 <sup>st</sup> Sem.	2 <sup>nd</sup> Sem.	3 <sup>rd</sup> Sem.
Summer Session				
BIO 1514	Anatomy and Physiology for Allied Health I	4		
BIO 1524	Anatomy and Physiology for Allied Health II	4		
RGT 1312	Principles of Radiation Protection	2		
RGT 1223	Patient Care and Radiography	3		
Fall Semester				
RGT 1114	Clinical Education I		4	
RGT 1213	Fundamentals of Radiography		3	
RGT 1413	Radiation Exposure I		3	
RGT 1513	Radiographic Procedures I		3	
	Mathematic/Science Elective		3	
Spring Semeste	r			
RGT 1124	Clinical Education II			4
RGT 1423`	Radiation Exposure II			3
RGT 1523`	Radiographic Procedures II			3 3
RGT 1613	Physics of Imaging Equipment			3
	Written Communication Elective			3
SOPHOMORE \	YEAR			
Summer Session	n			
RGT 1139	Clinical Education III	9		
Fall Semester				
RGT 2132	Social and legal Responsibilities	2		
RGT 2147	Clinical Education IV	7		
RGT 2532	Radiographic Procedures III	2		
RGT 2921	Radiographic Pathology	1		
	Social/Behavioral Science Elective	3		
	Humanities/Fine Arts Elective	3		
Spring Semeste	r			
RGT 2157	Clinical Education V		7	
RGT 2542	Radiographic Procedures IV		2	
RGT 2911	Radiation Biology		1	
RGT 2933	Certification Fundamentals		3	
	Oral Communication Elective		3	
TOTAL HOURS	: 88			

# OCCUPATIONAL THERAPY ASSISTANT TECHNOLOGY SUGGESTED COURSE SEQUENCE\* Baseline Competencies for Occupational Therapy Assistant Technology\*\* Forrest County Center

Occupational Therapy Assistants are health professionals who assist individuals in overcoming challenges in performing tasks of daily living. These challenges may include physical, psychological, developmental or social conditions. Employment opportunities are available in hospitals, rehabilitation units, outpatient clinics, home health, school systems, mental health centers, private clinics and other community settings. The United States Department of Labor estimates a 36% increase in Occupational Therapy Assistant jobs nationally by 2007.

FRESHMAN YEAR			SEMESTER HOURS
		1st Sem.	2nd Sem. 3rd Sem.
Fall Semester			
OTA 1113	Foundations of Occupational		
	Therapy	3	
OTA 1142	Wellness Systems	2	
OTA 1134	Anatomy & Physiology	4	
OTA 1423	Occupational Therapy Skills I	3	
	Written Communication Elective	3	
	Social/Behavioral Science Elective	3	
Spring Semester			
OTA 1213	Pathology of Psychiatric Conditions		3
OTA 1314	Kinesiology		4

OTA 1413	Therapeutic Media		3
OTA 1513	Group Process		3
	Mathematics/Science Elective		3
Summer Session	1		
OTA 1913	Fieldwork 1A: Psychosocial/		
	Specialty		3
OTA 1433	Occupational Therapy		
	Skills II		3
OTA 1223	Pathology of Physical		
	Disability Conditions		3
OTA 1233	Pathology of Developmental		
	Conditions		3
SOPHOMORE Y	'EAR		
Fall Semester			
OTA 2713	Concepts in Occupational Therapy	3	
OTA 2935	Fieldwork 1B: Physical		
	Dysfunction/Pediatrics	5	
OTA 2443	Occupational Therapy Skills III	3	
OTA 2961	Occupational Therapy Transitions	1	
	Fine Arts/Humanities Elective	3	
	Oral Communication Elective	3	
Spring Semester			
OTA 2946	Fieldwork 11A		6
OTA 2956	Fieldwork 11B		6

# PHYSICAL THERAPIST ASSISTANT TECHNOLOGY Associate in Applied Science Forrest County Center

The physical therapist assistant, under the supervision of the physical therapist, works with patients of all ages with a wide spectrum of neurological, musculoskeletal, and cardiopulmonary problems resulting from illness and accidents. Physical therapist assistants work in hospitals, rehabilitation centers, nursing homes, home health agencies, public schools, universities, industry, education, and in private offices or clinics.

FRESHMAN YEAR			SEMESTER HOL	
		1st Sem.	2nd Sem.	Summer
PTA 1123	Fundamental Concepts of			
	Physical Therapy	3		
ENG 1113	English Composition I	3		
MAT 1313	College Algebra	3		
BIO 1513	Anatomy & Physiology for			
	Allied Health I	3		
BIO 1511	Anatomy & Physiology for			
	Allied Health I Lab	1		
PSY 1513	General Psychology	3		
PTA 1213	PTA Fundamental Skills		3	
BIO 1523	Anatomy & Physiology for Allied Health II		3	
BIO 1521	Anatomy & Physiology for Allied Health II L	.ab	1	
PTA 1315	Kinesiology		5	
SPT 1113	Oral Communication		3	
PTA 2233	Electrotherapy		3	
PTA 1224	Therapeutic Modalities			4
PTA 2414	Clinical Education I			4
SOPHOMORE	YEAR			
PTA 2111	Clinical Skills	1		
PTA 1325	Therapeutic Exercise I	5		
PTA 2335	Therapeutic Exercise II	5		
PTA 2513	Medical Conditions and			
	Related Pathology	3		
	Humanities/Fine Arts Elective	3		
PTA 2523	Physical Therapy Seminar		3	
PTA 2424	Clinical Education II		4	

<sup>\*</sup>Students who lack entry level skills in mathematics, English, science, etc., will be provided related studies.

