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

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

**CTS 2317 NETWORK DEFENSE AND COUNTERMEASURES II (3 CREDITS)**

Introduction to various methods used to ensure security across cloud platforms. Emphasis is placed on the strategic domain with special attention to adaptive and defense security, framing network policies, and achieving compliance. Examination of the operational domain to apply strategic decision-making processes to ensure secure networks.

1. **PREREQUISITES FOR THIS COURSE:** CTS 1314 with a grade of “C” or better

**CO-REQUISITES FOR THIS COURSE:** None

1. **GENERAL COURSE INFORMATION:** Topic Outline.
* Enterprise virtual, cloud, and wireless network security
* Monitoring and analysis of network traffic and logs
* Incident response and forensic investigation
* Threat assessments
* Business continuity and disaster recovery
* Risk anticipation and management
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 outcomes/objectives assessed in this course which play an *integral* part in the student’s general education along with the general education competency they support.

  General Education Competency:  **Think**

Course outcomes or objectives supporting the General Education competency:

* Analyze enterprise and corporate level software for cloud and network security system(s).
* Assess cybersecurity risk(s), facilitating a comprehension of risk management for network architecture.

**B.** **Other Course Objectives/Standards**

* Implement network digital forensic tools for hardware and software devices.
* Develop cyber defense skills through authentication, encryption, log monitoring, and administrative level exercises.
* Utilize packet sniffers, network logs, and implement log monitoring for a networking system.
* Conduct a cyberattack assessment and respond with appropriate countermeasure(s).
* Document administrative security policies, procedures, ISO and NST standard(s).
* Formulate corporate level practices, policies, and procedures for identified network risks.
* Perform a mid-large business level incident response and digital forensic investigation.
* Implement disaster recover methods through network defense methods and business practices.
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.  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:**

EC Council SOC Analyst (CSA)

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.)