

## Metasploit Framework User Guide

**Over 100 recipes for penetration testing using Metasploit and virtual machines** **Key Features** Special focus on the latest operating systems, exploits, and penetration testing techniques **Learn new anti-virus evasion techniques and use Metasploit to evade countermeasures** Automate post exploitation with AutoRunScript **Exploit Android devices, record audio and video, send and read SMS, read call logs, and much more** Build and analyze Metasploit modules in Ruby **Integrate Metasploit with other penetration testing tools** **Book Description** Metasploit is the world's leading penetration testing tool and helps security and IT professionals find, exploit, and validate vulnerabilities. Metasploit allows penetration testing automation, password auditing, web application scanning, social engineering, post exploitation, evidence collection, and reporting. Metasploit's integration with InsightVM (or Nexpose), Nessus, OpenVas, and other vulnerability scanners provides a validation solution that simplifies vulnerability prioritization and remediation reporting. Teams can collaborate in Metasploit and present their findings in consolidated reports. In this book, you will go through great recipes that will allow you to start using Metasploit effectively. With an ever increasing level of complexity, and covering everything from the fundamentals to more advanced features in Metasploit, this book is not just for beginners but also for professionals keen to master this awesome tool. You will begin by building your lab environment, setting up Metasploit, and learning how to perform intelligence gathering, threat modeling, vulnerability analysis, exploitation, and post exploitation—all inside Metasploit. You will learn how to create and customize payloads to evade anti-virus software and bypass an organization's defenses, exploit server vulnerabilities, attack client systems, compromise mobile phones, automate post exploitation, install backdoors, run keyloggers, hijack webcams, port public exploits to the framework, create your own modules, and much more. What you will learn **Set up a complete penetration testing environment using Metasploit and virtual machines** Master the world's leading penetration testing tool and use it in professional penetration testing **Make the most of Metasploit with PostgreSQL, importing scan results, using workspaces, hosts, loot, notes, services, vulnerabilities, and exploit results** Use Metasploit with the Penetration Testing Execution Standard methodology **Use MSFvenom efficiently to generate payloads and backdoor files, and create shellcode** Leverage Metasploit's advanced options, upgrade sessions, use proxies, use Meterpreter sleep control, and change timeouts to be stealthy **Who this book is for** If you are a Security professional or pentester and want to get into vulnerability exploitation and make the most of the Metasploit framework, then this book is for you. Some prior understanding of penetration testing and Metasploit is required.

The Metasploit Framework makes discovering, exploiting, and sharing vulnerabilities quick and relatively painless. But while Metasploit is used by security professionals everywhere, the tool can be hard to grasp for first-time users. **Metasploit: The Penetration Tester's Guide** fills this gap by teaching you how to harness the Framework and interact with the vibrant community of Metasploit contributors. Once you've built your foundation for penetration testing, you'll learn the Framework's conventions, interfaces, and module system as you launch simulated attacks. You'll move on to advanced penetration testing techniques, including network reconnaissance and enumeration, client-side attacks, wireless attacks, and targeted social-engineering attacks. **Learn how to: –Find and**

**exploit unmaintained, misconfigured, and unpatched systems –Perform reconnaissance and find valuable information about your target –Bypass anti-virus technologies and circumvent security controls –Integrate Nmap, NeXpose, and Nessus with Metasploit to automate discovery –Use the Meterpreter shell to launch further attacks from inside the network –Harness standalone Metasploit utilities, third-party tools, and plug-ins –Learn how to write your own Meterpreter post exploitation modules and scripts You'll even touch on exploit discovery for zero-day research, write a fuzzer, port existing exploits into the Framework, and learn how to cover your tracks. Whether your goal is to secure your own networks or to put someone else's to the test, Metasploit: The Penetration Tester's Guide will take you there and beyond.**

**"An essential requirement for protecting any organization's computer and network systems from adversarial attack is finding the vulnerabilities in those systems before the bad guys do. In this course, cybersecurity expert Ric Messier shows you how to use Metasploit, the open source, multi-platform (Linux, Windows, Mac OS) exploit framework deployed by systems administrators and security engineers everywhere to spot those vulnerabilities. You'll learn how to download, install, and configure the software; how to extend Metasploit; how to perform system reconnaissance and vulnerability identification missions; how to use exploits; and the basics of social engineering attacks, such as phishing and site cloning."--Resource description page.**

**Prepare for success on the new PenTest+ certification exam and an exciting career in penetration testing In the revamped Second Edition of CompTIA PenTest+ Study Guide: Exam PT0-002, veteran information security experts Dr. Mike Chapple and David Seidl deliver a comprehensive roadmap to the foundational and advanced skills every pentester (penetration tester) needs to secure their CompTIA PenTest+ certification, ace their next interview, and succeed in an exciting new career in a growing field. You'll learn to perform security assessments of traditional servers, desktop and mobile operating systems, cloud installations, Internet-of-Things devices, and industrial or embedded systems. You'll plan and scope a penetration testing engagement including vulnerability scanning, understand legal and regulatory compliance requirements, analyze test results, and produce a written report with remediation techniques. This book will: Prepare you for success on the newly introduced CompTIA PenTest+ PT0-002 Exam Multiply your career opportunities with a certification that complies with ISO 17024 standards and meets Department of Defense Directive 8140/8570.01-M requirements Allow access to the Sybex online learning center, with chapter review questions, full-length practice exams, hundreds of electronic flashcards, and a glossary of key terms Perfect for anyone preparing for the updated CompTIA PenTest+ certification exam, CompTIA PenTest+ Study Guide: Exam PT0-002 is also a must-read resource for aspiring penetration testers and IT security professionals seeking to expand and improve their skillset.**

**Windows and Linux Penetration Testing from Scratch**

**Unleash Kali Linux, PowerShell, and Windows debugging tools for security testing and analysis**

**Hands-On Penetration Testing on Windows**

**Exam CAS-002**

**CASP CompTIA Advanced Security Practitioner Study Guide**

## Hands-On Web Penetration Testing with Metasploit

**Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.**

**If your job is to design or implement IT security solutions or if you're studying for any security certification, this is the how-to guide you've been looking for. Here's how to assess your needs, gather the tools, and create a controlled environment in which you can experiment, test, and develop the solutions that work. With liberal examples from real-world scenarios, it tells you exactly how to implement a strategy to secure your systems now and in the future. Note: CD-ROM/DVD and other supplementary materials are not included as part of eBook file.**

