



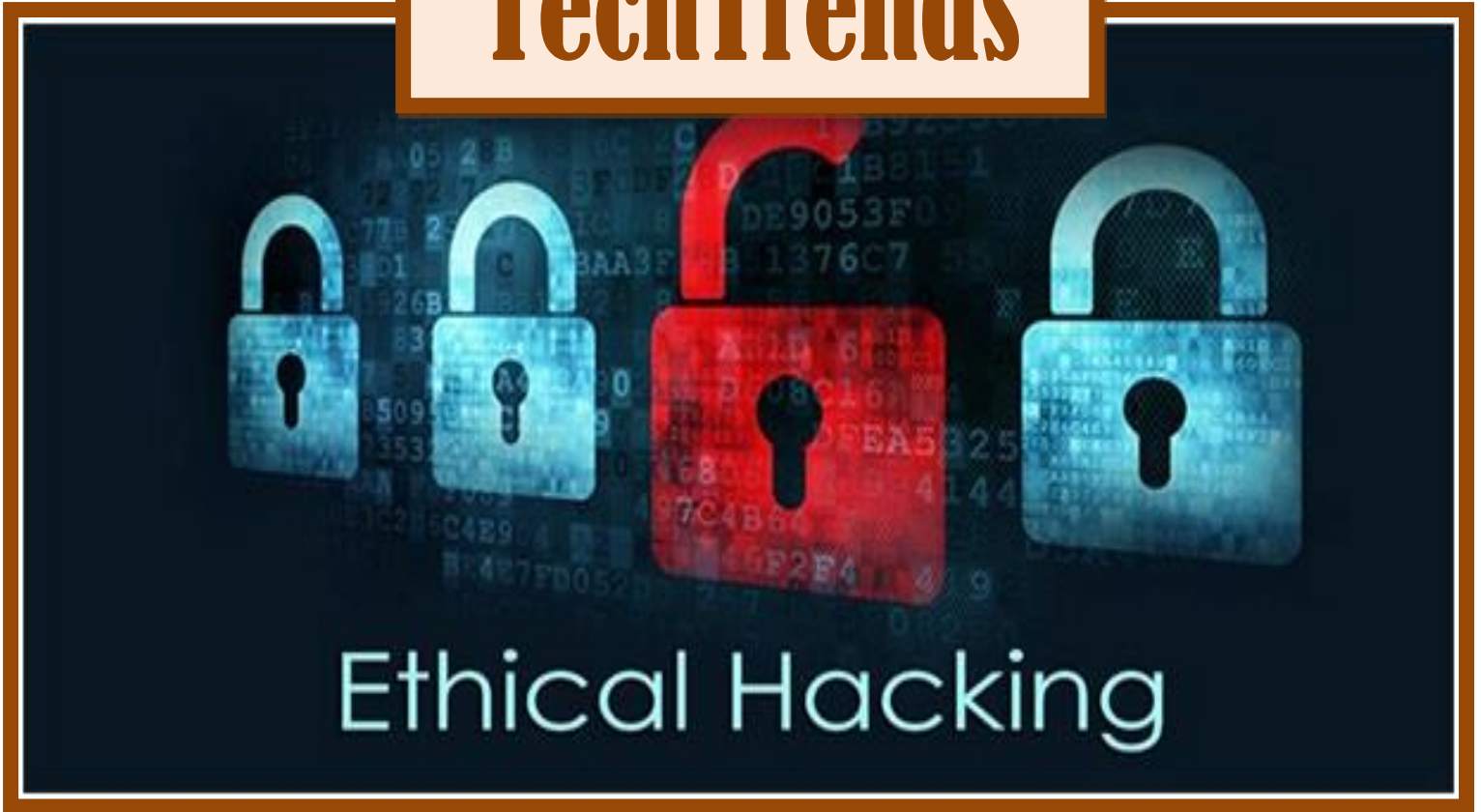
Department of Computer Engineering

Government Polytechnic for Girls, Surat

August-2020 : Vol.-11

TechTrends

E-Newsletter



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To empower girls of diploma computer engineering to excel in IT Industries and serve the society.

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What is Ethical Hacking?

