

uCertify

Course Outline

Systems Security Certified Practitioner (SSCP)



05 May 2024

1. Course Objective

2. Pre-Assessment

3. Exercises, Quizzes, Flashcards & Glossary

Number of Questions

4. Expert Instructor-Led Training

5. ADA Compliant & JAWS Compatible Platform

6. State of the Art Educator Tools

7. Award Winning Learning Platform (LMS)

8. Chapter & Lessons

Syllabus

Chapter 1: Introduction

Chapter 2: The Business Case for Decision Assurance and Information Security

Chapter 3: Information Security Fundamentals

Chapter 4: Integrated Risk Management and Mitigation

Chapter 5: Operationalizing Risk Mitigation

Chapter 6: Communications and Network Security

Chapter 7: Identity and Access Control

Chapter 8: Cryptography

Chapter 9: Hardware and Systems Security

Chapter 10: Applications, Data, and Cloud Security

Chapter 11: Incident Response and Recovery

Chapter 12: Business Continuity via Information Security and People Power

Chapter 13: Risks, Issues, and Opportunities, Starting Tomorrow

Videos and How To

9. Practice Test

Here's what you get

Features

10. Live labs

Lab Tasks

Here's what you get

11. Post-Assessment

1. Course Objective

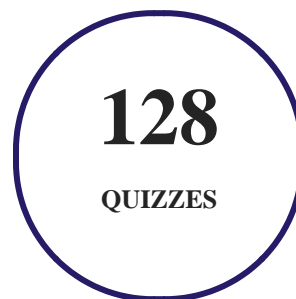
Become an (ISC)² SSCP certified professional with the Systems Security Certified Practitioner (SSCP) course and lab. The lab is cloud-based, device-enabled, and can easily be integrated with an LMS. The SSCP course covers the certification exam objectives and provides skills required for understanding common needs for privacy, confidentiality, integrity, and availability, and professional ethics, ongoing, continuous monitoring, and more. The SSCP training will help you understand exam objectives completely with its various interactive learning resources.

2. Pre-Assessment

Pre-Assessment lets you identify the areas for improvement before you start your prep. It determines what students know about a topic before it is taught and identifies areas for improvement with question assessment before beginning the course.

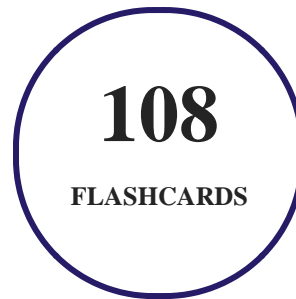
3. Quizzes

Quizzes test your knowledge on the topics of the exam when you go through the course material. There is no limit to the number of times you can attempt it.



4. flashcards

Flashcards are effective memory-aiding tools that help you learn complex topics easily. The flashcard will help you in memorizing definitions, terminologies, key concepts, and more. There is no limit to the number of times learners can attempt these. Flashcards help master the key concepts.



5. Glossary of terms

uCertify provides detailed explanations of concepts relevant to the course through Glossary. It contains a list of frequently used terminologies along with its detailed explanation. Glossary defines the key terms.



6. Expert Instructor-Led Training

uCertify uses the content from the finest publishers and only the IT industry's finest instructors. They have a minimum of 15 years real-world experience and are subject matter experts in their fields. Unlike a live class, you can study at your own pace. This creates a personal learning experience and gives you all the benefit of hands-on training with the flexibility of doing it around your schedule 24/7.

7. ADA Compliant & JAWS Compatible Platform

uCertify course and labs are ADA (Americans with Disability Act) compliant. It is now more accessible to students with features such as:

- Change the font, size, and color of the content of the course
- Text-to-speech, reads the text into spoken words
- Interactive videos, how-tos videos come with transcripts and voice-over
- Interactive transcripts, each word is clickable. Students can clip a specific part of the video by clicking on a word or a portion of the text.

JAWS (Job Access with Speech) is a computer screen reader program for Microsoft Windows that reads the screen either with a text-to-speech output or by a Refreshable Braille display. Student can easily navigate uCertify course using JAWS shortcut keys.

8. State of the Art Educator Tools

uCertify knows the importance of instructors and provide tools to help them do their job effectively. Instructors are able to clone and customize course. Do ability grouping. Create sections. Design grade scale and grade formula. Create and schedule assessments. Educators can also move a student from self-paced to mentor-guided to instructor-led mode in three clicks.