**Comprehensive coverage of the new CASP+ exam, with hands-on practice and interactive study tools**  
**The CASP+ CompTIA Advanced Security Practitioner Study Guide: Exam CAS-003, Third Edition, offers invaluable preparation for exam CAS-003. Covering 100 percent of the exam objectives, this book provides expert walk-through of essential security concepts and processes to help you tackle this challenging exam with full confidence. Practical examples and real-world insights illustrate critical topics and show what essential practices look like on the ground, while detailed explanations of technical and business concepts give you the background you need to apply identify and implement appropriate security solutions. End-of-chapter reviews help solidify your understanding of each objective, and cutting-edge exam prep software features electronic flashcards, hands-on lab exercises, and hundreds of practice questions to help you test your knowledge in advance of the exam. The next few years will bring a 45-fold increase in digital data, and at least one third of that data will pass through the cloud. The level of risk to data everywhere is growing in parallel, and organizations are in need of qualified data security professionals; the CASP+ certification validates this in-demand skill set, and this book is your ideal resource for passing the exam. Master cryptography, controls, vulnerability analysis, and network security Identify risks and execute mitigation planning, strategies, and controls Analyze security trends and their impact on your organization Integrate business and technical components to achieve a secure enterprise architecture CASP+ meets the ISO 17024 standard, and is approved by U.S. Department of Defense to fulfill Directive 8570.01-M requirements. It is also compliant with government regulations under the Federal Information Security Management Act (FISMA). As such, this career-building credential makes you in demand in the marketplace and shows that you are qualified to address enterprise-level security concerns. The CASP+ CompTIA Advanced Security Practitioner Study Guide: Exam CAS-003, Third Edition, is the preparation**

**resource you need to take the next big step for your career and pass with flying colors. Master the Metasploit Framework and become an expert in penetration testing. Key Features**

- Gain a thorough understanding of the Metasploit Framework**
- Develop the skills to perform penetration testing in complex and highly secure environments**
- Learn techniques to integrate Metasploit with the industry's leading tools**

**Book Description** Most businesses today are driven by their IT infrastructure, and the tiniest crack in this IT network can bring down the entire business. Metasploit is a pentesting network that can validate your system by performing elaborate penetration tests using the Metasploit Framework to secure your infrastructure. This Learning Path introduces you to the basic functionalities and applications of Metasploit. Throughout this book, you'll learn different techniques for programming Metasploit modules to validate services such as databases, fingerprinting, and scanning. You'll get to grips with post exploitation and write quick scripts to gather information from exploited systems. As you progress, you'll delve into real-world scenarios where performing penetration tests are a challenge. With the help of these case studies, you'll explore client-side attacks using Metasploit and a variety of scripts built on the Metasploit Framework. By the end of this Learning Path, you'll have the skills required to identify system vulnerabilities by using thorough testing. This Learning Path includes content from the following Packt products:

- Metasploit for Beginners** by Sagar Rahalkar
- Mastering Metasploit - Third Edition** by Nipun Jaswal

**What you will learn**

- Develop advanced and sophisticated auxiliary modules**
- Port exploits from Perl, Python, and many other programming languages**
- Bypass modern protections such as antivirus and IDS with Metasploit**
- Script attacks in Armitage using the Cortana scripting language**
- Customize Metasploit modules to modify existing exploits**
- Explore the steps involved in post-exploitation on Android and mobile platforms**

**Who this book is for** This Learning Path is ideal for security professionals, web programmers, and pentesters who want to master vulnerability exploitation and get the most of the Metasploit Framework. Basic knowledge of Ruby programming and Cortana scripting language is required.

**Metasploit Toolkit for Penetration Testing, Exploit Development, and Vulnerability Research Exam CS0-001**

**A practical guide to mastering Red Team operations**

**CompTIA CYSA+ Guide to Cyber Security Analyst**

**Exploit systems, cover your tracks, and bypass security controls with the Metasploit 5.0 framework, 4th Edition**

## Second Edition

Leverage Wireshark, Lua and Metasploit to solve any security challenge. Wireshark is arguably one of the most versatile networking tools available, allowing microscopic examination of almost any kind of network activity. This book is designed to help you quickly navigate and leverage Wireshark effectively, with a primer for exploring the Wireshark Lua API as well as an introduction to the Metasploit Framework. *Wireshark for Security Professionals* covers both offensive and defensive concepts that can be applied to any Infosec position, providing detailed, advanced content demonstrating the full potential of the Wireshark tool. Coverage includes the Wireshark Lua API, Networking and Metasploit fundamentals, plus important foundational security concepts explained in a practical manner. You are guided through full usage of Wireshark, from installation to everyday use, including how to surreptitiously capture packets using advanced MITM techniques. Practical demonstrations integrate Metasploit and Wireshark demonstrating how these tools can be used together, with detailed explanations and cases that illustrate the concepts at work. These concepts can be equally useful if you are performing offensive reverse engineering or performing incident response and network forensics. Lua source code is provided, and you can download virtual lab environments as well as PCAPs allowing them to follow along and gain hands-on experience. The final chapter includes a practical case study that expands upon the topics presented to provide a cohesive example of how to leverage Wireshark in a real world scenario. Understand the basics of Wireshark and Metasploit within the security space. Integrate Lua scripting to extend Wireshark and perform packet analysis. Learn the technical details behind common network exploitation. Packet analysis in the context of both offensive and defensive security research. Wireshark is the standard network analysis tool used across many industries due to its powerful feature set and support for numerous protocols. When used effectively, it becomes an invaluable tool for any security professional, however the learning curve can be steep. Climb the curve more quickly with the expert insight and comprehensive coverage in *Wireshark for Security Professionals*.

