NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2015-2016

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	08
7			Study Material	11
8			Topics Covered	21
9			Photo	22

NAVODAYA
INSTITUTE OF
TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-2016

NET's

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

SHORT TERM TRAINING PROGRAMME

1.	ACADEMIC YEAR	2015-2016
2.	TYPE OF THE PROGRAMME PROPOSED	Computing Skill
3.	TITLE OF THE PROGRAMME	Core Java programming
4.	BROAD OBJECTIVE OF THE PROGRAMME	To enhance student to understand the Java programming.
5.	NAME OF THE DEPARTMENT	CSE, EEE, ECE
6.	TARGETED GROUP OF STUDENTS	Second and Third Year
7.	DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR	09 hrs
8.	NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME	03 days
9.	PROPOSED DATE AND DURATION OF THE PROGRAMME	10/10/2015, 17/09/2015, 24/09/2015
10.	TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME	09 hrs
11.	NUMBER OF HOURS REQUIRED PER DAY	03 hrs
12.	LOCATION DETAILS	NIT Auditorium
13.	MINIMUM NUMBER OF PARTICIPANTS	70
14.	DETAILS OF RESOURCE PERSONS	Mr. Sandeep k, Mr. Chetan Gudi
15.	EVENT ORGANISERS(STUDENTS)	Jayteerth,Apoorva
16.	FACULTY COORDINATOR	Mr. Chetan Gudi
17.	PROGRAMME PROPOSED BY	CSE Department

Coordinator 24/09/15

HOD 24/09/15

PRINCIPAL 24/9/15
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

Shivareddy SIR

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

To,   **Date: 07.09.2015**

The Principal

NIT, Raichur

Subject: Approval of training program and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2015-2016

Respected Sir,

This is with respect to the approval of training program on Core Java Programming and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2015-2016. Following are the details.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Mr. Sandeep K	B. Tech	Computer Science	1 Years	10/10/2015 17/10/2015 24/10/2015
III	Mr.Chetan Gudi	M. Tech	Computer Science	4 Years	10/10/2015 17/10/2015 24/10/2015

I request you to approve for the same. Thanking you in anticipation.

forwarded to principal sir,

Yours Sincerely,

Coordinator

Head of Departme..
omputer Science & Engineeri..
ivodaya Institute of Technolog
RAICHUR-584 10'

PRINCIPAL
Navodaya Ins... ... of Technology (NIT)
RAICHUR-584 103

NET/NIT/PO/CIR/2015-16/ 01   08/10/2015

CIRCULAR

The HOD of ECE and EEE department are here by informed that department of CSE is organizing training sessions for all the II & III year students of CSE, ECE, and EEE departments. The training sessions on Core Java programming will be conducted as per the following schedule. All the students should attend the training class without fail.

Session – 1 : 10/10/2015 – Time: 2.00pm to 5.00pm

Session – 2 : 17/10/2015 – Time: 2.00pm to 5.00pm

Session – 3 : 24/10/2015 – Time: 2.00pm to 5.00pm

Coordinator

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR - 584 101

Copy to,

1) Notice Board
2) HOD's – CSE, ECE, EEE
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting Core Java Programming training classes to all the II & III year students of CSE, ECE, EEE departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Mr. Sandeep K	B. Tech	Computer Science	1 Years	10/10/2015 17/10/2015 24/10/2015
III	Mr.Chetan Gudi	M. Tech	Computer Science	4 Years	10/10/2015 17/10/2015 24/10/2015

Coordinator

HOD

Head of Department
Computer Science & Engineer
Navodaya Institute of Technology
586 10

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-16

SHORT TERM PROGRAM OF COMPUTING SKILLS ON CORE JAVA

PROGRAMMING

STUDENT ENROLLMENT LIST (CSE)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA14CS002	BHAGYASHREE T
2	3NA14CS004	K N SHARANA BASAVA
3	3NA14CS006	MOHD SALMAN
4	3NA14CS007	NAZIYA SULTANA
5	3NA14CS013	VANDANA TOTAGANTI
6	3NA14CS016	APOORVA N
7	3NA13CS024	JAITHEERTH
8	3NA15CS400	PAVAN KUMAR
9	3NA15CS401	POOJA GOGI
10	3NA13CS003	AMARESH DESAI
11	3NA13CS004	BALARAJ
12	3NA13CS007	FAKEERGOUDA
13	3NA13CS010	LAXMI

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA13CS002	AKSHATHA K NAGRAJ
2	3NA13CS005	BASSAMMA
3	3NA13CS008	FARHA NAAZ N
4	3NA13CS009	FARHEEN SULTANA
5	3NA13CS011	MANJULA
6	3NA13CS012	MEGHA G
7	3NA13CS015	REKHA
8	3NA13CS016	RUBIYA NAAZ
9	3NA13CS017	SANIYA TABASUM

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-16

SHORT TERM PROGRAM OF COMPUTING SKILLS ON CORE JAVA PROGRAMMING

STUDENT ENROLLMENT LIST (EEE)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA13EE003	CHAITANYA M.S.
2	3NA14EE001	ANAGHA DESAI
3	3NA14EE002	ASIMA NIKHAT
4	3NA14EE004	BIRU NAVALLI WAGHMODE
5	3NA14EE005	HANAMANT DHOOLSHETTI
6	3NA14EE006	M SHAKEER AHMED
7	3NA14EE009	RUKSANA BEGUM
8	3NA14EE010	SANIYA AYESHA L
9	3NA14EE011	SEEMA
10	3NA14EE012	SHANTHI

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA13EE001	B.N. POOJA
2	3NA13EE004	MUBASHIRA MOHAMMEDI
3	3NA13EE006	NAZIA BEGUM
4	3NA13EE009	RAKSHIT
5	3NA13EE010	SAMPRETH D.
6	3NA13EE012	SUNIL
7	3NA13EE013	SUNIL KUMAR
8	3NA13EE014	SYEDA SUMIYA ANJUM
9	3NA13EE015	VIJAYALAXMI
10	3NA14EE401	ANILKUMAR SHIVASHANKAR
11	3NA14EE403	ARUNKUMAR T. S.

COORDINATOR

SHORT TERM PROGRAM OF COMPUTING SKILLS ON CORE JAVA

PROGRAMMING

STUDENT ENROLLMENT LIST (ECE)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA14EC001	AISHWARYA NAIR
2	3NA14EC003	ANUSHA HIREMATH
3	3NA14EC004	BHAVANA B
4	3NA14EC005	CHAITRA M
5	3NA14EC007	HUMERA TAHSEEN
6	3NA14EC008	K VISHNUPRIYA
7	3NA14EC009	MEGHANA
8	3NA14EC010	NIKITA
9	3NA14EC012	SAHANA VAIDYA
10	3NA14EC016	T.N.FARFEEN

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA13EC02	AJMAL FIRDOUS
2	3NA13EC04	ANJANA D
3	3NA13EC05	ANJUM
4	3NA13EC06	BHARATHI
5	3NA13EC07	CHANDRIKA
6	3NA13EC08	DIVYALAKSHMI
7	3NA13EC09	AMANI REDDY
8	3NA13EC010	HUMERA TAMKEEN

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-16

SHORT TERM PROGRAM OF COMPUTING SKILLS ON CORE JAVA
PROGRAMMING
STUDENT ATTENDANCE SHEET (CSE)

Sl No.	USN No.	Name	10/10/2015	17/10/2015	24/10/2015
SECOND YEAR					
1	3NA14CS002	BHAGYASHREE T	*(sign)*	*(sign)*	*(sign)*
2	3NA14CS004	K N SHARANA BASAVA	Sharana	Sharana	Sharana
3	3NA14CS006	MOHD SALMAN	Mdsalman	Mdsalman	Mdsalman
4	3NA14CS007	NAZIYA SULTANA	Naziya	Naziya	Naziya
5	3NA14CS013	VANDANA TOTAGANTI	AB	Vandana	Vandana
6	3NA14CS016	APOORVA N	*(sign)*	*(sign)*	*(sign)*
7	3NA13CS024	JAITHEERTH	Jai	Jai	Jai
8	3NA15CS400	PAVAN KUMAR	Pavan	Pavan	Pavan
9	3NA15CS401	POOJA GOGI	Pooja	Pooja	Pooja
10	3NA13CS003	AMARESH DESAI	*(sign)*	*(sign)*	*(sign)*
11	3NA13CS004	BALARAJ	Balaraj	Balaraj	Balaraj
12	3NA13CS007	FAKEERGOUDA	Fakee	Fakee	Fakee
13	3NA13CS010	LAXMI	*(sign)*	*(sign)*	*(sign)*
THIRD YEAR					
1	3NA13CS002	AKSHATHA K NAGRAJ	*(sign)*	*(sign)*	*(sign)*
2	3NA13CS005	BASSAMMA	Basamma	AB	Basamma
3	3NA13CS008	FARHA NAAZ N	*(sign)*	*(sign)*	*(sign)*
4	3NA13CS009	FARHEEN SULTANA	AB	Farhan	Farhan
5	3NA13CS011	MANJULA	*(sign)*	*(sign)*	*(sign)*
6	3NA13CS012	MEGHA G	Megha	Megha	Megha
7	3NA13CS015	REKHA	*(sign)*	*(sign)*	*(sign)*
8	3NA13CS016	RUBIYA NAAZ	*(sign)*	*(sign)*	*(sign)*
9	3NA13CS017	SANIYA TABASUM	*(sign)*	*(sign)*	*(sign)*

Coordinator

SHORT TERM PROGRAM OF COMPUTING SKILLS ON CORE JAVA

PROGRAMMING

STUDENT ATTENDANCE SHEET (EEE)

SECOND YEAR

Sr. No.	USN Number	Name	10/10/2015	17/10/2015	24/10/2015
1	3NA13EE003	CHAITANYA M.S.			
2	3NA14EE001	ANAGHA DESAI			
3	3NA14EE002	ASIMA NIKHAT			
4	3NA14EE004	BIRU NAVALLI WAGHMODE		AB	
5	3NA14EE005	HANAMANT DHOOLSHETTI			
6	3NA14EE006	M SHAKEER AHMED			
7	3NA14EE009	RUKSANA BEGUM			
8	3NA14EE010	SANIYA AYESHA L			
9	3NA14EE011	SEEMA			
10	3NA14EE012	SHANTHI			

THIRD YEAR

Sr. No.	USN Number	Name	10/10/2015	17/10/2015	24/10/2015
1	3NA13EE001	B.N. POOJA			
2	3NA13EE004	MUBASHIRA MOHAMMEDI			
3	3NA13EE006	NAZIA BEGUM			
4	3NA13EE009	RAKSHIT			
5	3NA13EE010	SAMPRETH D.			
6	3NA13EE012	SUNIL			
7	3NA13EE013	SUNIL KUMAR			
8	3NA13EE014	SYEDA SUMIYA ANJUM			
9	3NA13EE015	VIJAYALAXMI			
10	3NA14EE401	ANILKUMAR SHIVASHANKAR			
11	3NA14EE403	ARUNKUMAR T. S.			

Coordinator

SHORT TERM PROGRAM OF COMPUTING SKILLS ON CORE JAVA

PROGRAMMING

STUDENT ATTENDANCE SHEET (ECE)

SECOND YEAR

Sr. No.	USN Number	Name	10/10/2015	17/10/2015	24/10/2015
1	3NA14EC001	AISHWARYA NAIR	*(sign)*	*(sign)*	*(sign)*
2	3NA14EC003	ANUSHA HIREMATH	AHR	AHR	AHR
3	3NA14EC004	BHAVANA B	*(sign)*	*(sign)*	*(sign)*
4	3NA14EC005	CHAITRA M	*(sign)*	*(sign)*	*(sign)*
5	3NA14EC007	HUMERA TAHSEEN	Humera	Humera	Humera
6	3NA14EC008	K VISHNUPRIYA	vishnupriya	AB	vishnupriya
7	3NA14EC009	MEGHANA	*(sign)*	*(sign)*	*(sign)*
8	3NA14EC010	NIKITA	Niki	Niki	Niki
9	3NA14EC012	SAHANA VAIDYA	Sahana	Sahana	Sahana
10	3NA14EC016	T.N.FARFEEN	Farl	Farl	Farl

THIRD YEAR

Sr. No.	USN Number	Name	10/10/2015	17/10/2015	24/10/2015
1	3NA13EC02	AJMAL FIRDOUS	AB	Ajmal	AB
2	3NA13EC04	ANJANA D	*(sign)*	*(sign)*	*(sign)*
3	3NA13EC05	ANJUM	Anjum	Anjum	Anjum
4	3NA13EC06	BHARATHI	*(sign)*	*(sign)*	*(sign)*
5	3NA13EC07	CHANDRIKA	Chandrika	Chandrika	Chandrika
6	3NA13EC08	DIVYALAKSHMI	Divya	Divya	Divya
7	3NA13EC09	AMANI REDDY	*(sign)*	*(sign)*	*(sign)*
8	3NA13EC010	HUMERA TAMKEEN	Humera	Humera	Humera

Coordinator

Core Java Programming (Tips & Tricks)

1. Prefer returning Empty Collections instead of Null

If a program is returning a collection which does not have any value, make sure an Empty collection is returned rather than Null elements. This saves a lot of "*if else*" testing on Null Elements.

```
1 public class getLocationName {
2     return (null==cityName ? "": cityName);
3 }
```

2. Use Strings carefully

If two Strings are concatenated using "+" operator in a "for" loop, then it creates a new String Object, every time. This causes wastage of memory and increases performance time. Also, while instantiating a String Object, constructors should be avoided and instantiation should happen directly. For example:

```
1 //Slower Instantiation
2 String bad = new String("Yet another string object");
3
4 //Faster Instantiation
5 String good = "Yet another string object"
```

3. Avoid unnecessary Objects

One of the most expensive operations (in terms of Memory Utilization) in Java is Object Creation. Thus it is recommended that Objects should only be created or initialized if necessary. Following code gives an example:

```
01 import java.util.ArrayList;
02 import java.util.List;
03
04 public class Employees {
05
06     private List Employees;
07
08     public List getEmployees() {
09
10         //initialize only when required
11         if(null == Employees) {
12             Employees = new ArrayList();
13         }
14         return Employees;
15 }
```

4. Dilemma between Array and ArrayList

Developers often find it difficult to decide if they should go for Array type data structure of ArrayList type. They both have their strengths and weaknesses. The choice really depends on the requirements.

```
01
02
03 import java.util.ArrayList;
04
05 public class arrayVsArrayList {
06     public static void main(String[] args) {
07         int[] myArray = new int[6];
08         myArray[7]= 10; // ArraysOutOfBoundException
09
10         //Declaration of ArrayList. Add and Remove of elements is easy.
11         ArrayList<Integer> myArrayList = new ArrayList<>();
12         myArrayList.add(1);
13         myArrayList.add(2);
14         myArrayList.add(3);
15         myArrayList.add(4);
16         myArrayList.add(5);
17         myArrayList.remove(0);
18
19         for(int i = 0; i < myArrayList.size(); i++) {
20         System.out.println("Element: " + myArrayList.get(i));
21         }
22
23         //Multi-dimensional Array
24         int[][][] multiArray = new int [3][3][3];
25     }
   }
```

1. Arrays have fixed size but ArrayLists have variable sizes. Since the size of Array is fixed, the memory gets allocated at the time of declaration of Array type variable. Hence, Arrays are very fast. On the other hand, if we are not aware of the size of the data, then ArrayList is More data will lead to ArrayOutOfBoundException and less data will cause wastage of storage space.
2. It is much easier to Add or Remove elements from ArrayList than Array
3. Array can be multi-dimensional but ArrayList can be only one dimension.

5. When Finally does not get executed with Try

Consider following code snippet:

```
01 public class shutDownHooksDemo {
02     public static void main(String[] args) {
03         for(int i=0;i<5;i++)
```

```
04              try {
05                  if(i==4) {
06   executing Finally block.");     System.out.println("Inside Try Block.Exiting without
07                      System.exit(0);
08                  }
09              }
10              finally {
11                  System.out.println("Inside Finally Block.");
12          }
13      }
14  }
15
16
```

From the program, it looks like "println" inside *finally* block will be executed 5 times. But if the program is executed, the user will find that *finally* block is called only 4 times. In the fifth iteration, *exit* function is called and *finally* never gets called the fifth time. The reason is-System.exit halts execution of all the running threads including the current one. Even *finally* block does not get executed after *try* when *exit* is executed.

When *System.exit* is called, JVM performs two cleanup tasks before shut down:

First, it executes all the *shutdown hooks* which have been registered with *Runtime.addShutdownHook*. This is very useful because it releases the resources external to JVM.

Second is related to *Finalizers*. Either *System.runFinalizersOnExit* or *Runtime.runFinalizersOnExit*. The use of *finalizers* has been deprecated from a long time. *Finalizers* can run on live objects while they are being manipulated by other threads. This results in undesirable results or even in a deadlock.

```
01  public class shutDownHooksDemo {
02
03      public static void main(String[] args) {
04          for(int i=0;i<5;i++)
05          {
06              final int final_i = i;
07              try {
08                  Runtime.getRuntime().addShutdownHook(
09                      new Thread() {
10                          public void run() {
11   Try Block.Exiting without executing Finally block.");  if(final_i==4) {        System.out.println("Inside
12                              System.exit(0);
13                          }
14                      }
15                  });
16              }
17              finally {
18                  System.out.println("Inside Finally Block.");
19              }
```

(13)

```
20    )
21)
22
23
24
```

6. Check Oddity

Have a look at the lines of code below and determine if they can be used to precisely identify if a given number is Odd?

```
1 public boolean oddOrNot(int num) {
2     return num % 2 == 1;
3 }
```

These lines seem correct but they will return incorrect results one of every four times (Statistically speaking). Consider a negative Odd number, the remainder of division with 2 will not be 1. So, the returned result will be false which is incorrect!

This can be fixed as follows:

```
1 public boolean oddOrNot(int num) {
2     return (num & 1) != 0;
3 }
```

Using this code, not only is the problem of negative odd numbers solved, but this code is also highly optimized. Since, Arithmetic and Logical operations are much faster compared to division and multiplication, the results are achieved faster so in second snippet.

7. Difference between single quotes and double quotes

```
1 public class Haha {
2     public static void main(String args[]) {
3     System.out.print("H" + "a");
4     System.out.print('H' + 'a');
5     }
6 }
```

From the code, it would seem return "HaHa" is returned, but it actually returns Ha169. The reason is that if double quotes are used, the characters are treated as a string but in case of single quotes, the char -valued operands ('H' and 'a') to int values through a process known as widening primitive conversion. After integer conversion, the numbers are added and return 169.

8. Avoiding Memory leaks by simple tricks

Memory leaks often cause performance degradation of software. Since, Java manages memory automatically, the developers do not have much control. But there are still some standard practices which can be used to protect from memory leakages.

- Always release database connections when querying is complete.
- Try to use Finally block as often possible.
- Release instances stored in Static Tables.

9. Avoiding Deadlocks in Java

Deadlocks can occur for many different reasons. There is no single recipe to avoid deadlocks. Normally deadlocks occur when one synchronized object is waiting for lock on resources locked by another synchronized object.

Try running the below program. This program demonstrates a Deadlock. This deadlock arises because both the threads are waiting for the resources which are grabbed by other thread. They both keep waiting and no one releases.

```
01 public class DeadlockDemo {
02    public static Object addLock = new Object();
03    public static Object subLock = new Object();
04
05    public static void main(String args[]) {
06
07       MyAdditionThread add = new MyAdditionThread();
08       MySubtractionThread sub = new MySubtractionThread();
09       add.start();
10       sub.start();
11    }
12    private static class MyAdditionThread extends Thread {
13       public void run() {
14          synchronized (addLock) {
15             int a = 10, b = 3;
16             int c = a + b;
17             System.out.println("Addition Thread: " + c);
18             System.out.println("Holding First Lock...");
19             try { Thread.sleep(10); }
20             catch (InterruptedException e) {}
21             System.out.println("Addition Thread: Waiting for
22 AddLock...");
23             synchronized (subLock) {
24                System.out.println("Threads: Holding Add and Sub
25 Locks...");
26             }
27          }
28       }
29    }
30    private static class MySubtractionThread extends Thread {
31       public void run() {
32          synchronized (subLock) {
33             int a = 10, b = 3;
34             int c = a - b;
35             System.out.println("Subtraction Thread: " + c);
36             System.out.println("Holding Second Lock...");
37             try { Thread.sleep(10); }
38             catch (InterruptedException e) {}
```

```
33          System.out.println("Subtraction  Thread: Waiting for
34 SubLock...");
35          synchronized (addLock) {
36               System.out.println("Threads: Holding Add and Sub
    Locks...");
37          }
38       }
39     }
40 }
41
42
43
44
```

Output:

```
1
=====
2 Addition Thread: 13
3 Subtraction Thread: 7
4 Holding First Lock...
5 Holding Second Lock...
6 Addition Thread: Waiting for AddLock...
7 Subtraction  Thread: Waiting for SubLock...
```

But if the order in which the threads are called is changed, the deadlock problem is resolved.

```
01 public class DeadlockSolutionDemo {
02     public static Object addLock = new Object();
03     public static Object subLock = new Object();
04
05     public static void main(String args[]) {
06
07         MyAdditionThread add = new MyAdditionThread();
08         MySubtractionThread sub = new MySubtractionThread();
09         add.start();
         sub.start();
10     }
11
12 private static class MyAdditionThread extends Thread {
13     public void run() {
14         synchronized (addLock) {
15         int a = 10, b = 3;
16         int c = a + b;
17             System.out.println("Addition Thread: " + c);
18             System.out.println("Holding First Lock...");
19             try { Thread.sleep(10); }
20             catch (InterruptedException e) {}
             System.out.println("Addition Thread: Waiting for
21 AddLock...");
22             synchronized (subLock) {
23                 System.out.println("Threads: Holding Add and Sub
    Locks...");
24             }
25         }
```

```
26      }
27
28      private static class MySubtractionThread extends Thread {
29          public void run() {
30              synchronized (addLock) {
31              int a = 10, b = 3;
                int c = a - b;
32                  System.out.println("Subtraction Thread: " + c);
33                  System.out.println("Holding Second Lock...");
34                  try { Thread.sleep(10); }
35                  catch (InterruptedException e) {}
                    System.out.println("Subtraction  Thread: Waiting for
36 SubLock...");
37                  synchronized (subLock) {
                        System.out.println("Threads: Holding Add and Sub
38 Locks...");
39                  }
40              }
41          }
42      }
43
44
45
46
47
```

Output:

```
1
2 ======
3 Addition Thread: 13
  Holding First Lock...
4 Addition Thread: Waiting for AddLock...
5 Threads: Holding Add and Sub Locks...
6 Subtraction Thread: 7
7 Holding Second Lock...
  Subtraction  Thread: Waiting for SubLock...
8 Threads: Holding Add and Sub Locks...
9
```

10. Reserve memory for Java

Some of the Java applications can be highly CPU intensive as well as they need a lot of RAM. Such applications generally run slow because of a high RAM requirement. In order to improve performance of such applications, RAM is reserved for Java. So, for example, if we have a Tomcat webserver and it has 10 GB of RAM. If we like, we can allocate RAM for Java on this machine using the following command:

```
export JAVA_OPTS="$JAVA_OPTS -Xms1000m -Xmx1000m -XX:PermSize=1024m -
XX:MaxPermSize=1024m"
```

- Xms = Minimum memory allocation pool
- Xmx = Maximum memory allocation pool
- XX:PermSize = Initial size that will be allocated during startup of the JVM
- XX:MaxPermSize = Maximum size that can be allocated during startup of the JVM

11. How to time operations in Java

There are two standard ways to time operations in Java: **System.currentTimeMillis()** and **System.nanoTime()** The question is, which of these to choose and under what circumstances. In principle, they both perform the same action but are different in the following ways:

1. System.currentTimeMillis takes somewhere between 1/1000th of a second to 15/1000th of a second (depending on the system) but System.nanoTime() takes around 1/1000,000th of a second (1,000 nanos)
2. System.currentTimeMillis takes a few clock cycles to perform Read Operation. On the other hand, System.nanoTime() takes 100+ clock cycles.
3. System.currentTimeMillis reflects Absolute Time (Number of millis since 1 Jan 1970 00:00 (Epoch Time)) but System.nanoTime() does not necessarily represent any reference point.

12. Choice between Float and Double

Data type	Bytes used	Significant figures (decimal)
Float	4	7
Double	8	15

Double is often preferred over float in software where precision is important because of the following reasons:

Most processors take nearly the same amount of processing time to perform operations on Float and Double. Double offers far more precision in the same amount of computation time.

13. Computation of power

To compute power (^), java performs Exclusive OR (XOR). In order to compute power, Java offers two options:

1. **Multiplication:**

```
double square = double a * double a;            // Optimized
double cube = double a * double a * double a;   // Non-optimized
double cube = double a * double square;         // Optimized
double quad = double a * double a * double a * double a;  // Non-optimized
double quad = double square * double square;    // Optimized
```

2. **pow(double base, double exponent):**'pow' method is used to calculate where multiplication is not possible (base^exponent)

```
1 double cube = Math.pow(base, exponent);
```

Math.pow should be used ONLY when necessary. For example, exponent is a fractional value. That is because Math.pow() method is typically around 300-600 times slower than a multiplication.

14. How to handle Null Pointer Exceptions

Null Pointer Exceptions are quite common in Java. This exception occurs when we try to call a method on a Null Object Reference. For example,

```
1 int noOfStudents = school.listStudents().count;
```

If in the above example, if get a NullPointerException, then either school is null or listStudents() is Null. It's a good idea to check Nulls early so that they can be eliminated.

```
1 private int getListOfStudents(File[] files) {
2     if (files == null)
3         throw new NullPointerException("File list cannot be null");
4 }
```

15. Encode in JSON

JSON (JavaScript Object Notation) is syntax for storing and exchanging data. JSON is an easier-to-use alternative to XML. Json is becoming very popular over internet these days because of its properties and light weight. A normal data structure can be encoded into JSON and shared across web pages easily. Before beginning to write code, a JSON parser has to be installed. In below examples, we have used json.simple (https://code.google.com/p/json-simple/).

Below is a basic example of Encoding into JSON:

```
01 import org.json.simple.JSONObject;
02 import org.json.simple.JSONArray;
03
04 public class JsonEncodeDemo {
05
06     public static void main(String[] args) {
07
08         JSONObject obj = new JSONObject();
09         obj.put("Novel Name", "Godaan");
10         obj.put("Author", "Munshi Premchand");
11
12         JSONArray novelDetails = new JSONArray();
13         novelDetails.add("Language: Hindi");
14         novelDetails.add("Year of Publication: 1936");
15         novelDetails.add("Publisher: Lokmanya Press");
```

```
15          obj.put("Novel Details", novelDetails);
16
17          System.out.print(obj);
18      }
19  }
20
21
```
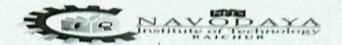
Output:

```
{"Novel Name":"Godaan","Novel Details":["Language: Hindi","Year of
Publication: 1936","Publisher: Lokmanya Press"],"Author":"Munshi
Premchand"}
```

16. Decode from JSON

In order to decode JSON, the developer must be aware of the schema. The details can be found in below example:

```
01 import java.io.FileNotFoundException;
02 import java.io.FileReader;
   import java.io.IOException;
03 import java.util.Iterator;
04
05 import org.json.simple.JSONArray;
06 import org.json.simple.JSONObject;
07 import org.json.simple.parser.JSONParser;
08 import org.json.simple.parser.ParseException;
09 public class JsonParseTest {
10
11     private static final String filePath =
12 "//home//user//Documents//jsonDemoFile.json";
13
14     public static void main(String[] args) {
15
16         try {
17             // read the json file
18             FileReader reader = new FileReader(filePath);
19             JSONParser jsonParser = new JSONParser();
20             JSONObject jsonObject = (JSONObject)jsonParser.parse(reader);
21
22             // get a number from the JSON object
23             Long id = (Long) jsonObject.get("id");
24             System.out.println("The id is: " + id);
25
26             // get a String from the JSON object
27             String  type = (String) jsonObject.get("type");
28             System.out.println("The type is: " + type);
29
30             // get a String from the JSON object
31             String  name = (String) jsonObject.get("name");
                 System.out.println("The name is: " + name);

                 // get a number from the JSON object
```

SHORT TERM PROGRAM OF COMPUTING SKILLS CORE ON JAVA PROGRAMMING

Following are the topics covered for II & III year students of CSE, ECE, and EEE departments during the training sessions on Core Java programming.

Topics Covered

Sessions	Date	Time	Topics Covered
Session – 1	10/10/2015	2.00pm to 5.00pm	Core Java Programming (Tips & Tricks)
Session – 2	17/10/2015	2.00pm to 5.00pm	Dilemma between Array and Array List
Session – 3	24/10/2015	2.00pm to 5.00pm	Avoiding Memory leaks by simple tricks

Coordinator

HOD

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-16

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON CORE JAVA PROGRAMMING

Training program for CSE, EEE and ECE department students held on 17/10/2015 by Mr. Sandeep K.