9. Award Winning Learning Platform (LMS)

uCertify has developed an award winning, highly interactive yet simple to use platform. The SIIA CODiE Awards is the only peer-reviewed program to showcase business and education technology's finest products and services. Since 1986, thousands of products, services and solutions have been recognized for achieving excellence. uCertify has won CODiE awards consecutively for last 7 years:

- **2014**
 1. Best Postsecondary Learning Solution
- **2015**
 1. Best Education Solution

2. Best Virtual Learning Solution
3. Best Student Assessment Solution
4. Best Postsecondary Learning Solution
5. Best Career and Workforce Readiness Solution
6. Best Instructional Solution in Other Curriculum Areas
7. Best Corporate Learning/Workforce Development Solution

- **2016**

1. Best Virtual Learning Solution
2. Best Education Cloud-based Solution
3. Best College and Career Readiness Solution
4. Best Corporate / Workforce Learning Solution
5. Best Postsecondary Learning Content Solution
6. Best Postsecondary LMS or Learning Platform
7. Best Learning Relationship Management Solution

- **2017**

1. Best Overall Education Solution
2. Best Student Assessment Solution
3. Best Corporate/Workforce Learning Solution
4. Best Higher Education LMS or Learning Platform

- **2018**

1. Best Higher Education LMS or Learning Platform
2. Best Instructional Solution in Other Curriculum Areas
3. Best Learning Relationship Management Solution

- **2019**

1. Best Virtual Learning Solution
2. Best Content Authoring Development or Curation Solution
3. Best Higher Education Learning Management Solution (LMS)

- **2020**

1. Best College and Career Readiness Solution
2. Best Cross-Curricular Solution
3. Best Virtual Learning Solution

10. Chapter & Lessons

uCertify brings these textbooks to life. It is full of interactive activities that keeps the learner engaged. uCertify brings all available learning resources for a topic in one place so that the learner can efficiently learn without going to multiple places. Challenge questions are also embedded in the chapters so learners can attempt those while they are learning about that particular topic. This helps them grasp the concepts better because they can go over it again right away which improves learning.

Learners can do Flashcards, Exercises, Quizzes and Labs related to each chapter. At the end of every lesson, uCertify courses guide the learners on the path they should follow.

Syllabus

Chapter 1: Introduction

- About This Course
- What Is an SSCP?
- Using This Course
- Objective Map
- Earning Your Certification

Chapter 2: The Business Case for Decision Assurance and Information Security

- Information: The Lifeblood of Business

- Policy, Procedure, and Process: How Business Gets Business Done
- Who Runs the Business?
- Summary

Chapter 3: Information Security Fundamentals

- The Common Needs for Privacy, Confidentiality, Integrity, and Availability
- Training and Educating Everybody
- SSCPs and Professional Ethics
- Summary
- Exam Essentials

Chapter 4: Integrated Risk Management and Mitigation

- It's a Dangerous World
- The Four Faces of Risk
- Getting Integrated and Proactive with Information Defense
- Risk Management: Concepts and Frameworks
- Risk Assessment
- Four Choices for Limiting or Containing Damage

- Summary
- Exam Essentials

Chapter 5: Operationalizing Risk Mitigation

- From Tactical Planning to Information Security Operations
- Operationalizing Risk Mitigation: Step by Step
- The Ongoing Job of Keeping Your Baseline Secure
- Ongoing, Continuous Monitoring
- Reporting to and Engaging with Management
- Summary
- Exam Essentials

Chapter 6: Communications and Network Security

- Trusting Our Communications in a Converged World
- Internet Systems Concepts
- Two Protocol Stacks, One Internet
- IP Addresses, DHCP, and Subnets
- IPv4 vs. IPv6: Key Differences and Options
- CIANA Layer by Layer

- Securing Networks as Systems
- Summary
- Exam Essentials

Chapter 7: Identity and Access Control

- Identity and Access: Two Sides of the Same CIANA Coin
- Identity Management Concepts
- Access Control Concepts
- Network Access Control
- Implementing and Scaling IAM
- Zero Trust Architectures
- Summary
- Exam Essentials

Chapter 8: Cryptography

- Cryptography: What and Why
- Building Blocks of Digital Cryptographic Systems
- Keys and Key Management

- Modern Cryptography: Beyond the “Secret Decoder Ring”
- “Why Isn’t All of This Stuff Secret?”
- Cryptography and CIANA
- Public Key Infrastructures
- Other Protocols: Applying Cryptography to Meet Different Needs
- Measures of Merit for Cryptographic Solutions
- Attacks and Countermeasures
- On the Near Horizon
- Summary
- Exam Essentials