The Metasploit framework has been around for a number of years and is one of the most widely used tools for carrying out penetration testing on various services. This book is a hands-on guide to penetration testing using Metasploit and covers its complete development. It will help you clearly understand the creation process of various exploits and modules and develop approaches to writing custom functionalities into the Metasploit framework. This book covers a number of techniques and methodologies that will help you learn and master the Metasploit framework. You will also explore approaches to carrying out advanced penetration

testing in highly secured environments, and the book's hands-on approach will help you understand everything you need to know about Metasploit.

Metasploit Toolkit for Penetration Testing, Exploit Development, and Vulnerability Research is the first book available for the Metasploit Framework (MSF), which is the attack platform of choice for one of the fastest growing careers in IT security: Penetration Testing. The book will provide professional penetration testers and security researchers with a fully integrated suite of tools for discovering, running, and testing exploit code. This book discusses how to use the Metasploit Framework (MSF) as an exploitation platform. The book begins with a detailed discussion of the three MSF interfaces: msfweb, msfconsole, and msfcli. This chapter demonstrates all of the features offered by the MSF as an exploitation platform. With a solid understanding of MSF's capabilities, the book then details techniques for dramatically reducing the amount of time required for developing functional exploits. By working through a real-world vulnerabilities against popular closed source applications, the reader will learn how to use the tools and MSF to quickly build reliable attacks as standalone exploits. The section will also explain how to integrate an exploit directly into the Metasploit Framework by providing a line-by-line analysis of an integrated exploit module. Details as to how the Metasploit engine drives the behind-the-scenes exploitation process will be covered, and along the way the reader will come to understand the advantages of exploitation frameworks. The final section of the book examines the Meterpreter payload system and teaches readers to develop completely new extensions that will integrate fluidly with the Metasploit Framework. A November 2004 survey conducted by "CSO Magazine" stated that 42% of chief security officers considered penetration testing to be a security priority for their organizations. The Metasploit Framework is the most popular open source exploit platform, and there are no competing books.

CISSP Study Guide, Third Edition provides readers with information on the CISSP certification, the most prestigious, globally-recognized, vendor-neutral exam for information security professionals. With over 100,000 professionals certified worldwide, and many more joining their ranks, this new third edition presents everything a reader needs to know on the newest version of the exam's Common Body of Knowledge. The eight domains are covered completely and as concisely as possible, allowing users to ace the exam. Each domain has its own chapter that includes a specially-designed pedagogy to help users pass the exam, including clearly-stated exam objectives, unique terms and definitions, exam warnings, "learning by example" modules, hands-on exercises, and chapter ending questions. Provides the most complete and effective study

guide to prepare users for passing the CISSP exam, giving them exactly what they need to pass the test  
Authored by Eric Conrad who has prepared hundreds of professionals for passing the CISSP exam through  
SANS, a popular and well-known organization for information security professionals Covers all of the new  
information in the Common Body of Knowledge updated in January 2015, and also provides two exams,  
tiered end-of-chapter questions for a gradual learning curve, and a complete self-test appendix

Recent Advances in Intrusion Detection

Sockets, Shellcode, Porting, and Coding: Reverse Engineering Exploits and Tool Coding for Security  
Professionals

CASP+ CompTIA Advanced Security Practitioner Study Guide

12th Asian Computing Science Conference, Doha, Qatar, December 9-11, 2007, Proceedings

Build Your Own Security Lab

Evade antiviruses, bypass firewalls, and exploit complex environments with the most widely used  
penetration testing framework, 3rd Edition

*Accompanying CD-ROM contains: Pearson IT Certification Practice Test Engine, with two practice exams and access to a large library of  
exam-realistic questions; memory tables, lists, and other resources, all in searchable PDF format.*

*A comprehensive and detailed, step by step tutorial guide that takes you through important aspects of the Metasploit framework. If you are a  
penetration tester, security engineer, or someone who is looking to extend their penetration testing skills with Metasploit, then this book is ideal  
for you. The readers of this book must have a basic knowledge of using Metasploit. They are also expected to have knowledge of exploitation  
and an in-depth understanding of object-oriented programming languages.*

*This book constitutes the refereed proceedings of the 12th Asian Computing Science Conference, ASIAN 2007, held in Doha, Qatar, in  
December 2007. Covering all current aspects of computer and network security, the papers are organized in topical sections on program  
security, computer security, access control, protocols, intrusion detection, network security, and safe execution.*

*An easy to digest practical guide to Metasploit covering all aspects of the framework from installation, configuration, and vulnerability hunting  
to advanced client side attacks and anti-forensics. About This Book Carry out penetration testing in highly-secured environments with  
Metasploit Learn to bypass different defenses to gain access into different systems. A step-by-step guide that will quickly enhance your  
penetration testing skills. Who This Book Is For If you are a penetration tester, ethical hacker, or security consultant who wants to quickly  
learn the Metasploit framework to carry out elementary penetration testing in highly secured environments then, this book is for you. What You  
Will Learn Get to know the absolute basics of the Metasploit framework so you have a strong foundation for advanced attacks Integrate and  
use various supporting tools to make Metasploit even more powerful and precise Set up the Metasploit environment along with your own virtual  
testing lab Use Metasploit for information gathering and enumeration before planning the blueprint for the attack on the target system Get your*

*hands dirty by firing up Metasploit in your own virtual lab and hunt down real vulnerabilities Discover the clever features of the Metasploit framework for launching sophisticated and deceptive client-side attacks that bypass the perimeter security Leverage Metasploit capabilities to perform Web application security scanning In Detail This book will begin by introducing you to Metasploit and its functionality. Next, you will learn how to set up and configure Metasploit on various platforms to create a virtual test environment. You will also get your hands on various tools and components used by Metasploit. Further on in the book, you will learn how to find weaknesses in the target system and hunt for vulnerabilities using Metasploit and its supporting tools. Next, you'll get hands-on experience carrying out client-side attacks. Moving on, you'll learn about web application security scanning and bypassing anti-virus and clearing traces on the target system post compromise. This book will also keep you updated with the latest security techniques and methods that can be directly applied to scan, test, hack, and secure networks and systems with Metasploit. By the end of this book, you'll get the hang of bypassing different defenses, after which you'll learn how hackers use the network to gain access into different systems. Style and approach This tutorial is packed with step-by-step instructions that are useful for those getting started with Metasploit. This is an easy-to-read guide to learning Metasploit from scratch that explains simply and clearly all you need to know to use this essential IT power tool.*