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2015-2016

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	07
7			Study Material	09
8			Topics Covered	24
9			Photo	25

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-2016

NET's

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

SHORT TERM TRAINING PROGRAMME

1.	ACADEMIC YEAR	2015-2016
2.	TYPE OF THE PROGRAMME PROPOSED	Computing Skill
3.	TITLE OF THE PROGRAMME	OS installation
4.	BROAD OBJECTIVE OF THE PROGRAMME	To enhance student to understand different OS installation.
5.	NAME OF THE DEPARTMENT	Mechanical, Civil
6.	TARGETED GROUP OF STUDENTS	Second and Third Year
7.	DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR	09 hrs
8.	NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME	03 days
9.	PROPOSED DATE AND DURATION OF THE PROGRAMME	29/09/2015, 06/10/2015, 13/10/2015
10.	TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME	09 hrs
11.	NUMBER OF HOURS REQUIRED PER DAY	03 hrs
12.	LOCATION DETAILS	NIT Auditorium
13.	MINIMUM NUMBER OF PARTICIPANTS	75
14.	DETAILS OF RESOURCE PERSONS	Mr. Sharda D M, Mr. Hanumesh D
15.	EVENT ORGANISERS(STUDENTS)	Akshatha, Megha
16.	FACULTY COORDINATOR	Mr. Hanumesh
17.	PROGRAMME PROPOSED BY	CSE Department

Coordinator

PRINCIPAL 13/10/15
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

HOD 13/10/15

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

To,   Date: 14.09.2015
The Principal
NIT, Raichur

Subject: Approval of training program and resource persons for II and III year students of Mechanical and Civil department for academic year 2015-2016

Respected Sir,

This is with respect to the approval of training program on OS installation and resource persons for II and III year students of Mechanical and Civil department for academic year 2015-2016. Following are the details.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Sharda D M	B.E	CSE	1 year	31/10/2015 7/11/2015 14/11/2015
III	Hanumesh D	M.Tech	CSE	1 year	31/10/2015 7/11/2015 14/11/2015

I request you to approve for the same. Thanking you in anticipation.

forwarded to principal

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 103

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

Yours Sincerely,

Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-16

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting OS installation training classes to all the II & III year students of Mechanical, Civil departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Sharda D M	B.E	CSE	1 year	31/10/2015 7/11/2015 14/11/2015
III	Hanumesh D	M.Tech	CSE	1 year	31/10/2015 7/11/2015 14/11/2015

Coordinator

HOD

Department
Science & Engineering
...days institute of Technology
RAICHUR-584 10

4

NET/NIT/PO/CIR/2015-16/ 02   08/10/2015

CIRCULAR

The HOD of Mechanical and Civil department are here by informed that department of CSE is organizing training sessions for all the II & III year students of Mechanical and Civil departments. The training sessions on OS Installation will be conducted as per the following schedule. All the students should attend the training class without fail.

    Session – 1 : 31/10/2015 – Time: 2.00pm to 5.00pm

    Session – 2 : 07/10/2015 – Time: 2.00pm to 5.00pm

    Session – 3 : 14/10/2015 –.Time: 2.00pm to 5.00pm

Coordinator

Head of Department,
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10'

Copy to,

1) Notice Board
2) HOD's – Mechanical, Civil
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-16

SHORT TERM PROGRAM OF COMPUTING SKILLS ON OS

INSTALLATION

STUDENT ENROLLMENT LIST (MECHANICAL)

SECOND YEAR
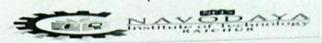
Sr. No.	USN Number	Name
1	3NA13ME004	ANILKUMAR R
2	3NA13ME008	C H VENKATESHA
3	3NA14ME023	MURTHUJAKHADAR
4	3NA14ME024	NARAYAN AVADOOT
5	3NA14ME031	SAMEER AHMED
6	3NA15ME400	AJIT KUMAR
7	3NA15ME401	AJITHKUMAR HOLI
8	3NA15ME402	AKSHATHA B
9	3NA14ME046	VIJAYA NARASIMHA P
10	3NA14ME047	VINAYAK ANNIGERI

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA13ME002	ABHISHEK D
2	3NA13ME005	ANWAR ALI
3	3NA13ME006	BALAJI PATIL
4	3NA13ME035	SHARATH KUMAR
5	3NA13ME037	SHIVARAJ
6	3NA13ME047	VINOD KUMAR
7	3NA13ME409	PRASHANTH KUMAR T
8	3NA13ME410	PRADEEP BIJAPURE
9	3NA14ME418	S SUJITH KUMAR

COORDINATOR

SHORT TERM PROGRAM OF COMPUTING SKILLS ON OS INSTALLATION

STUDENT ENROLLMENT LIST (CIVIL)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA14CV001	A DINESH
2	3NA14CV003	AISHWARYA HADIMANI
3	3NA14CV004	ARCHANA B N
4	3NA14CV012	BHEEMARAYA
5	3NA14CV020	K AVINASH
6	3NA14CV022	KHAJA KALEEMUDDIN
7	3NA14CV023	KHANEES FATIMA
8	3NA14CV034	MD SHOAIB KALMANI
9	3NA14CV038	MD. SHOAIB
10	3NA14CV044	NIKHIL M

THIRD YEAR

1	3NA12CV003	CHANDRASHEKHAR
2	3NA12CV007	RAVICHANDRA
3	3NA12CV010	MD. AMIR SOHAIL SIDDIQUI
4	3NA13CV023	NAGESHWARI
5	3NA13CV024	NAYANA M.N
6	3NA13CV028	POOJA BHANDARI
7	3NA13CV017	MADHUSHREE VALKE
8	3NA13CV018	MANJUNATH

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-16

SHORT TERM PROGRAM OF COMPUTING SKILLS ON OS
INSTALLATION
STUDENT ATTENDANCE SHEET (MECHANICAL)

Sr. No.	USN Number	Name	31/10/2015	7/11/2015	14/11/2015
1	3NA13ME004	ANILKUMAR R	Anil	Anil	Anil.
2	3NA13ME008	C H VENKATESHA	*(signature)*	*(signature)*	*(signature)*
3	3NA14ME023	MURTHUJAKHADAR	Murthuja	Murthuja	Murthuja
4	3NA14ME024	NARAYAN AVADOOT	Narayan	Narayan	Narayan
5	3NA14ME031	SAMEER AHMED	Sameer	Sameer	Sameer
6	3NA15ME400	AJIT KUMAR	Ajith	Ajith	Ajith
7	3NA15ME401	AJITHKUMAR HOLI	Holi	Holi	Holi
8	3NA15ME402	AKSHATHA B	Akshatha	Akshatha	Akshatha
9	3NA14ME046	VIJAYA NARASIMHA P	Vijay	Vijay	Vijaya
10	3NA14ME047	VINAYAK ANNIGERI	Vinayak	Vinayak	Vinayak

THIRD YEAR

Sr. No.	USN Number	Name	31/10/2015	7/11/2015	14/11/2015
1	3NA13ME002	ABHISHEK D	AB	AB	AB
2	3NA13ME005	ANWAR ALI	Anwar	Anwar	Anwar
3	3NA13ME006	BALAJI PATIL	Bala	Bala	Bala
4	3NA13ME035	SHARATH KUMAR	Sharat	Sharat	Sharat
5	3NA13ME037	SHIVARAJ	Shiva	Shiva	Shiva
6	3NA13ME047	VINOD KUMAR	Vinod	Vinod	Vinod
7	3NA13ME409	PRASHANTH KUMAR T	Pra	Pra	Pra
8	3NA13ME410	PRADEEP BIJAPURE	Pradeep	Pradeep	Pradeep
9	3NA14ME418	S SUJITH KUMAR	Sujith	Sujith	Sujith.

Coordinator

⑦

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2015-16

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE
TEACHING PLATFROM
STUDENT ATTENDANCE SHEET (CIVIL)

SECOND YEAR

Sr. No.	USN Number	Name	31/10/2015	7/11/2015	14/11/2015
1	3NA14CV001	A DINESH	dinesh	dinesh	dinesh
2	3NA14CV003	AISHWARYA HADIMANI	Aishwarya	Aishwarya	Aishwarya
3	3NA14CV004	ARCHANA B N	Archana	Archana	Archana
4	3NA14CV012	BHEEMARAYA	Bheem	Bheem	Bheem
5	3NA14CV020	K AVINASH	Avi	Avi	Avi
6	3NA14CV022	KHAJA KALEEMUDDIN	Kha	Kha	Kha
7	3NA14CV023	KHANEES FATIMA	Kanees	Kanees	Kanees
8	3NA14CV034	MD SHOAIB KALMANI	Mshoaibk	Mshoaibk	Mshoaibk
9	3NA14CV038	MD. SHOAIB	Shoaib	Shoaib	Shoaib
10	3NA14CV044	NIKHIL M	Nikhil	Nikhil	Nikhil

THIRD YEAR

Sr. No.	USN Number	Name	31/10/2015	7/11/2015	14/11/2015
1	3NA12CV003	CHANDRASHEKHAR	Chandru	Chandru	Chandru
2	3NA12CV007	RAVICHANDRA	Ravi	Ravi	Ravi
3	3NA12CV010	MD. AMIR SOHAIL SIDDIQUI	Amir	Amir	Amir
4	3NA13CV023	NAGESHWARI	Nagesh	Nagesh	Nagesh
5	3NA13CV024	NAYANA M.N	Naya	Naya	Naya
6	3NA13CV028	POOJA BHANDARI	Pooja	Pooja	Pooja
7	3NA13CV017	MADHUSHREE VALKE	AB	Madhu	Madhu
8	3NA13CV018	MANJUNATH	Manju	Manju	Manju

Coordinator

Operating System Installation Guidelines

The following document guides you step-by-step through the process of installing the operating systems so they are properly configured for boot camp.

The document is divided into 3 parts:
1. Windows XP Installation
2. Linux Installation
3. VMWare Installation

Option 1:

If you are going to use a bootable Knoppix CD for the Linux portion, you only need to install Windows XP and follow section 1. For Windows XP you want to perform a full default install of all components. It is critical that you use Windows XP Professional, Windows XP Home Edition will NOT work. You also want to make sure that Service Pack 2 is installed. For Knoppix, please download and boot off of the Knoppix CD prior to coming to class to validate that Knoppix supports your hardware. The version of Knoppix that we will use for class can be found at http://www.knoppix-std.org/.

Option 2:

If you are going to use VMWare for Linux follow steps 1 and 3. For Windows XP you want to perform a full default install of all components. It is critical that you use Windows XP Professional as Windows XP Home Edition will NOT work. You also want to make sure that Service Pack 2 is installed. It is critical that you install and test VMWare with Knoppix prior to coming to class. The version of Knoppix that we will use for class can be found at http://www.knoppix-std.org/.

Option 3:

If you are going to use a dual boot system and install both Windows XP and Linux, follow steps 1 and 2. For Windows XP you want to perform a full default install of all components. It is critical that you use Windows XP Professional, Windows XP Home Edition will NOT work. You also want to make sure that Service Pack 2 is installed. For Linux you want to make sure you install all components. Prior coming to class install and run Nessus to confirm that all of the components have been properly installed for Linux.

If you do not install the proper configuration, some of the exercises might not work.

Windows XP Installation

It is important to understand that this guide was specifically designed for a lab environment. There are a lot of operating system vulnerabilities that are intentionally left unpatched in these installation steps. This is intentionally done to give you the best results when completing the labs and tutorials in this book. If you are interested, a great reference for building a Windows XP Professional box that is secure enough for a production environment is *Windows XP Security: Step By Step* by SANS.

To create a properly configured laptop for the Security Essentials Boot Camp, follow the detailed steps in this document—from the initial setup screen to the final login. This guide was designed for use on a system that doesn't already have a Windows platform installed on it. If your machine does not have a blank hard drive, some of the screens you see at the beginning of the installation may be different from what you see in this chapter. If different screens appear, it is important that you always choose the option to *replace,* or *overwrite.* Do not choose to upgrade. The Windows install should also be placed in the default c:\windows directory.

Creating Boot Disks

If your system does not support the capability to boot off of a CD-ROM, you can use the Windows XP boot disk to boot. If you do not have a set of the four disks, you need to use a machine that already has Windows XP Professional installed on it. The following steps show you how to create the four boot disks:
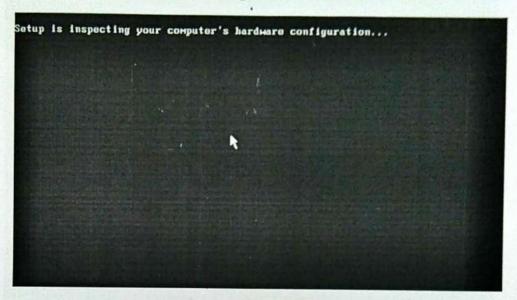
1. Label four blank, formatted, 3.5-inch, 1.44-MB floppy disks as: **Setup Disk One, Setup Disk Two, Setup Disk Three**, and **Setup Disk Four**.
2. Insert **Setup Disk One** into the floppy disk drive of a Windows or DOS system.
3. Insert the Windows XP CD-ROM into the CD-ROM drive.
4. Click **Start**, and then click **Run**.
5. In the **Open** box, type **D:\bootdisk\makeboot a:** (where **D:** is the drive letter assigned to your CD-ROM drive), and then click **OK**.
6. Follow the screen prompts.
7. After you have completed the screen prompt requests, insert **Setup Disk One** into the floppy disk drive of the lab PC and power the PC on.

Booting from the CD-ROM

If your system supports booting off of the CD-ROM, you do not need to use the disks previously discussed. Instead, follow these steps:

1. Simply start by placing the Windows XP CD-ROM into your CD tray and power on your machine. The first non-blank screen you should see is the one shown in the following illustration.

```
Setup is inspecting your computer's hardware configuration...
```

A - 3
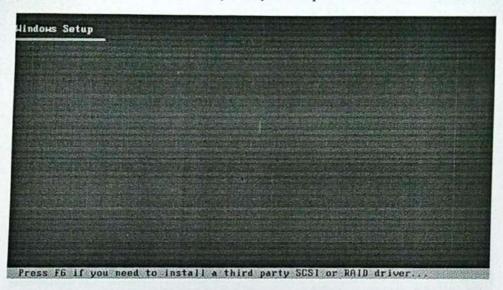
2. If the previous screen does not appear, reboot your machine and open up the BIOS. You need to make the system boot to the CD-ROM first. The following screen is one of several different BIOSes you could have on your system. You need to navigate to a screen that allows you to change the Boot Order. This is where you tell it to boot off of the CD-ROM.
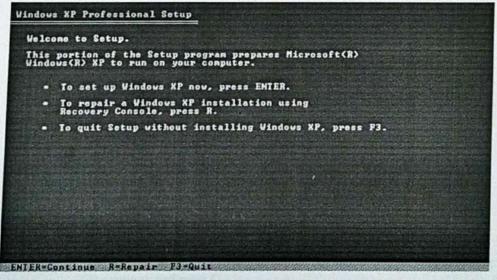
```
                        PhoenixBIOS Setup Utility
    Main    Advanced    Security    Power    Boot     Exit

                                              Item Specific Help
     •Removable Devices
     •Hard Drive
      ATAPI CD-ROM Drive            .
                                           Keys used to view or
                                           configure devices:
                                           <Enter> expands or
                                           collapses devices with
                                           a + or -
                                           <Ctrl+Enter> expands
                                           all
                                           <Shift + 1> enables or
                                           disables a device.
                                           <+> and <-> moves the
                                           device up or down.
                                           <n> May move removable
                                           device between Hard
                                           Disk or Removable Disk
                                           <d> Remove a device
                                           that is not installed.

    F1  Help   ↑↓  Select Item   -/+   Change Values    F9   Setup Defaults
    Esc Exit   ←→  Select Menu   Enter Select ► Sub-Menu F10  Save and Exit
```

A - 4

3.   Now your system should boot off of the CD-ROM. After a period of time (typically 30-45 seconds), the following screen appears. Because we are doing an initial install, you only need to press **Enter** to continue.

```
Windows Setup

















Press F6 if you need to install a third party SCSI or RAID driver...
```

4.   Hit **Enter** at the next screen to continue installation.

```
Windows XP Professional Setup


    Welcome to Setup.

    This portion of the Setup program prepares Microsoft(R)
    Windows(R) XP to run on your computer.

        •  To set up Windows XP now, press ENTER.

        •  To repair a Windows XP installation using
           Recovery Console, press R.

        •  To quit Setup without installing Windows XP, press F3.










  ENTER=Continue   R=Repair   F3=Quit
```

A - 5

5. The Microsoft Windows XP Licensing Agreement appears next, as shown in the following screen. It is important that you read and understand this agreement before continuing with the installation. After you have read and agreed to the contents of the license, press **F8** to continue.

Defining Drive Partitions

You now need to define the drive partitions. Defining your drive partitions is used instead of FDISK. When defining your drive partitions, it is extremely important that you leave enough space for your Linux partition! Following are the steps:

1. Press **C** to create a partition for your Windows install.

2. You need a minimum of 2Gb of space for each of your operating systems. When you are prompted for the size of the partition, enter a number that is equal to 50 percent of your available hard drive space. Then, highlight the partition, which should be labeled **Unpartitioned space** (see the following illustration), and press **C**.

Note: If partitions already exist they should be deleted. However you should realize that this will permanently remove any data that is currently on your system.

A-6

```
Windows XP Professional Setup

   The following list shows the existing partitions and
   unpartitioned space on this computer.

   Use the UP and DOWN ARROW keys to select an item in the list.

      • To set up Windows XP on the selected item, press ENTER.

      • To create a partition in the unpartitioned space, press C.

      • To delete the selected partition, press D.

   ┌──────────────────────────────────────────────────────────┐
   │ 8190 MB Disk 0 at Id 0 on bus 0 on atapi [MBR]           │
   │    Unpartitioned space                      8189 MB       │
   │                                                          │
   │                                                          │
   │                                                          │
   └──────────────────────────────────────────────────────────┘

   ENTER=Install  C=Create Partition  F3=Quit
```

Now create your new partition to be at least 2 Gb. In the provided space type **2047** and press **Enter**

```
Windows XP Professional Setup

   You asked Setup to create a new partition on
   8190 MB Disk 0 at Id 0 on bus 0 on atapi [MBR].

      • To create the new partition, enter a size below and
        press ENTER.

      • To go back to the previous screen without creating
        the partition, press ESC.

   The minimum size for the new partition is      8 megabytes (MB).
   The maximum size for the new partition is   8182 megabytes (MB).
   Create partition of size (in MB): 2047_

   ENTER=Create  ESC=Cancel
```

A-7

You should now see two partitions. Verify that the new 2047 partition is highlighted and press **Enter**.

```
Windows XP Professional Setup

   The following list shows the existing partitions and
   unpartitioned space on this computer.

   Use the UP and DOWN ARROW keys to select an item in the list.

      •  To set up Windows XP on the selected item, press ENTER.

      •  To create a partition in the unpartitioned space, press C.

      •  To delete the selected partition, press D.

   8190 MB Disk 0 at Id 0 on bus 0 on atapi [MBR]

      C:  Partition1 [New (Raw)]              2047 MB ( 2047 MB free)
          Unpartitioned space                6142 MB






   ENTER=Install   D=Delete Partition   F3=Quit
```

Formatting Drive Partitions

The next step is to format your partition. For security reasons, you should format your partitions using NTFS. NTFS is a Windows partition type that allows you to assign permissions at the folder level. This level of granularity is not the same for FAT partitions. NTFS also allows for lager partition sizes compared to the 2Gb limit that comes with FAT16. The steps for formatting your partition follow:

1. Highlight the NTFS <Quick> partition option as shown in the following screen, and press **Enter**.

```
Windows XP Professional Setup

    The partition you selected is not formatted. Setup will now
    format the partition.

    Use the UP and DOWN ARROW keys to select the file system
    you want, and then press ENTER.

    If you want to select a different partition for Windows XP,
    press ESC.

        Format the partition using the NTFS file system (Quick)
        Format the partition using the FAT file system (Quick)
        Format the partition using the NTFS file system
        Format the partition using the FAT file system




  ENTER=Continue   ESC=Cancel
```

2. After you press **Enter**, the system formats the partition, as shown in the following screens. Depending on the size of the partition, this step can take from 5 minutes to an hour. This is a great time to refill your caffeine-laced beverage of choice. (You may need it because you have a long way to go.)

```
Windows XP Professional Setup


            Please wait while Setup formats the partition
    C:  Partition1 [New (Raw)]                 2047 MB ( 2047 MB free)
          on 8190 MB Disk 0 at Id 0 on bus 0 on atapi [MBR].




        Setup is formatting...
                                0%


```

A - 9

Since this will take a while you should just wait while this process continues.

```
Windows XP Professional Setup

                    Please wait while Setup copies files
                     to the Windows installation folders.
                 This might take several minutes to complete.


        Setup is copying files...
                                        3x
        ■


                                                        Copying: csrss.exe
```

When you return to your machine, you may see one of the following screens. Don't be alarmed. The system has completed the formatting process and has automatically rebooted. After this occurs, you have to answer the remaining install questions.

Customizing Your System

Now Windows presents a series of questions, which, when answered, customize your system. The following steps walk you through the process of customizing your system:

1. Typically, you only need to make changes during the next step (see the following screen) if you are located outside of the United States or if you use a non-standard keyboard. If you are in the United States and you are using a standard QWERTY keyboard, press the **Next** button. If you are located outside of the United States, you should change your locale settings.

2. Enter your name and the organization you work for in the **Name** and **Organization** fields. For the purposes of this course, have some fun making up fictional names. Click the **Next** button when you are done.

3. In the next screen, enter the Product Key number that came with your software (find it on your CD). If you make a mistake when you enter the key, you receive an **Invalid Key** message and the system gives you another opportunity to enter it. Once you enter in the valid key, press the **Enter** key.

4. Now enter a name in the **Computer name** field to name your computer. If you are part of a corporation's domain, you need to follow your corporation's guidelines for naming systems. For our purposes, name your machine whatever you desire. Then, type in a password in the **Administrator password** field. You also need to confirm the password, as shown in the following screen. Then, click the **Next** button.

    Warning: A common mistake many administrators make at this stage is to leave the **Administrator password** field blank. It is highly advisable that you enter a password that matches your company's password policy for local passwords. You don't want to forget to change the password after you have completed the installation. Also, make sure you remember this password. You will need it to login.

SHORT TERM PROGRAM OF COMPUTING SKILLS ON OS INSTALLATION

Following are the topics covered for II & III year students of Mechanical and Civil departments during the training sessions on OS installation.

Topics Covered

Sessions	Date	Time	Topics Covered
Session – 1	31/10/2015	2.00pm to 5.00pm	What is OS installation? How it works?
Session – 2	7/11/2015	2.00pm to 5.00pm	Windows XP Installation Linux Installation
Session – 3	14/11/2015	2.00pm to 5.00pm	VMWare Installation

Coordinator

HOD

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON OS INSTALLATION

Training program for Mechanical and Civil department students held on 14/11/2015 by Mrs. Sharda D M

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2016-2017

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	08
7			Study Material	09
8			Topics Covered	16
9			Photo	17

SHORT TERM TRAINING PROGRAMME

1.	ACADEMIC YEAR	2016-2017
2.	TYPE OF THE PROGRAMME PROPOSED	Computing Skill
3.	TITLE OF THE PROGRAMME	Quick book & basic networking
4.	BROAD OBJECTIVE OF THE PROGRAMME	To enhance student to understand the basic networking.
5.	NAME OF THE DEPARTMENT	CSE, EEE, ECE
6.	TARGETED GROUP OF STUDENTS	Second and Third Year
7.	DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR	09 hrs
8.	NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME	03 days
9.	PROPOSED DATE AND DURATION OF THE PROGRAMME	8/10/2016,15/10/2016,22/10/2016
10.	TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME	09 hrs
11.	NUMBER OF HOURS REQUIRED PER DAY	03 hrs
12.	LOCATION DETAILS	NIT Auditorium
13.	MINIMUM NUMBER OF PARTICIPANTS	70
14.	DETAILS OF RESOURCE PERSONS	Mrs. Sharda D M, Mrs. Shanthi E
15.	EVENT ORGANISERS(STUDENTS)	Jayteerth, Apoorva
16.	FACULTY COORDINATOR	Mrs. Shanthi E
17.	PROGRAMME PROPOSED BY	CSE Department

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 103

Principal
Navodaya Institute of Technology (Hal)
RAICHUR-584 103

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

To,   **Date: 10.09.2016**
The Principal
NIT, Raichur

Subject: Approval of training program and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2016-2017

Respected Sir,

This is with respect to the approval of training program on Quick book & basic networking and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2016-2017. Following are the details.
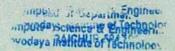
Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Sharda D M	B.E	CSE	2 years	8/10/2016 15/10/2016 22/10/2016
III	Shanthi E	M.Tech	CSE	3 years	8/10/2016 15/10/2016 22/10/2016

I request you to approve for the same. Thanking you in anticipation.

forwarded
to principal si

Yours Sincerely,

PRINCIPAL
**Navodaya Institute of Technology (NIT)
RAICHUR-584 103**

Coordinator

NET/NIT/PO/CIR/2016-17/ 03

05/10/2016

CIRCULAR

The HOD of ECE and EEE department are here by informed that department of CSE is organizing training sessions for all the II & III year students of CSE, ECE, and EEE departments. The training sessions on Quick book & basic networking will be conducted as per the following schedule. All the students should attend the training class without fail.

Session – 1 : 08/10/2016 – Time: 2.00pm to 5.00pm

Session – 2 : 15/10/2016 – Time: 2.00pm to 5.00pm

Session – 3 : 22/10/2016 – Time: 2.00pm to 5.00pm

Coordinator

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10.

