

MEDICAL ASSISTANT (MA)

920 clock hours/ 41 weeks (Total time to complete the program may vary based on school holidays and breaks)
36 weeks Theory/Lab (20 hours per week) + 5 weeks externship (40 hours per week)

Program Objective:

The Medical Assistant program is designed to prepare students for employment as an entry-level Medical Assistant. The program focuses on both administrative and clinical competencies and designed for students who wish to pursue a career in the allied health profession. Upon completion graduates may pursue a career in a clinical setting under the supervision of a licensed physician and function as a vital part of the healthcare team. Education is focused on anatomy and physiology of all body systems, administrative functions such as appointment scheduling, insurance billing, and office management, as well as clinical functions including administering medications, venipuncture skills, obtaining and recording medical histories and vital signs, and preparation of the patient and treatment rooms for physician examinations.

The MA Program is delivered on campus/residential.

Upon successful completion of the program, graduates may obtain employment as:

- Medical Assistant (CIP # 51.0801; O-NET # 31-9092.00)

Module #	Module Title	Week #	Clock Hours
I	Introduction to Medical Assistant	1-4	80
II	Administrative Procedures and Office Management	5-8	80
III	Medical Records and Assisting with Physical Examinations and Pharmacology	9-12	80
IV	Medical Billing	13-16	80
V	Anatomy and Physiology I	17-20	80
VI	Anatomy and Physiology II	21-24	80
VII	Clinical Assisting	25-28	80
VIII	Assisting with Medical Emergency and Certifications	29-32	80
IX	Rehabilitation, Nutrition, Pediatrics/Geriatrics	33-36	80
X	Externship	37-41	200
Total			920

Note: one clock hour is defined as a 60-minute span of time in which 50 minutes is devoted to actual class instruction, with the remaining portion designated as a break.

For information on graduation rates, median debt of graduates completing this program or other important information, visit <http://www.cbd.edu/programs/medical-assistant-program/>

Program Syllabus:

Course Number	Course Title	Lecture	Lab	Externship	Total Hours
MA 100	Introduction to Medical Assistant	10	10	0	20
MA 110	Patient Communication	10	10	0	20
MA 120	Universal Precautions	15	5	0	20
MA 130	Vital Signs	5	15	0	20
MA 200	Administrative Procedures	10	10	0	20
MA 210	Computers and Documentation	10	20	0	30
MA 220	Patient Education	10	0	0	10
MA 230	Office Management	10	10	0	20
MA 300	Medical Records	10	10	0	20
MA 310	Assisting With Physical Exams	10	10	0	20
MA 320	Pharmacology	20	20	0	40
MA 400	Medical Insurance	10	10	0	20
MA 410	Medical Coding	10	20	0	30
MA 420	Patient Financial Accounts	10	0	0	10
MA 430	Bookkeeping and Banking	10	10	0	20
MA 500	Body Structure	10	10	0	20
MA 510	Musculoskeletal System	10	10	0	20
MA 520	Cardiovascular System	10	10	0	20
MA 530	Lymphatic and Immune System	10	10	0	20
MA 600	Respiratory and Digestive System	10	10	0	20
MA 610	Nervous and Special Senses System	10	10	0	20
MA 620	Urinary and Reproductive System	10	10	0	20
MA 630	Endocrine System	10	10	0	20
MA 700	Venipuncture	10	30	0	40
MA 710	EKG (Electrocardiogram)	10	10	0	20
MA 720	Radiology	10	10	0	20
MA 800	Microbiology	10	10	0	20
MA 810	Minor Surgery Assisting	10	10	0	20
MA 820	Medical Emergencies	10	10	0	20
MA 830	HIPAA, OSHA & CPR Certification	10	10	0	20
MA 900	Medical Specialties	10	10	0	20
MA 910	Pediatrics and Geriatrics	10	10	0	20
MA 920	Rehabilitation	10	10	0	20
MA 930	Nutrition	10	10	0	20
MA 1000	Externship	0	0	200	200
TOTAL		350	370	200	920

MA Program Description:

MODULE I MA 100 Introduction to Medical Assistant

Prerequisites: None.