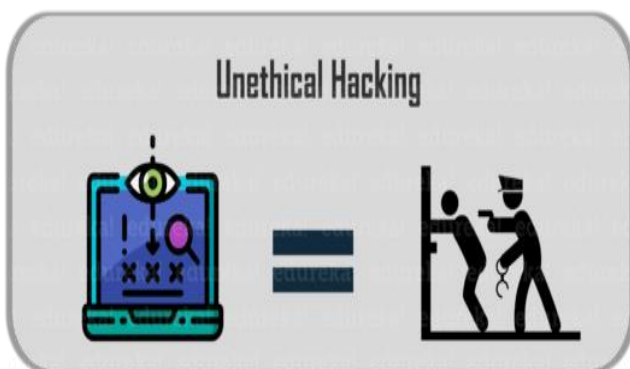


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What is Ethical Hacking?

Hacking is the process of finding vulnerabilities in a system and using these found vulnerabilities to gain unauthorized access into the system to perform malicious activities ranging from deleting system files to stealing sensitive information. Hacking is illegal and can lead to extreme consequences if you are caught in the act.

Hacking can be legal if done with permission. Computer experts are often hired by companies to hack into their system to find vulnerabilities and weak endpoints so that they can be fixed. This is done as a precautionary measure against legitimate hackers who have malicious intent. Such people, who hack into a system with permission, without any malicious intent, are known as *ethical hackers* and the process is known as *ethical hacking*.



What are the types of Hackers?

Hackers can be segregated according to their intent.

- White Hat Hacker



It is another name for an Ethical Hacker. They hack into a system with prior permission to find out vulnerabilities so that they can be fixed before a person with malicious intent finds them.

- Black Hat Hacker



They are also known as crackers, who hack in order to gain unauthorized access to a system & harm its operations or steal sensitive information. It's always illegal because of its malicious intent which includes stealing corporate data, violating privacy, damaging the system etc.

- Grey Hat Hacker



They are a blend of both black hat and white hat hackers. They mostly hack for fun and exploit a security weakness in a computer system or network without the owner's permission or knowledge. Their intent is to bring the weakness to the attention of the owners & earning some bug bounty.

- Suicide Hacker



A suicide hacker is a person who works with the intent to bring down major corporations and infrastructure. These kinds of hackers are not scared of the consequences of their actions as they mostly work with a vengeance in their mind. These people are also known as hacktivists.

What are the different types of hacking?

Hacking into different types depending on what the hacker is trying to achieve.

- Website Hacking



Hacking a website means taking unauthorized control over a web server and its associated software such as databases and other interfaces.

- Network Hacking



Hacking a network means gathering information about a network by using tools like Telnet, NS lookup, Ping, Tracert, Netstat, etc. with the intent to harm the network system and hamper its operation.

- Email Hacking



This includes gaining unauthorized access to an Email account and using it without taking the consent of its owner for sending out spam links, third-party threats, and other such harmful activities.

- Password Hacking



This is the process of recovering secret passwords from data that has been stored in or transmitted by a computer system.

- Computer Hacking



This is the process of stealing computer ID and password by applying hacking methods and getting unauthorized access to a computer system.

Importance of Ethical Hacking

- Helps to maintain privacy & full control.
- Helps to find system flaws and thereby avoiding leaking sensitive information to Crackers.
- Since, computers are getting accessible to more and more people, ethical hacking helps to maintain and strengthen computer security.
- Get appointed at esteemed government as well as multi-national organizations.

Hacker's Skill Set

Knowledge about:

- | | |
|--|---|
| <ul style="list-style-type: none">• Network Protocols like HTTP, HTTPS• Authentication Techniques• Firewall Architecture, Port Details• Network Architectures | <ul style="list-style-type: none">• Web Server Configurations• Web Application Structures• Database Setups with Client-Server |
|--|---|

What are Hacking Tools?

Hacking tools are software applications designed to serve one or several specific purposes to hack/crack. These are used to make complex hacking procedures, easy-to-use and nowadays, also offer good GUI to help beginners in Ethical Hacking.

Types of Hacking tools

- 1) Vulnerability Scanners
- 2) Port Scanners
- 3) Web Application Scanners
- 4) Password Cracking Tools
- 5) Packet Sniffers

Password Cracking Tool

Password cracking is the process of guessing or recovering a password from stored locations or from data transmission system. It is used to get a password for unauthorized access or to recover a forgotten password. In penetration testing, it is used to check the security of an application.