Copy to,

1) Notice Board
2) HOD's – CSE, ECE, EEE
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting Quick book & basic networking training classes to all the II & III year students of CSE, ECE, EEE departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Sharda D M	B.E	CSE	2 year	8/10/2016 15/10/2016 22/10/2016
III	Shanthi E	M.Tech	CSE	3 year	8/10/2016 15/10/2016 22/10/2016

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10*

SHORT TERM PROGRAM OF COMPUTING SKILLS ON QUICKBOOK

& BASIC NETWORKING

STUDENT ENROLLMENT LIST (CSE)

SECOND YEAR
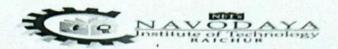
Sr. No.	USN Number	Name
1	3NA15CS002	ANKITH KUMAR RANJALKAR
2	3NA15CS003	B K VISHNU
3	3NA15CS004	B. LAVANYA
4	3NA15CS005	CHAITRA PUJAR
5	3NA15CS006	DEEPTHI C
6	3NA15CS008	M.K LAKSHMI MANASA
7	3NA15CS010	NAGARADONA SAI APARNA
8	3NA15CS011	NIKHITHA
9	3NA15CS016	SHAGUFTA ANJUM
10	3NA15CS018	SHIVASHARANA M
11	3NA15CS022	SYED HAMEEDA TASNEEM
12	3NA15CS023	TAYYABA TAHSEEN
13	3NA15CS024	VATHSALA T

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA12CS020	SHARANAMMA MADAGIRI
2	3NA14CS002	BHAGYASHREE T
3	3NA14CS004	K N SHARANA BASAVA
4	3NA14CS006	MOHD SALMAN
5	3NA14CS007	NAZIYA SULTANA
6	3NA14CS013	VANDANA TOTAGANTI
7	3NA14CS016	APOORVA N
8	3NA13CS024	JAITHEERTH
9	3NA15CS400	PAVAN KUMAR

COORDINATOR
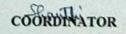
SHORT TERM PROGRAM OF COMPUTING SKILLS ON QUICKBOOK
& BASIC NETWORKING

STUDENT ENROLLMENT LIST (EEE)

SECOND YEAR		
Sr. No.	USN Number	Name
1	3NA14EE008	NAZIYA BEGUM
2	3NA15EE001	AFSHA TABASSUM
3	3NA15EE003	AYESHA UMERA
4	3NA15EE004	F AMALAMARI MYATHRI
5	3NA15EE005	KASHMALA M FATIMA
6	3NA15EE006	KHAISAR AMEENA
7	3NA15EE007	MD SAIFULLA ISLAM
8	3NA15EE010	NAGALAKSHI DESAI
9	3NA15EE011	NAVEEN K
10	3NA15EE012	NEHA FATIMA
THIRD YEAR		
1	3NA13EE008	KARTHIK RAJ
2	3NA14EE001	ANAGHA DESAI
3	3NA14EE002	ASIMA NIKHAT
4	3NA14EE004	BIRUNAVALLI WAGHMODE
5	3NA14EE005	HANAMANT DHOOLSHETTI
6	3NA14EE006	M SHAKEER AHMED
7	3NA14EE009	RUKSANA BEGUM
8	3NA14EE010	SANIYA AYESHA L
9	3NA14EE011	SEEMA
10	3NA14EE012	SHANTHI
11	3NA14EE400	ADIL HAZARI

COORDINATOR

SHORT TERM PROGRAM OF COMPUTING SKILLS ON QUICKBOOK

& BASIC NETWORKING

STUDENT ENROLLMENT LIST (ECE)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA15EC002	ANKITHA K P
2	3NA15EC004	APARNA MAHENDRAKAR
3	3NA15EC005	ASHWINI CHINNAKAR
4	3NA15EC006	BHAVANESWARI
5	3NA15EC007	BHUVANESWARI CHANGAPPA
6	3NA15EC009	C VINOD BABU
7	3NA15EC012	FARHARA FARHEEN
8	3NA15EC013	HARSHITA P
9	3NA14EC014	SUSHMA
10	3NA14EC006	DEVIKA PATEL

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA14EC001	AISHWARYA NAIR
2	3NA14EC003	ANUSHA HIREMATH
3	3NA14EC004	BHAVANA B
4	3NA14EC005	CHAITRA M
5	3NA14EC007	HUMERA TAHSEEN
6	3NA14EC008	K VISHNUPRIYA
7	3NA14EC018	VANISHREE R K
8	3NA14EC406	UDAY KUMAR

COORDINATOR
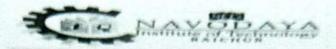
SHORT TERM PROGRAM OF COMPUTING SKILLS ON QUICK BOOK
& BASIC NETWORKING
STUDENT ATTENDANCE SHEET (CSE)

Sl No.	USN No.	Name	08/10/2016	15/10/2016	22/10/2016
SECOND YEAR					
1	3NA15CS002	ANKITH KUMAR RANJALKAR	Ankith	Ankith	Ankith
2	3NA15CS003	B K VISHNU	Vishnu	Vishnu	Vishnu
3	3NA15CS004	B. LAVANYA	B.Lavanya	B.Lavanya	B.Lavanya
4	3NA15CS005	CHAITRA PUJAR	chaitra	Chaitra	chaitra
5	3NA15CS006	DEEPTHI C	Deepthi	Depthi	Deepthi
6	3NA15CS008	M.K LAKSHMI MANASA	MK.Manasa	MK.Manasa	MK.Manasa
7	3NA15CS010	NAGARADONA SAI APARNA	Sai Aparna	Sai Aparna	Sai Aparna
8	3NA15CS011	NIKHITHA	Nikhitha	Nikhitha	Nikhitha
9	3NA15CS016	SHAGUFTA ANJUM	Shagufta	Shagufta	Shagufta
10	3NA15CS018	SHIVASHARANA M	Shiva	Shiva	Shiva
11	3NA15CS022	SYED HAMEEDA TASNEEM	Syed	Syed	Syed
12	3NA15CS023	TAYYABA TAHSEEN	Tayyaba	Tayyaba	Tayyaba
13	3NA15CS024	VATHSALA T	Vathsala	Vathsala	Vathsala
THIRD YEAR					
1	3NA12CS020	SHARANAMMA MADAGIRI	Sharanamma	Sharanamma	Sharanamma
2	3NA14CS002	BHAGYASHREE T	Bhagya	Bhagya	Bhagya
3	3NA14CS004	K N SHARANA BASAVA	Basava	Basava	Basava
4	3NA14CS006	MOHD SALMAN	Salman	Salman	Salman
5	3NA14CS007	NAZIYA SULTANA	Naziya	Naziya	Naziya
6	3NA14CS013	VANDANA TOTAGANTI	Vandana	Vandana	Vandana
7	3NA14CS016	APOORVA N	Apoorva	Apoorva	Apoorva
8	3NA13CS024	JAITHEERTH	Jaitheerth	Jaitheerth	Jaitheerth
9	3NA15CS400	PAVAN KUMAR	Pavan	Pavan	Pavan

Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2016-17

SHORT TERM PROGRAM OF COMPUTING SKILLS ON QUICK BOOK
& BASIC NETWORKING
STUDENT ATTENDANCE SHEET (EEE)

SECOND YEAR

Sr. No.	USN Number	Name	08/10/2016	15/10/2016	22/10/2016
1	3NA14EE008	NAZIYA BEGUM	Naziya	Naziya	AB
2	3NA15EE001	AFSHA TABASSUM	Afsha	Afsha	Afsha
3	3NA15EE003	AYESHA UMERA			
4	3NA15EE004	F AMALAMARI MYATHRI	myathri	myathe	myathe
5	3NA15EE005	KASHMALA M FATIMA			
6	3NA15EE006	KHAISAR AMEENA	Ameena	Ameena	Ameena
7	3NA15EE007	MD SAIFULLA ISLAM			
8	3NA15EE010	NAGALAKSHI DESAI	nagu	nagu	nagu
9	3NA15EE011	NAVEEN K	Naveen	Naveen	Naveen
10	3NA15EE012	NEHA FATIMA	Neha	Neha	Neha

THIRD YEAR

Sr. No.	USN Number	Name	08/10/2016	15/10/2016	22/10/2016
1	3NA13EE008	KARTHIK RAJ	Karthik	Karthik	Karthik
2	3NA14EE001	ANAGHA DESAI	Anagha	Anagha	Anagha
3	3NA14EE002	ASIMA NIKHAT	Asima	Asima	Asima
4	3NA14EE004	BIRUNAVALLI WAGHMODE	BV	BV	BV
5	3NA14EE005	HANAMANT DHOOLSHETTI	Hanamanth	Hanamanth	Hanamanth
6	3NA14EE006	M SHAKEER AHMED	Shakeer	Shakeer	Shakeer
7	3NA14EE009	RUKSANA BEGUM			
8	3NA14EE010	SANIYA AYESHA L	Saniya	Saniya	Saniya
9	3NA14EE011	SEEMA			
10	3NA14EE012	SHANTHI			
11	3NA14EE400	ADIL HAZARI	Adil	Adil	Adil

Shanthu
Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2016-17

SHORT TERM PROGRAM OF COMPUTING SKILLS ON QUICK BOOK
& BASIC NETWORKING
STUDENT ATTENDANCE SHEET (ECE)

SECOND YEAR

Sr. No.	USN Number	Name	08/10/2016	15/10/2016	22/10/2016
1	3NA15EC002	ANKITHA K P	Ankta	Ankita	Ankita
2	3NA15EC004	APARNA MAHENDRAKAR	Apurm	Apurm	Apurm
3	3NA15EC005	ASHWINI CHINNAKAR	Ash	Ash	Ash.
4	3NA15EC006	BHAVANESWARI	Bhwari	Bhavee	Bhuri
5	3NA15EC007	BHUVANESWARI CHANGAPPA	Changappa	Changappa	Changappa
6	3NA15EC009	C VINOD BABU	cvinodbabu	cvinodbabu	cvinodbabu
7	3NA15EC012	FARHARA FARHEEN	Farhun	Farhun	Farha
8	3NA15EC013	HARSHITA P	Harshita	Harshita	Harshita
9	3NA14EC014	SUSHMA	Susmu	Susmu	Susmu
10	3NA14EC006	DEVIKA PATEL	Devi	Devi	Devi

THIRD YEAR

1	3NA14EC001	AISHWARYA NAIR	Aishwarya	Aishwarya	Aishwarya
2	3NA14EC003	ANUSHA HIREMATH	Anusha	Anusha	Anusha
3	3NA14EC004	BHAVANA B	Bhavana	Bhavana	Bhavana
4	3NA14EC005	CHAITRA M	Chaitra	Chaitra	Chaitra
5	3NA14EC007	HUMERA TAHSEEN	Humera	Humera	Humera
6	3NA14EC008	K VISHNUPRIYA	Vishnu	Vishnu	Vishnu
7	3NA14EC018	VANISHREE R K	Vani	Vani	Vani
8	3NA14EC406	UDAY KUMAR	Uday	Uday	Uday

Coordinator

(10)

Basics of Computer Networking

Computer Network Components
BY DINESH THAKUR Category: Computer Network

In general, a computer network composed of one or more servers, workstations, network interface cards, active and passive hub, routers, bridges, gateways, modem, software components like network operating systems, and other application software. The following components widely used for the construction of networks.

What is Shared Ethernet Networks?
BY DINESH THAKUR Category: Computer Network

Shared Ethernet Networks implementing technical standard access to physical media by the IEEE 802.3 working group under the name MAC access (Medium Access Control). MAC uses a general technique called random access.

What are the physical layer interfaces?
BY DINESH THAKUR Category: Computer Network

The physical layer represents the first level of the hierarchy of the reference model. This level is responsible for transporting the bits on physical media varied. To access a support, use an access interface.

What is Optical Switches?
BY DINESH THAKUR Category: Computer Network

The **Optical Switches** are used to connect optical links between them. At incoming optical fibers correspond outgoing optical fibers. If the switch uses an electrical part, the switch is said optoelectronics and not only optical. These switches are based on the interconnection of switching elements, that is to say, switches which have two input gates and two output ports as shown in Figure. Connected in series, these elementary switches allow making great switches. The design of these devices, however, poses many problems.

What is Wavelength Routing Networks?
BY DINESH THAKUR Category: Computer Network

The idea at the basis of the wavelength routing network consists of maximum reuse the same wavelengths. The figure illustrates a node of a routing network wherein wavelengths of the same wavelength are used repeatedly.

What is a Distributed Computing System? - Definition

BY DINESH THAKUR Category: Computer Network

A **Distributed computing** is a model of computation that is firmly related to **Distributed Systems**, refers to as multiple computer systems located at different places linked together over a network and use to solve higher level computation without having to use an expensive supercomputer. Distributed system is called, When collection of various computers seems a single coherent system to its client, then it is called *distributed system*.

What is Broadcast Network?

BY DINESH THAKUR Category: Computer Network

Broadcast: Any form of communication in which a single sender transmits messages to many receivers at once, the most familiar examples being the television and public radio systems. The opposite of broadcast is POINT-TO-POINT or narrowcast communication, between just a single transmitter and a single receiver - a telephone conversation for example. When such a multiple connection is made via a network cable as opposed to wireless, such communication is often called MULTIPOINT, as opposed to a point-to-point or UNICAST. Communication channel is shared by all the machines on the network in broadcast network.

What is bps (bits per second)?

BY DINESH THAKUR Category: Computer Network

The acronym **bps** stands for bits per second, which is a measurement of how fast information (data) travels between two devices. When two modems converse via the telephone line, the speed of modem communications is measured in bps. (When people talk about modems, they often use the word "baud" to mean the same thing as bps, though technically the two terms are not synonymous.

What is baud rate?

BY DINESH THAKUR Category: Computer Network

baud, baud rate A baud is the number of signaling elements per second sent by a communications device such as a modem, In theory, a modem with a high baud rate means fast transmission. The baud rate is therefore equal to the bit rate only if each signal element represents one bit of information.

What is Internetworks

BY DINESH THAKUR Category: Computer Network

Availability of different operating systems, hardware platforms and the geographical dispersion of the computing resources necessitated the need of networking in such a manner that computers of all sizes can communicate with each other, regardless of the vendor, the operating system, the hardware platform, or geographical proximity. Therefore, we may say that internetworking is a scheme for interconnecting multiple networks of dissimilar technologies. To interconnect multiple networks of dissimilar technologies use both additional hardware and software. This additional hardware is positioned between networks and software on each attached computer. Thus, system of interconnected networks is called an inter network or an Internet.

LAN OPERATING SYSTEMS

BY DINESH THAKUR Category: Computer Network

A **LAN Operating System**, or **Network Operating System** (NOS), is software that provides the network with multi-user, multitasking capabilities. The operating system facilitates communications and resource sharing, thereby providing the basic framework for the operation of the LAN. The operating system consists of modules that are distributed throughout the LAN environment. Some NOS modules reside in servers, while other modules reside in the clients.

TCP/IP Encapsulation

BY DINESH THAKUR Category: Computer Network

TCP/IP encapsulate upper layers using headers for the purpose of exchanging control and status information about the progress of the communication because its protocols also engage in peer talk by encapsulating data with protocol headers before submitting it to the underlying layer for subsequent delivery to the network. The data communication using TCP/IP and Ethernet as it is passed down the layers by an application on node X to node Y across the network.

What is protocol? and its types - Definition

BY DINESH THAKUR Category: Computer Network

Protocol Definition: It is a digital language through which we communicate with others on the Internet. **protocol meaning is that it a set of mutually accepted and implemented rules at both ends of the communications channel for the proper exchange of information.** By adopting these rules, two devices can communicate with each other and can interchange information. We can't even think of using the Internet without Protocols. Each *protocol* is defined in different terms and different use with unique name. Message travel from sender to reciever via a medium (The medium is the physical path over which a message travels) using a protocol.

Star Topologies – What is Star Topologies?

The distinguishing feature of star topology is that all nodes are joined at a single point, as shown in Figure. This single point is called as a central node, hub, or switch, to which all other devices are attached directly, generally via UTP or STP. This topology is frequently used for networks in which control of the network is located in the central node. This method is optimal when the bulk of communication is between the central and outlying nodes. If traffic is high between outlying nodes, an undue switching burden is placed on the central node.

Ring Topologies – What is Ring Topologies?

The ring architecture is a distributed architecture, with minimal connectivity and a topology of two links connected to every node as shown in Figure and forms unbroken circular configuration. Figure shows a network laid out in a physical ring, or closed loop, configuration. Transmitted messages travel from node to node around the ring. Each node must be able to recognize its own address in order to accept messages.
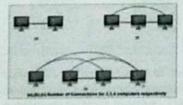
What is Bus Topology? Advantages and Disadvantages of Bus Network

Bus Topology is multipoint electrical circuits that can be implemented using coaxial cable, UTP, or STP. Data transmission is bidirectional, with the attached devices transmitting in both directions. While generally operating at a raw data rate of 10 Mbps, actual throughput is much less.

Point-to-point Connections

The point-to-point scheme provides separate communication channels for each pair of computers. When more than two computers need to communicate with one another, the number of connections grows very quickly as number of computer increases. Above figure illustrates that two computers need only one connection, three computers need three connections and four computers need six connections.

What is Metropolitan Area Network (MAN)? - Definition

(14)
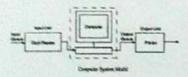
The **MAN network (Metropolitan Area Network)** is a high-speed network (broadband) that covers larger geographic area such as city (tens of kilometers) or districts than local area network (LAN) but smaller than wide area network (WAN) and providing the ability to integrate multiple services through the transmission of data, voice, and video, on transmission media such as copper, fiber optics, and microwaves.

Evolution of Computer Networks

BY DINESH THAKUR Category: Computer Network

Computer System Model
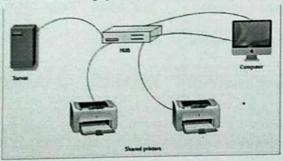
The term *computer networks* resulted from the 'combination of two major areas, namely *computers* and *communications*.

Need For Computer Networks

BY DINESH THAKUR Category: Computer Network

The term *network* is defined as a set of computers of different types, terminals, telephones, and other communication equipments, connected by data communication links, which allow the network components to work together. The network components may be located within a small area or spread over many remote locations. In any case, data communications hold the network together.

15

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC NETWORKING

Following are the topics covered for II & III year students of CSE, ECE, and EEE departments during the training sessions on basic networking.

Topics Covered

Sessions	Date	Time	Topics Covered
Session – 1	8/10/2016	2.00pm to 5.00pm	What is networking? Basics of network, types of networks
Session – 2	15/10/2016	2.00pm to 5.00pm	Switches, routers, wireless access points
Session – 3	22/10/2016	2.00pm to 5.00pm	Network topology

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 103

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2016-2017

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON QUICKBOOK & NETWORKING

Training program for CSE, EEE and ECE department students held on 8/10/2016 by Mrs. Sharda D M

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2016-2017

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	07
7			Study Material	09
8			Topics Covered	14
9			Photo	15

SHORT TERM TRAINING PROGRAMME

1.	ACADEMIC YEAR	2016-2017
2.	TYPE OF THE PROGRAMME PROPOSED	Computing Skill
3.	TITLE OF THE PROGRAMME	Software installation & troubleshooting
4.	BROAD OBJECTIVE OF THE PROGRAMME	To enhance student to understand Software installation & troubleshooting
5.	NAME OF THE DEPARTMENT	Mechanical, Civil
6.	TARGETED GROUP OF STUDENTS	Second and Third Year
7.	DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR	09 hrs
8.	NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME	03 days
9.	PROPOSED DATE AND DURATION OF THE PROGRAMME	29/10/2016, 5/11/2016, 12/11/2016
10.	TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME	09 hrs
11.	NUMBER OF HOURS REQUIRED PER DAY	03 hrs
12.	LOCATION DETAILS	NIT Auditorium
13.	MINIMUM NUMBER OF PARTICIPANTS	75
14.	DETAILS OF RESOURCE PERSONS	Mr. Shiva Prasad, Mr. Hanumesh D
15.	EVENT ORGANISERS(STUDENTS)	Akshatha, Megha
16.	FACULTY COORDINATOR	Mr. Hanumesh
17.	PROGRAMME PROPOSED BY	CSE Department

Coordinator

HOD
Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 103

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

To,   **Date: 10.09.2016**
The Principal
NIT, Raichur

Subject: Approval of training program and resource persons for II and III year students of
Mechanical & Civil department for academic year 2016-2017

Respected Sir,

This is with respect to the approval of training program on Software installation & troubleshooting
and resource persons for II and III year students of Mechanical & Civil department for academic
year 2016-2017. Following are the details.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Shiva Prasad	B.E	CSE	1 year	29/10/2016 5/11/2016 12/10/2016
III	Hanumesh D	M.Tech	CSE	3 Years	29/10/2016 5/11/2016 12/11/2016

I request you to approve for the same. Thanking you in anticipation.

forwarded to principal

Yours Sincerely,

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

Coordinator

NET/NIT/PO/CIR/2016-17/ o 4   08/10/2015

CIRCULAR

The HOD of Mechanical and Civil department are here by informed that department of CSE is organizing training sessions for all the II & III year students of Mechanical and Civil departments. The training sessions on Sofware installation & troubleshooting will be conducted as per the following schedule. All the students should attend the training class without fail.

Session – 1 : 29/10/2016 – Time: 2.00pm to 5.00pm

Session – 2 : 05/11/2016 – Time: 2.00pm to 5.00pm

Session – 3 : 12/11/2016 – Time: 2.00pm to 5.00pm

Coordinator

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10

Copy to,

1) Notice Board
2) HOD's – Mechanical, Civil
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting Software installation & troubleshooting training classes to all the II & III year students of Mechanical, Civil departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Shiva Prasad	B.E	CSE	1 year	29/10/2016 5/11/2016 12/11/2016
III	Hanumesh D	M.Tech.	CSE	3 years	29/10/2016 5/11/2016 12/11/2016

Coordinator

Head of Department...
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10...

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOFTWARE

INSTALLATION & TROUBLESHOOTING

STUDENT ENROLLMENT LIST (MECHANICAL)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA15ME004	CHANDRASHEKHAR M
2	3NA15ME005	CHANNABASAVA J
3	3NA15ME008	GANAPATHI
4	3NA15ME010	HOTUR VINAY KUMAR
5	3NA15ME011	JAGADEESH C
6	3NA15ME014	MANI BHARGAVA B
7	3NA15ME016	MANJUNATH M PUJARI
8	3NA15ME018	MD WAJAHATH HUSSAIN
9	3NA15ME020	MOHAMMED ASIF R KUNTOJI
10	3NA15ME022	NIKHIL

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA14ME032	SAMEER PASHA
2	3NA14ME033	SHAHEEN BEGUM
3	3NA14ME034	SHIVAJI
4	3NA14ME035	SHIVKUMAR
5	3NA14ME036	SIDDLINGA
6	3NA14ME039	SUMIT TIWARI
7	3NA14ME046	VJJAYA NARASIMHA P
8	3NA14ME049	KHURESHI FARID AHEMED
9	3NA15ME400	AJIT KUMAR

COORDINATOR
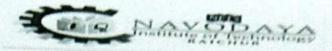
SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOFTWARE

INSTALLATION & TROUBLESHOOTING

STUDENT ENROLLMENT LIST (CIVIL)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA15CV007	ANIL CHANDRA BABU S
2	3NA15CV008	ANURADHA A
3	3NA14CV029	MD MOSIN AHMED
4	3NA14CV039	MD ZEESHAN JUNAIDH
5	3NA14CV046	P AKSHATA
6	3NA14CV047	PAGUNT SAGAR
7	3NA14CV050	POOJA
8	3NA14CV057	SADASHIVAYYA
9	3NA14CV059	SANTOSH
10	3NA14CV070	SWATI DATTATREYA J

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA14CV016	DEVARAJ
2	3NA14CV019	J ANKITHA NAYAKA
3	3NA14CV020	K AVINASH
4	3NA14CV022	KHAJA KALEEMUDDIN
5	3NA14CV023	KHANEES FATIMA
6	3NA13CV024	NAYANA M N
7	3NA14CV025	LAXMI JANAKAR
8	3NA14CV026	M AJAY KUMAR

COORDINATOR
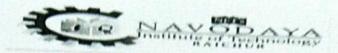
SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOFTWARE

INSTALLATION & TROUBLESHOOTING

STUDENT ATTENDANCE SHEET (MECHANICAL)

Sr. No.	USN Number	Name	29/10/2016	5/11/2016	12/11/2016
1	3NA15ME004	CHANDRASHEKHAR M	Chandrashekar	AB.	chandra chekel
2	3NA15ME005	CHANNABASAVA J	channa	channa	channa
3	3NA15ME008	GANAPATHI	Ganapathi	Ganapath	Ganapath
4	3NA15ME010	HOTUR VINAY KUMAR	Vinay	Vinay	Vinay
5	3NA15ME011	JAGADEESH C	Jagadeh	Jagadah	Jagadeh
6	3NA15ME014	MANI BHARGAVA B	mani	mani	mani
7	3NA15ME016	MANJUNATH M PUJARI	Manjunath	Manjunath	Manjunath.
8	3NA15ME018	MD WAJAHATH HUSSAIN	AB	Hussain	Husain
9	3NA15ME020	MOHAMMED ASIF R KUNTOJI	Asifk	Asifk	AB
10	3NA15ME022	NIKHIL	Nikhil	Nikhil	Nikhil
THIRD YEAR					
1	3NA14ME032	SAMEER PASHA	Sameer	Sameer	Sameer
2	3NA14ME033	SHAHEEN BEGUM	Shaheen	AB	Shaheen
3	3NA14ME034	SHIVAJI	Shivaji	Shivaji	Shivaji
4	3NA14ME035	SHIVKUMAR	Sivu	Sivu	Sivu
5	3NA14ME036	SIDDLINGA	Siddling	Siddling	Siddling
6	3NA14ME039	SUMIT TIWARI	Smit	Smit	Smut
7	3NA14ME046	VIJAYA NARASIMHA P	vijaya	vijay	vijay
8	3NA14ME049	KHURESHI FARID AHEMED	Farid	Farid	Farid
9	3NA15ME400	AJIT KUMAR	Ajit	Ajit	Ajit

Coordinator

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOFTWARE INSTALLATION & TROUBLESHOOTING

STUDENT ATTENDANCE SHEET (CIVIL)

SECOND YEAR

Sr. No.	USN Number	Name	29/10/2016	5/11/2016	12/11/2016
1	3NA15CV007	ANIL CHANDRA BABU S	Anil	Anil	Anil
2	3NA15CV008	ANURADHA A	Anuradha	Anuradha	Anuradha
3	3NA14CV029	MD MOSIN AHMED	Mohsin	Mohsin	Mohsin
4	3NA14CV039	MD ZEESHAN JUNAIDH	Mdzeeshan	Md zeeshan	Md zeeshan
5	3NA14CV046	P AKSHATA	Akshata	Akshata	Akshata
6	3NA14CV047	PAGUNT SAGAR	S	S	S
7	3NA14CV050	POOJA	Pooja	Pooja	Pooja
8	3NA14CV057	SADASHIVAYYA	Sadashiv	Sadashiv	Sadashiv
9	3NA14CV059	SANTOSH	Santosh	Santosh	Santosh
10	3NA14CV070	SWATI DATTATREYA J	Swati	Swati	Swat

THIRD YEAR

Sr. No.	USN Number	Name	29/10/2016	5/11/2016	12/11/2016
1	3NA14CV016	DEVARAJ	Devaraj	Devaraj	Devaraj
2	3NA14CV019	J ANKITHA NAYAKA	Ankitha	Ankitha	Ankitha
3	3NA14CV020	K AVINASH	Avinash	Avinash	Avinash
4	3NA14CV022	KHAJA KALEEMUDDIN	Khaja	Khaja	Khaja
5	3NA14CV023	KHANEES FATIMA	Fatima	Fatima	Fatima
6	3NA13CV024	NAYANA M N	Nayana	Nayana	Nayana
7	3NA14CV025	LAXMI JANAKAR	Laxmi	Laxmi	Laxmi
8	3NA14CV026	M AJAY KUMAR	A Jay	A Jay	A Jay

Coordinator

Install and Configure the MATLAB Runtime

Download the MATLAB Runtime Installer from the Web

Download the MATLAB® Runtime from the website
at https://www.mathworks.com/products/compiler/matlab-runtime.html.

Install the MATLAB Runtime Interactively

To install the MATLAB® Runtime:

1. Unzip/Extract the archive containing the MATLAB Runtime installer.

Platform	Steps
Windows®	Unzip the MATLAB Runtime installer. To unzip the installer: Right click the zip file MATLAB_Runtime_R2020a_win64.zip Select **Extract All**, and then follow the instructions.
Linux®	Unzip the MATLAB Runtime installer at the terminal using the unzip command. For example, if you are unzipping the R2020a MATLAB Runtime installer, at the Terminal unzip MATLAB_Runtime_R2020a_glnxa64.zip
macOS	Unzip the MATLAB Runtime installer at the terminal using the unzip command. For example, if you are unzipping the R2020a MATLAB Runtime installer, at the Terminal unzip MATLAB_Runtime_R2020a_maci64.zip

1. Start the MATLAB Runtime installer.

Platform	Steps
Windows	Double-click the file setup.exe from the extracted files to start the installer.

Linux	At the Terminal, type:
	    sudo ./install
	Note
	On Debian® based Linux distributions, you will need to type:
	    gksudo ./install

macOS	At the Terminal, type: ./install **Note** You may need to enter an administrator username and password after you run ./install.

2. When the MATLAB Runtime installer starts, it displays a dialog box. Read the information and then click **Next** to proceed with the installation.

3. Specify the folder in which you want to install the MATLAB Runtime in the **Folder Selection** dialog box.

Note

On Windows systems, you can have multiple versions of the MATLAB Runtime on your computer but only one installation for any particular version. If you already have an existing installation, the MATLAB Runtime installer does not display the **Folder Selection** dialog box because you can only overwrite the existing installation in the same folder.

4. Confirm your choices and click **Next**.

   The MATLAB Runtime installer starts copying files into the installation folder.

5. On Linux and macOS platforms, after copying files to your disk, the MATLAB Runtime installer displays the **Product Configuration Notes** dialog box. This dialog box contains information necessary for setting your path environment variables. Copy the path information from this dialog box and then click **Next**.

6. Click **Finish** to exit the installer.

Install the MATLAB Runtime Non-Interactively

To install the MATLAB Runtime without having to interact with the installer dialog boxes, use one of the MATLAB Runtime installer's non-interactive modes:

- silent—the installer runs as a background task and does not display any dialog boxes
- automated—the installer displays the dialog boxes but does not wait for user interaction

When run in silent or automated mode, the MATLAB Runtime installer uses default values for installation options. You can override these defaults by using MATLAB Runtime installer command-line options or an installer control file.

Note

When running in silent or automated mode, the installer overwrites the default installation location.

Running the Installer in Silent Mode

To install the MATLAB Runtime in silent mode:

1. Extract the contents of the MATLAB Runtime installer file to a temporary folder, called $temp in this documentation.

   Note

   On Windows systems, **manually** extract the contents of the installer file.

2. Run the MATLAB Runtime installer, specifying the -mode option and -agreeToLicense yes on the command line.

   Note

   On most platforms, the installer is located at the root of the folder into which the archive was extracted. On Windows 64, the installer is located in the archives bin folder.

Platform	Command
Windows	setup -mode silent -agreeToLicense yes
Linux	./install -mode silent -agreeToLicense yes
macOS	./install -mode silent -agreeToLicense yes

Note

If you do not include the -agreeToLicense yes the installer will not install the MATLAB Runtime.

3. View a log of the installation.

On Windows systems, the MATLAB Runtime installer creates a log file, named mathworks_*username*.log, where *username* is your Windows log-in name, in the location defined by your TEMP environment variable.

4. On Linux and macOS systems, specify the path variable. The MATLAB Runtime installer displays the log information for Linux and macOS systems at the command prompt, unless you redirect it to a file.

Customizing a Non-Interactive Installation

When run in one of the non-interactive modes, the installer will use the default values unless told to do otherwise. Like the MATLAB installer, the MATLAB Runtime installer accepts a number of command line options that modify the default installation properties.

Option	Description
-destinationFolder	Specifies where the MATLAB Runtime will be installed.
-outputFile	Specifies where the installation log file is written.
-automatedModeTimeout	Specifies how long, in milliseconds, that the dialog boxes are displayed when run automatic mode.
-inputFile	Specifies an installer control file with the values for all of the above options.

Note

The MATLAB Runtime installer archive includes an example installer control file called installer_input.txt. This file contains all of the options available for a full MATLAB installation. Only the options listed in this section are valid for the MATLAB Runtime installer.

Install the MATLAB Runtime without Administrator Rights

To install the MATLAB Runtime as a user without administrator rights on Windows:

1. Use the MATLAB Runtime installer to install it on a Windows machine where you have administrator rights.

2. Copy the folder where the MATLAB Runtime was installed to the machine without administrator rights. You can compress the folder into zip file and distribute to multiple users.

3. On the machine without administrator rights, add the *mcr_root*\runtime*arch* directory onto the user's path environment variable.

Note

You don't need administrator rights for adding directories to a user's path environment variable.

Multiple MATLAB Runtime Versions on Single Machine

MCRInstaller supports the installation of multiple versions of the MATLAB Runtime on a target machine. This allows applications compiled with different versions of the MATLAB Runtime to execute side by side on the same machine.