Total clock hours: 20

This course identifies the duties and responsibilities of a Medical Assistant. Distinguishes between the various organizations related to the profession of medical assisting; explains the need and importance of credentials; identifies training methods for becoming a medical assistant; discuss professional development; identifies healthcare trends and their relationship to the practice of medical assisting; identifies medical specialties.

MODULE I MA 110 Patient Communication

Prerequisites: None.

Total clock hours: 20

This course identifies elements and types of communication. Relates communication to human behavior and needs; categorize positive and negative communication. Models ways to improve communication techniques, carries out therapeutic communication skills. Uses effective communication strategies; carries out positive communication with coworkers and management; differentiate between laws and ethics; identifies responsibilities of both the patient and physician regarding the patient-physician contract. It describes the four Ds of negligence and the four Cs of malpractice prevention.

MODULE I MA 120 Universal Precaution

Prerequisites: None.

Total clock hours: 20

This course presents the components of a medical office safety plan. Identifies OSHA's role in protecting healthcare workers. It describes basic safety precautions. Summarizes proper methods for storing and handling chemicals. Explains the principles of ergonomics. Illustrates the cycle of infection. Summarizes the Blood borne Pathogens Standard and Universal Precautions. Describes methods of infection control. Describes CDC requirements for reporting cases of infectious diseases. Describes the layout of a typical exam room. Differentiates between sanitization and disinfection.

MODULE I MA 130 Vital Signs

Prerequisites: None.

Total clock hours: 20

This course presents how to identify the skills necessary to conduct a patient interview; recognize the signs of anxiety, depression, and abuse. Uses the six Cs for writing an accurate patient history. Uses critical thinking skills to describe the five vital signs. Identifies various methods of taking temperature; describes the process of taking pulse and respirations. Carries out blood pressure measurements; summarize orthostatic vital signs.

MODULE II MA 200 Administrative Procedures

Prerequisites: None.

Total clock hours: 20

This course introduces the list that design items to be considered when setting up a reception area. Summarizes housekeeping tasks. Discusses office access. Identifies the cause of most injuries to medical workers and body areas where they occur; explains the Red Flags Rule. Implanting policies and procedures for opening and closing the office. Explains the purpose to telecommunications equipment used in the office. Relates the five Cs of communication to telephone use; defines telephone etiquette, pitch pronunciation, enunciation, and tone; describes how to handle incoming calls. Carries out the procedures for taking a telephone message. Summarizes call screening skills used in making an outgoing call.

MODULE II MA 210 Computers and Documentation

Prerequisites: None.

Total clock hours: 30

This course identifies common types of computers. Describes computer hardware components and their functions. Describes software applications commonly used in a medical office. Summarizes options available for learning software applications. Discusses steps involved in upgrading or replacing existing computer equipment. Explains how a well-written document reflects on the medical practice. It describes types of document supplies used. Outlines general guidelines for effective writing. Lists and explains the purpose of different types of documents used in the medical field. Describes editing and proofreading documents.

MODULE II MA 220 Patient Education

Prerequisites: None.

Total clock hours: 10

This course identifies the benefits of patient education; describes factors that affect learning and teaching; implements teaching techniques. Chooses reliable patient education materials; explains how patient education can promote good health habits. Describes the information contained in a patient information packet. Describes the benefits of patient education prior to surgical procedures. Describes how the appointment book is key to continuity of patient care. Identifies how to properly apply a matrix to an appointment schedule. Compares appointment scheduling systems. Identifies ways to organize and schedule appointments.

MODULE II MA 230 Office Management

Prerequisites: None.

Total clock hours: 20

This course is an introduction of the basic organizational design of the medical office and the relationship of the healthcare team. It describes the responsibilities of the office manager. Summarizes basic human resource functions in office management. Distinguishes traits of someone with leadership skills. Compares risk management and quality assurance, calculates employee earnings. Describes tax forms commonly used in a medical office. This course explains documentation, federal and state guidelines, established policies, liability coverage, risk management, health laws and regulations and ethics.

MODULE III MA 300 Medical Records

Prerequisites: None.