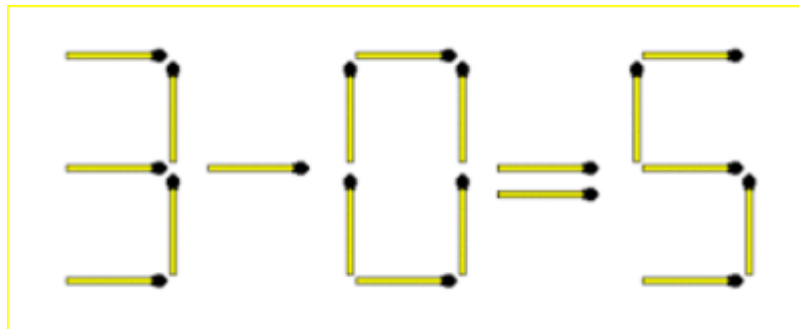
Computer programmers have been trying to create algorithms for password cracking in less time. Most of the password cracking tools try to login with every possible combination of words. If login is successful, it means the password was found. If the password is strong enough with a combination of numbers, characters and special characters, this cracking method may take hours to weeks or months. A few password cracking tools use a dictionary that contains passwords. These tools are totally dependent on the dictionary, so success rate is lower.

- | | | |
|------------------|---------------------|-------------|
| 1) Brutus. | 4) Cain & Abel. | 7) Medusa. |
| 2) RainbowCrack. | 5) John the Ripper. | 8) OphCrack |
| 3) Wfuzz. | 6) THC Hydra. | |



QUIZ (11)

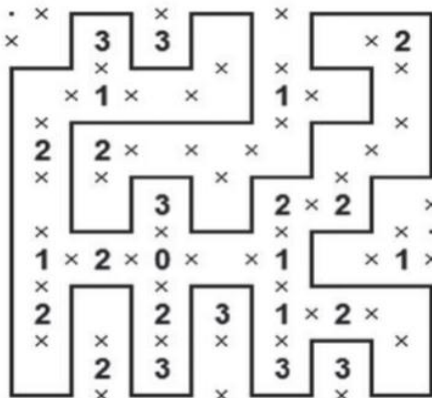
Q. 1 Can you add two matches to make the equation true?



Q. 2 I have cities, but no houses. I have mountains, but no trees. I have water, but no fish. What am I?

Answer of Last Quiz (10)

Q. 1



Q. 2

D

Starting at top left of first figure and moving in Z shape, letter values increase by 2, then 3 and 4,5,6 to reach the top figure in next diagram so the answer is D.

मेरे यारों
ये साथका पल,
अब एक दास्तां
ये बदल रहा....
आ गया वो मोड़ जिस में
अलविदा कहना पड़ रहा.....
क्लास और कैंटिनवाली
कहानी होगी मंजिलें
और अलग होगा रास्ता.....
कैंपसकी वोसीरिया
जमती जहां थी महफिलें.....
वो सीढ़ियोंका स्टेजभी
अब खाली करना पड़ रहा.....
आ गया वो मोड़ जिसमें
अलविदा कहना पड़ रहा.....
बच्चे ही थेन जब आये थे
ये पलभी कैसे ढल गये.....
हाथ में डिग्री मिली
और....हम सब सयाने हो गये
सेमेस्टर के एग्जाम सेशनल
सब कितने जल्दी हो गए
एक पल में अरसा गुजरनेका

ये दौरभी अब थम रहा.....
आ गया वो मोड़ जिसमें
अलविदा कहना पड़ रहा.....
मेरें दोस्तों ठीकसे देखलो
कहीं कूछ छूटा नहीं....
कहीं तुम्हारी वजह से
किसी का दिल रुठा न हो.....
भूलकर सब रंजिशें
गले मिल लो फिरसे....
मिलने का वादा करलो.....
क्योंकि जा रहाहै वक्तजो
वो दोबारा आने से रहा.....
दिल साम आंखें पोंछकर
अलविदा कहना पड़ रहा.....
अलविदा कहना पड़ रहा.....
मेरे यारों
ये साथ का पल,
अब एक दास्तां
ये बदल रहा....
आ गया वो मोड़ जिसमें
अलविदा कहना पड़ रहा.....
अलविदा कहना पड़ रहा.....



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