If you do not want multiple MATLAB Runtime versions on the target machine, you can remove the unwanted ones. On Windows, run **Add or Remove Programs** from the Control Panel to remove any of the previous versions. On Linux, you manually delete the unwanted MATLAB Runtime. You can remove unwanted versions before or after installation of a more recent version of the MATLAB Runtime, as versions can be installed or removed in any order.

MATLAB and MATLAB Runtime on Same Machine

You do not need to install MATLAB Runtime on your machine if your machine has MATLAB installed. The version of MATLAB should be the same as the version of MATLAB that was used to create the compiled MATLAB code. Also, to act as the MATLAB Runtime replacement, the MATLAB installation must include MATLAB Compiler™.

You can, however, install the MATLAB Runtime for debugging purposes.

Modifying the Path

If you install MATLAB Runtime on a machine that already has MATLAB on it, you must adjust the library path according to your needs.

- **Windows**

  To run deployed MATLAB code against MATLAB
  Runtime install, *mcr_root*\ver\runtime\win64 must appear on your system path before *matlabroot*\runtime\win64.

  If *mcr_root*\ver\runtime*arch* appears first on the compiled application path, the application uses the files in the MATLAB Runtime install area.

  If *matlabroot*\runtime*arch* appears first on the compiled application path, the application uses the files in the MATLAB installation area.

- **Linux**

  To run deployed MATLAB code against MATLAB Runtime on Linux, the folder <mcr_root>/runtime/<arch> must appear on your LD_LIBRARY_PATH before *matlabroot*/runtime/<arch>.

- **macOS**

To run deployed MATLAB code on macOS, the <mcr_root>/runtime folder must appear on your DYLD_LIBRARY_PATH before *matlabroot*/runtime/<arch>.

To run MATLAB on macOS or Intel® Mac, *matlabroot*/runtime/<arch> must appear on your DYLD_LIBRARY_PATH before the <mcr_root>/bin folder.

Uninstall MATLAB Runtime

The method you use to uninstall MATLAB Runtime from your computer varies depending on the type of computer.

Windows

1. Start the uninstaller.

   From the Windows Start menu, search for the **Add or Remove Programs** control panel, and double-click MATLAB Runtime in the list.

   You can also start the MATLAB Runtime uninstaller from the *mcr_root*\uninstall\bin*arch* folder, where *mcr_root* is your MATLAB Runtime installation folder and *arch* is an architecture-specific folder, such as win64.

2. Select the MATLAB Runtime from the list of products in the Uninstall Products dialog box.

3. Click **Next**.

4. Click **Finish**.

Linux

1. Exit the application.

2. Enter this command at the Linux prompt:

   rm -rf *mcr_root*

   where *mcr_root* represents the name of your top-level MATLAB installation folder.

macOS

1. Exit the application.

2. Navigate to your MATLAB Runtime installation folder. For example, the installation folder might be named MATLAB_Compiler_Runtime.app in your Applications folder.

3. Drag your MATLAB Runtime installation folder to the trash, and then select **Empty Trash** from the Finder menu.

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOTWARE INSTALLATION & TROUBLESHOOTING

Following are the topics covered for II & III year students of Mechanical and Civil departments during the training sessions on software installation & troubleshooting.

Topics Covered

Sessions	Date	Time	Topics Covered
Session – 1	31/10/2015	2.00pm to 5.00pm	What is software installation? Types & procedure.
Session – 2	7/11/2015	2.00pm to 5.00pm	Installation of Matlab
Session – 3	14/11/2015	2.00pm to 5.00pm	Common PC problems & How to troubleshoot them

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 101

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2016-17

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON SOFTWARE INSTALLATION &TROUBLESHOOTING

Training program for CE and ME department students held on 29/10/2016 by Mr. Shivprasad

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2017-2018

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	08
7			Study Material	11
8			Topics Covered	25
9			Photo	26

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

NET's

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

SHORT TERM TRAINING PROGRAMME

1.	ACADEMIC YEAR	2017-2018
2.	TYPE OF THE PROGRAMME PROPOSED	Computing Skill
3.	TITLE OF THE PROGRAMME·	Basic web designing
4.	BROAD OBJECTIVE OF THE PROGRAMME	To enhance student to understand the usage of designing the web and implement the knowledge
5.	NAME OF THE DEPARTMENT	CSE, EEE, ECE
6.	TARGETED GROUP OF STUDENTS	Second and Third Year
7.	DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR	09 hrs
8.	NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME	03 days
9.	PROPOSED DATE AND DURATION OF THE PROGRAMME	16/09/2017, 23/10/2017, 30/09/2017
10.	TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME	09 hrs
11.	NUMBER OF HOURS REQUIRED PER DAY	03 hrs
12.	LOCATION DETAILS	NIT Auditorium
13.	MINIMUM NUMBER OF PARTICIPANTS	70
14.	DETAILS OF RESOURCE PERSONS	Mrs. Supriya Purohit, Ms. Bhargava G.
15.	EVENT ORGANISERS(STUDENTS)	B. Lavanya, Priyanka
16.	FACULTY COORDINATOR	Ms. Shanti E.
17.	PROGRAMME PROPOSED BY	CSE Department

Coordinator

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10*

NET/NIT/PO/CIR/2017-18/ OO5   14/08/2017

CIRCULAR

The HoD of ECE and EEE department are here by informed that department of CSE is organizing training sessions for all the II & III year students of CSE, ECE, and EEE departments. The training sessions on Basic web designing will be conducted as per the following schedule. All the students should attend the training class without fail.

> Session – 1 : 16/09/2017– Time: 2.00pm to 5.00pm
>
> Session – 2 : 23/10/2017– Time: 2.00pm to 5.00pm
>
> Session – 3 : 30/10/2017– Time: 2.00pm to 5.00pm

Coordinator   HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 103

Copy to,

1) Notice Board
2) HoD's – CSE, ECE, EEE
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

To,   **Date: 10.08.2017**
The Principal
NIT, Raichur

Subject: Approval of training program and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2017-2018

Respected Sir,

This is with respect to the approval of training program on Basic web designing and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2017-2018. Following are the details.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Ms. Bhargava G.	B. Tech	Computer Science	2 Years	16/09/2017, 23/10/2017, 30/09/2017
III	Mrs. Supriya Purohit	M. E.	Software Engineering	6.5 Years	16/09/2017, 23/10/2017, 30/09/2017

I request you to approve for the same. Thanking you in anticipation.

Yours Sincerely,

forwarded to
principal sir for
Head of Department approval
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 104

Coordinator

Permitted

PRINCIPAL
Navodaya Institute of
RAICHUR-5

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting Basic web designing training classes to all the II & III year students of CSE, ECE, EEE departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Ms. Bhargava G.	B. Tech	Computer Science	2 Years	16/09/2017, 23/10/2017, 30/09/2017
III	Mrs. Supriya Purohit	M. E.	Software Engineering	6.5 Years	16/09/2017, 23/10/2017, 30/09/2017

Coordinator

HOD

Head of Department,
Computer Science & Engineerin
Navodaya Institute of Technolo
RAICHUR-584 1°

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC WEB DESIGNING

STUDENT ENROLLMENT LIST (CSE)
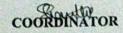
SECOND YEAR		
Sr. No.	USN Number	Name
1	3NA16CS004	ANUSHA M
2	3NA16CS005	APOORVA M R
3	3NA16CS007	BHAGYASHREE
4	3NA16CS008	E SWETHA
5	3NA16CS009	K JAHNAVI
6	3NA16CS014	SHRUSTI MALI PATIL
7	3NA16CS015	SHWETA
8	3NA16CS016	SINDHU PATIL
9	3NA16CS017	SHIRISHA DESHPANDE
10	3NA16CS018	SRI LAKSHMI K
11	3NA16CS020	SUSHMITHA PATIL
12	3NA16CS021	SYEDA SANAYYA FATIMA
13	3NA15CS013	PRIYANKA
THIRD YEAR		
1	3NA15CS002	ANKITH KUMAR RANJALKAR
2	3NA15CS004	B, LAVANYA
3	3NA15CS005	CHAITRA PUJAR
4	3NA15CS006	DEEPTHI C
5	3NA15CS008	M.K LAKSHMI MANASA
6	3NA15CS010	NAGARADONA SAI APARNA
7	3NA15CS011	NIKHITHA
8	3NA15CS024	VATHSALA T
9	3NA15CS025	VIDYA

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC WEB DESIGNING

STUDENT ENROLLMENT LIST (EEE)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA14EE004	BIRU NAVALLI WAGHMODE
2	3NA14EE005	HANAMANT DHOOLSHETTI
3	3NA14EE006	M SHAKEER AHMED
4	3NA14EE009	RUKSANA BEGUM
5	3NA14EE010	SANIYA AYESHA L
6	3NA14EE004	BIRU NAVALLI WAGHMODE
7	3NA15EE404	JAVED HUSSAIN
8	3NA15EE406	MAHESH H
9	3NA15EE407	MOHAMAD AKHIL
10	3NA15EE409	NAGALINGAMMA

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA13EE012	SUNIL
2	3NA13EE013	SUNIL KUMAR
3	3NA13EE014	SYEDA SUMIYA ANJUM
4	3NA13EE015	VIJAYALAXMI
5	3NA14EE401	ANILKUMAR SHIVASHANKAR
6	3NA14EE402	APOORVA
7	3NA14EE403	ARUNKUMAR T. S.
8	3NA14EE411	RENUKA
9	3NA14EE414	SARITHA
10	3NA14EE415	SHAIK ZAHEER PASHA
11	3NA14EE416	SHIVAPPA

COORDINATOR
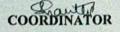
NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC WEB DESIGNING

STUDENT ENROLLMENT LIST (ECE)

SECOND YEAR		
Sr. No.	USN Number	Name
1	3NA17ECE003	Aishwarya
2	3NA17ECE005	C GayathriVarma
3	3NA17ECE006	Hanmantharao Mukhtedar
4	3NA17ECE007	Harshita Gangaked
5	3NA17ECE008	K Rajeetha
6	3NA17ECE009	Lakshmi P Aretnoor
7	3NA17ECE0010	Pratheek
8	3NA17ECE0011	Rajani
9	3NA16EC005	BASAVAPRABHU
10	3NA16EC017	SWATHI
THIRD YEAR		.
1	3NA16EC006	SHASHANK KUMAR REDDY
2	3NA16EC007	FATHIMA AFAF
3	3NA16EC008	J SHRAVANI
4	3NA16EC009	JAVERIA IRAM
5	3NA16EC010	MAHALAXMI M
6	3NA16EC013	SANIYA NAYYER
7	3NA16EC014	SHIVAMURTHY K
8	3NA16EC023	RAKESH T
9	3NA16EC403	SHRUTI

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC WEB

DESIGNING

STUDENT ATTENDANCE SHEET (CSE)

SECOND YEAR			16/09/2017	23/09/2017	30/09/2017
Sr. No.	USN No.	Name			
1	3NA16CS004	ANUSHA M	Anusha	Anusha	Anusha
2	3NA16CS005	APOORVA M R	Apoorva	Apoorva	Apooree
3	3NA16CS007	BHAGYASHREE	Bagu	Bacuy	Bacuy
4	3NA16CS008	E SWETHA	Swel	Swee	Ab
5	3NA16CS009	K JAHNAVI	K.jahnavi	k.jahnavi	K.jahnavi
6	3NA16CS014	SHRUSTI MALI PATIL	8	8	8
7	3NA16CS015	SHWETA			
8	3NA16CS016	SINDHU PATIL	Sindhupatil	Sindhupatil	Sindhupatil
9	3NA16CS017	SHIRISHA DESHPANDE	shirisha	Ab	Shiri
10	3NA16CS018	SRI LAKSHMI K	Srilard	Srilari	Srilari
11	3NA16CS020	SUSHMITHA PATIL	Spatil	Spatil	Spatil
12	3NA16CS021	SYEDA SANAYYA FATIMA	Syada	Syda	
13	3NA15CS013	PRIYANKA	Priya	Priya	Ab
THIRD YEAR					
1	3NA15CS002	ANKITH KUMAR RANJALKAR	Ankith		Ankith
2	3NA15CS004	B. LAVANYA	Lavanya	Lauuy	Ab
3	3NA15CS005	CHAITRA PUJAR	Deeph	Deeph	Deeph
4	3NA15CS006	DEEPTHI C	Deepthi	Deepthic	Deepthic
5	3NA15CS008	M.K LAKSHMI MANASA	Oakshi	Quble	Ab
6	3NA15CS010	NAGARADONA SAI APARNA	N.aparna	N.aparna	N.aparna
7	3NA15CS011	NIKHITHA	Nikitha	Nikith	Nikitha
8	3NA15CS024	VATHSALA T	Vathsala	Vathsala	Vathsala
9	3NA15CS025	VIDYA	Vidya	Vidya	Vidya

Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC WEB

DESIGNING

STUDENT ATTENDANCE SHEET (EEE)

SECOND YEAR
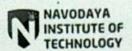
Sr. No.	USN Number	Name	16/09/2017	23/09/2017	30/09/2017
1	3NA14EE004	BIRU NAVALLI WAGHMODE	Biru	BNW	Ab
2	3NA14EE005	HANAMANT DHOOLSHETTI	Hant	Hant	Hant
3	3NA14EE006	M SHAKEER AHMED	Ahmed	Ahmed	Ahmed
4	3NA14EE009	RUKSANA BEGUM	Ruksana	Ab	Ruksh
5	3NA14EE010	SANIYA AYESHA L	Saniya	Saniya	Saniya
6	3NA14EE004	BIRU NAVALLI WAGHMODE	Navalli	Novalli	Ab
7	3NA15EE404	JAVED HUSSAIN	Javed	Javed	Javed
8	3NA15EE406	MAHESH H	Nu	Nu	Nu
9	3NA15EE407	MOHAMAD AKHIL	Akhil	Akhil	Akhil
10	3NA15EE409	NAGALINGAMMA	Nagalingamma	Ab	Nagalamma

THIRD YEAR

Sr. No.	USN Number	Name	16/09/2017	23/09/2017	30/09/2017
1	3NA13EE012	SUNIL	Ab	Sunil	Sunil
2	3NA13EE013	SUNIL KUMAR	Sunil	Sunil	Sunil
3	3NA13EE014	SYEDA SUMIYA ANJUM	Syeda.	Syeda.	Syeda.
4	3NA13EE015	VIJAYALAXMI	Ab	Laxmi	Laxmi
5	3NA14EE401	ANILKUMAR SHIVASHANKAR	Anil	Anil	Anil
6	3NA14EE402	APOORVA	Apoorva	Ab	Apoorva
7	3NA14EE403	ARUNKUMAR T. S.	Arunk	Arunk	Arunk
8	3NA14EE411	RENUKA	Renuka	Renuka	Renuka
9	3NA14EE414	SARITHA	Saritha	Saritha	Saritha
10	3NA14EE415	SHAIK ZAHEER PASHA	Pasha	Pasha	Pasha
11	3NA14EE416	SHIVAPPA	Ab	Shivppa	Shivppa

Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC WEB DESIGNING

STUDENT ATTENDANCE SHEET (ECE)

SECOND YEAR

Sr. No.	USN Number	Name	16/09/2017	23/09/2017	30/09/2017
1	3NA17ECE003	Aishwarya			
2	3NA17ECE005	C GayathriVarma			
3	3NA17ECE006	Hanmantharao Mukhtedar		Ab.	
4	3NA17ECE007	Harshita Gangaked			
5	3NA17ECE008	K Rajeetha			
6	3NA17ECE009	Lakshmi P Aretnoor			
7	3NA17ECE0010	Pratheek			
8	3NA17ECE0011	Rajani			
9	3NA16EC005	BASAVAPRABHU			
10	3NA16EC017	SWATHI			

THIRD YEAR

Sr. No.	USN Number	Name	16/09/2017	23/09/2017	30/09/2017
1	3NA16EC006	SHASHANK KUMAR REDDY			
2	3NA16EC007	FATHIMA AFAF			
3	3NA16EC008	J SHRAVANI		Ab	
4	3NA16EC009	JAVERIA IRAM			
5	3NA16EC010	MAHALAXMI M			
6	3NA16EC013	SANIYA NAYYER			
7	3NA16EC014	SHIVAMURTHY K			
8	3NA16EC023	RAKESH T			
9	3NA16EC403	SHRUTI			

Coordinator

Creating a Web Page Using Microsoft Word

Microsoft Word is normally used to create documents such as memos, letters, or reports. However, you can also use Word to create Web pages. A special template, *Web Pages*, contains the formatting necessary to get you well on your way to completing a Web page. To create a Web page in Word, you simply design the page as a document, using a Web page template if you like, and then save the document as an HTML document. When you save an HTML document, a folder is saved along with it. The folder, containing images and information relevant to the formatting of the Web page, is placed on the same disk and in the same folder location as the HTML document.
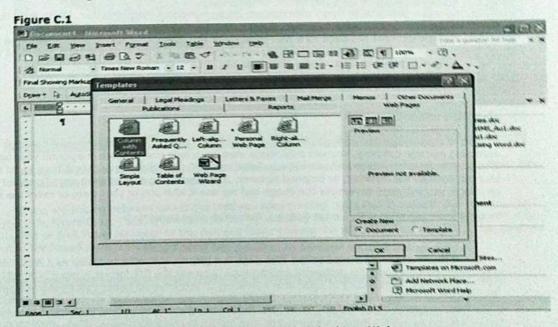
Creating a Home Page

A home page is the first page that visitors will see when they access your Web site. In many cases, the home page is the entire Web site, but you have the option of including other pages that can be linked to the home page. To create a home page using Word, you will probably want to use either a Web page template or the Web Page Wizard. Both items are available when you select the Web Page option from the General Templates area.

To create a home page:

1. Open Word (Click Start, All Programs, Microsoft Word).
2. Click File, New. In the New Document task pane, click General Templates. Click the Web Pages tab, as shown in Figure C.1.

Figure C.1

A Web Page template provides assistance with developing a Web page.

3. Choose a Web page style or let the Web Page Wizard guide you through the steps of creating a Web page. The page shown in Figure C.2 was based on the *Left Aligned Column* style.

Figure C.2

This Web page was developed using Word's Left Aligned Column style.

4. A Web page structure appears, in which you can click and drag to select a section to change, and then type text to replace the selection. Change the heading, and replace existing text with your own. Delete any existing text that you no longer need as a placeholder.

5. Change the attributes of any text. You can change text's font size, type, or color, and apply any attributes, such as boldface, italics, or underline.

6. To add a background color, click Format, Background and choose a color. If you want to include a fill effect instead of a solid-color background, click Format Background, Fill Effects.

7. Periodically save the page as a Web page. Click File, Save As. Click Web Page, give the page a name, indicate the location (disk and folder) where the file should be saved, and click Save. A Web page filename cannot contain spaces (2004Reunion is OK; 2004 Reunion is not.)

Including Images

Seldom is a Web page entirely text. Most include images and even animation to make the page more appealing and eye-catching. You will most likely want to include one or more images on your page, as well. Web page images can be pictures from your digital camera; clip art that you collect from Word or from other sources, such as the Internet; or scanned pictures. If you are using a Word Web page template that includes an image, you will need to remove the image and replace it with one of your own, or leave the space empty.

To include an image on a Web page (using a Word Web page template):

1. Click the image to be removed or replaced, and press Delete.
2. If the image to be placed on the Web page is a picture, it should be saved as a JPEG file. The JPEG file format is best for displaying photographs, whereas the GIF format is more often used for line drawings, large blocks of color, and animation. If you have an image editor, you can open the image in that software and save it as a JPEG file. Your image editor might give you the option of saving a file as a Web-ready picture. When you choose the Web-ready option, the picture is automatically saved as a JPEG file in an appropriate size for display on a Web page. If you don't have an image editor, you can open the picture in Paint (Click Start, All Programs, Accessories, Paint), and change the file type to JPEG, if necessary, before saving it. To change the file type, click File, Save As, and then select JPEG from the drop-down list beside the file type area.
3. To place the image on the Web page that you are developing, click where you want the picture to go, and click Insert, Picture, From File (or Insert, Picture, Clip Art if you are selecting from Word's clip art inventory). Navigate to the disk and folder containing the picture to be inserted, and double-click the image file.
4. Resize the image by clicking to select it and then clicking and dragging a corner handle.
5. If you are using a Word Web page template, you will probably be able to type text beside and beneath the inserted image. If, for some reason, you are not able to type beside the image, you must format the image to allow that to occur. Right-click the image, and select Format Picture from the context menu. Click the Layout tab. Click Square. Click OK. At that point, you can type text beside and beneath the picture.
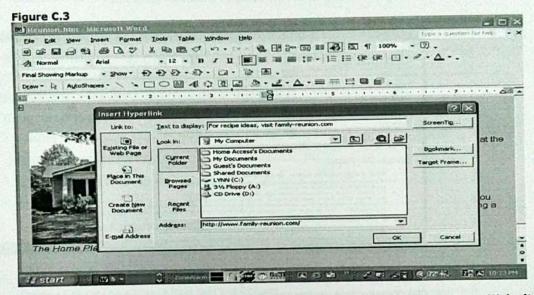
Linking Web Pages

The next time you are on the Internet, take a careful look at any Web page. More likely than not, you will be

mouse pointer becomes an arrow or pointing hand when you move over the link. Links connect to other Web pages so that you can easily move among pages without typing new page addresses. When creating a Web page using Word, you can create links to other pages that you plan to create or to other pages already on the Internet.

To link pages (using Word):

1. Create as many pages as you want to include in your Web site. Each Web page is a Word file.
2. To link the Web pages that you have created, or to link to another Web page, you must include one or more hyperlinks on your home page.
3. On the home page, type text for a hyperlink. For example, if you want to include a link on your home page to the Reunions.com page, type some text, such as "For reunion recipe ideas, click here," as shown in Figure C.4a. Then click and drag to select the link text, and click Insert, Hyperlink. At the dialog box, shown in Figure C.3, click Existing File or Web Page. Type the Web address of the Web page to link. Click OK.

Figure C.3

Using the Insert Hyperlink dialog box, you can link text in a Word document to a Web site, so that the text becomes a hyperlink.

4. If you are linking between two pages that you have created, type text to indicate the link, such as that shown in Figure C.4a. Then, create a hyperlink by selecting the text and clicking Insert, Hyperlink. Click Existing File or Web Page. Navigate to the disk and folder holding the page to be linked, and double-click the page file. The linked page is shown in Figure C.4b.

Figure C.4

1. **Text linking to another Web page on your Web site**
2. **Text linking to another Web Site**
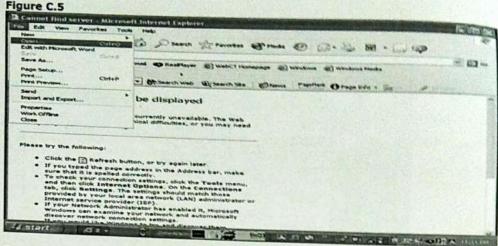
Text on one page (a) can be used to link to another page (b).

Previewing Your Web Pages
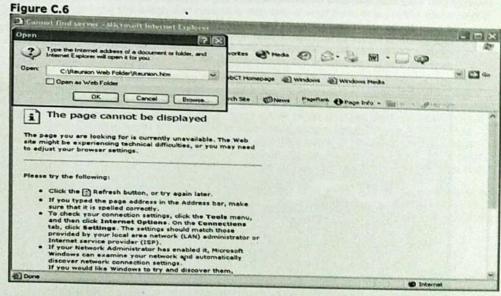
It is common practice to design a Web page *offline*, which means that you can spend as much time as necessary perfecting its design before you actually place it on the Internet. If you are using Word to design the page, you will complete the document and save it as an HTML file. At that point, you will certainly want to check on how it will look when displayed online. However, you don't need to be online to check its appearance. You can simply use your browser, even offline, to open and preview the Web page.

To preview a Web page:

3. Open your browser by double-clicking the icon on the desktop or by locating it on the Start, All Programs menu. Click File, Open, as shown in Figure C.5.

Figure C.5

Open your Web page file in your browser to preview it.

4. Click Browse, and navigate to the disk and folder in which your home page is stored (Figure C.6). Click OK.

Figure C.6

You must indicate where the home page file is stored.

The page will be displayed exactly as it would look on the Internet. Click to test any hyperlink. Click Back to return to the home page from a linked page. Close your browser.

Create a Website for Denise Harrison's English Writing Class

Prepared by the Student Multimedia Studio
Visit http://www.library.kent.edu/sms for more information and tutorials.

Contents

What you will be creating (in a nutshell):

1. A **Web Page** that you will create using MS Word then use the "Save as Webpage" feature in Word to convert the Word document into a Web Page.
2. The following **Word Documents** that you will also create using MS Word:
   - **A Release Form**
   - **A Philosophy Statement**
   - **A Reflection**

   NOTE: You will be creating "hyperlinks" from your "Web Page" to these "word documents"

   You will also be creating hyperlinks to other websites and adding pictures and text to your webpage. Professor Harrison will give you more information about what she expects you to include on your web page.

Create a Folder on your Jump Drive

Before you do anything, create a folder on your jump drive.

For this tutorial we are going to name the folder: **english**

Make sure that you use all lower-case letters! Do not capitalize the "e" in english.

Create the "Documents"

1. Open MS Word. You should have a blank page.
2. Type the word, **release**, on the page.
3. Choose: **Save as > Word 97-2003 Document**

   > *Do not save as a Word 2007 document (with a .DOCX extension) It will not work as a hyperlinked document on a website!*

4. In the **File name:** box, type in, **release**
   Use all lower case letters!
5. Browse to the **english folder** you created on your Jump Drive.
6. Click **SAVE**

Now, change the text on the word document you just saved from **release** to **philosophy**.

7. Choose: **Save as > Word 97-2003 Document**
8. In the **File name:** box, type in, **philosophy**
      Use all lower case letters!
9. You should still be saving in the **english folder**. If not browse to the **english folder** you created on your Jump Drive.
10. Click **SAVE**

   ... and one more time

11. Change the text on the word document from **philosophy** to **reflection**.
12. Choose: **Save as > Word 97-2003 Document**
13. In the **File name:** box, type in, **reflection**
      Use all lower case letters!
14. You should still be saving in the **english folder**. If not browse to the **english folder** you created on your Jump Drive.
15. Click **SAVE**

You now have all three "word" documents saved inside the English folder on your Jump Drive. You might want to look inside the folder just to be sure. You should see:

release.doc
philosophy.doc
reflection.doc

Close Word.

Create the Web Page

1. Open Word (you should have a blank page)
2. Go to **View** (at the top of Word) and choose **Web Layout**.

Create a "table"

1. Click on the **Insert tab** on the **Main Toolbar**
2. Choose **Table**
3. Create a **1x1** table (one row and one column) as shown below.

[**In Word 2003:** Choose **Table > Insert > Table** then enter the # of Rows and Columns.]

2

The table will be placed on the left side of the page (Aligned to the Left). You can leave it aligned to the left or you could CENTER THE TABLE ON THE PAGE (Recommended).

Center the Table on the Page

1. **Right click** anywhere on the Table
2. Choose **Table Properties** from the drop down box that opens
3. Under **"Alignment"**, click on the **CENTER icon.**
4. Click **OK**

The table will move to the center of the page.

Set the Preferred Width for the Table

1. Right click anywhere on the Table
2. Choose **Table Properties** from the drop down box that opens
3. Check the **Preferred Width** box.
4. Enter the number **"9"** and make sure it's set to **Measure in: Inches**
5. Click **OK**

The table will now always be 9" wide no matter what resolution the monitor is when being viewed later as a web page in Internet Explorer.

Add a Title

Inside the Table, type the word, **Title,** or whatever you want. *See below*

Title

Add a Row for the Navigation Menu

1. Right click inside the Table
2. Choose **Insert > Insert Rows Below** from the drop down box that opens
   A new row will be created below the top row
3. In the new row, type in the following text (which will eventually be the links to the word documents you created and saved earlier) leaving about 5 to 10 SPACES between the "links". *Do not use the "Tab" key to create the space between the text links.*
   See below

Title		
Release Form	Philosophy Statement	Reflection

You can resize and center text and if desired.... *see below*

Title		
Release Form	Philosophy Statement	Reflection

Create the Text Hyperlinks to the Word Documents

1. Select the text, **Release Form**
2. Choose **Insert > Hyperlink**
3. Browse to the **english folder** on your Jump Drive
4. Find and click on the word document, **release.doc**
5. Click **OK**
6. Repeat this with the text, **Philosophy Statement** and **Reflection**, choosing the word documents, **philosophy.doc** and **reflection.doc** for each of the hyperlinks.

Your table and text should look something like this now...

Title		
Release Form	Philosophy Statement	Reflection

Add another row for more content

1. Right click inside the second (bottom) row on the table.
2. Choose **Insert > Insert Rows Below** from the drop down box that opens

A new row will be created as shown below

Title		
Release Form	Philosophy Statement	Reflection

At this point you could just start adding text and pictures inside the bottom row but to control the placement of text and pictures you should create 2 or more columns on the row.

Creating Columns on a Row to Hold Text and Pictures

1. Right click inside the (bottom) row on the table.
2. Choose **Split Cells** then enter the number of columns you want to create in that cell

The example below shows that the bottom cell has been split into 2 columns. Additionally, the "borders" have been moved to allow more room for text on the left and a small picture on the right. As you type in text or insert pictures the height of the row will automatically adjust.