*Metasploit*

*Penetration Testing with the Metasploit Framework*

*A Quickstart Guide to White Hat Security Discovery and Exploitation*

*Penetration Testing*

*10th International Symposium, RAID 2007, Gold Coast, Australia, September 5-7, 2007, Proceedings*

*Lab Manual for Security+ Guide to Network Security Fundamentals, 5th*

This book constitutes the thoroughly refereed post-conference proceedings of the 15th International Conference on Information Security and Cryptology, ICISC 2012, held in Seoul, Korea, in November 2012. The 32 revised full papers presented together with 3 invited talks were carefully selected from 120 submissions during two rounds of reviewing. The papers provide the latest results in research, development, and applications in the field of information security and cryptology. They are organized in topical sections on attack and defense, software and Web security, cryptanalysis, cryptographic protocol, identity-based encryption, efficient implementation, cloud computing security, side channel analysis, digital signature, and privacy enhancement.

Discusses how to install, run, and configure Windows XP for both the home and office, explaining how to connect to the Internet, design a LAN, and share drives and printers, and includes tips and troubleshooting techniques.

Penetration testers simulate cyber attacks to find security weaknesses in networks, operating systems, and applications. Information security experts worldwide use penetration techniques to evaluate enterprise defenses. In Penetration Testing, security expert, researcher, and trainer Georgia Weidman introduces you to the core skills and techniques that

every pentester needs. Using a virtual machine – based lab that includes Kali Linux and vulnerable operating systems, you'll run through a series of practical lessons with tools like Wireshark, Nmap, and Burp Suite. As you follow along with the labs and launch attacks, you'll experience the key stages of an actual assessment—including information gathering, finding exploitable vulnerabilities, gaining access to systems, post exploitation, and more. Learn how to: – Crack passwords and wireless network keys with brute-forcing and wordlists – Test web applications for vulnerabilities – Use the Metasploit Framework to launch exploits and write your own Metasploit modules – Automate social-engineering attacks – Bypass antivirus software – Turn access to one machine into total control of the enterprise in the post exploitation phase You'll even explore writing your own exploits. Then it's on to mobile hacking—Weidman's particular area of research—with her tool, the Smartphone Pentest Framework. With its collection of hands-on lessons that cover key tools and strategies, Penetration Testing is the introduction that every aspiring hacker needs. Over 80 recipes to master the most widely used penetration testing framework.

A Hands-On Introduction to Hacking

Metasploit Handbook

Exam

Windows XP in a Nutshell

15th International Conference, Seoul, Korea, November 28-30, 2012, Revised Selected Papers

Quick Start Guide to Penetration Testing

*Master the art of identifying vulnerabilities within the Windows OS and develop the desired solutions for it using Kali Linux. Key Features Identify the vulnerabilities in your system using Kali Linux 2018.02 Discover the art of exploiting Windows kernel drivers Get to know several bypassing techniques to gain control of your Windows environment Book Description Windows has always been the go-to platform for users around the globe to perform administration and ad hoc tasks, in settings that range from small offices to global enterprises, and this massive footprint makes securing Windows a unique challenge. This book will enable you to distinguish yourself to your clients. In this book, you'll learn advanced techniques to attack Windows environments from the indispensable toolkit that is Kali Linux. We'll work through core network hacking concepts and advanced Windows exploitation techniques, such as stack and heap overflows, precision heap spraying, and kernel exploitation, using coding principles that allow you*

to leverage powerful Python scripts and shellcode. We'll wrap up with post-exploitation strategies that enable you to go deeper and keep your access. Finally, we'll introduce kernel hacking fundamentals and fuzzing testing, so you can discover vulnerabilities and write custom exploits. By the end of this book, you'll be well-versed in identifying vulnerabilities within the Windows OS and developing the desired solutions for them. What you will learn Get to know advanced pen testing techniques with Kali Linux Gain an understanding of Kali Linux tools and methods from behind the scenes See how to use Kali Linux at an advanced level Understand the exploitation of Windows kernel drivers Understand advanced Windows concepts and protections, and how to bypass them using Kali Linux Discover Windows exploitation techniques, such as stack and heap overflows and kernel exploitation, through coding principles Who this book is for This book is for penetration testers, ethical hackers, and individuals breaking into the pentesting role after demonstrating an advanced skill in boot camps. Prior experience with Windows exploitation, Kali Linux, and some Windows debugging tools is necessary Certified Ethical Hacker v10 Exam 312-50 Latest v10. This updated version includes three major enhancement, New modules added to cover complete CEHv10 blueprint. Book scrutinized to rectify grammar, punctuation, spelling and vocabulary errors. Added 150+ Exam Practice Questions to help you in the exam. CEHv10 Update CEH v10 covers new modules for the security of IoT devices, vulnerability analysis, focus on emerging attack vectors on the cloud, artificial intelligence, and machine learning including a complete malware analysis process. Our CEH workbook delivers a deep understanding of applications of the vulnerability analysis in a real-world environment. Information security is always a great challenge for networks and systems. Data breach statistics estimated millions of records stolen every day which evolved the need for Security. Almost each and every organization in the world demands security from identity theft, information leakage and the integrity of their data. The role and skills of Certified Ethical Hacker are becoming more significant and demanding than ever. EC-Council Certified Ethical Hacking (CEH) ensures the delivery of knowledge regarding fundamental and advanced security threats, evasion techniques from intrusion detection system and countermeasures of attacks as well