Total clock hours: 20

This course explains the importance of patient medical records; identifies the documents that comprise a medical record; compares the different types of formats related to documentation. Describes the need for neatness, timeliness, accuracy, and professional tone in patient's records; illustrates the correct procedure for correcting and updating medical records. Describes the steps in responding to requests for release of medical records. Lists four medical mistakes that will be decreased through the use of EHR, differentiate among electronic medical records, electronic health records, and personal health records.

MODULE III MA 310 Assisting with Physical Exams

Prerequisites: None.

Total clock hours: 20

This course identifies the purpose of a general physical exam; also, identifies the medical assistant's role in patient examinations. Carries out the necessary steps to prepare a patient for examination. It carries out positioning and draping a patient in all nine common exam positions. Identifies the six examination methods used in a general physical exam. Carries out the role of the medical assistant in a gynecology exam. Carries out the role of the medical assistant in obstetrics. Identifies diagnostic and therapeutic procedures performed in gynecology and obstetrics. Relates the role of the medical assistant in urology. Identifies diagnostic tests and procedures performed in urology. Recognizes diseases and disorders of the reproductive and urinary systems.

MODULE III MA 320 Pharmacology

Prerequisites: None.

Total clock hours: 40

This course presents and explains the medical assistant's role in pharmacology. Recognizes the five categories of pharmacology and their importance to medication administration. Differentiates the major drug categories, drug names, and their actions. Classifies over-the-counter (OTC), prescription, and herbal drugs. Uses credible sources to obtain drug information. Carries out the procedure for registering or renewing a physician with the Drug Enforcement Agency (DEA) for permission to administer, dispense, and prescribe controlled drugs. Identifies the parts of a prescription, including commonly used abbreviations and symbols; discuss non-pharmacological treatments for pain. Describes how vaccines work in the immune system. Explains the role of the medical assistant to ensure safe dosage calculations.

MODULE IV MA 400 Medical Insurance

Prerequisites: None.

Total clock hours: 20

This course defines and explains the terms used in the insurance industry. Compares types of insurance plans. Outlines requirements for coverage by Medicare, Medicaid, TRICARE and CHAMPVA programs; describes allowed charge, contracted fee, capitation, and RBRVS. Outlines the tasks performed to obtain information required to produce an insurance claim. Produces a clean CMS-1500 claim form. Explains the methods used to submit an insurance claim. Recalls the information found on a remittance advice.

MODULE IV MA 410 Medical Coding

Prerequisites: None.

Total clock hours: 30

This course is designed to recognize the ways that ICD codes are used; describes the conventions used by ICD-9-CM. Outlines the steps to code a diagnosis. Explains the purpose and usage of V codes and E codes. Names the appendices found in the ICD-9-CM. Compares ICD-9-CM and ICD-10-CM. Summarizes the ICD-10-CM general coding guidelines. Illustrates coding applications for neoplasm's, diabetes mellitus, fractures, R codes, poisonings, and Z codes; Lists the sections of the CPT manual. Briefly describes CPT coding guidelines. Lists the types of E/M codes within the CPT. Lists the areas included in the surgical coding section. Locates procedure codes using the CPT manual; explains the importance of code linkage and avoiding fraud.

MODULE IV MA 420 Patient Financial Accounts

Prerequisites: None.

Total clock hours: 10

This course describes the accounts receivable and accounts payable methods. Identifies different documents used in patient billing and cycle billing. Compares accounting systems; explains the purpose of various credit and collection laws. Relates the required components of a Truth in Lending Statement to credit practices. Summarizes common problems in collections.

MODULE IV MA 430 Bookkeeping and Banking

Prerequisites: None.

Total clock hours: 20

This course presents the importance of good bookkeeping practices. Compares bookkeeping systems; Outlines patient financial transactions. Identifies negotiable instruments and items required for a check to be negotiable. Describes the different types of check endorsements and steps in making a bank deposit. Carries out the process of reconciling a bank statement; Lists several advantages to electronic banking. Implements setting up, classifying, and recording disbursements in a disbursement journal.

MODULE V MA 500 Body Structure

Prerequisites: None.

