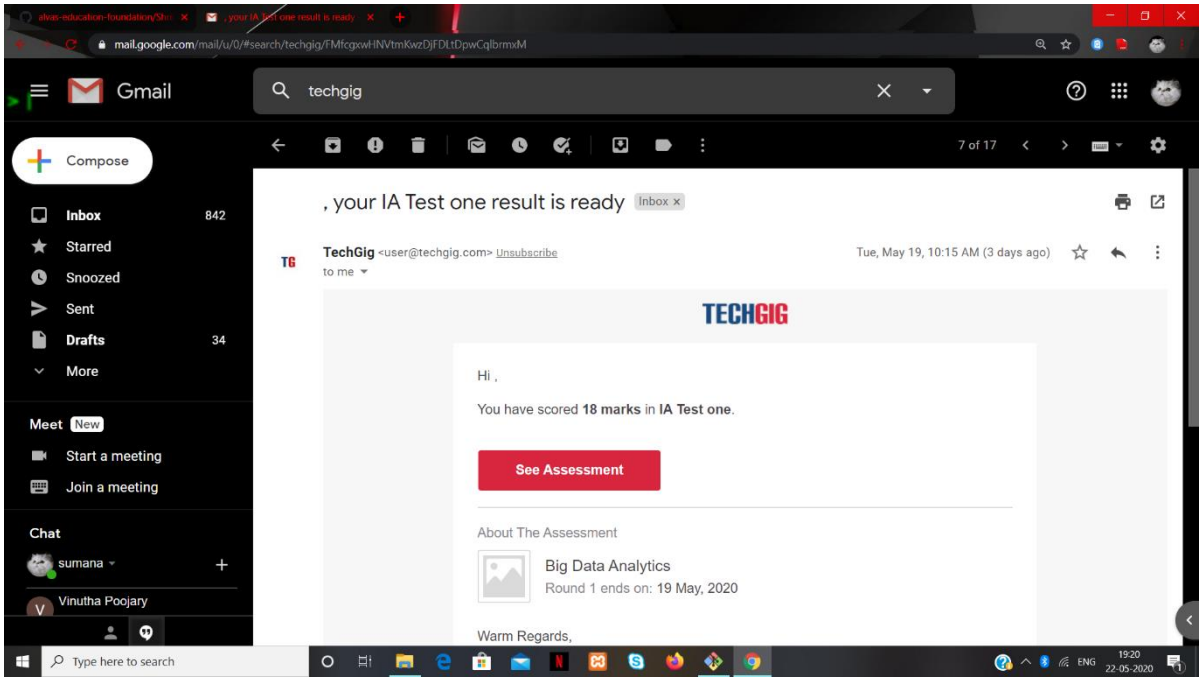
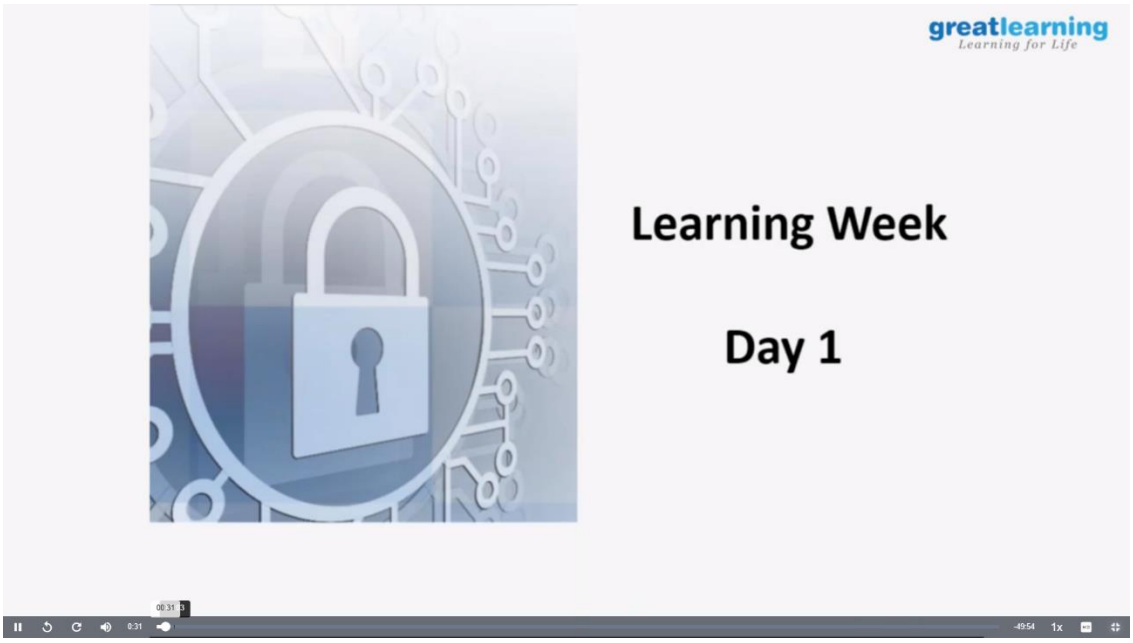
DAILY ONLINE ACTIVITIES SUMMARY