as up-skill you to penetrate platforms to identify vulnerabilities in the architecture. CEH v10 update will cover the latest exam blueprint, comprised of 20 Modules which includes the practice of information security and hacking tools which are popularly used by professionals to exploit any computer systems. CEHV10 course blueprint covers all five Phases of Ethical Hacking starting from Reconnaissance, Gaining Access, Enumeration, Maintaining Access till covering your tracks. While studying CEHV10, you will feel yourself into a Hacker's Mindset. Major additions in the CEHV10 course are Vulnerability Analysis, IoT Hacking, Focused on Emerging Attack Vectors, Hacking Challenges, and updates of latest threats & attacks including Ransomware, Android Malware, Banking & Financial malware, IoT botnets and much more. IPSpecialist CEH technology workbook will help you to learn Five Phases of Ethical Hacking with tools, techniques, and The methodology of Vulnerability Analysis to explore security loopholes, Vulnerability Management Life Cycle, and Tools used for Vulnerability analysis. DoS/DDoS, Session Hijacking, SQL Injection & much more. Threats to IoT platforms and defending techniques of IoT devices. Advance Vulnerability Analysis to identify security loopholes in a corporate network, infrastructure, and endpoints. Cryptography Concepts, Ciphers, Public Key Infrastructure (PKI), Cryptography attacks, Cryptanalysis tools and Methodology of Crypt Analysis. Penetration testing, security audit, vulnerability assessment, and penetration testing roadmap. Cloud computing concepts, threats, attacks, tools, and Wireless networks, Wireless network security, Threats, Attacks, and Countermeasures and much more.

Identify, exploit, and test web application security with ease Key FeaturesGet up to speed with Metasploit and discover how to use it for pentestingUnderstand how to exploit and protect your web environment effectivelyLearn how an exploit works and what causes vulnerabilitiesBook Description Metasploit has been a crucial security tool for many years. However, there are only a few modules that Metasploit has made available to the public for pentesting web applications. In this book, you'll explore another aspect of the framework - web applications - which is not commonly used. You'll also discover how Metasploit, when used with its inbuilt GUI, simplifies web application penetration

testing. The book starts by focusing on the Metasploit setup, along with covering the life cycle of the penetration testing process. Then, you will explore Metasploit terminology and the web GUI, which is available in the Metasploit Community Edition. Next, the book will take you through pentesting popular content management systems such as Drupal, WordPress, and Joomla, which will also include studying the latest CVEs and understanding the root cause of vulnerability in detail. Later, you'll gain insights into the vulnerability assessment and exploitation of technological platforms such as JBoss, Jenkins, and Tomcat. Finally, you'll learn how to fuzz web applications to find logical security vulnerabilities using third-party tools. By the end of this book, you'll have a solid understanding of how to exploit and validate vulnerabilities by working with various tools and techniques. What you will learn

Get up to speed with setting up and installing the Metasploit framework  
Gain first-hand experience of the Metasploit web interface  
Use Metasploit for web-application reconnaissance  
Understand how to pentest various content management systems  
Pentest platforms such as JBoss, Tomcat, and Jenkins  
Become well-versed with fuzzing web applications  
Write and automate penetration testing reports

Who this book is for This book is for web security analysts, bug bounty hunters, security professionals, or any stakeholder in the security sector who wants to delve into web application security testing. Professionals who are not experts with command line tools or Kali Linux and prefer Metasploit's graphical user interface (GUI) will also find this book useful. No experience with Metasploit is required, but basic knowledge of Linux and web application pentesting will be helpful.

Master the art of identifying and exploiting vulnerabilities with Metasploit, Empire, PowerShell, and Python, turning Kali Linux into your fighter cockpit  
Key Features  
Map your client's attack surface with Kali Linux  
Discover the craft of shellcode injection and managing multiple compromises in the environment  
Understand both the attacker and the defender mindset

Book Description Let's be honest—security testing can get repetitive. If you're ready to break out of the routine and embrace the art of penetration testing, this book will help you to distinguish yourself to your clients. This pen testing book is your guide to learning advanced techniques to attack Windows and Linux environments from the

*indispensable platform, Kali Linux. You'll work through core network hacking concepts and advanced exploitation techniques that leverage both technical and human factors to maximize success. You'll also explore how to leverage public resources to learn more about your target, discover potential targets, analyze them, and gain a foothold using a variety of exploitation techniques while dodging defenses like antivirus and firewalls. The book focuses on leveraging target resources, such as PowerShell, to execute powerful and difficult-to-detect attacks. Along the way, you'll enjoy reading about how these methods work so that you walk away with the necessary knowledge to explain your findings to clients from all backgrounds. Wrapping up with post-exploitation strategies, you'll be able to go deeper and keep your access. By the end of this book, you'll be well-versed in identifying vulnerabilities within your clients' environments and providing the necessary insight for proper remediation. What you will learn Get to know advanced pen testing techniques with Kali Linux Gain an understanding of Kali Linux tools and methods from behind the scenes Get to grips with the exploitation of Windows and Linux clients and servers Understand advanced Windows concepts and protection and bypass them with Kali and living-off-the-land methods Get the hang of sophisticated attack frameworks such as Metasploit and Empire Become adept in generating and analyzing shellcode Build and tweak attack scripts and modules Who this book is for This book is for penetration testers, information technology professionals, cybersecurity professionals and students, and individuals breaking into a pentesting role after demonstrating advanced skills in boot camps. Prior experience with Windows, Linux, and networking is necessary.*

*Wireshark for Security Professionals*

*Using Wireshark and the Metasploit Framework*

*CompTIA PenTest+ Study Guide*

*Exam PT0-002*

*Mastering Metasploit*

*Harness the power of pen testing with Kali Linux for unbeatable hard-hitting results*

*World-class preparation for the new PenTest+ exam The CompTIA PenTest+ Study Guide: Exam PT0-001 offers comprehensive preparation for the newest intermediate cybersecurity certification exam. With expert coverage of*

