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| **PROFESSOR:** | **PHONE NUMBER:** |
| **OFFICE LOCATION:** | **E-MAIL:** |
| **OFFICE HOURS:** | **SEMESTER:** |

1. **COURSE NUMBER AND TITLE, CATALOG DESCRIPTION, CREDITS:**

**CVT 2620C NON-INVASIVE CARDIOLOGY TECHNOLOGY I (2 CREDITS)**

This course presents an introduction to non-invasive cardiology and those tests performed in this area. In addition, normal and abnormal heart rhythms, ECG acquisition and analysis, patient safety, stress testing, Holter monitoring, and an introduction in echocardiography are presented.

1. **PREREQUISITES FOR THIS COURSE:**

ret 1613c, cvt 1200, cvt 1800l, cvt 1801l

**CO-REQUISITES FOR THIS COURSE:**

cvt 2420c, cvt 2805C

1. **GENERAL COURSE INFORMATION:** Topic Outline.

* Cardiovascular Anatomy and Physiology
* Normal electrocardiogram
* Arrhythmias
* 12 Lead EKG
* Vectorcardiography and axis determination
* Atrial enlargement
* Ventricular enlargement
* Ventricular conduction disturbances
* Ischemia, Injury and Myocardial infarction patterns
* Cardiac arrest
* Exercise electrocardiography + stress testing including nuclear stress testing
* Ambulatory ECG monitoring - Holter monitoring
* Pacemaker basics
* Echocardiography basics

1. **All courses at Florida SouthWestern State College contribute to the general education program by meeting one or more of the following general education competencies:**

**C**ommunicate clearly in a variety of modes and media.

**R**esearch and examine academic and non-academic information, resources, and evidence.

**E**valuate and utilize mathematical principles, technology, scientific and quantitative data.

**A**nalyze and create individual and collaborative works of art, literature, and performance.

**T**hink critically about questions to yield meaning and value.

**I**nvestigate and engage in the transdisciplinary applications of research, learning, and knowledge.

**V**isualize and engage the world from different historical, social, religious, and cultural approaches.

**E**ngage meanings of active citizenship in one’s community, nation, and the world.

**A.**  **General Education Competencies and Course Outcomes**

1. Listed here are the course outcomes/objectives assessed in this course which play an integral part in contributing to the student’s general education along with the general education competency it supports.

General Education Competency: **Investigate**

Course Outcomes or Objectives Supporting the General Education Competency Selected:

* Interpret and understand the major cardiac rhythm disturbances and other abnormal patterns including axis deviation, chamber enlargement and hypertrophy, bundle branch block, ischemia, injury and infarction as seen by 12-lead electrocardiography.
* Discuss the equipment used in this procedure; attachments, controls operation, trouble-shooting.

**2.  Listed here are the course outcomes/objectives assessed in this course which play a *supplemental* role in contributing to the student’s general education along with the general education competency it supports.**

General Education Competency: **Think**

Course Outcomes or Objectives Supporting the General Education Competency Selected:

* Describe, in detail, the theory of, rationale for, and perform electrocardiography, graded exercise stress testing, Holter monitoring, telemetry monitoring, pacemaker usage, and echocardiography.
* Interpret and understand the major abnormal patterns obtained by electrocardiography, graded exercise stress testing, Holter monitoring, telemetry monitoring, pacemaker usage, and echocardiography.

General Education Competency: **Evaluate**

Course Outcomes or Objectives Supporting the General Education Competency Selected:

* Identify the portion of the heart evaluated by each lead
* Identify normal EKG waveforms in each lead
* Identify and discuss causes of right axis deviation, left axis deviation, extreme right axis deviation, right atrial enlargement, left atrial enlargement, right ventricular hypertrophy, left ventricular hypertrophy, right bundle branch block, left bundle branch block, ischemia, injury and infarct patterns
* Identify the portion of the heart compromised and possible coronary artery involved from analyzing ischemia, injury or infarct patterns on 12-lead EKG.

1. **DISTRICT-WIDE POLICIES:**

**Programs for Students with Disabilities**

Florida SouthWestern State College, in accordance with the Americans with Disabilities Act and the College’s guiding principles, offers students with documented disabilities programs to equalize access to the educational process. Students needing to request an accommodation in this class due to a disability, or who suspect that their academic performance is affected by a disability should contact the Office of Adaptive Services at the nearest campus. The office locations and telephone numbers for the Office of Adaptive Services at each campus can be found at <http://www.fsw.edu/adaptiveservices>.

**REPORTING TITLE IX VIOLATIONS**

Florida SouthWestern State College, in accordance with Title IX and the Violence Against Women Act, has established a set of procedures for reporting and investigating Title IX violations including sexual misconduct.  Students who need to report an incident or need to receive support regarding an incident should contact the Equity Officer at [equity@fsw.edu](mailto:equity@fsw.edu).  Incoming students are encouraged to participate in the Sexual Violence Prevention training offered online.  Additional information and resources can be found on the College’s website at <http://www.fsw.edu/sexualassault>.

1. **REQUIREMENTS FOR THE STUDENTS:**

List specific course assessments such as class participation, tests, homework assignments, make-up procedures, etc.

1. **ATTENDANCE POLICY:**

The professor’s specific policy concerning absence. (The College policy on attendance is in the Catalog, and defers to the professor.)

1. **GRADING POLICY:**

Include numerical ranges for letter grades; the following is a range commonly used by many faculty:

90 - 100 = A

80 - 89 = B

70 - 79 = C

60 - 69 = D

Below 60 = F

(Note: The “incomplete” grade [“I”] should be given only when unusual circumstances warrant. An “incomplete” is not a substitute for a “D,” “F,” or “W.” Refer to the policy on “incomplete grades.)

1. **REQUIRED COURSE MATERIALS:**

(In correct bibliographic format.)

1. **RESERVED MATERIALS FOR THE COURSE:**

Other special learning resources.

1. **CLASS SCHEDULE:**

This section includes assignments for each class meeting or unit, along with scheduled Library activities and other scheduled support, including scheduled tests.

1. **ANY OTHER INFORMATION OR CLASS PROCEDURES OR POLICIES:**

(Which would be useful to the students in the class.)