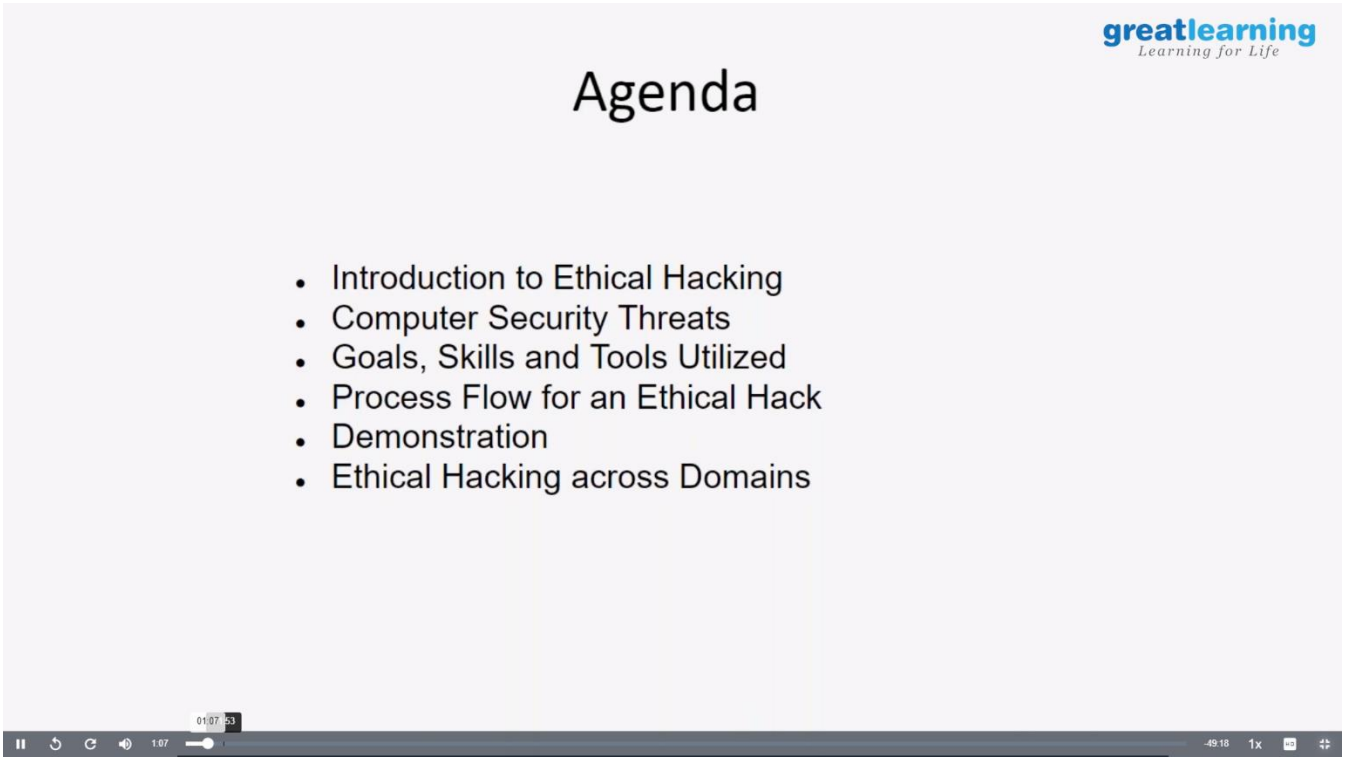
Date:	**19/5/2020**	**Name:**	**Sumana**
Sem & Sec	**8th Sem B**	**USN:**	**4AL16CS107**
Online Test Summary			
Subject	**Big Data Analytics**		
Max. Marks	**30**	**Score**	**18**
Certification Course Summary			
Course	**Introduction to Ethical Hacking**		
Certificate Provider	**greatlearning.in**	**Duration**	**6 hrs**
Coding Challenges			
Problem Statement: To add some letters for a given word or letter then to find the shortest palindrome possible **To check whether the given linked list is palindrome or not**			
Status: Completed			
Uploaded the report in Github	**Yes**		
If yes Repository name	**Alvas-education-foundation/Sumana**		
Uploaded the report in slack	**yes**		

Online Test Details:



Certification Course Details:





Coding Challenges Details:

C program to implement various operations of SLL Stack :

PROGRAM 1 :

```
package shortestpalindromeexample.java;

 import java.util.Scanner;

public class ShortestPalindromeDemo {

public static String shortestPalindrome(String str)

 {

int x=0;

 int y=str.length()-1;

 while(y>=0)

{
```

```
if(str.charAt(x)==str.c harAt(y))
{
 x++;
 }
 y--;
 }
 if(x==str.length())
 return str;
 String suffix = str.substring(x);
 String prefix = new StringBuilder(suffix).reverse().toString();
 String mid = shortestPalindrome(str.substring(0, x));
 return prefix+mid+suffix;
 }
 public static void main(String[] args)
 {
 Scanner in = new Scanner(System.in);
System.out.println("Enter a String to find out shortest palindrome");
String str=in.nextLine();
 System.out.println("Shortest palindrome of "+str+" is "+shortestPalindrome(str));
 }
```

Prog 2:

```
 import java.util.Stack;
 class Node
 {
 int data;
Node next;
 Node(int i)
 {
 this.data = i;
 this.next = null;
 }
};
 class Main
 {
 public static boolean isPalindrome(Node head)
 {
Stack s = new Stack<>();
Node node = head;
// push
 while (node != null)
{
 s.push(node.data);
```

```
 node = node.next;
}
 // traverse
node = head;
while (node != null)
{
 int top = s.pop();
 //pop
if (top != node.data)
{
return false;
 }
 node = node.next;
 }
 return true;
 }
 public static void main(String[] args)
 {
 Node head = new Node(1);
 head.next = new Node(2);
head.next.next = new Node(3);
```

```
 head.next.next.next = new Node(2);

 head.next.next.next.next = new Node(1);

 if (isPalindrome(head))

{

 System.out.print("Linked List is a palindrome.");

}

Else

 {

 System.out.print("Linked List is not a palindrome.");

}

 }

 }
```