*Exam PT0-001 objectives, this book is your ideal companion throughout all stages of study; whether you're just embarking on your certification journey or finalizing preparations for the big day, this invaluable resource helps you solidify your understanding of essential skills and concepts. Access to the Sybex online learning environment allows you to study anytime, anywhere with electronic flashcards, a searchable glossary, and more, while hundreds of practice exam questions help you step up your preparations and avoid surprises on exam day. The CompTIA PenTest+ certification validates your skills and knowledge surrounding second-generation penetration testing, vulnerability assessment, and vulnerability management on a variety of systems and devices, making it the latest go-to qualification in an increasingly mobile world. This book contains everything you need to prepare; identify what you already know, learn what you don't know, and face the exam with full confidence! Perform security assessments on desktops and mobile devices, as well as cloud, IoT, industrial and embedded systems Identify security weaknesses and manage system vulnerabilities Ensure that existing cybersecurity practices, configurations, and policies conform with current best practices Simulate cyberattacks to pinpoint security weaknesses in operating systems, networks, and applications As our information technology advances, so do the threats against it. It's an arms race for complexity and sophistication, and the expansion of networked devices and the Internet of Things has integrated cybersecurity into nearly every aspect of our lives. The PenTest+ certification equips you with the skills you need to identify potential problems—and fix them—and the CompTIA PenTest+ Study Guide: Exam PT0-001 is the central component of a complete preparation plan.*

*This book follows a Cookbook style with recipes explaining the steps for penetration testing with WLAN, VOIP, and even cloud computing. There is plenty of code and commands used to make your learning curve easy and quick. This book targets both professional penetration testers as well as new users of Metasploit, who wish to gain expertise over the framework and learn an additional skill of penetration testing, not limited to a particular OS. The book requires basic knowledge of scanning, exploitation, and the Ruby language.*

*A complete pentesting guide facilitating smooth backtracking for working hackers About This Book Conduct network testing, surveillance, pen testing and forensics on MS Windows using Kali Linux Gain a deep understanding of the flaws in web applications and exploit them in a practical manner Pentest Android apps and perform various attacks in the real world using real case studies Who This Book Is For This course is for anyone who wants to learn about security. Basic knowledge of Android programming would be a plus. What You Will Learn Exploit several common Windows network vulnerabilities Recover lost files, investigate successful hacks, and discover hidden data in innocent-looking files Expose vulnerabilities present in web servers and their applications using server-side attacks Use SQL*

*and cross-site scripting (XSS) attacks Check for XSS flaws using the burp suite proxy Acquaint yourself with the fundamental building blocks of Android Apps in the right way Take a look at how your personal data can be stolen by malicious attackers See how developers make mistakes that allow attackers to steal data from phones In Detail The need for penetration testers has grown well over what the IT industry ever anticipated. Running just a vulnerability scanner is no longer an effective method to determine whether a business is truly secure. This learning path will help you develop the most effective penetration testing skills to protect your Windows, web applications, and Android devices. The first module focuses on the Windows platform, which is one of the most common OSes, and managing its security spawned the discipline of IT security. Kali Linux is the premier platform for testing and maintaining Windows security. Employs the most advanced tools and techniques to reproduce the methods used by sophisticated hackers. In this module first, you'll be introduced to Kali's top ten tools and other useful reporting tools. Then, you will find your way around your target network and determine known vulnerabilities so you can exploit a system remotely. You'll not only learn to penetrate in the machine, but will also learn to work with Windows privilege escalations. The second module will help you get to grips with the tools used in Kali Linux 2.0 that relate to web application hacking. You will get to know about scripting and input validation flaws, AJAX, and security issues related to AJAX. You will also use an automated technique called fuzzing so you can identify flaws in a web application. Finally, you'll understand the web application vulnerabilities and the ways they can be exploited. In the last module, you'll get started with Android security. Android, being the platform with the largest consumer base, is the obvious primary target for attackers. You'll begin this journey with the absolute basics and will then slowly gear up to the concepts of Android rooting, application security assessments, malware, infecting APK files, and fuzzing. You'll gain the skills necessary to perform Android application vulnerability assessments and to create an Android pentesting lab. This Learning Path is a blend of content from the following Packt products: Kali Linux 2: Windows Penetration Testing by Wolf Halton and Bo Weaver Web Penetration Testing with Kali Linux, Second Edition by Juned Ahmed Ansari Hacking Android by Srinivasa Rao Kotipalli and Mohammed A. Imran Style and approach This course uses easy-to-understand yet professional language for explaining concepts to test your network's security.*

*GUIDE TO NETWORK SECURITY is a wide-ranging new text that provides a detailed review of the network security field, including essential terminology, the history of the discipline, and practical techniques to manage implementation of network security solutions. It begins with an overview of information, network, and web security, emphasizing the role of data communications and encryption. The authors then explore network perimeter defense technologies and methods, including access controls, firewalls, VPNs, and intrusion detection systems, as well as*

*applied cryptography in public key infrastructure, wireless security, and web commerce. The final section covers additional topics relevant for information security practitioners, such as assessing network security, professional careers in the field, and contingency planning. Perfect for both aspiring and active IT professionals, GUIDE TO NETWORK SECURITY is an ideal resource for students who want to help organizations protect critical information assets and secure their systems and networks, both by recognizing current threats and vulnerabilities, and by designing and developing the secure systems of the future. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.*

*CompTIA PenTest+ Certification All-in-One Exam Guide (Exam PT0-001)*

*Certified Ethical Hacker Complete Training Guide with Practice Questions & Labs:*

*Metasploit for Beginners*

*Advances in Computer Science - ASIAN 2007. Computer and Network Security*

*Certified Ethical Hacker (CEH) Cert Guide*

*A Field Guide for Network Testing*

Your one-stop guide to learning and implementing Red Team tactics effectively  
Key Features  
Target a complex enterprise environment in a Red Team activity  
Detect threats and respond to them with a real-world cyber-attack simulation  
Explore advanced penetration testing tools and techniques  
Book Description  
Red Teaming is used to enhance security by performing simulated attacks on an organization in order to detect network and system vulnerabilities. Hands-On Red Team Tactics starts with an overview of pentesting and Red Teaming, before giving you an introduction to few of the latest pentesting tools. We will then move on to exploring Metasploit and getting to grips with Armitage. Once you have studied the fundamentals, you will learn how to use Cobalt Strike and how to set up its team server. The book introduces some common lesser known techniques for pivoting and how to pivot over SSH, before using Cobalt Strike to pivot. This comprehensive guide demonstrates advanced methods of post-exploitation using Cobalt Strike and introduces you to Command and Control (C2) servers and redirectors. All this will help you achieve persistence using beacons and data exfiltration, and will also give you the chance to run through the methodology to use Red Team activity tools such as Empire during a Red Team activity on Active Directory and Domain Controller. In addition to this, you will explore maintaining persistent access, staying untraceable, and getting reverse connections over different C2 covert channels. By the end of this book, you will have learned about advanced penetration testing tools, techniques to get reverse shells over encrypted channels, and processes for post-exploitation. What you will learn  
Get started with red team engagements using lesser-known methods  
Explore intermediate and advanced levels of