<sup>\*\*</sup>Baseline competencies are taken from the high school Allied Health program. Students who can document mastery of these competencies should not receive duplicate instruction. Students who cannot demonstrate mastery will be required to do so.

TOTAL CREDIT HOURS: 74				
RECOMMENDED ELECTIVES:				
Introduction to Computing with Business Applications				
Personal and Community Health				
First Aid				
College Skills				
English Composition II				
Human Growth and Development				

Clinical Education III Clinical Education IV

Health Care Experience I

Health Care Experience II

PTA Practicum I

PTA Practicum II

### RESPIRATORY CARE PRACTITIONER TECHNOLOGY Associate in Applied Science **Forrest County Center**

The respiratory care practitioner is an allied health professional employed in the treatment, management, control, and care of patients with deficiencies and abnormalities associated with the respiratory system. They serve as a consultant to the physician in the treatment and management of cardio-pulmonary abnormalities and work with nurses in coordinating and implementing an overall patient care strategy. Employment opportunities are available in hospitals, home health agencies, nursing homes, and other health care settings.

#### PRE-PROGRAM CURRICULUM

PTA 2434

PTA 2444

PTA 1111

PTA 1151

PTA 1132

PTA 1143

ENG 1113	English Composition I (3)			
BIO 1513	Anatomy & Physiology for Allied Health I (3)			
BIO 1511	Anatomy & Physiology for Allied Health I Lab (1)			
BIO 1523	Anatomy & Physiology for Allied Health II (3)			
BIO 1521	Anatomy & Physiology for Allied Health II Lab (1)			
Behavioral/Social	Science Elective (3)			
SPT 1113	Oral Communication (3)			
MAT 1313	College Algebra (3)			
Humanities Elective (3)				
TOTAL HOUDO: 00				

**TOTAL HOURS: 23** 

FRESHMAN YEAR			SEMESTER HOURS		
		1st Sem.	2nd Sem.	3rd Sem.	
RCT 1113	Practicum	3			
RCT 1223	Patient Assessment and Planning	3			
RCT 1214	Respiratory Care Science	4			
RCT 1322	Pulmonary Function Testing (PFT)	2			
RCT 1416	Respiratory Care Practitioner I		6		
RCT 1516	Clinical Practice I		6		
RCT 1613	Respiratory Care Pharmacology .		3		
SOPHOMORE YEAR					
RCT 1313	Cardiopulmonary A & P	3			
RCT 1424	Respiratory Care Practitioner II	4			
RCT 1523	Clinical Practice II	3			
RCT 2333	Cardiopulmonary Pathology	3			
RCT 2435	Respiratory Care Practitioner III		5		
RCT 2534	Clinical Practice III		4		
RCT 2613	Neonatal/Pediatrics Management.		3		
RCT 2548	Clinical IV			8	
RCT 2714	Respiratory Care Seminar			4	
TOTAL CREDIT HOURS (included within program): 64					
	(total including prerequisites): 87				

# SURGICAL TECHNOLOGY Certificate/Associate in Applied Science **Forrest County Center**

Surgical technologists work as part of the surgical team preparing the operating rooms, equipment, and supplies for use during surgery. The technologist assists the surgeon during actual operating procedures. Employment opportunities are available in hospital operating and delivery rooms, surgeons' offices and sterile processing. Some technologists may work as private

FRESHMAN YEAR (CERTIFICATE)		1 <sup>st</sup> Sem.	SEMESTER HOURS 2 <sup>nd</sup> Sem.	Ord Com	
SUT 1113	Fundamentals of	r Sem.	Z <sup>m</sup> Sem.	3 <sup>rd</sup> Sem.	
301 1113	Surgical Technology	3			
SUT 1216	Principles of	3			
001 1210	Surgical Technique	6			
SUT 1314	Surgical Anatomy	4			
SUT 1413	Surgical Microbiology	3			
	Written Communication				
	Electives	3			
SUT 1518	Basic and Related				
	Surgical		8		
SUT 1528	Specialized Surgical		8		
SUT 1538	Advanced Surgical Procedures		8		
TOTAL HOURS: 43					
SOPHOMORE YEAR (TECHNICAL)					
SPT 1113	Oral Communication	3			
	Approved Electives***	3			
BIO 2923	Microbiology	3			
BIO 2921	Microbiology Lab	1			
	Approved Electives***	3			
*BIO 1513	Anatomy & Physiology for Allied				
	Health I	3			
*BIO 1511	Anatomy & Physiology for Allied				
	Health I Lab	1			
	Humanities/Fine Arts Elective		3		
	Social/Behavioral Science Elective		3		
	Mathematics/Natural Science Elective		3		
*******	Approved Electives***		3		
**BIO 1523	Anatomy and Physiology II		3		
**BIO 1521	Anatomy and Physiology II Lab		1		
TOTAL HOURS					
*Approved exceptions:					
Human A&P I and Laboratory (BIO 2514)					
**Approved exc	ceptions:				

\*\*Approved exceptions:

Human A&P II and Laboratory (BIO 2524)

# \*\*\*Approved Electives:

Principles of Chemistry with Lab (CHE 1314)

General Biology I (BIO 1134) General Biology II (BIO 1144)

Algebra (MAT 1313 or higher)

Child Psychology (EPY 2513)
Adolescent Psychology (Human Growth and Development) (EPY 2533)

Nutrition (FCS 1253)

Personal and Community Health I (HPR 1213) Marriage and Family (SOC 2143)