You can add more rows, but after splitting a row into 2 or more columns, new rows will have the same number of columns. You can use "MERGE CELLS" to create one cell out of 2 or more cells.

Title	
Release Form Philosophy Statement Reflection	
You can left justify the text in this cell (column) and adjust the border to the right to make this cell wider. The height will increase as you type in text. A "random" picture has been inserted into the cell on the right. Pictures can be resized by clicking on them then using the CORNER handles to drag them to any size needed.	
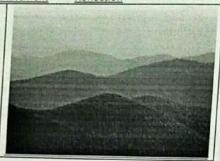
You could add more rows if desired to hold more pictures and text on the same rows. You could also add a row, then SELECT all the CELLS on that ROW and Choose **MERGE CELLS** to create just one cell (or column) on that row.

Hiding Table and Cell Borders

Notice that the table and its rows and columns are indicated by a solid black line. Most web pages don't show these so you may want to make them "invisible". To hide them:

1. Open **Table Properties** as previously described
2. Click on the **Borders and Shading button**
3. Choose **"None"** under the **Borders Tab**
   The borders will "disappear"

In **Word 2007**, to "show" the borders so you can see them while your working on your page, select **Table Tools > Layout > View Gridlines**. The Table, Rows and Column edges will appear as dotted lines but will be invisible when viewed as a web page.

[In **Word 2003**, the borders remain "visible" as light gray lines but will disappear when viewed as a web page]

5

Creating Hyperlinks to other Web Sites

1. Type in text that you will use as a "text" hyperlink.
2. Select the text by clicking and dragging a selection over the text (as you did for the navigation menu hyperlinks).
3. Right click on the selected text and choose Hyperlink then either:
   a. Type in the full URL for the Web Site in the Address window or
   b. Copy and Paste the URL from a Browser Address window into the Hyperlink Address Window.

Saving the Web Page

First:
Save as a Word Document

Before converting your Word Document to a Web Page, first save it as a Word Document

1. Choose: **Save as > Word 97-2003 Document**

> *Because you are just using this word document to create a Web Page, you could save it as a Word 2007 document (with a .DOCX extension). But for consistency, just save it as a 97-2003 document.*

2. In the **File name:** box, type in, **index**

Use all lower case letters!

3. Browse to the **english folder** you created on your Jump Drive.
4. Click **SAVE**

A Good Thing to Know and Remember:
If you want to make changes/revisions to your **Web Page** later, you must:

1. Reopen and make the changes to the **Original Word Document (index.doc), not to the Web Page (index.htm)**
2. **Resave it as a Word Document (index.doc) again,** then
3. **Save it as a web page (index.htm) again**
                    (see instructions below)
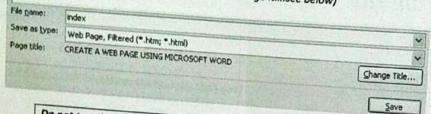
Next:
<u>Save as a Web Page</u>

1. With the Word 2007 Document open, choose the **OFFICE BUTTON** and select **SAVE AS > OTHER FORMATS**
2. Click on the arrow next to the **SAVE AS TYPE** box and choose: **Web Page, Filtered (*.htm; *.html)** *(see below)*
3. In the **File Name:** type **index**   .

(it should already be index but if it isn't, change it....see below)

File name:	index
Save as type:	Web Page, Filtered (*.htm; *.html)
Page title:	CREATE A WEB PAGE USING MICROSOFT WORD

Change Title...

Save

> **Do not type in index.htm.** When you click **SAVE** the .htm extension will automatically be added to the word "index".
>
> **Use only lower-case letters!** Do not capitalize any letters in the word **index**. If you do, the web page won't open if you follow the remaining directions in this tutorial.

Take a look inside your **english folder**...

You should now have the following files and a new folder inside the english folder:

> **index.doc**
> *(this could also be index.docx if you saved it as a Word 2007 document and is also the document you MUST open and edit if you want to make changes to your web page)*
>
> **index.htm**
> *(this is your web page but you must not open and make changes to it directly. Only open the index.doc file, make changes to it then Save it as a Web Page)*
>
> **release.doc**
> **philosophy.doc**
> **reflection.doc**
>
> These are the Word Documents that you created, saved and then created hyperlinks to from the web page. These MUST be .doc files!
>
> **An index_files folder**
> *(this is a folder that is automatically created when you saved the word document as a web page. It holds the pictures you inserted on your web page)*
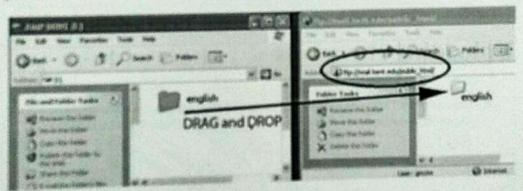
Uploading Your Web Site to the Kent Personal Server

1. Open **MY COMPUTER**
   Don't open internet Explorer or any other Web Browser for this.

2. In the Address Bar for My Computer type-in: ftp://mail.kent.edu/public_html

3. Enter your **Flashline User Name** and **Flashline Password**

4. **Copy and Paste** or **Drag and Drop** your website folder, *english*, from you local computer (probably saved on your Jump Drive) to the open **My Computer Window.**

Notice that the Address bar on the Kent Personal Server shows that you are **INSIDE** the public_html folder on the "server" ... the Circled Area ...
(See Illustration)

Your Local Computer
(your Jump drive)

Kent Personal Server
(ftp://mail.kent.edu/public_html)

> **Note:** You should close all open word documents on the local computer before uploading them to the server. If you don't, you might get an error message when you try to upload the files.

Your website is now on the server and can be viewed by anyone in the world.... If they know the correct "URL" address to find it.

8

Viewing your Website on the Internet

1. Open **Internet Explorer** (or any Browser)
2. In the Address type-in:
   http://www.personal.kent.edu/~yourusername/english

Your web page should open in the browser.

> *Note: If you didn't name your folder, english, then you would replace the word "english" at the end of the above URL address with whatever word you used for your folder.*
>
> ***The URL is CASE SENSITIVE!*** *If you capitalized the folder name as: English, then you need to capitalize the word English in the URL!*
>
> *If you didn't name your webpage, **index.htm**, then it will not open either. If you named your page anything other than **index.htm** (all lower-case letters), used a capital "I" as in **Index.htm** or used any other filename for your home page, you will have to add that filename to the end of the URL, after folder name.*

Uploading Revisions

1. Login to the server using the directions above.
2. **Copy and Paste** or **Drag and Drop** your website folder, *english*, from you **local computer** (probably saved on your Jump Drive) to the open **My Computer Window** as before

   BUT...

This time make sure you drop the folder into a <u>blank area</u> on the server.

DO NOT DROP THE FOLDER <u>ON TOP OF THE EXISTING FOLDER</u> ON THE SERVER!

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC WEB DESIGNING

Following are the topics covered for II & III year students of CSE, ECE, and EEE departments during the training sessions on Basic web designing.

Topics Covered

Sessions	Date	Time	Topics Covered	Outcome
Session – 1	16/09/2017	2.00pm to 5.00pm	Creating a Web page using Microsoft word.	Create and apply appropriate techniques, resources and modern IT tools including prediction and modelling with understanding of limitation.
Session – 2	23/10/2017	2.00pm to 5.00pm	How to create a folder in jump drive, create web page.	
Session – 3	30/09/2017	2.00pm to 5.00pm	Uploading your website to personal server, viewing our website on internet.	

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10⁴

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON BASIC WEB DESIGINING

Training program for CSE, EEE and ECE department students held on 23/10/2017 by Mrs. Supriya Purohit

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2017-2018

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	07
7			Study Material	09
8			Topics Covered	28
9			Photo	29

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

NET's

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

SHORT TERM TRAINING PROGRAMME

No.		
1.	ACADEMIC YEAR	2017-2018
2.	TYPE OF THE PROGRAMME PROPOSED	Computing Skill
3.	TITLE OF THE PROGRAMME	Basic Computer assembly
4.	BROAD OBJECTIVE OF THE PROGRAMME	To boost the students to understand implement the different techniques of assembling the computer.
5.	NAME OF THE DEPARTMENT	Mechanical, Civil
6.	TARGETED GROUP OF STUDENTS	Second and Third Year
7.	DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR	09 hrs
8.	NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME	03 days
9.	PROPOSED DATE AND DURATION OF THE PROGRAMME	07/10/2017, 14/10/2017, 21/10/2017
10.	TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME	09 hrs
11.	NUMBER OF HOURS REQUIRED PER DAY	03 hrs
12.	LOCATION DETAILS	NIT Auditorium
13.	MINIMUM NUMBER OF PARTICIPANTS	75
14.	DETAILS OF RESOURCE PERSONS	Lavanya Pujari, Mrs. Jayashree
15.	EVENT ORGANISERS(STUDENTS)	Sindhu Patil, Nagaradona Sai Aparna
16.	FACULTY COORDINATOR	Mr. Chetan Gudi
17.	PROGRAMME PROPOSED BY	CSE Department

Coordinator

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

HOD
Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 101

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

To,   Date: 10.08.2017
The Principal
NIT, Raichur

Subject: Approval of training program and resource persons for II and III year students of Mechanical and Civil department for academic year 2017-2018

Respected Sir,

This is with respect to the approval of training program on Basic Computer assembly and resource persons for II and III year students of Mechanical and Civil department for academic year 2017-2018. Following are the details.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Lavanya Pujari	M. Tech	Computer Science	3 Years	07/10/2017, 14/10/2017, 21/10/2017
III	Mrs. Jayashree	M. Tech	Computer Science	5.5 Years	07/10/2017, 14/10/2017, 21/10/2017

I request you to approve for the same. Thanking you in anticipation.

Yours Sincerely,

forwarded to principal
sir, for tival approval

permitted

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10

PRINCIPAL
Navodaya Institute of Technology
RAICHUR-584 10

Coordinator

NET/NIT/PO/CIR/2017-18/ 006   14/08/2017

<u>CIRCULAR</u>

The HoD of Mechanical and Civil department are here by informed that department of CSE is organizing training sessions for all the II & III year students of Mechanical and Civil departments. The training sessions on Basic computer assembly will be conducted as per the following schedule. All the students should attend the training class without fail.

Session – 1 : 07/10/2017– Time: 2.00pm to 5.00pm

Session – 2 : 14/10/2017 –. Time: 2.00pm to 5.00pm

Session – 3 : 21/10/2017 – Time: 2.00pm to 5.00pm

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10

Copy to,

1) Notice Board
2) HoD's – Mechanical, Civil
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting Basic computer assembly

training classes to all the II & III year students of Mechanical, Civil departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Lavanya Pujari	M. Tech	Computer Science	3 Years	07/10/2017, 14/10/2017, 21/10/2017
III	Mrs. Jayashree	M. Tech	Computer Science	5.5 Years	07/10/2017, 14/10/2017, 21/10/2017

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 104

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC
COMPUTER ASSEMBLY

STUDENT ENROLLMENT LIST (MECHANICAL)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA15ME001	ABHISHEK PATIL
2	3NA15ME002	ANANDA
3	3NA15ME012	M ASHOK KIRAN
4	3NA15ME017	MD MASHAQ
5	3NA15ME019	MOHAMMED ABDUS SAMAD
6	3NA15ME021	MOHAMMED YUSUF
7	3NA15ME035	SHIVARAJ
8	3NA15ME036	SOUMYA
9	3NA15ME041	SYED SUBAN
10	3NA16ME001	ABHISHEK PANASHETTI

THIRD YEAR

1	3NA15ME018	MD WAJAHATH HUSSAIN
2	3NA15ME022	NIKHIL
3	3NA15ME023	NIKHIL KULKARNI
4	3NA15ME026	PRAVEEN GOUDA RAMPUR
5	3NA15ME028	RAHEEM
6	3NA15ME030	RAKESH G M
7	3NA15ME033	SHABAZ SIDDIQVE MD
8	3NA15ME039	SUBHAN AHMED
9	3NA15ME042	TUSHAR

COORDINATOR

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC COMPUTER ASSEMBLY

STUDENT ENROLLMENT LIST (CIVIL)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA15CV018	INDIRA
2	3NA15CV023	MOHAMMED ASLAM
3	3NA15CV034	NISAR AHMED
4	3NA15CV042	RANJITH KUMAR MURARI
5	3NA15CV046	SAIF ALI AHMED
6	3NA15CV054	SOUDAGAR AAMER
7	3NA16CV006	BHARATH KUMAR
8	3NA16CV007	BHARATH R B
9	3NA16CV008	BHAVYASHREE
10	3NA16CV009	C VITTAL MURTHY

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA14CV017	GURUNATH REDDY
2	3NA14CV039	MD ZEESHAN JUNAIDH
3	3NA14CV046	P AKSHATA
4	3NA14CV057	SADASHIVAYYA
5	3NA14CV070	SWATI DATTATREYA J
6	3NA14CV077	VIRUPAKSHA
7	3NA15CV001	A SHIVANI
8	3NA15CV004	AKSHATHA R
9	3NA15CV005	AMREEN FATIMA
10	3NA15CV006	ANANTHALAKSHMI

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC
COMPUTER ASSEMBLY
STUDENT ATTENDANCE SHEET (MECHANICAL)

Sr. No.	USN Number	Name	07/10/2017	14/10/2017	21/10/2017
1	3NA15ME001	ABHISHEK PATIL	A Patil	A. Patil	A patil
2	3NA15ME002	ANANDA	Anand	Ab.	Anand
3	3NA15ME012	M ASHOK KIRAN	Kiran	Kiran	Kiran
4	3NA15ME017	MD MASHAQ	Ab	Mashaq	Mashaq
5	3NA15ME019	MOHAMMED ABDUS SAMAD	M.Samad	M. Samad.	M Samad
6	3NA15ME021	MOHAMMED YUSUF	Yusuf	Yusuf	Yusuf
7	3NA15ME035	SHIVARAJ	Shivraj	Shivraj	Shivaraj
8	3NA15ME036	SOUMYA	Soumya	Soumya	Soumya
9	3NA15ME041	SYED SUBAN	Syed	Ab	Syed
10	3NA16ME001	ABHISHEK PANASHETTI	Abhishek	Abhishek	Abhishek
THIRD YEAR					
1	3NA15ME018	MD WAJAHATH HUSSAIN	Hussain	Hussain	Hussain
2	3NA15ME022	NIKHIL	Nikhil	Nikhil	Ab
3	3NA15ME023	NIKHIL KULKARNI	Nikulk	N Kulk	N Kulk
4	3NA15ME026	PRAVEEN GOUDA RAMPUR	Praveen	Praveen	Praveen
5	3NA15ME028	RAHEEM	R	R	R
6	3NA15ME030	RAKESH G M	Rakesh	Ab	Rakesh
7	3NA15ME033	SHABAZ SIDDIQVE MD	Se	Se	Se
8	3NA15ME039	SUBHAN AHMED	Ab	Subhan	Subhan
9	3NA15ME042	TUSHAR	Tushar	Tushar	Tushar

Coordinator

⑦

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC

COMPUTER ASSEMBLY

STUDENT ATTENDANCE SHEET (CIVIL)

SECOND YEAR

Sr. No.	USN Number	Name	07/10/2017	14/10/2017	21/10/2017
1	3NA15CV018	INDIRA			
2	3NA15CV023	MOHAMMED ASLAM			
3	3NA15CV034	NISAR AHMED			
4	3NA15CV042	RANJITH KUMAR MURARI			
5	3NA15CV046	SAIF ALI AHMED			
6	3NA15CV054	SOUDAGAR AAMER			
7	3NA16CV006	BHARATH KUMAR			
8	3NA16CV007	BHARATH R B			
9	3NA16CV008	BHAVYASHREE			
10	3NA16CV009	C VITTAL MURTHY			

THIRD YEAR

Sr. No.	USN Number	Name	07/10/2017	14/10/2017	21/10/2017
1	3NA14CV017	GURUNATH REDDY			
2	3NA14CV039	MD ZEESHAN JUNAIDH			
3	3NA14CV046	P AKSHATA			
4	3NA14CV057	SADASHIVAYYA			
5	3NA14CV070	SWATI DATTATREYA J			
6	3NA14CV077	VIRUPAKSHA			
7	3NA15CV001	A SHIVANI			
8	3NA15CV004	AKSHATHA R			
9	3NA15CV005	AMREEN FATIMA			
10	3NA15CV006	ANANTHALAKSHMI			

Coordinator

Chapter 3: Computer Assembly

IT Essentials: PC Hardware and Software v4.0

Cisco | Networking Academy®
Mind Wide Open™

Introduction

- Computer assembly is a large part of a technician's job.

  Work in a logical, methodical manner when working with computer components

  Improve computer assembly skills dramatically with practice

Cisco Networking Academy

Open the Case

- Prepare the workspace before opening case:

  Adequate lighting

  Good ventilation

  Comfortable room temperature

  Workbench accessible from all sides

  Avoid cluttering workbench.

  An antistatic mat on the table

  Small containers to hold screws and other small parts
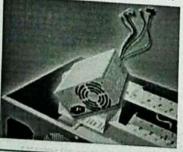
- There are different methods for opening cases. To learn how, consult the user manual or manufacturer's website.

Cisco Networking Academy
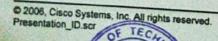
Install the Power Supply

Power supply installation steps include the following:

1. Insert the power supply into the case
2. Align the holes in the power supply with the holes in the case
3. Secure the power supply to the case using the proper screws
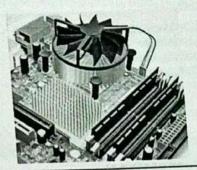
Attach Components to the Motherboard
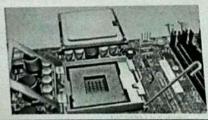
- As part of an upgrade or repair, a technician may need to attach components to the motherboard, and then install the motherboard.
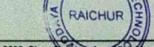
CPU on Motherboard

- The CPU and motherboard are sensitive to electrostatic discharge so use a grounded antistatic mat and wear an antistatic wrist strap. CAUTION: When handling a CPU, do not touch the CPU contacts.

- The CPU is secured to the socket on the motherboard with a locking assembly.
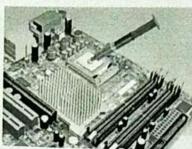
Thermal Compound
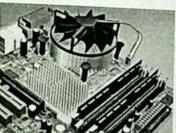
- **Thermal compound helps to keep the CPU cool.**
- To install a used CPU, clean it and the base of the heat sink with isopropyl alcohol to remove the old thermal compound.
- Follow manufacturer's recommendations about applying the thermal compound.

Heat Sink/Fan Assembly

- **The Heat Sink/Fan Assembly is a two-part cooling device.**
  - The heat sink draws heat away from the CPU.
  - The fan moves the heat away from the heat sink.
  - The heat sink/fan assembly usually has a 3-pin power connector.

Install CPU and Heat Sink/Fan Assembly

1. Align the CPU so that the Connection 1 indicator is lined up with Pin 1 on the CPU socket.

2. Place the CPU gently into the socket.

3. Close the CPU load plate and secure it by closing the load lever and moving it under the load lever retention tab.

4. Apply a small amount of thermal compound to the CPU and spread it evenly. Follow the application instructions provided by the manufacturer.

5. Line up the heat sink/fan assembly retainers to the holes on the motherboard.

6. Place the heat sink/fan assembly onto the CPU socket, being careful not to pinch the CPU fan wires.

7. Tighten the heat sink/fan assembly retainers to secure the assembly in place.

8. Connect the heat sink/fan assembly power cable to the header on the motherboard.

Install RAM

- RAM provides temporary data storage for the CPU while the computer is operating.

- RAM should be installed in the motherboard before the motherboard is placed in the computer case.

- RAM installation steps:

  1. Align the notches on the RAM module to the keys in the slot and press down until the side tabs click into place.

  2. Make sure that the side tabs have locked the RAM module and visually check for exposed contacts.

5
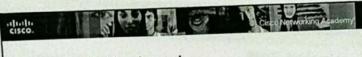
The Motherboard

- The motherboard is now ready to install in the computer case.
- Plastic and metal **standoffs** are used to mount the motherboard and to prevent it from touching the metal portions of the case.
- Install only the standoffs that align with the holes in the motherboard.
- Installing any additional standoffs may prevent the motherboard from being seated properly in the computer case.

Install Motherboard

1. Install standoffs in the computer case.
2. Align the I/O connectors on the back of the motherboard with the openings in the back of the case.
3. Align the screw holes of the motherboard with the standoffs.
4. Insert all of the motherboard screws.
5. Tighten all of the motherboard screws.

6

Install Internal Drives

- Drives that are installed in internal bays are called internal drives.
- A hard disk drive (HDD) is an example of an internal drive.
- HDD installation steps:
    1. Position the HDD so that it aligns with the 3.5-inch drive bay.
    2. Insert the HDD into the drive bay so that the screw holes in the drive line up with the screw holes in the case.
    3. Secure the HDD to the case using the proper screws.

Install Drives in External Bays

- **Drives, such as optical drives (CD and DVD) and floppy drives, are installed in drive bays that are accessed from the front of the case.**
- **Optical drives and floppy drives store data on removable media.**
- **Drives in external bays allow access to the media without opening the case.**

Cisco Networking Academy

Install Optical Drive

- An optical drive is a storage device that reads and writes information to CDs or DVDs.
- Optical drive installation steps:
    1. Position the optical drive to align with the 5.25 inch drive bay.
    2. Insert the optical drive into the drive bay so that the optical drive screw holes align with the screw holes in the case.
    3. Secure the optical drive to the case using the proper screws.

Cisco Networking Academy
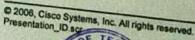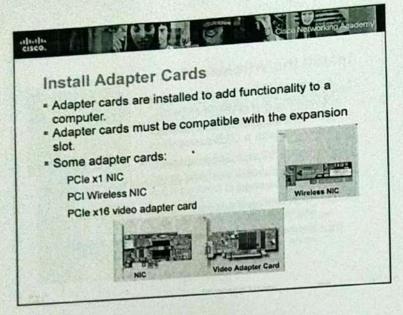
Install Floppy Drive
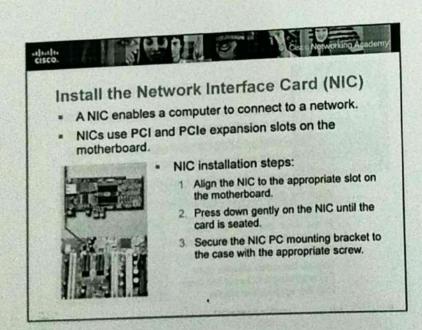
- A floppy disk drive (FDD) is a storage device that reads and writes information to a floppy disk.
- FDD installation steps:
    1. Position the FDD so that it aligns with the 3.5 inch drive bay.
    2. Insert the FDD into the drive bay so that the FDD screw holes align with the screw holes in the case.
    3. Secure the FDD to the case using the proper screws.

Install Adapter Cards

- Adapter cards are installed to add functionality to a computer.
- Adapter cards must be compatible with the expansion slot.
- Some adapter cards:

    PCIe x1 NIC

    PCI Wireless NIC

    PCIe x16 video adapter card

Wireless NIC

NIC

Video Adapter Card

Install the Network Interface Card (NIC)

- A NIC enables a computer to connect to a network.
- NICs use PCI and PCIe expansion slots on the motherboard.

- NIC installation steps:

    1. Align the NIC to the appropriate slot on the motherboard.

    2. Press down gently on the NIC until the card is seated.

    3. Secure the NIC PC mounting bracket to the case with the appropriate screw.

Install the Wireless NIC
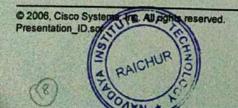
- A wireless NIC enables a computer to connect to a wireless network.

- Some wireless NICs are installed externally with a USB connector.

- Wireless NIC installation steps:

    1. Align the wireless NIC to the appropriate expansion slot on the motherboard.

    2. Press down gently on the wireless NIC until the card is fully seated.

    3. Secure the mounting bracket to the case with the appropriate screw.

Install the Video Adapter Card

- A video adapter card is the interface between a computer and a display monitor.

- An upgraded video adapter card can provide better graphic capabilities for games and graphic programs.

- Video adapter card installation steps:

    1. Align the video adapter card to the appropriate expansion slot on the motherboard.

    2. Press down gently on the video adapter card until the card is fully seated.

    3. Secure the video adapter card PC mounting bracket to the case with the appropriate screw.

Connect Internal Cables
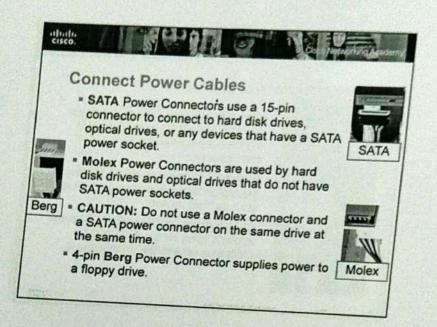
- Power cables are used to distribute electricity from the power supply to the motherboard and other components.
- Data cables transmit data between the motherboard and storage devices, such as hard drives.
- Additional cables connect the buttons and link lights on the front of the computer case to the motherboard.

Connect Power Cables

Motherboard Power Connections

- The Advanced Technology Extended (ATX) main power connector has either 20 or 24 pins.
- The power supply may also have a 4-pin or 6-pin Auxiliary (AUX) power connector that connects to the motherboard.
- A 20-pin connector will work in a motherboard with a 24-pin socket.

Connect Power Cables

- **SATA** Power Connectors use a 15-pin connector to connect to hard disk drives, optical drives, or any devices that have a SATA power socket.

SATA

- **Molex** Power Connectors are used by hard disk drives and optical drives that do not have SATA power sockets.

Berg

- **CAUTION:** Do not use a Molex connector and a SATA power connector on the same drive at the same time.

- 4-pin **Berg** Power Connector supplies power to a floppy drive.

Molex

Power Connector Installation Steps

1. Plug the SATA power connector into the HDD.
2. Plug the Molex power connector into the optical drive.
3. Plug the 4-pin Berg power connector into the FDD.
4. Connect the 3-pin fan power connector into the appropriate fan header on the motherboard, according to the motherboard manual.
5. Plug the additional cables from the case into the appropriate connectors according to the motherboard manual.

PATA Cables

- Drives connect to the motherboard using data cables.
  - Types of data cables are PATA, SATA, and floppy disk.
- The **PATA** cable (sometimes called a **ribbon cable**) is wide and flat and can have either 40 or 80 conductors.
  - A PATA cable usually has three 40-pin connectors.
  - If multiple hard drives are installed, the master drive will connect to the end connector. The slave drive will connect to the middle connector.
- Many motherboards have two PATA cable sockets, which provides support for a maximum of four PATA drives.

SATA Cables
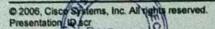
- The **SATA** data cable has a 7-pin connector.
  - One end of the cable is connected to the motherboard.
  - The other end is connected to any drive that has a SATA data connector.

13

Floppy Drive Cables

- The floppy drive data cable has a 34-pin connector and it has a stripe to denote the location of pin 1.

  One connector at the end of the cable connects to the motherboard. The other two connectors connect to drives.

  If multiple floppy drives are installed, the A: drive will connect to the end connector. The B: drive will connect to the middle connector.

- Motherboards have one floppy drive controller which provides support for a maximum of two floppy drives.

Install Data Cables

1. Plug the motherboard end of the PATA cable into the motherboard socket.

2. Plug the connector at the far end of the PATA cable into the optical drive.

3. Plug one end of the SATA cable into the motherboard socket.

4. Plug the other end of the SATA cable into the HDD.

5. Plug the motherboard end of the FDD cable into the motherboard socket.

6. Plug the connector at the far end of the FDD cable into the floppy drive.
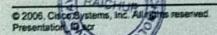
Re-attach Panels, Connect External Cables

- Now that all the internal components have been installed and connected to the motherboard and power supply, the side panels are re-attached to the computer case.

- The next step is to connect the cables for all computer peripherals and the power cable.

Re-attach Side Panels

- Most computer cases have two panels, one on each side.

- Once the cover is in place, make sure that it is secured at all screw locations.

- Refer to the documentation or manufacturer's website if you are unsure about how to remove or replace your computer case.

- CAUTION: Handle case parts with care. Some computer case covers have sharp or jagged edges.

Connect External Cables
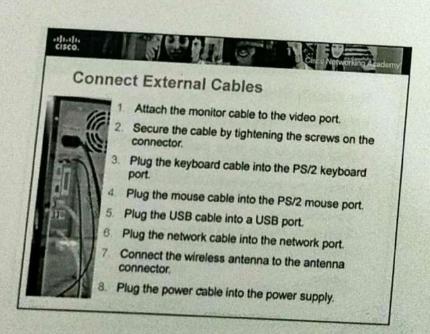
- After the case panels have been re-attached, connect the external cables to the back of the computer.
- External cable connections include:
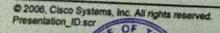
Monitor	USB
Keyboard	Power
Mouse	Ethernet

- CAUTION: When attaching cables, never force a connection.
- NOTE: Plug in the power cable after you have connected all other cables.

Connect External Cables

1. Attach the monitor cable to the video port.
2. Secure the cable by tightening the screws on the connector.
3. Plug the keyboard cable into the PS/2 keyboard port.
4. Plug the mouse cable into the PS/2 mouse port.
5. Plug the USB cable into a USB port.
6. Plug the network cable into the network port.
7. Connect the wireless antenna to the antenna connector.
8. Plug the power cable into the power supply.

Boot Computer for the First Time

- The BIOS is a set of instructions stored in a nonvolatile memory chip.