post-exploitation techniques  
Get acquainted with all the tools and frameworks included in the Metasploit framework  
Discover the art of getting stealthy access to systems via Red Teaming  
Understand the concept of redirectors to add further anonymity to your C2  
Get to grips with different uncommon techniques for data exfiltration  
Who this book is for  
Hands-On Red Team Tactics is for you if you are an IT professional, pentester, security consultant, or ethical hacker interested in the IT security domain and wants to go beyond Penetration Testing. Prior knowledge of penetration testing is beneficial.

The book is logically divided into 5 main categories with each category representing a major skill set required by most security professionals:

1. Coding - The ability to program and script is quickly becoming a mainstream requirement for just about everyone in the security industry. This section covers the basics in coding complemented with a slue of programming tips and tricks in C/C++, Java, Perl and NASL.
2. Sockets - The technology that allows programs and scripts to communicate over a network is sockets. Even though the theory remains the same - communication over TCP and UDP, sockets are implemented differently in nearly ever language.
3. Shellcode - Shellcode, commonly defined as bytecode converted from Assembly, is utilized to execute commands on remote systems via direct memory access.
4. Porting - Due to the differences between operating platforms and language implementations on those platforms, it is a common practice to modify an original body of code to work on a different platforms. This technique is known as porting and is incredible useful in the real world environments since it allows you to not "recreate the wheel.
5. Coding Tools - The culmination of the previous four sections, coding tools brings all of the techniques that you have learned to the forefront. With the background technologies and techniques you will now be able to code quick utilities that will not only make you more productive, they will arm you with an extremely valuable skill that will remain with you as long as you make the proper time and effort dedications.

\*Contains never before seen chapters on writing and automating exploits on windows systems with all-new exploits. \*Perform zero-day exploit forensics by reverse engineering malicious code. \*Provides working code and scripts in all of the most common programming languages for readers to use TODAY to defend their networks.

Here are the refereed proceedings of the 10th International Symposium on Recent Advances in Intrusion Detection. The 17 full papers were carefully reviewed. Each one represents an important contribution to the study of intrusion detection. Papers cover anomaly detection, attacks, system evaluation and threat assessment, malware collection and analysis, anomaly- and specification-based detection, and network intrusion detection.

Get started with NMAP, OpenVAS, and Metasploit in this short book and understand how NMAP, OpenVAS, and Metasploit can be integrated with each other for greater flexibility and efficiency. You will begin by working with NMAP and ZENMAP and learning the basic scanning and enumeration process. After getting to know the differences between TCP and UDP scans, you will learn to fine tune your scans and efficiently

## Read PDF Metasploit Framework User Guide

use NMAP scripts. This will be followed by an introduction to OpenVAS vulnerability management system. You will then learn to configure OpenVAS and scan for and report vulnerabilities. The next chapter takes you on a detailed tour of Metasploit and its basic commands and configuration. You will then invoke NMAP and OpenVAS scans from Metasploit. Lastly, you will take a look at scanning services with Metasploit and get to know more about Meterpreter, an advanced, dynamically extensible payload that is extended over the network at runtime. The final part of the book concludes by pentesting a system in a real-world scenario, where you will apply the skills you have learnt. What You Will Learn Carry out basic scanning with NMAP Invoke NMAP from Python Use vulnerability scanning and reporting with OpenVAS Master common commands in Metasploit Who This Book Is For Readers new to penetration testing who would like to get a quick start on it.

Metasploit Penetration Testing Cookbook

Hands-On Red Team Tactics

The subtle art of using Metasploit 5.0 for web application exploitation

Exam CAS-003

The Penetration Tester's Guide

Information Security and Cryptology -- ICISC 2012

This book constitutes the proceedings of the Sixth Conference on Information and Communication Technologies "TIC. EC" Cuenca, Ecuador, from November 27 to 29, 2019. Considered one of the most important conferences on ICT in Ecuador, together scholars and practitioners from the country and abroad to discuss the development, issues and projections of information and communication technologies in multiples fields of application. The 2019 "TIC.EC" conference was organized by Universidad del Azuay (UDA) and its Engineering School, as well as the Ecuadorian Corporation for the Development of Science and Academia (CEDIA). The book covers the following topics: · Software engineering · Security · Data · Networks · Applied ICTs · Technological entrepreneurship · Links between research and industry · High-impact innovation · Knowledge management and intellectual property

Seven Deadliest Network Attacks identifies seven classes of network attacks and discusses how the attack works, how to accomplish the attack, the risks of the attack, and how to defend against the attack. This book pinpoints the most common and exploits specific to networks, laying out the anatomy of these attacks including how to make your system more secure and discover the best ways to defend against these vicious hacks with step-by-step instruction and learn techniques to make your computer and network impenetrable. The book consists of seven chapters that deal with the following attacks: denial of service; dialing; penetration testing; protocol tunneling; spanning tree attacks; man-in-the-middle; and password replay. These attacks are not mutually exclusive and were chosen because they help illustrate different aspects of network security. The primary

they rely are unlikely to vanish any time soon, and they allow for the possibility of gaining something of interest to money to high-value data. This book is intended to provide practical, usable information. However, the world of networking is evolving very rapidly, and the attack that works today may (hopefully) not work tomorrow. It is more important, therefore, to understand the principles on which the attacks and exploits are based in order to properly plan either a network attack or a network defense. *Seven Deadliest Network Attacks* will appeal to information security professionals of all levels, network admins, and hackers. Knowledge is power, find out about the most dominant attacks currently waging war on computers and networks. Discover the best ways to defend against these vicious attacks; step-by-step instruction shows you how to make your network don't be caught defenseless again, and learn techniques to make your computer and network impenetrable. *The Laboratory Manual* is a valuable tool designed to enhance your lab experience. Lab activities, objectives, materials, step procedures, illustrations, and review questions are commonly found in a Lab Manual. Important Notice: Media referenced within the product description or the product text may not be available in the ebook version.

