



PHISHING

DDOS

HACKER

MALWARE

DDOS

VIRUS

KEYLOGGER

SPYWARE

Secret of pro hackers:

EAT

SLEEP

HACK

REPEAT

Cool isn't it???

# What is Hacking?

Hacking generally refers to unauthorized intrusion into a computer or a network.

<In other words>

Hacking is identifying weakness in computer systems or networks to exploit its weaknesses to gain access.

## Who is a Hacker?

Hackers are intelligent individuals who spends most of time exploring computing resources like networks, websites, mobile devices etc.

# What is Ethical Hacking?

Ethical Hacking is identifying weakness in computer systems and/or computer networks and coming up with countermeasures that protect the weaknesses.

## Who is an Ethical Hacker?

Ethical Hacker is a Computer and Network Expert, who tries to find out potential vulnerabilities on the target systems before a hacker could use, without actually doing any harm to the information systems on behalf of the owners of the IT Assets.



Another one got caught today, it's all over the papers "Teenager Arrested in Computer Crime Scandal",  
"Hacker Arrested after Bank Tampering"... *Damn kids. They're all alike.*

But did you, in your three-piece psychology and 1950's technobrain, ever take a look behind the eyes of the hacker?

Did you ever wonder what made him tick, what forces shaped him, what may have molded him?

I am a hacker, enter my world...

Mine is a world that begins with school... I'm smarter than most of the other kids, this crap they teach  
is bores me... *Damn underachiever. They're all alike.*

I'm in junior high or high school. I've listened to teachers explain for the fifteenth time how to  
reduce a fraction. I understand it. "No, Ms. Smith, I didn't show my work. I did it in my head..." *Damn kid. Probably copied it.*

I made a discovery today. I found a computer. wait a second, this is cool. It does what I want it to. If it makes a mistake, it's  
because I screwed it up. Not because it doesn't like me... *They're all alike.*

Or feels threatened by me... *Damn kid. And then it happened... a door opened to a*

Or thinks I'm a smart-ass... *All he does is play games. world... rushing through the phone line like*

Or doesn't like teaming up with bullies... *like heroin through an addict's veins, an elec-*

I know everyone here... even if I've never met them... never talked to them... *Or doesn't like teaming up with bullies... a refuge from the*

may never hear from them again... I know you all... *day-to-day incompetencies is sought... a*

(What, Why, How)

*board is found."This is it... this is*  
*Damn kid, hanging up the phone line again. where I belong..."*  
*They're all alike...*

You bet your ass we're all alike... *we've been spoon-fed baby food at school when we hungered for steak... the bits*  
of meat that you did let slip through were pre-chewed and tasteless. We've been dominated by sadists, or ignored by the apathetic. The few that had something to teach found us  
willing pupils, but those few are like drops of water in the desert. This is our world now... the world of the electron and the switch, the beauty of the baud.  
We make use of a service already existing without paying for what could be dirt-cheap if it wasn't run by profiteering gluttons,  
and you call us criminals. We explore... and you call us criminals. we seek after knowledge... and you call us criminals. We exist  
without skin color, without nationality, without religious bias... and you call us criminals. You build atomic bombs, you wage  
wars, you murder, cheat, and lie to us and try to make us believe it's for our own good, yet we're the criminals.

*Yes, I am a criminal.*

My crime is that of curiosity. My crime is that of judging people by what they say and think, not what they look like.

My crime is that of outsmarting you, something that you will never forgive me for.

I am a hacker, and this is my manifesto.

You may stop this individual, but you can't stop us all... after all, we're all alike.

**What?**

What you'll learn in Ethical Hacking?  
What happens if we don't secure our PC?

**Why?**

Why should we practice Ethical Hacking?  
Why should we Secure our information?

**How?**

How to perform a Hack?  
How to secure our PC?

W<sup>1</sup>

**What** we'll learn in this course?

What is Ethical hacking?

Why is Ethical Hacking necessary?

How to hack into a system or a network which is vulnerable?

**What** happens if we don't secure our PC?

You'll be a victim of bad things that happen in the digital world... ☹️





**What** your friends think once you complete this course .....



W<sup>2</sup>

# Why is Ethical Hacking necessary?

To crack a hacker you need to think like a hacker!!

For an attack there should be a counter attack! When your PC is under attack you should be able to counter that attack and protect your information, this is the basic necessity of Ethical Hacking.

- ✓ To Prevent hackers from gaining access to information breaches.
- ✓ To fight against terrorism and national security breaches.
- ✓ To build a system that avoids hackers from penetrating.
- ✓ To test if organization's security settings are in fact secure.

**Why** should we protect our information?

As we know information is wealth in present day scenario!!

Details of Credit card numbers stored in your electronic devices.

Details of Bank Account stored in your electronic devices.

Your personal information related job or personal life store on your electronic

devices will be at stake if you don't protect your information.

**How** to Hack into a System?

**How** to Secure our Information?

In the course.....

# Terminology

**Vulnerability:** In simple words, a vulnerability is loop hole, Limitation, or weakness that becomes a source for an attacker to enter into the system.

**Exploit:** It is a software tool designed to take advantage of a flaw(vulnerability) in a computer system, typically for malicious purposes such as installing malware or cause denial of service.

**Payload:** A payload is an action or set of action has to be done on the target, once the exploit successfully launched. It can be any kind of control, or Denial of service etc.



# **What** are the steps to perform a Hack?

Information Gathering

Scanning

Gaining Access

Maintaining Access

Clearing Tracks/ Reporting

# What is Information Security

**Information security**, sometimes shortened to **InfoSec**, is the practice of preventing unauthorized access, (use, disclosure, disruption, modification, inspection, recording or destruction of information).

**Information security's** primary focus is the balanced protection of the confidentiality, integrity and availability of data (also known as the CIA triad) while maintaining a focus on efficient policy implementation, all without hampering organization productivity.



Mode	VM → Host	HOST → VM	VM1 ↔ VM2	VM→ NET/LAN	NET/LAN→VM
Host-Only	✓	✓	✓	✗	✗
Internal	✗	✗	✓	✗	✗
Bridged	✓	✓	✓	✓	✓
NAT	✓	Port Forward	✗	✓	Port Forward
Nat Network	✓	Port Forward	✓	✓	Port Forward