- When the computer is booted, the basic input/output system (BIOS) will perform a power-on self test (POST) to check on all of the internal components.

```
Copyright 1994-2002
EVV25.86D.0084.P01.0211111021
EVV2 Production BIOS Version 1.00
BIOS Build 0094

2 X Intel(R) Xeon(TM) CPU 2.00GHz
Testing system memory, memory size=1024KB
1024KB Extended Memory Passed
512K L2 Cache SRAM Passed

USB Legacy .......... Enabled
```

- A special key or combination of keys on the keyboard is used to enter the BIOS setup program.

- The BIOS setup program displays information about all of the components in the computer.

Identify Beep Codes

- POST checks to see that all of the hardware in the computer is operating correctly.

- If a device is malfunctioning, an error or a beep code alerts the technician that there is a problem.

- Typically, a single beep denotes that the computer is functioning properly.

- If there is a hardware problem, the computer may emit a series of beeps.

- Each BIOS manufacturer uses different codes to indicate hardware problems.

- Consult the motherboard documentation to view beep codes for your computer.

Cisco Networking Academy
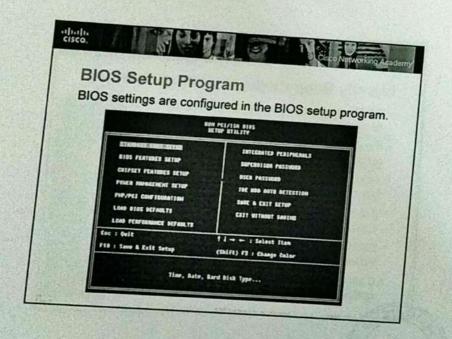
BIOS Setup

- The BIOS contains a setup program used to configure settings for hardware devices.
- The configuration data is saved to a special memory chip called a complementary metal-oxide semiconductor (CMOS).
- CMOS is maintained by the battery in the computer.
- If this battery dies, all BIOS setup configuration data will be lost.
- Replace the battery and reconfigure the BIOS settings.

Cisco Networking Academy

BIOS Setup Program

BIOS settings are configured in the BIOS setup program.

Cisco | Networking Academy®
Mind Wide Open

SHORT TERM PROGRAM OF COMPUTING SKILLS ON BASIC COMPUTER ASSEMBLY

Following are the topics covered for II & III year students of Mechanical and Civil departments during the training sessions on Basic computer assembly.

Topics Covered

Sessions	Date	Time	Topics Covered	Outcome
Session – 1	07/10/2017	2.00pm to 5.00pm	Installation of power supply, attaching components and CPU to motherboard.	Identify and design system components or processes that meet specific needs with appropriate consideration.
Session – 2	14/10/2017	2.00pm to 5.00pm	Installation of CPU, Heat Skin/Fan assembly, Install Ram and Motherboard.	
Session – 3	21/10/2017	2.00pm to 5.00pm	Install internal drives, optical drive, NIC, Video adapter cards and data cables.	

Coordinator

HOD

Head of Department.
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10'

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2017-18

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON BASIC COMPUTER ASSEMBLY

Training program for Mechanical and Civil department students held on 21/10/2018 by Ms. Lavanya Pujari

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2018-2019

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	07
7			Study Material	09
8			Topics Covered	19
9			Photo	20

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

NET's

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

SHORT TERM TRAINING PROGRAMME

1.	**ACADEMIC YEAR**	2018-2019
2.	**TYPE OF THE PROGRAMME PROPOSED**	Computing Skill
3.	**TITLE OF THE PROGRAMME**	Online teaching platform
4.	**BROAD OBJECTIVE OF THE PROGRAMME**	To boost the students to access and understand the different platforms used for teaching learning purpose.
5.	**NAME OF THE DEPARTMENT**	Mechanical, Civil
6.	**TARGETED GROUP OF STUDENTS**	Second and Third Year
7.	**DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR**	09 hrs
8.	**NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME**	03 days
9.	**PROPOSED DATE AND DURATION OF THE PROGRAMME**	29/09/2018, 06/10/2018, 13/10/2018
10.	**TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME**	09 hrs
11.	**NUMBER OF HOURS REQUIRED PER DAY**	03 hrs
12.	**LOCATION DETAILS**	NIT Auditorium
13.	**MINIMUM NUMBER OF PARTICIPANTS**	75
14.	**DETAILS OF RESOURCE PERSONS**	Mr. VijayKumar, Mr. Sundar Kumar
15.	**EVENT ORGANISERS(STUDENTS)**	Vaibhav, Pavan
16.	**FACULTY COORDINATOR**	Mr. Hanumesh
17.	**PROGRAMME PROPOSED BY**	CSE Department

Coordinator

PRINCIPAL
Navodaya Institute of Technology
RAICHUR-584 103

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
Navodaya Institute-584 103

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

Date: 07.08.2018

To,
The Principal
NIT, Raichur

Subject: Approval of training program and resource persons for II and III year students of Mechanical and Civil department for academic year 2018-2019

Respected Sir,

This is with respect to the approval of training program on Online Teaching Platform and resource persons for II and III year students of Mechanical and Civil department for academic year 2018-2019. Following are the details.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Sundar Kumar	B. Tech	Computer Science	2 Years	29/09/2018, 06/10/2018, 13/10/2018
III	Mr. VijayKumar	M. Tech	Computer Science	12 Years	29/09/2018, 06/10/2018, 13/10/2018

I request you to approve for the same. Thanking you in anticipation.

Yours Sincerely,

Coordinator

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology.
RAICHUR-584 101

NET/NIT/PO/CIR/2018-19/ 008   13/08/2018

CIRCULAR

The HoD of Mechanical and Civil department are here by informed that department of CSE is organizing training sessions for all the II & III year students of Mechanical and Civil departments. The training sessions on Online teaching platform will be conducted as per the following schedule. All the students should attend the training class without fail.

Session – 1 : 29/09/2018 – Time: 2.00pm to 5.00pm

Session – 2 : 06/10/2018 – Time: 2.00pm to 5.00pm

Session – 3 : 13/10/2018 – Time: 2.00pm to 5.00pm

Coordinator   HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology.
RAICHUR-584 101

Copy to,

1) Notice Board
2) HoD's – Mechanical, Civil
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting Online teaching platform

training classes to all the II & III year students of Mechanical, Civil departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Sundar Kumar	B. Tech	Computer Science	2 Years	29/09/2018, 06/10/2018, 13/10/2018
III	Mr. VijayKumar	M. Tech	Computer Science	12 Years	29/09/2018, 06/10/2018, 13/10/2018

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology.
RAICHUR-584 10'

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE
TEACHING PLATFROM SOCIAL MEDIA INTEGRATION

STUDENT ENROLLMENT LIST (MECHANICAL)

SECOND YEAR		
Sr. No.	USN Number	Name
1	3NA16ME029	RAHUL M P
2	3NA16ME042	HYDER ALI
3	3NA17ME004	ASHOK KALYAN
4	3NA17ME007	G SAI VAMSHI
5	3NA17ME008	J R PRIYA
6	3NA17ME009	KIRAN
7	3NA17ME010	ANANTH
8	3NA17ME011	M TEJASWINI
9	3NA17ME014	MD HAROON SHAIK
10	3NA18ME401	N'ARESH
THIRD YEAR		
1	3NA14ME004	ANANDA YADAV
2	3NA14ME009	FAROOQ AHMED
3	3NA14ME013	KIRAN KUMAR
4	3NA14ME022	MOHAMMED SHOAIB
5	3NA14ME037	SUDHAKAR
6	3NA14ME041	SUSHMA
7	3NA15ME034	SHIVAJI
8	3NA15ME035	SHIVARAJA
9	3NA15ME037	SOURABH DESHAPANDE

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE
TEACHING PLATFROM

STUDENT ENROLLMENT LIST (CIVIL)

SECOND YEAR		
Sr. No.	**USN Number**	**Name**
1	3NA16CV032	SRIKANT
2	3NA17CV004	ANIL KUMAR N
3	3NA17CV005	B VENKAN GOUDA
4	3NA17CV006	BABITHA B
5	3NA17CV007	BASAVARAJ ANWAR
6	3NA17CV008	G.P RAKSHANDHA KUMARI
7	3NA17CV034	MD. BASEER DANISH
8	3NA17CV035	MUSKAN HUMA
9	3NA17CV036	NEERAJ KUMAR SUNKARI
10	3NA17CV037	NIKHILA V
THIRD YEAR		
1	3NA14CV075	VIJAY SINGH
2	3NA15CV002	AKSHATHA KONER
3	3NA15CV014	EAJAZ AHAMED SHAIK
4	3NA15CV022	MALLIKARJUN REDDY B
5	3NA15CV023	MOHAMMED ASLAM
6	3NA15CV035	PALLAVI B P
7	3NA15CV037	PRAVEEN KUMAR
8	3NA16CV454	SUNIL KUMAR
9	3NA16CV460	T ANITHA SURPAG

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE

TEACHING PLATFROM

STUDENT ATTENDANCE SHEET (MECHANICAL)

Sr. No.	USN Number	Name	29/09/2018	06/10/2018	13/10/2018
1	3NA16ME029	RAHUL M P			
2	3NA16ME042	HYDER ALI			
3	3NA17ME004	ASHOK KALYAN			
4	3NA17ME007	G SAI VAMSHI			
5	3NA17ME008	J R PRIYA			
6	3NA17ME009	KIRAN			
7	3NA17ME010	ANANTH			
8	3NA17ME011	M TEJASWINI			
9	3NA17ME014	MD HAROON SHAIK			
10	3NA18ME401	NARESH			
THIRD YEAR					
1	3NA14ME004	ANANDA YADAV			
2	3NA14ME009	FAROOQ AHMED			
3	3NA14ME013	KIRAN KUMAR			
4	3NA14ME022	MOHAMMED SHOAIB			
5	3NA14ME037	SUDHAKAR			
6	3NA14ME041	SUSHMA			
7	3NA15ME034	SHIVAJI			
8	3NA15ME035	SHIVARAJA			
9	3NA15ME037	SOURABH DESHAPANDE			

Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE

TEACHING PLATFROM

STUDENT ATTENDANCE SHEET (CIVIL)

SECOND YEAR

Sr. No.	USN Number	Name	29/09/2018	06/10/2018	13/10/2018
1	3NA16CV032	SRIKANT	Srikant	Srikanth	Srikanth
2	3NA17CV004	ANIL KUMAR N	Anil	Anil	Anil
3	3NA17CV005	B VENKAN GOUDA	B. V. G	B-VG	A. V. G
4	3NA17CV006	BABITHA B	Babitha	Babitha	Babitha
5	3NA17CV007	BASAVARAJ ANWAR	Anwar	Anwar	Anwar
6	3NA17CV008	G.P RAKSHANDHA KUMARI	G.P.K	G-P-K	G-P-K
7	3NA17CV034	MD. BASEER DANISH	Baseer	Baseer	Baseer
8	3NA17CV035	MUSKAN HUMA	M	M	M
9	3NA17CV036	NEERAJ KUMAR SUNKARI	Neeraj	Neeraj	Neeraj
10	3NA17CV037	NIKHILA V	Nikhila	Nikhila	Nikhila

THIRD YEAR

Sr. No.	USN Number	Name	29/09/2018	06/10/2018	13/10/2018
1	3NA14CV075	VIJAY SINGH	Vijay	Vijay	Vijay
2	3NA15CV002	AKSHATHA KONER	Akshatha	Akshatha	Akshatha
3	3NA15CV014	EAJAZ AHAMED SHAIK	Ejaz	Ejaz	Ejaz
4	3NA15CV022	MALLIKARJUN REDDY B	Reddy B	Reddy R	Reddy B
5	3NA15CV023	MOHAMMED ASLAM	Md Aslam	Md Aslam	Md Aslam
6	3NA15CV035	PALLAVI B P	Pallavi	Pallavi	Pallavi
7	3NA15CV037	PRAVEEN KUMAR	P.K.	P.K.	P.K.
8	3NA16CV454	SUNIL KUMAR	Sunil	Sunil	Sunil
9	3NA16CV460	T ANITHA SURPAG	Anitha	Anitha	Anitha

Coordinator

SOCIAL MEDIA INTEGRATION

Social Cloud: Cloud Computing in Social Networks
Social Network Versus Computer Network

Networks can be categorized according to topology, which is the geometric arrangement of a computer system. Common topologies include a bus, star, and ring, protocol which defines a common set of rules and signals that computers on the network use to follow. Or architecture where networks can be broadly classified as either a peer-to-peer or client/server architecture. Computers on a network are some- times called nodes. Computers and devices that allocate resources for a network are called servers. It is argued that social networks differ from most other types of networks, including technological and biological networks, in two important ways. First, they have nontrivial clustering or network transitivity and second, they show positive correlations, between the degrees of adjacent vertices. Social networks are often divided into groups or communities, and it has recently been suggested that this division could account for the observed clustering. Further, group structure in networks can also account for degree correlations. Hence, assortative mixing in such networks with a variation in the sizes of the groups provides the predicted level compares well with that observed in real-world networks.

With the increasingly ubiquitous nature of Social networks and Cloud computing, users are starting to explore new ways to interact with, and exploit these developing paradigms. Social networks are used to reflect real world relationships that allow users to share information and form connections between one another, essentially creating dynamic Virtual Organizations. We propose leveraging the pre-established trust formed through friend relationships within a Social network to form a dynamic "Social Cloud", enabling friends to share resources within the context of a Social network. We believe that combining trust relationships with suitable incentive mechanisms (through financial payments or bartering) could provide much more sustainable resource sharing mechanisms. This paper outlines our vision of, and experiences with, creating a Social Storage Cloud, looking specifically at possible market mechanisms that could be used to create a dynamic Cloud infrastructure in a Social network environment.

Social networking has become an everyday part of many peoples' lives as evidenced by the huge user communities. Some communities even exceed the population of large coun- tries, for example Facebook has over 400 million active users.[1] Social networks provide a platform to facilitate communication and sharing between users, therefore modelling real world relationships. Social networking has also extended beyond communication between friends, for instance, there are a multitude of integrated applications and some organizations even utilize a user's Facebook credentials for authentication rather than requiring their own credentials (for example the Calgary Airport authority in Canada uses Facebook Connect[2] to grant access to their WiFi network).

The structure of a Social Network is essentially a dynamic virtual organization with inherent trust relationships between friends. We propose using this trust as a foundation for resource (information, hardware, services) sharing in a Social Cloud. Cloud environments typically provide low level abstractions of computation or storage. Computation and Storage Clouds are complementary and act as building blocks from which high level service Clouds and mash-ups can be created. Storage Clouds are often used to extend the capabilities of storage-limited devices such as phones and desktops, and provide transparent access to data from anywhere. There are a large number of commercial Cloud providers such as Amazon EC2/S3, Google App Engine, Microsoft Azure and also many smaller scale open Clouds like Nimbus [1] and Eucalyptus [2]. These Clouds provide access to scalable virtualized resources (computation, storage, applications) through pre-dominantly posted price mechanisms. A Social Cloud,

therefore, is a scalable computing model in which virtualized resources contributed by users are dynamically provisioned amongst a group of friends. Compensation for use is optional as users may wish to share resources without payment, and rather utilize a reciprocal credit (or barter) based model [3]. In both cases guarantees are offered through customized SLAs. In a sense, this model is similar to a Volunteer computing approach, in that friends share resources amongst each other for little to no gain. However, unlike Volunteer models there is inherent accountability through existing friend relationships. There are a number of advantages gained by leveraging Social networking platforms, in particular we gain access to huge user communities, can exploit existing user management functionality, and rely on pre-established trust formed through user relationships.

In this paper we outline our vision of a Social Cloud and describe our experiences with a prototype. The rest of the pa- per is organized as follows: section II outlines related research and some example applications that may use a Social Storage Cloud. Section III presents the design of a Social Cloud using Facebook as the Social network. A prototype Social Storage Cloud is described in section IV, before the evaluation of our prototype is presented in section V. Finally, section VI outlines future work and provides concluding remarks.

There are multiple instances of Social network and Cloud computing integration. However, most examples use Cloud platforms to host Social networks or create scalable appli- cations within the Social network. For example, Facebook users can build scalable Cloud based applications hosted by Amazon Web Services [4]. There is no literature related to creating a Cloud infrastructure leveraging Social networking as a means of dynamic user management, authentication, and user experience. Automated Service Provisioning ENviron- ment (ASPEN) [5] takes an enterprise approach to integrating Web 2.0, Social networking and Cloud Computing by exposing

applications hosted by Cloud providers to user communities in Facebook. There are similar efforts in the Grid community to leverage Social networking concepts, communities, and mechanisms. PolarGrid [6] is one such example which extracts Social data using the OpenSocial [7] interface and relies on OpenID [8] for identification. Different Social networking functions are then incorporated in an application specific portal.

An alternative approach involves building a Social network around a specific application domain such as MyExperi- ment (www.myExperiment.org) for biologists and nanoHub (www.nanoHub.org) for the nanoscience community. MyEx- periment provides a virtual research environment where col- laborators can share research and execute scientific work- flows remotely. nanoHub allows users to share data as well as transparently execute applications on distributed resource providers such as TeraGrid. These platforms highlight the types of collaborative scientific scenarios possible in Social networks, however they are not generic as they are focused on the communities they serve and lack the sizable user bases of Social networking platforms. Additionally, administrators need to create and manage proprietary social infrastructures and users require credentials for each network they participate in (unless they use OpenID). The same functionality can be realized using a Social Cloud deployed in an existing Social network. For example Social Storage Clouds can be used to store/share data and information (for example academic papers, scientific workflows, datasets, and analysis) within a community.

Volunteer computing is a distributed computing model in which users donate computing resources to a specific (academic) project. The first volunteer project was the Great Internet Mersenne Prime Search (www.mersenne.org) in 1996, however the term gained much exposure through the SETI@Home [9] and Folding@home [10] projects in the late 90's. These projects showed the enormous computing power available through collaborative systems. One of the most relevant Volunteer computing efforts is Storage@Home [11] which is used to back up and share huge data sets arising from scientific research. The focus of Volunteer computing has since shifted towards generic middleware providing a distributed

INTEGRATING ERP SYSTEMS WITH SOCIAL MEDIA: A LAYERED APPROACH

In spite of a lot of examples of organizations using social media, there are very few attempts at integrating social media with enterprise systems such as ERP. Silos of social media applications are bound to lead to spaghetti integration architecture of the past (Lam and Venky, 2010), which are inflexible and difficult to maintain. In order to enhance business value from social media, it is essential to integrate social media into the systems that drive daily work in an enterprise (CITO, 2012). In many cases, the existing social media accelerate communication without providing context. For example, it is more useful for a customer to get "real-time" product related information from social media sites such as Twitter at the moment of buying the

product rather than having to do the product review on the social media platform and then conduct the buying transaction on a separate system. On the one hand, business process discipline must be preserved and on the other, unstructured collaboration must be supported. Many of the best practice process rules are embedded within the enterprise system such as ERP, and must be combined with unstructured data from the social media. Data related to customer and transaction must be created in the enterprise system. One way to support this integration is through the use of a layered approach to extending ERP to social media solutions (Cordys, 2012); see Figure 2. The first layer represents the ERP system. The various business processes in the ERP are exposed as discrete services that can be invoked to perform tasks such as "Creating a Sales Order" or "Checking Product Inventory". These are core best practice process elements that have been predefined by the ERP vendor. Usually, these are processes that have very low change cycles and can be used as-is by various enterprises. However, these processes do not inherently support agility and hence the need for the second layer which represents the Business Process.

Social Media Layer

Business Process Layer

Retrieve Product Information Check Inventory Level   Create Sales Order

ERP Layer

Customized Interaction

Own Processes

Best Practice Processes
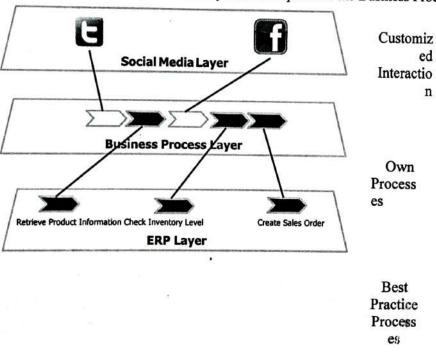
Figure 2 Integration of Social Media with ERP: A
Layered Approach

create the storage instance. In the market implementations participating users know the corresponding users identity, to provide accountability between friends. In traditional Cloud environments users are unaware of the lo- cation of their provision, the prototype Social Cloud could provide this transparency by removing user information from posted price listings, auction requests, and storage access.

A. Tools and Systems

Our implementation utilizes various tools and systems we have developed previously. In particular gRAVI (Grid Remote Application Virtualization Interface) [15] was used to create a base storage service, SORMA [16] is used to create WS- Agreements, and DRIVE (Distributed Resource Infrastructure for a Virtual Economy) [17] provides the auction framework.

B. Storage as a Service

A Social Storage Cloud is based on a generic Storage service which provides an interface for users to access virtu- alized storage. This service exposes a set of file manipulation operations to users and maps their actions to operations on the local file system. Users create storage by passing an agreement to the storage service, this creates a mapping between a user, agreement, and the storage instance. Instances are identified by user and agreement allowing individual users to have multiple storage instances in the same storage service. The storage service creates a representative resource and an associated working directory for each instance. The resource keeps track of service levels as outlined in the agreement such as the data

C. Banking Service

The banking service manages user and agreement informa- tion. The service itself is composed of two associated context services each representing different instance data. The first context service records user resources while the second stores agreements. The user resource stores the user's Facebook ID, current credits, agreement IDs the user has participated in, and auction references (EPR/ID). The agreement resource contains any agreements created in the system which are used to manage provision information as well as acting as a receipt. Fig. 6 shows a summary page generated by querying the banking service, this page displays current and historical agreements with other users. It includes both storage provided and consumed, and information corresponding to each reser- vation.

an EJSDL [18]; (JSDL [19] with economic extensions) document describing the storage request. This doc- ument is then converted into an agreement using SORMA SLA tools. The EJSDL document acts as the Service Description Term of the agreement and individual requirements are split into guarantee terms (as defined in [18]). EJSDL extends JSDL by adding additional economic information describing pricing and penalties which are mapped to their respective Business Value Lists. We have further extended this term language to include two additional Cloud specific QoS terms: Availability and Error Rate, which are defined as JSDL ranges and are used to describe and monitor the availability of the storage service. The SORMA reservation specification is used to capture the period of a service provision. Having created a SLA it is passed to the appropriate storage service to create a storage instance. The storage service determines if it will accept the agreement based on local policy and current resource capacity. Having instantiated the storage the agreement is then passed to the banking service to exchange credits and store a copy as a receipt. If either the banking service or storage service decline the agreement both entities remove the reservation.

infrastructure independent of the type of computation, for example the Berkeley Open Infrastructure for Network Com- puting (BOINC) [12]. Most Volunteer platforms do not define SLAs, typically users are anonymous and are not accountable for their actions (they are rewarded with different incentives however). In a Social Cloud context this does not suffice as users need to have some level of accountability. A more realistic model for this type of open sharing is a credit based system in which users earn credits by contributing resources and then spend these credits when using other resources. This type of policy is used in systems such as PlanetLab [13].

SOCIAL CLOUD ARCHITECTURE

The Social Cloud architecture presented is designed as a Facebook application, to make use of this widely used plat-form, development environment and API. In a Social Cloud, services can be mapped to particular users through Facebook identification, allowing for the definition of unique policies regarding the interactions between users. For example, a user could limit trading with close friends only, users in the same country/network/group, all friends, or even friends of friends. A specialized banking component manages the transfer of credits between users while also storing information relating to current reservations. A high level architecture of a Social Cloud is shown in Fig. 1.
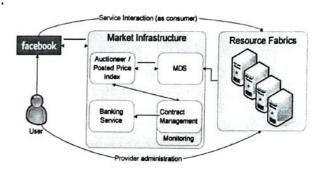
Fig. 1. Social Cloud Architecture. Users register Cloud services and friends are then able to provision and use these resources through the Social Cloud Facebook application. Allocation is conducted by the underlying market infrastructure(s).

A. Facebook Applications

Facebook exposes an application API through a REST- like interface which includes methods to get a range of data including friends, events, groups, application users, profile information, and photos. Facebook Markup Language (FBML) includes a subset of HTML with proprietary extensions that enables the creation of applications that integrate completely with the Facebook look and feel. Facebook JavaScript (FBJS) is Facebook's version of JavaScript – rather than sandboxing JavaScript, FBJS is parsed when a page is loaded to create a virtual application scope.

Facebook applications are hosted independently and are not hosted within the Facebook environment. A Facebook canvas URL is created for user access, this URL maps to a user defined callback URL which is hosted remotely. The process of rendering an application page is shown in Fig. 2. When a page is requested by the user through the Facebook Can- vas URL (http://apps.facebook.com/socialcloud/) the Facebook server forwards the request to the defined callback URL. The application creates a page based on the request and returns it to Facebook. At this point the page is parsed and Face- book specific content is added according to the FBML page

instructions. The final page is then returned to the user. This routing structure presents an important design consideration in a Social Cloud context as access to the Cloud services would be expensive if routed through both the Facebook server and the callback application server in order to get data from the actual Cloud service. To reduce this effect FBJS can be used to request data asynchronously from the specified service in a transparent manner without routing through the application server.

B. Virtualized resources

Cloud computing relies on exposing virtualized resources as a service in a metered and elastic manner. A Social Cloud service could represent *any* resource that users may wish to share, ranging from low level computation or storage through to high level mash-ups such as photo storage. There are two generic requirements of this service: firstly, the interface needs to provide a mechanism to create a stateful instance for a reservation. In our model the Social Cloud application passes a SLA to the service which is parsed and used to instantiate the required state. Secondly, in order to be discovered the service needs to advertise capacity so that it can be included in the market. In our design this advertised capacity is XML based metadata which is periodically refreshed and stored in Globus Monitoring and Discovery System (MDS) [14].

C. Banking

The prototype Social Cloud includes a credit-based system that rewards users for contributing resources and charges users for consuming resources. The banking service registers every member of the cloud and stores their credit balance and all agreements they are participating (or have participated) in. Credits are exchanged between users when an agreement is made, prior to the service being used. To bootstrap participa- tion in the Social Cloud, users are given an initial number of credits when joining the Cloud. While suitable for testing, this initial credit policy is susceptible to inflation and cheating (if fake users are created and the initial credits are transferred). Currently there is no mapping between Social Cloud credits and real currencies or Facebook credits.

D. Service Marketplaces

Service usage is exchanged for credits within a marketplace. The Social Cloud marketplace is generic and not limited to a specific type of market, although two implementations are provided.

1) Posted Price: In a posted price model providers adver- tise offers relating to particular service levels for a predefined price or following a linear pricing function; consumers are then able to fine tune specific parameters to create a SLA. Creating such a market requires coordination between a number of the Social Cloud components to; discover Cloud services, create agreements, and transfer credits. Fig. 4 shows the flow of events for a posted price trade in a Social Cloud. When a user requests posted price offers the Cloud application uses the

The Social Cloud prototype utilizes Web Services to create a scalable, distributed and decentralized infrastructure. All services use Web Service Resource Framework (WSRF) and run on Globus WS-core/Tomcat. The Facebook application is a JSP based web application. Two concurrent economic markets have been implemented to trade storage, both operate independently and are designed to work simultaneously. In a posted price market users select storage from a list of friends' service offers. In the auction market, consumers outline specific storage requirements and pass this description to the Social Cloud infrastructure, providers then bid to host the storage. Both markets result in the establishment of a SLA between users. The SLA is redeemed through the appropriate storage service to

The business process layer orchestrates tasks and information across the ERP and other social media applications along the value chain of the process. The business process designed in this layer can be easily modified without affecting the underlying processes defined in the ERP layer. Customer and revenue facing processes are now loosely coupled with the ERP, and can now include external applications such as social media that were not possible before. The social media layer comprises the various social media applications that are involved in the orchestrated business process. These applications provide users the necessary user interface to conduct business with the enterprise. For example, searching for a product, getting more information regarding the product from the ERP system, obtaining product reviews for the chosen product from social media sites, buying a product by executing the order processing process, giving feedback on the item bought, getting product support from the customer service representative or other customers, etc.

Technology Enablers

In order to implement a solution that integrates social media with ERP, as shown in Table 1 each of the above layers must satisfy a set of requirements and will need technology components to execute those requirements.