Total clock hours: 20

This course explains the difference between anatomy and physiology. Illustrates body organization from a single molecule to an organism. Describes the location and characteristics of the four main tissue types. Describes the body organ systems, their general functions, and the major organs of each. Uses medical and anatomical terminology correctly. Explains the anatomical position. Identifies body cavities and the organs within them. Relates a basic understanding of chemistry and its importance in studying the body. Names the parts of a cell and their functions; summarizes how substances move across a cell membrane.

MODULE V MA 510 Musculoskeletal System

Prerequisites: None.

Total clock hours: 20

This course describes the structure of bone tissue; explains the function of bones. Compares intermembranous and endochondrial ossification. Describes the skeletal structures and locations; locates the bones of the skull; locates the bones of the spinal column. Locates the bones of the rib cage; locates the bones of the shoulders, arms, and hands. Locates the bones of the hips, legs, and feet. Describes the three major types of joints and give examples of each. Describes the common diseases and disorders of the skeletal system.

MODULE V MA 520 Cardiovascular System

Prerequisites: None.

Total clock hours: 20

This course introduces the structures of the heart and the functions of each. Explains the cardiac cycle, including the cardiac conduction system. Compares pulmonary and systemic circulation. Differentiates among the different types of blood vessels and their functions. Explains blood pressure and how it is controlled; describes the causes, signs and symptoms, and treatments of various diseases and disorders of the cardiovascular system. Describes the components of blood, giving the function of each component listed. Explains how bleeding is controlled.

MODULE V MA 530 Lymphatic and Immune System

Prerequisites: None.

Total clock hours: 20

This course describes the pathways and organs of the lymphatic system. Compares the nonspecific and specific body defense mechanisms. Explains how antibodies fight infection; describes the four different types of acquired immunities; describes the causes, signs and symptoms, and various treatments of the major immune disorders.

MODULE VI MA 600 Respiratory and Digestive System

Prerequisites: None.

Total clock hours: 20

This course describes the structure and function of each organ of the respiratory system. Describes the events involved in inspiration and expiration of air. Explains how oxygen and carbon dioxide are transported in the blood. Compares various respiratory volumes and tell how they are used to diagnose respiratory problems. Describes the causes, signs and symptoms, and treatments of various diseases and disorders of the respiratory system. Describes the organs of the alimentary canal and their functions. Explains the functions of the digestive system's accessory organs. Identifies the nutrients absorbed by the digestive system and where they are absorbed; describe the causes, signs and symptoms, and treatments of various common diseases and disorders of the digestive system.

MODULE VI MA 610 Nervous and Special Senses System

Prerequisites: None.

Total clock hours: 20

This course is a study of the general functions of the nervous system; summarizes the structure of a neuron. Explains the function of nerve impulses and the role of synapses in their transmission. Describes the structures and functions of the central nervous system. Compares the structures and functions of the somatic and autonomic nervous systems in the peripheral nervous system. Recognizes common tests that are performed to determine neurological disorders. Describes the causes, signs and symptoms, and treatments of various diseases and disorders of the nervous system; describes the anatomy of the nose and the function of each part.

MODULE VI MA 620 Urinary and Reproductive System

Prerequisites: None.

Total clock hours: 20

This course describes the structure, location, and function of the kidney. Explains how nephrons filter blood and form urine. Compares the locations, structures, and functions of the uterus, bladder, and urethra. Describes the causes, signs and symptoms, and treatment of various diseases and disorders of the urinary system. Summarizes the organs of the male reproductive system including the locations, structures, and functions of each. Describes the causes, signs and symptoms, and treatment of various disorders of the male reproductive system.

MODULE VI MA 630 Endocrine System

Prerequisites: None.

Total clock hours: 20

This course describes the general functions and hormones of the endocrine system. Identifies the hormones released by the pituitary gland, thyroid gland, parathyroid glands, adrenal glands, pancreas, and other hormone-producing organs, and give the functions of each; explains the effect of stressors on the body. Describes the causes, signs and symptoms, and treatments of various endocrine disorders.