Chapter 9: Hardware and Systems Security

- Infrastructure Security Is Baseline Management
- Infrastructures 101 and Threat Modeling
- Malware: Exploiting the Infrastructure’s Vulnerabilities
- Privacy and Secure Browsing
- “The Sin of Aggregation”
- Updating the Threat Model

- Managing Your Systems' Security
- Summary
- Exam Essentials

Chapter 10: Applications, Data, and Cloud Security

- It's a Data-Driven World...At the Endpoint
- Software as Appliances
- Applications Lifecycles and Security
- CIANA and Applications Software Requirements
- Application Vulnerabilities
- "Shadow IT:" The Dilemma of the User as Builder
- Information Quality and Information Assurance
- Protecting Data in Motion, in Use, and at Rest
- Into the Clouds: Endpoint App and Data Security Considerations
- Legal and Regulatory Issues
- Countermeasures: Keeping Your Apps and Data Safe and Secure
- Summary
- Exam Essentials

Chapter 11: Incident Response and Recovery

- Defeating the Kill Chain One Skirmish at a Time
- Incident Response Framework
- Preparation
- Detection and Analysis
- Containment and Eradication
- Recovery: Getting Back to Business
- Post-Incident Activities
- Summary
- Exam Essentials

Chapter 12: Business Continuity via Information Security and People Power

- A Spectrum of Disruption
- Surviving to Operate: Plan for It!
- Cloud-Based “Do-Over” Buttons for Continuity, Security, and Resilience
- CIANA at Layer 8 and Above
- Summary
- Exam Essentials

Chapter 13: Risks, Issues, and Opportunities, Starting Tomorrow

- On Our Way to the Future
- CIA, CIANA, or CIANAPS?
- Enduring Lessons
- Your Next Steps
- At the Close

11. Practice Test

Here's what you get

125

PRE-ASSESSMENTS
QUESTIONS

2

FULL LENGTH TESTS

125

POST-ASSESSMENTS
QUESTIONS

Features

Each question comes with detailed remediation explaining not only why an answer option is correct but also why it is incorrect.

Unlimited Practice

Each test can be taken unlimited number of times until the learner feels they are prepared. Learner can review the test and read detailed remediation. Detailed test history is also available.

Each test set comes with learn, test and review modes. In learn mode, learners will attempt a question and will get immediate feedback and complete remediation as they move on to the next question. In test mode, learners can take a timed test simulating the actual exam conditions. In review mode, learners can read through one item at a time without attempting it.

12. Live Labs

The benefits of live-labs are:

- Exam based practical tasks
- Real equipment, absolutely no simulations
- Access to the latest industry technologies
- Available anytime, anywhere on any device
- Break and Reset functionality
- No hardware costs

Lab Tasks

Information Security Fundamentals

- Encrypting Files with EFS

Integrated Risk Management and Mitigation

- Conducting Vulnerability Scanning Using Nessus
- Installing Antivirus Software
- Using Social Engineering Techniques to Plan an Attack

- Configuring a VPN

Communications and Network Security

- Performing ARP Spoofing
- Obtaining Hardware Information of a Network Adapter
- Obtaining the ARP Cache
- Obtaining Information about Different IP versions
- Obtaining the IP Version of a Network Adapter
- Getting the TCP Settings
- Getting Information about the Current Connection Statistics of TCP
- Getting the UDP Settings
- Getting Information about the Current Connection Statistics of UDP
- Getting Information about DNS
- Finding the Host Name of a Machine
- Finding the Physical Address of a LAN Adapter
- Finding the Logical Address of a LAN Adapter
- Tracing Route Using Tracert
- Intercepting Packets
- Configuring a Router
- Configuring SSH in a Router
- Configuring Static Routing
- Configuring Default Routing
- Configuring VLANs
- Configuring Network Address Translation
- Assigning Different Classes of IP Addresses
- Adding an IPv6 Address
- Spoofing MAC Address
- Performing Session Hijacking Using Burp Suite
- Attacking a Website Using XSS Injection
- Exploiting a Website Using SQL Injection
- Performing a Man-in-the-Middle Attack
- Using nmap for Scanning
- Performing a DoS Attack with the SYN Flood

Identity and Access Control

- Creating ACL in a Router

Cryptography

- Observing an MD5-Generated Hash Value
- Observe an SHA-Generated Hash Value
- Applying Symmetric Key Encryption
- Using OpenSSL to Create a Public/Private Key Pair

Hardware and Systems Security

- Creating a Virtual Machine

Here's what you get

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LIVE LABS

13. Post-Assessment

After completion of the uCertify course Post-Assessments are given to students and often used in conjunction with a Pre-Assessment to measure their achievement and the effectiveness of the exam.

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