	ERP Layer	Business Process Layer	Social Media Layer
Requirements	• Expose process elements as services using industry standard • Execute appropriate process logic when service is invoked • Persistent store of transaction information • A repository to search and configure the	• Orchestrate the business logic that controls the flow of business process • Provide persistent store of information for each process instance • Define access control for various activities in the process • Provide mechanisms to invoke services that are required by an activity in the process	• Expose functionality that can be invoked by the business process • Allow input and output of data from the social media application

Prototype Evaluation

The evaluation of the prototype focused on demonstrating the feasibility of the solution using an example test case. For brevity, we will only show a few screens of the process. In this test case, we assume the enterprise name is XML Pte Ltd, the user's name is Alberto Ramirez and age is 25. Once the user logs into the composite application through Facebook, the relevant products that match the user's profile are retrieved and displayed (see Figure 5).
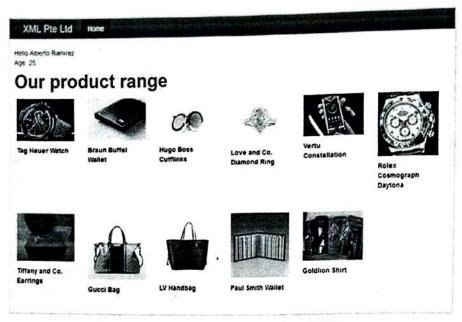
Figure 5 Products Displayed from ERP

Once the user selects the product "Rolex Cosmograph Daytona", the composite application will display the "Tweets" along with the sentiment analysis for the chosen product (see Figure 6). As seen in this example, there is no very strong positive or negative sentiment for the chosen product.
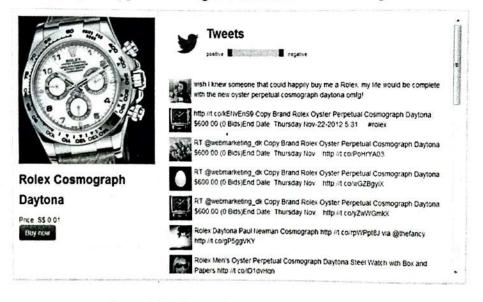
Figure 6 Sentiment Display for Chosen Product

Once the payment is successful, the sales order is created in the ERP. Figure 7 shows the example sales order for the purchase of the product "Rolex Cosmograph Daytona".
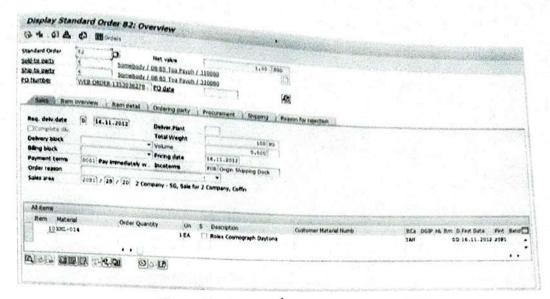
Figure 7 Sales Order Created in the SAP ERP

Missing Data in Social Network

The inherent problem with much of the data is that it is noisy and incomplete, and at the wrong level of fidelity and abstraction for meaningful data analysis. Thus there is a need for methods which extract and infer "clean" annotated networks from noisy observational network data. This involves inferring missing attribute values (attribute prediction), adding missing links and removing spurious links between the nodes (link prediction), and eliminating duplicate nodes (entity resolution).

Moustafa et al. [36] identified a set of primitives to support the extraction and inference of a network from observational data, and describe a framework that enables network analyst to easily implement and combine new extraction and analysis techniques, and efficiently apply them to large observation networks. Perez et al. [36] proposed linguistic decision analysis to solve decision-making problems based on linguistic information by using the ordinal fuzzy linguistic modeling. In such situations, experts are forced to provide incomplete fuzzy linguistic preference relations. So an additive consistency-based estimation process of missing values to deal with incomplete fuzzy linguistic preference relations is developed.

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE TEACHING PLATFROM

Following are the topics covered for II & III year students of Mechanical and Civil departments during the training sessions on Online Teaching Platform.

Topics Covered

Sessions	Date	Time	Topics Covered	Outcome
Session – 1	29/09/2018	2.00pm to 5.00pm	What is Online Learning?, How it works, A New Paradigm for Teaching and Learning	Recognize the need for, and have the preparation and ability to engage in independent and lifelong learning in broadcast context of technological change.
Session – 2	06/10/2018	2.00pm to 5.00pm	Benefits of Online Teaching and Learning, Online Learning FAQ	
Session – 3	13/10/2018	2.00pm to 5.00pm	Digital Teaching Platforms, Pedagogical theory, Online Writing Centers, Research into the impact of digital teaching platforms	

Coordinator

HOD
Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON SOCIAL MEDIA INTEGRATION

Training program for CSE, EEE and ECE department students held on 15/09/2018 by Mr. SivaKumar Reddy

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2018-2019

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	08
7			Study Material	11
8			Topics Covered	19
9			Photo	20

NET's

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

SHORT TERM TRAINING PROGRAMME

1.	ACADEMIC YEAR	2018-2019
2.	TYPE OF THE PROGRAMME PROPOSED	Computing Skill
3.	TITLE OF THE PROGRAMME	Social media integration
4.	BROAD OBJECTIVE OF THE PROGRAMME	To enhance student to understand the usage of social media and implement its integration.
5.	NAME OF THE DEPARTMENT	CSE, EEE, ECE
6.	TARGETED GROUP OF STUDENTS	Second and Third Year
7.	DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR	09 hrs
8.	NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME	03 days
9.	PROPOSED DATE AND DURATION OF THE PROGRAMME	08/09/2018, 15/09/2018, 22/09/2018
10.	TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME	09 hrs
11.	NUMBER OF HOURS REQUIRED PER DAY	03 hrs
12.	LOCATION DETAILS	NIT Auditorium
13.	MINIMUM NUMBER OF PARTICIPANTS	70
14.	DETAILS OF RESOURCE PERSONS	Mr. SivaKumar Reddy, Mr. Chetty Pramodachar
15.	EVENT ORGANISERS(STUDENTS)	Vijay Tarun, Devika
16.	FACULTY COORDINATOR	Vishakha Patange
17.	PROGRAMME PROPOSED BY	CSE Department

Coordinator

PRINCIPAL
Navodaya Institute of Technology
RAICHUR-584 103

HOD

Head of Dept.
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR 584 101

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

To,   **Date: 07.08.2018**
The Principal
NIT, Raichur

Subject: Approval of training program and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2018-2019

Respected Sir,

This is with respect to the approval of training program on Social media integration and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2018-2019. Following are the details.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Mr. Chetty Pramodachar	M. Tech	Computer Science	3 Years	08/09/2018, 15/09/2018, 22/09/2018
III	Mr. SivaKumar Reddy	M. Tech	Information Technology and Networking	6.5 Years	08/09/2018, 15/09/2018, 22/09/2018

I request you to approve for the same. Thanking you in anticipation.

Yours Sincerely,

Coordinator

NET/NIT/PO/CIR/2018-19/ 007   13/08/2018

CIRCULAR

The HoD of ECE and EEE department are here by informed that department of CSE is organizing training sessions for all the II & III year students of CSE, ECE, and EEE departments. The training sessions on Social media integration will be conducted as per the following schedule. All the students should attend the training class without fail.

Session – 1 : 08/09/2018 – Time: 2.00pm to 5.00pm

Session – 2 : 15/09/2018 – Time: 2.00pm to 5.00pm

Session – 3 : 22/09/2018 – Time: 2.00pm to 5.00pm

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology.
RAICHUR-584 10°

Copy to,

1) Notice Board
2) HoD's – CSE, ECE, EEE
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting Social media integration training classes to all the II & III year students of CSE, ECE, EEE departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Mr. Chetty Pramodachar	M. Tech	Computer Science	3 Years	08/09/2018, 15/09/2018, 22/09/2018
III	Mr. SivaKumar Reddy	M. Tech	Information Technology and Networking	6.5 Years	08/09/2018, 15/09/2018, 22/09/2018

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10*

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOCIAL MEDIA INTEGRATION

STUDENT ENROLLMENT LIST (CSE)

Sr. No.	USN Number	Name
SECOND YEAR		
1	3NA17CS001	AKSHAY B MUTALIC
2	3NA17CS002	B SREEJA
3	3NA17CS003	B V REKHA DEVI
4	3NA17CS004	BHAVYA
5	3NA17CS005	C POOJITHA
6	3NA17CS006	G TEJASWINI
7	3NA17CS008	VIJAY TARUN
8	3NA17CS009	HAFSA BATUL
9	3NA17CS010	HAJRA
10	3NA17CS012	KOMAL
11	3NA17CS013	KRISHNAVENI PUJARI
12	3NA17CS022	SHIVAPPA
13	3NA17CS024	SHREESHA DANDE
THIRD YEAR		
1	3NA16CS001	ABHISHEK KULKARNI
2	3NA16CS002	AMEENA BEGUM
3	3NA16CS004	ANUSHA M
4	3NA16CS005	APOORVA M R
5	3NA16CS008	E SWETHA
6	3NA16CS009	K JAHNAVI
7	3NA16CS013	SAMREEN SULTANA
8	3NA16CS014	SHRUSTI MALI PATIL
9	3NA17CS400	IMTIYAZ

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOCIAL MEDIA INTEGRATION

STUDENT ENROLLMENT LIST (EEE)

SECOND YEAR		
Sr. No.	USN Number	Name
1	3NA17EE001	Amith Kalayankar
2	3NA17EE002	Ashwini
3	3NA17EE003	Basavarajeshwari S
4	3NA17EE004	G Venkatlaxmi
5	3NA17EE005	Ganesh Kumar L
6	3NA17EE006	MD Jamaluddin Abu Turab
7	3NA17EE009	Md. Mohiuddinulla B
8	3NA17EE010	Nabila Nuzhat
9	3NA17EE011	Nadini
10	3NA17EE013	Nazneen Sultana
THIRD YEAR		
1	3NA16EE015	MUNAZZA NOOR ZIYA
2	3NA16EE016	NAZMA UNNISA
3	3NA16EE017	OMKARI VIJAYALAXMI
4	3NA16EE018	PADMAJA G
5	3NA16EE019	PALLAVI NAYAK
6	3NA16EE020	PAVANKUMAR
7	3NA16EE022	ROHINI J P
8	3NA16EE023	SOHAIL KHAN SURI
9	3NA16EE024	SUJATHA
10	3NA16EE025	N V SWETHA
11	3NA16EE027	TULJA BHAVANI

COORDINATOR

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOCIAL MEDIA INTEGRATION

STUDENT ENROLLMENT LIST (ECE)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA16EC005	BASAVAPRABHU
2	3NA16EC017	SWATHI
3	3NA17EC001	ABDUL RAHMAN
4	3NA17EC002	ABHISHEK
5	3NA17EC005	C GAYATHRIVARMA
6	3NA17EC007	HARSHITA GANGAKED
7	3NA17EC008	K RAJEETHA
8	3NA17EC009	LAKSHMI P ARETNOOR
9	3NA17EC010	PRATHEEK
10	3NA17EC011	RAJANI

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA16EC001	A. DEEPTHI
2	3NA16EC006	SHASHANK KUMAR REDDY
3	3NA16EC007	FATHIMA AFAF
4	3NA16EC008	J SHRAVANI
5	3NA16EC009	JAVERIA IRAM
6	3NA16EC010	MAHALAXMI M
7	3NA16EC013	SANIYA NAYYER
8	3NA16EC014	SHIVAMURTHY K
9	3NA16EC023	RAKESH T
10	3NA16EC403	SHRUTI

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOCIAL

MEDIA INTEGRATION

STUDENT ATTENDANCE SHEET (CSE)

SECOND YEAR			08/09/2018	15/09/2018	22/09/2018
Sr. No.	USN No.	Name			
1	3NA17CS001	AKSHAY B MUTALIC			
2	3NA17CS002	B SREEJA			
3	3NA17CS003	B V REKHA DEVI			
4	3NA17CS004	BHAVYA			
5	3NA17CS005	C POOJITHA			
6	3NA17CS006	G TEJASWINI			
7	3NA17CS008	VIJAY TARUN			
8	3NA17CS009	HAFSA BATUL			
9	3NA17CS010	HAJRA			
10	3NA17CS012	KOMAL			
11	3NA17CS013	KRISHNAVENI PUJARI			
12	3NA17CS022	SHIVAPPA			
13	3NA17CS024	SHREESHA DANDE			
THIRD YEAR					
1	3NA16CS001	ABHISHEK KULKARNI			
2	3NA16CS002	AMEENA BEGUM			
3	3NA16CS004	ANUSHA M			
4	3NA16CS005	APOORVA M R			
5	3NA16CS008	E SWETHA			
6	3NA16CS009	K JAHNAVI			
7	3NA16CS013	SAMREEN SULTANA			
8	3NA16CS014	SHRUSTI MALI PATIL			
9	3NA17CS400	IMTIYAZ			

Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOCIAL

MEDIA INTEGRATION

STUDENT ATTENDANCE SHEET (ECE)

Sr. No.	USN Number	Name	08/09/2018	15/09/2018	22/09/2018
SECOND YEAR					
1	3NA16EC005	BASAVAPRABHU			
2	3NA16EC017	SWATHI			
3	3NA17EC001	ABDUL RAHMAN			
4	3NA17EC002	ABHISHEK			
5	3NA17EC005	C GAYATHRIVARMA			
6	3NA17EC007	HARSHITA GANGAKED			
7	3NA17EC008	K RAJEETHA			
8	3NA17EC009	LAKSHMI P ARETNOOR			
9	3NA17EC010	PRATHEEK			
10	3NA17EC011	RAJANI			
THIRD YEAR					
1	3NA16EC001	A. DEEPTHI			
2	3NA16EC007	FATHIMA AFAF			
3	3NA16EC008	J SHRAVANI			
4	3NA16EC009	JAVERIA IRAM			
5	3NA16EC010	MAHALAXMI M			
6	3NA16EC013	SANIYA NAYYER			
7	3NA16EC014	SHIVAMURTHY K			
8	3NA16EC023	RAKESH T			
9	3NA16EC403	SHRUTI			

Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOCIAL

MEDIA INTEGRATION

STUDENT ATTENDANCE SHEET (EEE)

SECOND YEAR

Sr. No.	USN Number	Name	08/09/2018	15/09/2018	22/09/2018
1	3NA17EE001	Amith Kalayankar	Amith	Amith	Amith
2	3NA17EE002	Ashwini	Ashwini	Ashwini	Ashwini
3	3NA17EE003	Basavarajeshwari S			
4	3NA17EE004	G Venkatlaxmi	G.vent	Connut	G.vent
5	3NA17EE005	Ganesh Kumar L			
6	3NA17EE006	MD Jamaluddin Abu Turab			
7	3NA17EE009	Md. Mohiuddinulla B	+B	+B	+B
8	3NA17EE010	Nabila Nuzhat			
9	3NA17EE011	Nadini	Nadini	Nadini	Nadini
10	3NA17EE013	Nazneen Sultana	Sultan	Sultan	Sultan

THIRD YEAR

Sr. No.	USN Number	Name	08/09/2018	15/09/2018	22/09/2018
1	3NA16EE015	MUNAZZA NOOR ZIYA			
2	3NA16EE016	NAZMA UNNISA	Nazma	Nazma	Nazma
3	3NA16EE017	OMKARI VIJAYALAXMI	Vijay.	Vijl	Vijl
4	3NA16EE018	PADMAJA G	Padmaja	Padmaja	Padmaja
5	3NA16EE019	PALLAVI NAYAK	P.Nayak	P.Nayak	P.Nayak
6	3NA16EE020	PAVANKUMAR	P. kumar	P. kumar	P. kumar
7	3NA16EE022	ROHINI J P			
8	3NA16EE023	SOHAIL KHAN SURI	Khan	Khan	Khan
9	3NA16EE024	SUJATHA			
10	3NA16EE025	N V SWETHA	Seth	Seth	Seth
11	3NA16EE027	TULJA BHAVANI	Bhavni	Bhavni	Bhavni

Coordinator

Digital teaching platform

Digital teaching platforms refers to a general concept that broadly covers the ongoing development of digital learn- ing environments and how these environments can be used e□ectively.[1]

The **digital teaching platform** is also a new educational series of products designed to operate in a teacher-led classroom by the company Time To Know, Inc.[2] It of- fers a new tech-centric approach to the learning pro- cess and classroom planning.[3] The platform is designed to function as the instructional environment in today's technology-intensive classrooms. It provides a full digital curriculum, and supports the teacher with tools for cur- riculum planning, classroom management, and student assessment.[4]

1 Characteristics

The product "digital teaching platform" is designed for 21st century K–12 classrooms. Its approach contrasts with ideas and techniques used in the 1950s to prepare students for careers in factory-like atmospheres. It is a web-based system that puts the teacher in charge of the lesson, and is designed to provide the tools and resources the teacher needs to ensure smooth operation of the class. The platform functions as the primary instructional envi- ronment in a classroom with a 1:1 student-computer ra- tio. According to the One-to-One Institute, "One-to-one learning provides every student and teacher access to his or her own personal portable technology in a wireless en- vironment allowing students to learn at their own pace and ability levels."[5]

Unlike supplemental software programs, the digital teaching platform is the primary carrier of core curricu- lum content. It includes a comprehensive digital cur- riculum, which the teacher and students can access from their own computers. It also includes tools that allow the teacher to easily plan lessons, assign instruction, manage the classroom, and assess student learning — all from his or her computer.

2 Classroom uses

According to Walters and Dede the technology-rich dig- ital teaching platform uses a one-to-one computing en- vironment to best advantage.[2] The platform enables highly di□erentiated learning instruction, and supports collaborative learning and interdisciplinary techniques.[6] It facilitates large group multimedia presentations, small group projects, and individualized practice and assess- ment. The teacher is fully in control of student activities by making assignments, mentoring individuals, leading discussions, and providing feedback.[7]

Before class, the teacher uses planning tools provided on the system to prepare the lesson. During class, the teacher uses multimedia to introduce a topic. Using their com- puters, students then access applets to explore concepts, and practice exercises.[8] After class – at school or home – the teacher can use her computer to review each student's progress and trends in class performance, and begin the process for planning tomorrow's lessons. Teachers can also use the platform to customize learning sequences, assign assessments to students,[9] and create reports of student progress. Each student uses a laptop during the class[10] which allows not only for individual participa- tion, but teachers are also able to monitor individual stu- dent progress throughout the class.[11]

With a digital teaching platform, students see only the ac- tivities they are assigned, so they are not distracted by ma- terials meant for others or by activities that will be used later. The platform ensures that students understand their assignments and can move quickly from one activity to the next without losing time or momentum.

3 Research into the impact of digital teaching platforms

Independent studies in the United States and Israel show students who use a digital teaching platform achieve higher gains in language arts and mathematics than stu- dents in comparable schools using traditional teaching methods and curriculum. The digital teaching platform classrooms also show improved teaching quality, an im- proved learning environment with fewer disruptions, and an increase in student confidence, motivation and enjoy- ment of math and reading/language arts.[7]

A 2009 study by the Henrietta Szold Institute, the Na- tional Institute for Research in the Behavioral Sciences in Jerusalem, examined the educational impact of a spe- cific digital teaching platform, called Time To Know, on students in two public elementary schools in Israel. One was an inner city school with many students from low-income households or state-run group homes, and the other was located in an upper-middle-class neighborhood.

expert who transfers knowledge to students under the facade of universality.[20][21] Learning activi- ties are authentic and leverage the learners' puzzlement and curiosity that arises when their faulty or incomplete knowledge fails to predict what they observe. Teach- ers encourage students to reflect on these experiences, to seek alternative viewpoints, and to test a variety of ideas rather than adopt hegemonic principles. Student moti- vation to achieve these goals is determined by factors such as challenge, curiosity, choice, fantasy, and social recognition.[22] These goals produce a critical technological literacy that will make the student aware of the social, economic, and pedagogical implications of new comm nication technologies.[23]

The National Research Council lists the essential goals of learning in a constructivist approach:

- Building a deep foundation of factual knowledge and procedural skills;
- Developing conceptual frameworks;
- Organizing domain knowledge as experts do;
- Improving the thinking processes.[24]

Student motivation to achieve these goals is determined by a variety of intrinsic and extrinsic factors, such as sat- isfaction from achievement, contributing to others, and challenge and curiosity.[22]

6 Online Writing Centers

Online learning is often thought of as a binary opposi- tion to live instruction. Digital platforms are criticized for being disembodied or for preventing dialogue. Be- cause writing curriculum emphasizes process and discus- sion, digital teaching platforms are considered anathema to teaching writing.

In contrast, the presence and success of OWL's or Online Writing Labs in higher education has privileged student writing with the very features that inspire the criticism of it. OWL's provide multiple formats for dialogue includ- ing discussion boards, video conferencing, track changes, and shared spaces. Each of these tools oers a new and convenient possibility to support a stage of the writing process. OWLs coordinate people, platforms, and writ- ing techniques to support student writing. Where tutor- ing was once a luxury for students with greater resources, OWL's level the playing field by making this service avail- able to all students.

The planning and organization of the digital platform translates to clear and organized curriculum and instruc- tion. Gee associates optimal learning with a language delivery system that is just in time and on demand. In the instance of digital media students can interface with this language as participants and not simply spectators.[25] Hall hails tutoring methods, rather than method of de- livery, as crucial to successful tutoring. The tutor's task of understanding the student's understanding of an assignment is crucial. Blog discussions support tutors in shuttling from single-loop and double loop process with aplomb. Online tutors benefit from blogging their tuto- rial reflection with each other to share information and insight.[26] With the intervention of a well developed OWL, students benefit from the variability of small to large audiences for their writing within and outside of the discourse community. Online tutoring benefits from the intervention of training programs for all participants. Training in new technolo- gies, such as video conferencing, coordinate the members of a writing center from administrators, teachers, graduate students, and technical support.[27] Networking people promotes collective intelligence and serves a sec- ondary purpose of exposing students to the social geography of a university. Taken in a Vygotskyian frame, tutors, teachers and administrators model the dominant discourse via multiple platforms and with greater trans- parency.

The Purdue Writing center opened in 1994 and with an asynchronous communication model of email and web- site. Although an improvement at the time, email rein- forces the limits of the student teacher model rather than expanding dialogue. With updated technologies, such as video conferencing, discussion boards, and Wikipedia storming, digital learning platforms expand the num- ber of opportunities for writing intervention by provid- ing structured dialogue and an expanded audience. The heavy lifting of working with an individual on writing challenges no longer rests exclusively on the teacher. Much analysis of OWLs conflates data from old asyn- chronous models to more current platforms, which mis- represents the eectiveness of this method. Further, ac- cording to Gee, digital age experts are rarely accurate in predicting outcomes. Education in a digital age needs to undergo a saber metrics revolution where readings of more current and essential information are considered in policy making.[25]

expert who transfers knowledge to students under the facade of universality.[20][21] Learning activi- ties are authentic and leverage the learners' puzzlement and curiosity that arises when their faulty or incomplete knowledge fails to predict what they observe. Teach- ers encourage students to reflect on these experiences, to seek alternative viewpoints, and to test a variety of ideas rather than adopt hegemonic principles. Student moti- vation to achieve these goals is determined by factors such as challenge, curiosity, choice, fantasy, and social recognition.[22] These goals produce a critical technological literacy that will make the student aware of the social, economic, and pedagogical implications of new comm nication technologies.[23]

The National Research Council lists the essential goals of learning in a constructivist approach:

- Building a deep foundation of factual knowledge and procedural skills;

- Developing conceptual frameworks;

- Organizing domain knowledge as experts do;

- Improving the thinking processes.[24]

Student motivation to achieve these goals is determined by a variety of intrinsic and extrinsic factors, such as sat- isfaction from achievement, contributing to others, and challenge and curiosity.[22]

6 Online Writing Centers

Online learning is often thought of as a binary opposi- tion to live instruction. Digital platforms are criticized for being disembodied or for preventing dialogue. Be- cause writing curriculum emphasizes process and discus- sion, digital teaching platforms are considered anathema to teaching writing.

In contrast, the presence and success of OWL's or Online Writing Labs in higher education has privileged student writing with the very features that inspire the criticism of it. OWL's provide multiple formats for dialogue includ- ing discussion boards, video conferencing, track changes, and shared spaces. Each of these tools o ers a new and convenient possibility to support a stage of the writing process. OWLs coordinate people, platforms, and writ- ing techniques to support student writing. Where tutor- ing was once a luxury for students with greater resources, OWL's level the playing field by making this service avail- able to all students.

The planning and organization of the digital platform translates to clear and organized curriculum and instruc- tion. Gee associates optimal learning with a language delivery system that is just in time and on demand. In the instance of digital media students can interface with this language as participants and not simply spectators.[25] Hall hails tutoring methods, rather than method of de- livery, as crucial to successful tutoring. The tutor's task of understanding the student's understanding of an assignment is crucial. Blog discussions support tutors in shuttling from single-loop and double loop process with aplomb. Online tutors benefit from blogging their tuto- rial reflection with each other to share information and insight.[26] With the intervention of a well developed OWL, students benefit from the variability of small to large audiences for their writing within and outside of the discourse community. Online tutoring benefits from the intervention of training programs for all participants. Training in new technolo- gies, such as video conferencing, coordinate the members of a writing center from administrators, teachers, graduate students, and technical support.[27] Networking people promotes collective intelligence and serves a sec- ondary purpose of exposing students to the social geography of a university. Taken in a Vygotskyian frame, tutors, teachers and administrators model the dominant discourse via multiple platforms and with greater trans- parency.

The Purdue Writing center opened in 1994 and with an asynchronous communication model of email and web- site. Although an improvement at the time, email rein- forces the limits of the student teacher model rather than expanding dialogue. With updated technologies, such as video conferencing, discussion boards, and Wikipedia storming, digital learning platforms expand the num- ber of opportunities for writing intervention by provid- ing structured dialogue and an expanded audience. The heavy lifting of working with an individual on writing challenges no longer rests exclusively on the teacher. Much analysis of OWLs conflates data from old asyn- chronous models to more current platforms, which mis- represents the e ectiveness of this method. Further, ac- cording to Gee, digital age experts are rarely accurate in predicting outcomes. Education in a digital age needs to undergo a saber metrics revolution where readings of more current and essential information are considered in policy making.[25]

work is up to you. You should try to do your work on a daily basis so as to avoid being overburdened at the end of each unit.

Is taking a class online easier than a "regular" class?

Answer: No. The course content in an online class is usually identical to that of a face-to-face class on the same topic. Some people think the workload is even more demanding than a regular face-to-face class in that you have to be a self-directed learner, stay motivated, and stay on top of your workload independently. It has been shown that the most successful online students/teachers tend to share the following characteristics:

- Self-motivation/self-starter
- Good organization and time-management skills
- Familiar with computers and the Internet
- Resourceful and actively seek answers and solutions to questions and problems

What Internet skills would be helpful in an online class?

Answer: The most successful students have the following Internet skills:

- Familiarity with Web browsers and an email program.
- Some familiarity with Web-based interactions such as email, discussion boards, listservs, and chat rooms.
- Proficiency with typing and word processing.
- Experience in successful Internet searches using a variety of search engines.

How is online teaching different from traditional classroom teaching?

Answer: The online model emphasizes an interactive learning environment, designed to stimulate dialogue between instructor and students and among students themselves. The online process requires both instructor and students to take active roles. The instructor will often act as a facilitator, organizing activities that engage students directly rather than relying too heavily on lectures and memorization.

When and where do classes take place?

Answer: We don't really "meet" in a real-time or physical face-to-face sense. Instead, we interact regularly through the CMS and via email. Courses take place wherever your computer is: at home, at work, on the road - anywhere you can connect to the Internet. Courses are typically organized by week with specific due dates. The model is primarily asynchronous, which means that within each week you and your students may log in whenever it is most convenient. Generally, logging in four to five times per week is necessary to give timely feedback and interact sufficiently with students. Although communication is primarily asynchronous, real-time chat is also available.

How will I be able to communicate with my students?

Answer: A lot of instructors mistakenly assume that they'll feel isolated from their online students. To their surprise, most instructors find that online courses actually provide a high degree of personal contact, and many say that they get to know their online students much better than their students in on-ground courses. This is because asynchronous, online courses offer many more opportunities for reflection, in-depth discussion, and interaction than traditional courses that meet only once or twice a week. Not only will you and your students communicate directly, everyone in the class can be involved in group- and class-level discussions contributing as much and as often as they want. Far from being an impediment to communication, the online format facilitates and enhances communication and interaction in ways that would be impossible in other situations.

How It Works

In years past, instructors had to create their "virtual classrooms" from scratch which was difficult and often led to poor results. Today, an entire industry has emerged to do this for us. Course Management System (CMS) software is utilized by just about all colleges today. CMS allow instructors to design and deliver their courses within a flexible framework that includes a number of different tools to enable learning and communication to occur.

Popular for-profit CMS include:

- Blackboard (www.blackboard.com)
- WebCT (www.webct.com)
- eCollege (www.ecollege.com)

Low cost alternative and open source CMS include:

- ETUDES-NG (http://etudesproject.org)
- Moodle (http://moodle.org)
- Angel (http://angellearning.com)

Any of these CMS offer functionality which allows instructors to deliver *course content,* enable *communications,* and conduct *evaluations.* The most common tools offered by CMS include:

Schedule   For posting and viewing deadlines, events, etc. Announcements

For posting current information to all students. Syllabus

For creating and posting the course syllabus. Modules For

publishing and viewing course content in sections. Assignments   For posting, submitting,

and grading student work.

Discussion Board   For asynchronous discussions, group work, and collaboration. Private Messages

For private communication between students and/or the instructor. Chat   For

real-time, synchronous conversation in written form.

Tests & Quizzes   For authoring and administering exams, quizzes, surveys, etc.

Gradebook   For posting and managing student grades.

A New Paradigm for Teaching and Learning

Online learning is catalyzing a pedagogical shift in how we teach and learn. There is a shift away from top-down lecturing and passive students to a more interactive, collaborative approach in which students and instructor co-create the learning process. The Instructor's role is changing from the "*sage on the stage*" to "*the guide on the side.*"

Constructivism
This point of view maintains that people actively *construct* new knowledge as they interact with their environment. This is a student-centered approach in which students "co-create" their

learning experience. This approach empowers students as active learners instead of just passive recipients absorbing information and reproducing it for standardized tests.

