

ARIZONA WESTERN COLLEGE  
SYLLABUS

CIS 175 COMPUTER SECURITY  
(Same as TEC 174)

Credit Hours: 3 Lec: 3 Lab: 1

PREREQUISITE: None

COURSE DESCRIPTION

Introduction to computer and information security topics: threats, protective techniques, risk analysis, contingency planning, password techniques, encryption, biometrics, network protocols, intercept devices, and internet resources.

1. COURSE GOAL

Application of principles, mechanisms and implementations of computer security; learn how attacks work, how to defend against them, and how to design systems to withstand such attacks.

2. OUTCOMES

Upon satisfactory completion of this course, students will be able to:

- 2.1 explain what computer security is, where it came from, why it is important, and where it is going.
- 2.2 discuss methods of protecting information stored in a computer system, along with understanding and defining viruses, worms, and other types of malicious codes.
- 2.3 describe the administrative procedures that improve security within an organization and gain an understanding of trusted systems.
- 2.4 discuss methods of protecting information while it is being transmitted over communication lines.
- 2.5 explain what encryption is and how it protects data.
- 2.6 describe methods of establishing physical security for information technology and discuss different types of biometric devices.

3. METHODS OF INSTRUCTION

- 3.1 Lectures
- 3.2 Lab creations and exercises
- 3.3 Discussions
- 3.4 Individualized instruction
- 3.5 Feedback on labs, assignments, and exams

4. LEARNING ACTIVITIES

- 4.1 Take notes during lectures
- 4.2 Participate in class and group exercises
- 4.3 Complete lab assignments
- 4.4 Review incorrect answers to questions on quizzes and exams
- 4.5 Take part in class discussions
- 4.6 Read assigned chapters and do software application exercises
- 4.7 Analyze feedback and apply to future learning situations

- 4.8 Ask questions if concepts are not understood
- 5. EVALUATION
  - 5.1 Exams
  - 5.2 Assigned projects and lab assignments
  - 5.3 Quizzes
- 6. STUDENT RESPONSIBILITIES
  - 6.1 Under AWC Policy, students are expected to attend every session of class in which they are enrolled.
  - 6.2 If a student is unable to attend the course or must drop the course for any reason, it will be the responsibility of the student to withdraw from the course. Students who are not attending as of the 45th day of the course will be withdrawn by the instructor. If the student does not withdraw from the course and fails to complete the requirements of the course, the student will receive a failing grade.
  - 6.3 Americans with Disabilities Act Accommodations: Arizona Western College provides academic accommodations to students with disabilities through AccessABILITY Resource Services (ARS). ARS provides reasonable and appropriate accommodations to students who have documented disabilities. It is the responsibility of the student to make the ARS Coordinator aware of the need for accommodations in the classroom prior to the beginning of the semester. Students should follow up with their instructors once the semester begins. To make an appointment call the ARS front desk at (928) 344-7674 or ARS Coordinator at (928) 344-7629, in the College Community Center (3C) building, next to Advising.
  - 6.4 Academic Integrity: Any student participating in acts of academic dishonesty—including, but not limited to, copying the work of other students, using unauthorized “crib notes”, plagiarism, stealing tests, or forging an instructor’s signature—will be subject to the procedures and consequences outlined in AWC’s Student Code of Conduct.
  - 6.5 Texts and Notebooks: Students are required to obtain the class materials for the course.