MODULE VII MA 700 Venipuncture

Prerequisites: None.

Total clock hours: 40

This course explains the role of the medical assistant when collecting, processing, and testing blood samples; carries out the procedure for collecting a blood specimen. Summarizes ways to respond to patients' needs when collecting blood. Carries out the procedure for performing blood tests.

MODULE VII MA 710 EKG (Electrocardiogram)

Prerequisites: None.

Total clock hours: 20

This course is an introduction of medical assistant's role in electrocardiography and pulmonary function testing. Explains the basic principles of electrocardiography and how it relates to the conduction system of the heart; identifies the components of an electrocardiograph and what each does. Carries out the steps necessary to obtain an ECG. Summarizes exercise electrocardiography and echocardiography. Explains the procedure of Holter monitoring. Carries out the various types of pulmonary function tests; describes the procedure for performing pulse oximetry testing.

MODULE VII MA 720 Radiology

Prerequisites: None.

Total clock hours: 20

This course explains what X-rays are and how they are used for diagnostic and therapeutic purposes. Compares invasive and noninvasive diagnostic procedures. Carries out the medical assistant's role in X-ray and diagnostic radiology testing. Discusses common diagnostic imaging procedures. Describes different types of radiation therapy and how they are used. Explains the risks and safety precautions associated with radiology work; relates the advances of medical imaging to EHR.

MODULE VIII MA 800 Microbiology

Prerequisites: None.

Total clock hours: 20

This course presents and explains the medical assistants' role in microbiology. Summarizes how microorganisms cause disease; describes how microorganisms are classified and named. Discusses the role of viruses in human disease. Reviews the symptoms of HIV / AIDS and hepatitis. Discusses the role of bacteria in human disease. Discusses the role of protozoa in human disease. Discusses the role of fungi in human disease. Discusses the role of multicellular parasites in human disease. Describes the process involved in diagnosing an infection.

MODULE VIII MA 810 Minor Surgery Assisting

Prerequisites: None.

Total clock hours: 20

This course presents and explains the medical assistant's role in minor surgical procedures. Describes the surgical procedures performed in an office setting. Identifies the instruments used in minor surgery and describe their functions. Describes the procedures for medical and sterile asepsis in minor surgery. Discusses the procedures used in a medical office to sterilize surgical instruments and equipment; summarizes the medical assistant's duties in preoperative procedures. Describes the medical assistant's duties during an operative procedure.

MODULE VIII MA 820 Medical Emergencies

Prerequisites: None.

Total clock hours: 20

This course explains the importance of first aid during a medical emergency. Identifies items found in a crash cart; recognizes various accidental emergencies and how to deal with them; Lists common illnesses that can result in medical emergencies. Identifies less common illnesses that can result in medical emergencies. Discusses your role in caring for people with psychosocial emergencies.

MODULE VIII MA 830 Medical Emergencies

Prerequisites: None.

Total clock hours: 20

This course is designed to train and prepare the students for HIPAA, OSHA and CPR Certifications.

MODULE IX MA 900 Medical Specialties

Prerequisites: None.

Total clock hours: 20

This course describes and explains the medical specialties of allergy, cardiology, dermatology, endocrinology, gastroenterology, neurology, oncology, and orthopedics. Identifies common diseases and disorders related to these same fields; relates the role of the medical assistant in procedures performed in medical specialties.

MODULE IX MA 910 Pediatrics and Geriatrics

Prerequisites: None.

Total clock hours: 20

This course identifies the role of the medical assistant in a pediatric examination. Discusses pediatric immunizations. Explains various pediatric screening procedures and diagnostic tests. Describes common pediatric diseases and disorders. Recognizes special health concerns of pediatric patients. Relates developmental changes in geriatric patients. Describes common geriatric diseases and disorders. Identifies variations of care for geriatric patients. Explains special health concerns of geriatric patients.

MODULE IX MA 920 Rehabilitation

Prerequisites: None.