NOTE: The name of the exam has changed from CSA+ to CySA+. However, the CSO-001 exam objectives are exactly the same as the exam that the book was printed with CSA+ in the title, CompTIA changed the name to CySA+. We have corrected the title to CySA+ in subsequent book printings, but earlier printings that were sold may still show CSA+ in the title. Please rest assured that the content is 100% the same. Prepare yourself for the newest CompTIA certification *The CompTIA Cybersecurity Analyst Study Guide* provides 100% coverage of all exam objectives for the new CySA+ certification. The CySA+ certification tests a candidate's skills to configure and use threat detection tools, perform data analysis, identify vulnerabilities with a goal of protecting organizations systems. Focus your review for the CySA+ with Sybex and benefit from real-world examples from experts, hands-on labs, insight on how to create your own cybersecurity toolkit, and end-of-chapter review questions to gauge your understanding each step of the way. You also gain access to the Sybex interactive learning environment, electronic flashcards, a searchable glossary, and hundreds of bonus practice questions. This study guide provides the knowledge you need to demonstrate your skill set in cybersecurity. Key exam topics include: Threat management Vulnerability management Cyber incident response Security architecture and toolsets

*Guide to Network Security*

*Information and Communication Technologies of Ecuador (TIC.EC)*

*Seven Deadliest Network Attacks*

*The Complete Metasploit Guide*

*Penetration Testing: A Survival Guide*

*CompTIA CySA+ Study Guide*

This comprehensive exam guide offers 100% coverage of every topic on the CompTIA PenTest+ exam. Get complete coverage of all the objectives included on the CompTIA PenTest+ certification exam PT0-001 from this comprehensive resource. Written by an expert penetration tester, the book provides learning objectives at the beginning of each chapter, hands-on exercises, exam tips, and practice questions with in-depth answer explanations. Designed to help you pass the exam with ease, this definitive volume also serves as an essential on-the-job reference. Covers all exam topics, including:

- Pre-engagement activities
- Getting to know your targets
- Network scanning and enumeration
- Vulnerability scanning and analysis
- Mobile device and application testing
- Social engineering
- Network-based attacks
- Wireless and RF attacks
- Web and database attacks
- Attacking local operating systems
- Physical penetration testing
- Writing the pen test report

And more. Online content includes:

- Interactive performance-based questions
- Test engine that provides full-length practice exams or customized quizzes by chapter or by exam domain

Requiring no prior hacking experience, *Ethical Hacking and Penetration Testing Guide* supplies a complete introduction to the steps required to complete a penetration test, or ethical hack, from beginning to end. You will learn how to properly utilize and interpret the results of modern-day hacking tools, which are required to complete a penetration test. The book covers a wide range of tools, including Backtrack Linux, Google reconnaissance, MetaGooFil, dig, Nmap, Nessus, Metasploit, Fast Track Autopwn, Netcat, and Hacker Defender rootkit. Supplying a simple and clean explanation of how to effectively utilize these tools, it details a four-step methodology for conducting an effective penetration test or hack. Providing an accessible introduction to penetration testing and hacking, the book supplies you with a fundamental understanding of offensive security. After completing the book you will be prepared to take on in-depth and advanced topics in hacking and penetration testing. The book walks you through each of the steps and tools in a structured, orderly manner allowing you to understand how the output from each tool can be fully utilized in the subsequent phases of the penetration test. This process will allow you to clearly see how the various tools and phases relate to each other. An ideal resource for those who want to learn about ethical hacking but don't know where to start, this book will help take your hacking skills to the next level. The topics described in this book comply with international standards and with what is being taught in international certifications.

Discover the next level of network defense and penetration testing with the Metasploit 5.0 framework. Key Features:

- Make your network robust and resilient with this updated edition covering the latest pentesting techniques.
- Explore a variety of entry points to compromise a system while remaining undetected.
- Enhance your ethical hacking skills by performing penetration tests in highly secure environments.

**Book Description**

Updated for the latest version of Metasploit, this book will prepare you to face everyday cyberattacks by simulating real-world scenarios. Complete with step-by-step explanations of essential concepts and practical examples, *Mastering Metasploit* will help you gain insights into programming Metasploit modules and carrying out exploitation, as well as building and porting various kinds of exploits in Metasploit. Giving you the ability to perform tests on different services, including databases, IoT, and mobile, this Metasploit book will help you get to grips with real-world, sophisticated scenarios where performing penetration tests is a challenge. You'll then learn a variety of methods and techniques to evade security controls deployed at a target's endpoint. As you advance, you'll script automated attacks using CORTANA and Armitage to aid penetration testing by developing virtual bots and discover how you can add custom functionalities in Armitage. Following real-world case studies, this book will take you on a journey through client-side attacks using Metasploit and various scripts built on the Metasploit 5.0 framework. By the end of the book, you'll have developed the skills you need to work confidently with efficient exploitation techniques. What you will learn:

- Develop advanced and sophisticated auxiliary, exploitation, and post-exploitation modules.
- Learn to script automated attacks.

using CORTANATest services such as databases, SCADA, VoIP, and mobile devicesAttack the client side with highly advanced pentesting techniquesBypass modern protection mechanisms, such as antivirus, IDS, and firewallsImport public exploits to the Metasploit FrameworkLeverage C and Python programming to effectively evade endpoint protectionWho this book is for If you are a professional penetration tester, security engineer, or law enforcement analyst with basic knowledge of Metasploit, this book will help you to master the Metasploit framework and guide you in developing your exploit and module development skills. Researchers looking to add their custom functionalities to Metasploit will find this book useful. As Mastering Metasploit covers Ruby programming and attack scripting using Cortana, practical knowledge of Ruby and Cortana is required.

Explore effective penetration testing techniques with Metasploit

Exam: 312-50

With NMAP, OpenVAS and Metasploit

CISSP Study Guide

Ethical Hacking and Penetration Testing Guide