Total clock hours: 20

This course identifies the general principles of physical therapy; relates various cold and health therapies to their benefits and contraindications. Recalls hydrotherapy methods. Names several methods of exercise therapy; describes the types of massage used in rehabilitation therapy. Compares different methods of traction. Carries out the procedure for teaching a patient to use a cane, a walker, crutches, and a wheelchair. Models the steps you should take when referring a patient to a physical therapist.

MODULE IX MA 930 Nutrition

Prerequisites: None.

Total clock hours: 20

This course identifies and explains nutrients and their role in health. Implements a plan for a nutritious, well-balanced diet and healthy lifestyle using the USDA's guidelines. Describes methods used to assess a patient's nutritional status. Explains reasons why a diet may be modified. Identifies types of patients who require special diets and the modifications required for each; describes the warning signs, symptoms, and treatments for eating disorders.

MODULE X MA 1000 Externship

Prerequisites: MA100-930

Total clock hours: 200

Upon successful completion of all modules, medical assistant students will participate in a 200-hour externship at an approved facility. This will provide the student with the opportunity to apply principles and practices learned in the program and utilize entry-level medical assisting skills in a real world environment.

MA SKILLS LABORATORY

The campus skills laboratory is designed to provide students with assignments to learn the many skills necessary for medical assistants. Skills should be practiced in the skills laboratory prior to providing skills in the externship settings.

All Medical Assistant students are permitted to use the skills lab with their assigned instructors. Food and drinks are not allowed inside the skills laboratory.

All supplies should be handled with care and replaced in their storage areas after use. Items requiring replacement or reordering should be reported to the instructor daily or as needed basis.

All students are to participate in the maintenance of the campus skills lab.

Students are to wear their uniforms while working in the skills lab. Shoes should be closed toe, low-heeled and clothing should be safe without strings or ties that may become tangled and cause harm to the student or to others.

Always be considerate of others when working in the skills lab.

MA LAB/EXTERNSHIP EVALUATION METHOD

The Medical Assistant program contains some courses that consider lab performance as one of the components of the course final grade.

Lab and externship performance are evaluated on a "pass/fail" designation, based upon successful completion of the lab objectives.

Students with a "fail" grade in any of the skills practiced will meet with the instructor and/or director of the program and receive a plan for improvement which may include but is not limited to:

3. Special assignments in the content area
4. Individual/group tutorial in the campus skills lab

During the externship, students will be visited on-site at the midpoint and a final evaluation will be conducted at the end of externship.

Completion of the externship module

Successful completion of the externship module requires:

- a pass grade on the final evaluation by the externship instructor
- completion of all required 200 hours

MA EQUIPMENT AND MATERIALS

- 3-Step Ladder
- Adult Mannequins, Child Mannequins
- AED
- Ambu Bag Adult, Ambu Bag Infant
- Autoclave
- Biohazard Trash Can
- BP Monitor w/Digital Multicuff
- Centrifuge, Microhematocrit Centrifuge
- EKG Machine
- Emergency Eyewash Station
- Exam Table, Mayo stand
- Glucometer, Otoscope, Ophthalmoscope
- Gooseneck Lamp
- Holter Monitor
- Infant Mannequins
- Laryngeal mirror, Nasal speculum, Reflex hammer
- Microscope
- Peak Flow Meter
- Pediatric Scale, Adult Scale w/ Height Bar
- Pen Light, (Can keep this if you purchased one)
- Phlebotomy Chair, Venipuncture Arm
- Pulse Oximeter, Sphygmomanometer
- Sharps Container
- Skin Staple Remover
- Surgical Instruments
- Teaching Stethoscope, Audiometer
- Tripod Cane, Quad Base Cane
- Tube Gauze Applicator
- Tuning Fork
- Tympanic Thermometer
- Uterine Dilator
- Vital Signs Monitor
- Walker, Wheelchair, Crutches, Standard Cane

Books:

- *Medical Assisting: Administrative and Clinical Procedures with Anatomy and Physiology*
- *Student Workbook for use with Medical Assisting: Administrative and Clinical Procedures with Anatomy and Physiology*
- *Electronic Health Records for Allied Health Careers w/Student CD-ROM*
- *Medical Terminology for Health Professions*

Software:

- *ClaimGear*
- *Keyboarding Pro*