Derived from the work of Swiss philosopher, Jean Piaget, constructivism emphasizes:

- The learner as a unique individual.
- The relevence of the learner's background and culture.
- Increased responsibility for learning belongs to the student.
- Motivation for learning comes from successful completion of challenging tasks.
- Instructors as facilitators helping learners develop their own understanding of content.
- Learning is an active, social process.
- The dynamic interaction between task, instructor and learner. Synergy!

Constructionism

Constructionism asserts that learning is particularly effective when constructing something for others to experience. This can be anything from a spoken sentence or an internet posting, to more complex things like a painting or a presentation. For example, you might read this page several times and still forget it by tomorrow - but if you were asked to explain these ideas to someone else in your own words, or produce a slideshow that explained these concepts, you would gain a deeper understanding that is more integrated into your own ideas.

Collaboration

As an instructor, you focus on the experiences that would best generate learning from the learner's point of view, rather than just publishing and assessing the information you think they need to know. Each participant in a course can and should be a teacher as well as a learner. Your job changes from being the sole source of knowledge, to being a guide and role model. You connect with students in ways that address their own learning needs by moderating discussions and activities in a way that collectively leads students towards the larger learning goals of the class.

(Modified from: http://docs.moodle.org/en/Philosophy and http://en.wikipedia.org/wiki/Constructivism_%28learning_theory%29)

Benefits of Online Teaching and Learning

Why online distance learning and why now? Online distance learning meets the needs of an ever-growing population of students who cannot or prefer not to participate in traditional classroom settings. These learners include those unable to attend traditional classes, who cannot find a particular class at their chosen institution, who live in remote locations, who work full-time and can only study at or after work, and those who simply prefer to learn independently.

The minimum requirement for students to participate in an online course is access to a computer, the Internet, and the motivation to succeed in a non-traditional classroom. Online courses provide an excellent method of course delivery unbound by time or location allowing for accessibility to instruction at anytime from anywhere. Learners find the online environment a convenient way to fit education into their busy lives. The ability to access a course from any computer with Internet access, 24 hours a day, seven days a week is a tremendous incentive for many of today's students.

Some of the main advantages of online learning include:

- Convenience: 24/7 access from any online computer; accommodates busy schedules; no commuting, no searching for parking.

- Enhanced Learning: Research shows increased depth of understanding and retention of course content; more meaningful discussions; emphasis on writing skills, technology skills, and life skills like time management, independence, and self-discipline.

- Leveling of the Playing Field: Students can take more time to think and reflect before communicating; shy students tend to thrive online; anonymity of the online environment.

- Interaction: Increased student-to-teacher and student-to-student interaction and discussion; a more student-centered learning environment; less passive listening and more active learning; a greater sense of connectedness, synergy.

- Innovative Teaching: Student-centered approaches; increased variety and creativity of learning activities; address different learning styles; changes and improvements can translate to on-ground courses as well

- Improved Administration: Time to examine student work more thoroughly; ability to document and record online interactions; ability to manage grading online.

- Savings: Accommodate more students; increased student satisfaction = higher retention and fewer repeats.

- Maximize Physical Resources: Lessen demand on limited campus infrastructure; decrease congestion on campus and parking lots.

- Outreach: Give students options; reach new student markets; appeal to current students thus increasing enrollments.

Online Learning FAQ

Those new to online learning are often unclear about what to expect. Below are some answers to frequently asked questions about online classes.

Is an online class the same as a self-paced class?

Answer: No. While some online classes are similar to independent study, most online classes are not self-paced classes. The due dates for documents and class participation reflect those of a "regular" campus class. Homework, other activities, and online class participation must be completed by preset dates and times.

How much time do I have to spend online?

Answer: You should plan to spend at least the same amount of time you would spend on a face-to-face class. And probably more, at least at first, as you get oriented to the online CMS.

Do I have to log on to class at a particular time?

Answer: No. You will have deadlines by which to post your work, but when you complete that

Text and image sources, contributors, and licenses

Text

- **Digital teaching platform** *Source:* https://en.wikipedia.org/wiki/Digital_teaching_platform?oldid=651436641 *Contributors:* Michael Hardy, Bearcat, Tabletop, Rjwilmsi, SmackBot, Chris the speller, Jim.belk, Cydebot, Fetchcomms, Sun Creator, M.O.X, 2, Appari- tion11, Staticshakedown, Addbot, Chzz, Yobot, EarwigBot, Retired user 0001, Goony663, John of Reading, Alpha Quadrant, Architectsea, Kmoira, Snotbot, Helpful Pixie Bot, BG19bot, Epicgenius, Ghannam Wasif, Saragee11 and Anonymous: 8

Images

- **Creative Commons Attribution-Share Alike 3.0**

- **File:Ambox_important.svg** *Source:* https://upload.wikimedia.org/wikipedia/commons/b/b4/Ambox_important.svg *License:* Public do- main *Contributors:* Own work, based □ of Image:Ambox scales.svg *Original artist:* Dsmurat (talk · contribs)

Content license

- Creative Commons Attribution-Share Alike 3.0

What is Online Learning?

Online learning is education that takes place over the Internet. It is often referred to as "e- learning" among other terms. However, online learning is just one type of "distance learning" - the umbrella term for any learning that takes place across distance and not in a traditional classroom. Distance learning has a long history and there are several types available today, including:

- *Correspondence Courses:* conducted through regular mail with little interaction.

- *Telecourses:* where content is delivered via radio or television broadcast.

- *CD-ROM Courses:* where the student interacts with static computer content.

- *Online Learning:* Internet-based courses offered synchronously and/or asynchronously.

- *Mobile Learning:* by means of devices such as cellular phones, PDAs and digital audio players (iPods, MP3 players).

By far the most popular approach today is online learning. According to the Sloan Consortium, online enrollments continue to grow at rates faster than for the broader student population and institutes of higher education expect the rate of growth to continue increasing. Some of the key findings:

- Over 1.9 million students were studying online in the fall of 2003.

- Schools expect the number of online students to grow to over 2.6 million by the fall of 2004.

- Schools expect online enrollment growth to accelerate — the expected average growth rate for online students for 2004 is 24.8%, up from 19.8% in 2003.

- The majority of all schools (53.6%) agree that online education is critical to their long-term strategy.

- A majority of academic leaders believe that online learning quality is already equal to or superior to face-to-face instruction. (The "no significant difference" phenomenon.)

(From: http://www.sloan-c.org/resources/index.asp)

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2018-19

SHORT TERM PROGRAM OF COMPUTING SKILLS ON SOCIAL MEDIA INTEGRATION

Following are the topics covered for II & III year students of CSE, ECE, and EEE departments during the training sessions on Social media integration.

Topics Covered

Sessions	Date	Time	Topics Covered	Outcome
Session – 1	08/09/2018	2.00pm to 5.00pm	Social Network Analysis, Social Network versus Computer Network, Social Network Sites	Understand the impact of professional Engg solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
Session – 2	15/09/2018	2.00pm to 5.00pm	Cloud Computing in Social Networks, Social cloud architecture	
Session – 3	22/09/2018	2.00pm to 5.00pm	Integration of Social Media Technologies with ERP, Prototype evaluation	

Coordinator

Head of Department,
Computer Science & Engineering
Navodaya Institute of Technology.
RAICHUR-584 10°

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON ONLINE TEACHING PLATFORM

Training program for Mechanical and Civil department students held on 13/10/2018 by Mr. Sundar Kumar

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2019-2020

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	08
7			Study Material	11
8			Topics Covered	24
9			Photo	25

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2019-20

NET's

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

SHORT TERM TRAINING PROGRAMME

1.	ACADEMIC YEAR	2019-2020
2.	TYPE OF THE PROGRAMME PROPOSED	Computing Skill
3.	TITLE OF THE PROGRAMME	Online computing tools
4.	BROAD OBJECTIVE OF THE PROGRAMME	To enhance student to understand the usage of different computing tools and implement it online.
5.	NAME OF THE DEPARTMENT	CSE, EEE, ECE
6.	TARGETED GROUP OF STUDENTS	Second and Third Year
7.	DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR	09 hrs
8.	NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME	03 days
9.	PROPOSED DATE AND DURATION OF THE PROGRAMME	07/09/2019, 14/09/2019, 21/09/2019
10.	TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME	09 hrs
11.	NUMBER OF HOURS REQUIRED PER DAY	03 hrs
12.	LOCATION DETAILS	NIT Auditorium
13.	MINIMUM NUMBER OF PARTICIPANTS	70
14.	DETAILS OF RESOURCE PERSONS	Mr. Hanumesh, Mr. Sandeep K
15.	EVENT ORGANISERS(STUDENTS)	A Kanakalaxmi, Imtiyaz
16.	FACULTY COORDINATOR	Mrs. Supriya Purohit
17.	PROGRAMME PROPOSED BY	CSE Department

Coordinator

PRINCIPAL 14/9/19
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 103

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

Date: 08.08.2019

To,
The Principal
NIT, Raichur

Subject: Approval of training program and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2019-2020

Respected Sir,

This is with respect to the approval of training program on Online computing tools and resource persons for II and III year students of CSE, EEE and ECE department for academic year 2019-2020. Following are the details.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Mr. Sandeep K	B. Tech	Computer Science	1 Years	07/09/2019, 14/09/2019, 21/09/2019
III	Mr. Hanumesh	M. Tech	Computer Science	5.5 Years	07/09/2019, 14/09/2019, 21/09/2019

I request you to approve for the same. Thanking you in anticipation.

Yours Sincerely,

Coordinator

NET/NIT/PO/CIR/2019-20/09

14/08/2019

CIRCULAR

The HoD of ECE and EEE department are here by informed that department of CSE is organizing training sessions for all the II & III year students of CSE, ECE, and EEE departments. The training sessions on Online computing tools will be conducted as per the following schedule. All the students should attend the training class without fail.

Session – 1 : 07/09/2019 – Time: 2.00pm to 5.00pm

Session – 2 : 14/09/2019 – Time: 2.00pm to 5.00pm

Session – 3 : 21/09/2019 – Time: 2.00pm to 5.00pm

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 101

Copy to,

1) Notice Board
2) HoD's – CSE, ECE, EEE
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting Online computing tools training classes to all the II & III year students of CSE, ECE, EEE departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Mr. Sandeep K	B. Tech	Computer Science	1 Years	07/09/2019, 14/09/2019, 21/09/2019
III	Mr. Hanumesh	M. Tech	Computer Science	5.5 Years	07/09/2019, 14/09/2019, 21/09/2019

Coordinator

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 104

HOD

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-20

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE

COMPUTING TOOLS

STUDENT ENROLLMENT LIST (CSE)

SECOND YEAR		
Sr. No.	USN Number	Name
1	3NA18CS002	AFROZ AHMED
2	3NA18CS003	ANN MARY GEORGE
3	3NA18CS006	CHETANA J KULKARNI
4	3NA18CS007	DEEPTHI H JOSHI
5	3NA18CS008	DIVYA
6	3NA18CS009	DURGAVENI
7	3NA18CS010	DYAM HANUMESH
8	3NA18CS012	HUGAR PHULARI VISHAL AMRUT
9	3NA18CS013	K RAGHAVENDRA RAO
10	3NA18CS026	PAVANKUMAR SINGH
11	3NA18CS027	POOJA RANI
12	3NA18CS028	PRAVEEN KUMAR
13	3NA18CS029	R NIDA AFREEN
THIRD YEAR		
1	3NA17CS002	B SREEJA
2	3NA17CS003	B V REKHA DEVI
3	3NA17CS004	BHAVYA
4	3NA17CS005	C POOJITHA
5	3NA17CS006	G TEJASWINI
6	3NA17CS008	VIJAY TARUN
7	3NA17CS009	HAFSA BATUL
8	3NA17CS010	HAJRA
9	3NA17CS019	S KAMAKSHI

COORDINATOR

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE COMPUTING TOOLS

STUDENT ENROLLMENT LIST (EEE)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA18EE012	MOHAMMED MOINUDDIN
2	3NA18EE013	MD SHAFIQ AFZAL
3	3NA18EE014	MD. SHAMSHUZAMA
4	3NA18EE015	MOHAMMED SHOAIB
5	3NA18EE022	TOOBA AFREEN
6	3NA18EE023	UMAR FAROOK
7	3NA19EE403	ERAMMA
8	3NA19EE404	GOUTHAM N
9	3NA19EE405	KIRAN BALBATTI
10	3NA19EE410	SHIVAKUMAR

THIRD YEAR

1	3NA17EE001	AMITH KALAYANKAR
2	3NA17EE002	ASHWINI
3	3NA17EE003	BASAVARAJESHWARI S
4	3NA17EE004	G VENKATLAXMI
5	3NA17EE015	S V RAHUL
6	3NA17EE016	SANJANA
7	3NA17EE018	SWATHI R
8	3NA17EE019	VASIYA NAHEED
9	3NA17EE020	YASHODHA
10	3NA16EE021	RAJU S PARAGI
11	3NA18EE407	SUREKHA ADRI

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2019-20

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE COMPUTING TOOLS

STUDENT ENROLLMENT LIST (ECE)

SECOND YEAR		
Sr. No.	USN Number	Name
1	3NA18EC003	DANDI KAVYA
2	3NA18EC004	DEEPA REDDY
3	3NA18EC006	K AKHILA
4	3NA18EC007	MD.INZAMAMUL HAQUE
5	3NA18EC008	NIKHITA N
6	3NA18EC009	PRIYANKA
7	3NA18EC0010	RESHMA BEGUM
8	3NA18EC001	CHAITRA PATIL
THIRD YEAR		
1	3NA16EC004	AYESHA SIDDIQUA
2	3NA15EC003	ANNAPURNA D
3	3NA17EC005	C GAYATHRI VARMA
4	3NA17EC007	HARSHITAGANGAKED
5	3NA17EC008	K RAJEETA
6	3NA17EC009	LAKSHMI P ARETNOOR
7	3NA17EC013	SURESH KODURI
8	3NA17EC014	VARSHA

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY

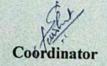## NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-20

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE
COMPUTING TOOLS
STUDENT ATTENDANCE SHEET (CSE)

SECOND YEAR			07/09/2019	14/09/2019	21/09/2019
Sr. No.	USN No.	Name			
1	3NA18CS002	AFROZ AHMED	Afroz	Afroz	AB.
2	3NA18CS003	ANN MARY GEORGE	Mary	Mary	Mary
3	3NA18CS006	CHETANA J KULKARNI	Chetu	AB	Chetu
4	3NA18CS007	DEEPTHI H JOSHI	deepthi	deepthi	deepthi
5	3NA18CS008	DIVYA	Divya	Divya	Divya
6	3NA18CS009	DURGAVENI	Dr	Dr	Dr
7	3NA18CS010	DYAM HANUMESH	DH	DH	DH
8	3NA18CS012	HUGAR PHULARI VISHAL AMRUT	Vishal	Vishal	Vishal
9	3NA18CS013	K RAGHAVENDRA RAO	Raghavendra Rao	Raghavendra Rao	Raghavendra Rao
10	3NA18CS026	PAVANKUMAR SINGH	PR	PR	PR
11	3NA18CS027	POOJA RANI	Pooja	Pooja	Pooja
12	3NA18CS028	PRAVEEN KUMAR	Praveen	Praveen	Praveen
13	3NA18CS029	R NIDA AFREEN	Nida	Nida	Nida
THIRD YEAR					
1	3NA17CS002	B SREEJA	Bsreeja	Bsreeja	Bsreeja
2	3NA17CS003	B V REKHA DEVI	Rek	Rek	AB
3	3NA17CS004	BHAVYA	Bhavya	Bhavya	Bhavya
4	3NA17CS005	C POOJITHA	Poojitha	Poojitha	Poojitha
5	3NA17CS006	G TEJASWINI	Tej	Tej	Tej
6	3NA17CS008	VIJAY TARUN			
7	3NA17CS009	HAFSA BATUL	HafsaBatul	HafsaBatul	HafsaBatul
8	3NA17CS010	HAJRA	hajra	AB	hajra
9	3NA17CS019	S KAMAKSHI	Kam	Kam	Kam

Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-20

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE

COMPUTING TOOLS

STUDENT ATTENDANCE SHEET (ECE)

SECOND YEAR

Sr. No.	USN Number	Name	07/09/2019	14/09/2019	21/09/2019
1	3NA18EC003	DANDI KAVYA	Kavya	Kavya	Kavya
2	3NA18EC004	DEEPA REDDY	Deepa	AB	Deepa
3	3NA18EC006	K AKHILA	Akhila	Akhila	Akhila
4	3NA18EC007	MD.INZAMAMUL HAQUE	H.D.Hqr	H.D.Hqr	H.D.Hqr
5	3NA18EC008	NIKHITA N			
6	3NA18EC009	PRIYANKA	priyanka	priyanka	Priyanka
7	3NA18EC0010	RESHMA BEGUM	Reshma	Reshma	Reshma
8	3NA18EC001	CHAITRA PATIL	AB	Chaitra	Chaitra

THIRD YEAR

Sr. No.	USN Number	Name	07/09/2019	14/09/2019	21/09/2019
1	3NA16EC004	AYESHA SIDDIQUA	AB.	Dyella	Dyella
2	3NA15EC003	ANNAPURNA D	Anna	Anna	Anna
3	3NA17EC005	C GAYATHRI VARMA	G.	G.	G.
4	3NA17EC007	HARSHITAGANGAKED	AB.	H.P	H.P
5	3NA17EC008	K RAJEETA	Ravi	Ravi	Ravi
6	3NA17EC009	LAKSHMI P ARETNOOR	Laomi	Laomi	Laomi
7	3NA17EC013	SURESH KODURI			AB
8	3NA17EC014	VARSHA	Varsha	Varsha	Varsha

Coordinator

(9)

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-20

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE
COMPUTING TOOLS
STUDENT ATTENDANCE SHEET (EEE)

SECOND YEAR

Sr. No.	USN Number	Name	07/09/2019	14/09/2019	21/09/2019
1	3NA18EE012	MOHAMMED MOINUDDIN			
2	3NA18EE013	MD SHAFIQ AFZAL			
3	3NA18EE014	MD. SHAMSHUZAMA			
4	3NA18EE015	MOHAMMED SHOAIB			AB.
5	3NA18EE022	TOOBA AFREEN			
6	3NA18EE023	UMAR FAROOK			
7	3NA19EE403	ERAMMA			
8	3NA19EE404	GOUTHAM N		AB	
9	3NA19EE405	KIRAN BALBATTI .			
10	3NA19EE410	SHIVAKUMAR			

THIRD YEAR

Sr. No.	USN Number	Name	07/09/2019	14/09/2019	21/09/2019
1	3NA17EE001	AMITH KALAYANKAR			
2	3NA17EE002	ASHWINI			
3	3NA17EE003	BASAVARAJESHWARI S			AB
4	3NA17EE004	G VENKATLAXMI			
5	3NA17EE015	S V RAHUL			
6	3NA17EE016	SANJANA			
7	3NA17EE018	SWATHI R		AB.	
8	3NA17EE019	VASIYA NAHEED .			
9	3NA17EE020	YASHODHA			
10	3NA16EE021	RAJU S PARAGI	AB		
11	3NA18EE407	SUREKHA ADRI			

Coordinator

ONLINE COMPUTING TOOLS

What is a Virus Scanner?

A virus scanner is a web service that **scans your device from a remote server.** As it's not as powerful as a full-scale antivirus — and some of them work from the cloud — there is little to no system lag.

If you suspect that your device is infected with a virus and you haven't yet installed a paid <u>antivirus,</u> then a free online virus scanner can **provide a quick and easy solution without having to download and install any software.**

However, not all virus scanners are the same, *and very few are actually free, web-based services.* They also vary considerably in terms of accuracy, customization, and added features.

How We Tested Them

To evaluate which are truly the best online virus scanners, **we used a device with several known <u>malware</u> infections** and tested it using the most popular and robust online virus scanners we could find.

Then we rated them according to the following criteria:

- Ease of Use
- Online vs. Download
- Ability to Identify Infections
- Additional Features
- Price
- Drawbacks

We compared many virus scanners, including <u>Kaspersky,</u> Trend Micro, and MetaDefender Cloud, and found that, though these are good free online scanners, the ones on this list provided better all-around protection.

The following seven ranked highest on all factors:

1. <u>**SafetyDetectives Vulnerabilities Scanner**</u>
2. <u>**VirusTotal**</u>
3. <u>**ESET Online Scanner**</u>
4. <u>**F-Secure Online Scanner**</u>
5. <u>**Norton Security Scan**</u>
6. <u>**BullGuard Online Virus Scan**</u>
7. <u>**Bitdefender Home Scanner**</u>

Let's look at each online virus scanner in more detail…

1. <u>SafetyDetectives Vulnerabilities Scanner</u> (No-Download Required)

Unlike many of the other online virus scanners we tested, the **SafetyDetectives Vulnerabilities Scanner doesn't require a download.** It runs a thorough scan to pick up any threats, and then explains how to fix them.

The scan **takes only a few seconds** and provides a high level of accuracy when identifying system vulnerabilities across all platforms. Again, **it doesn't repair the problem,** but it tells you how to fix it. So while it's free, light, and very quick, it should only be relied on for *identifying problems, not mending them.*

Pros:

- No download required.
- Scans entire system within seconds.
- 100% accuracy rate.
- Free service.
- Clearly explains how to rectify the problem.
- Cross-platform.
- Indicates level of threat.
- No ads.

Cons:

- Does not repair recognized vulnerabilities.
- No options for customization.

Review

While many antivirus companies claim to offer a web-based scanner, the fact is few actually do. <u>SafetyDetectives's Vulnerabilities Scanner</u> is one of a couple exceptions.

While not technically considered a full-scale antivirus, this online scanner offers a quick and easy to use cloud-based solution. If it detects an issue, it provides a threat-level warning and gives suggestions/advice on how to rectify the problem.

As a **truly free, cross-platform solution**, it's a great online tool for quick check-ups without the need for a download or subscription.

Test the <u>SafetyDetectives Vulnerabilities Scanner</u> >>>

2. <u>VirusTotal</u> (No-Download Required)

VirusTotal is a free online scanner that analyzes suspicious files and URLs for suspected malware by referencing a large online database of known infections.

Though it scans uploaded files impressively fast, **it's only able to analyze one at a time.** It's pretty annoying to run every single file on your PC through a full system scan. While it operates as a true web-based scanner — as it cannot remove any threats — it simply can't be classified as a system-wide detection tool.

Pros:

- No download required.
- Free service.
- High level of accuracy.
- Performs quickly.
- Several scanning options.
- Comprehensive reporting.
- Cross-platform.

Cons:

- Limited to one file/URL at a time.
- Unable to remove infection.

Review

I was impressed with how quickly VirusTotal worked and how detailed the analysis report was. It ran one *.doc* file through **58 different antivirus engines,** which was impressive.

After performing the online scan for malware, it automatically shared the results with its community of users, thereby checking in with a real-time database of global security threats. As a free and truly online tool, **it's great for one-off checks** but not robust enough to perform a system-wide scan.

Test the VirusTotal Scanner >>>

3. ESET Online Scanner (Download Required)

The ESET Online Scanner is a reduced version of the full ESET Security Suite. This download-only scanner provided **flawless accuracy when identifying infections** and was able to name and locate every suspicious file on our testing device.

Although the scan took 30 minutes — which is longer than other scanners — it thoroughly explored the operating memory, auto-start locations, and local drives.
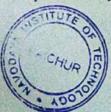
ESET lets you **delete or quarantine an infection,** which is not an option with some virus scanners.

The major drawback? It's only available on 32-bit and 64-bit Windows systems; so if you use a different operating system, you'll have to look elsewhere.

Pros:

- Scans your entire computer.
- 100% accuracy rate.
- Includes anti-stealth technology (anti-rootkit).
- Scan customization available.
- Comprehensive report available.

Cons:

- Downloadable add-on required.
- Only available on Windows.
- Full scan takes 30 minutes.

Review

The ESET Online Scanner offers a more in-depth virus scan than many of its competitors. Although it takes longer to scan, **the level of detail of the scan and the results are worth the wait.** Even if it didn't have the option to delete/quarantine (which it does), it still would be easy to locate and delete the infected files manually.

I was disappointed that a download was required for this virus scanner, but **ESET is a high-quality service,** and it is definitely worth it. The amount of customization is also notable. You can specify which features you want to use, and you can set up automatic scans.

The scanner is available for one-off use, but you can opt into a 30-day free trial of ESET's full Security Suite. This package offers continuous, real-time protection before having to commit to a subscription or payment.

*Test the **ESET Online Scanner** >>>*

For complete protection, see ***ESET Deals*** >>>

4. F-Secure Online Scanner (Download Required)

F-Secure's download-required virus scanner is sleek, simple to use and effective.

When tested, **it removed the majority of malware on our device.** The whole process was impressively fast for a download service, **taking less than a minute.** You can see information about any infected files with links to get more details online. The tool can also successfully remove malware via a system restart.

While very user-friendly, it's currently only available for Windows, however the company offers a free trial of their F-Secure Safe software for Mac users.

Pros:

- Removes infected files.
- 70% accuracy rate.
- Scans in less than a minute.
- Simple user interface.
- Regularly updated for new threats.

Cons:

- Only available on Windows.
- No cloud-based scanner.
- No custom scan options.
- System-restart required.

Review

(14)

The F-Secure virus scanner is definitely one of the best online virus scanners out there. While it requires a downloadable add-on, **it takes up minimal memory.**

The speed of the scan was another major selling point, as was the **ability to actually remove threats.** Although restarting the device was a slight inconvenience, a surprising number of other scanners don't offer removal options at all.

Overall, the F-Secure Online Scanner is impressive as a well-rounded live threat detection tool. It didn't manage to detect every single threat, but it still performed well in all areas.

*Test the **F-Secure Online Scanner** >>>*

For complete protection, see ***F-Secure Deals*** >>>

5. Norton Security Scan (Download Required)

Norton's free Security Scan tool provides a quick and more detailed scan than many of its other competitors.

But like most online virus scanners, the Norton Security Scan requires a software download to work. So, it can't be classified as a real, web-based scanning service.

However, when tested, **it identified 70% of malware,** alongside many suspicious cookies or outdated apps. While its results were broader than most, you still aren't able to actually remove the infections. Instead, you're redirected to purchase Norton's full antivirus software.

The tool also **doesn't disclose the names and locations of the infections,** so you can't remove them manually. However, if you just want to check whether your system is infected with malware and then use another program to remove it, then Norton's Security Scan is a decent option.

Pros:

- Full system-scan.
- Suspicious cookies scan.
- Identifies system vulnerability.
- High rate of detection.
- Trusted and established brand.

Cons:

- Not a true web-based service.
- Can't erase infections.
- Only available on Windows.
- Tries to upsell you to full software.

Review

Many online virus scanners try to upsell you to a paid antivirus, so the fact that Norton couldn't disinfect my system didn't come as much of a surprise. However, removing the infection is arguably the most important part of **antivirus protection**.

Despite this, the actual **detection rate is pretty impressive**. Instead of just highlighting malware, it thoroughly scans your device to uncover any potential security threats. If you already have an antivirus, Norton Security Scan is **ideal for performing instant checks**, instead of having to wait for a full system scan. Then, if you find an infection, you can switch to your installed software.

Unfortunately, Norton's Security Scan isn't compatible with Mac, but Apple users have the option to test out a trial version of any other Norton antivirus app without having to provide credit card information.

Test the Norton Security Scan Tool >>>

For complete protection, see *Norton Deals >>>*

6. BullGuard Online Virus Scan (Download Required)

Cybersecurity giant BullGuard used to offer a dedicated online virus checker, however, they recently updated their system so users can now download a **free two-month trial of their premium security packages.** These free apps provide fewer features, so they take up less space on your computer.

They can also be accessed via any browser, **offering higher compatibility than other similar tools.** Unfortunately, it does take a long time to set up. Plus, it doesn't have an instant scan setting; you have to select critical areas in a custom scan.

Pros:

- Available on most browsers.
- Several options available.
- Premium quality.
- Available for 60 days.

Cons:

- No dedicated online scanner.
- Long installation process.

Review

It was surprising that BullGuard removed the online scanning tool from their site. However, their free trial options are still remarkably quick and convenient to use. That said, **I wasn't impressed by the significant amount of time it took to install.** Not only did I have to go through a lengthy set-up process, I also had to create an account.

Although the client is well-designed, **it doesn't offer an auto-quick scan.** To only search the critical regions, I had to create a custom scan and choose them manually.

Nevertheless, the results were promising. **It found most of the malware.** I didn't expect anything less, as the app is just a smaller version of their premium antivirus engines.

While I wouldn't recommend the BullGuard Virus Scan as my first choice, it did successfully achieve its goals eventually.

*Test the **BullGuard Online Virus Scan Tool** >>>*

For complete protection, see ***BullGuard Deals*** >>>

7. Bitdefender Home Scanner (Download Required)

Bitdefender's Home Scanner is a download-only, low-usage app that's part of Bitdefender's free toolbox. You can use it to perform a quick scan of your device's critical areas, do a full system check, or target a custom location. We chose the first option, and **it completed the scan in less than one minute.**

It picked up on some infections, but it didn't find all the threats. I was able to quarantine the files, but I had to change my user privileges to be able to disinfect them. Overall, the scanner was **generally effective but unnecessarily complex** in some areas.

Pros:

- Available on Explorer, Firefox, and Chrome.
- Takes less than a minute to scan.
- Adware removal tool also available.
- Identifies malware fast.
- Fastest option available.

Cons:

- No detailed results.
- Download only.
- Some reports of interference with other apps.
- Limited accuracy.

What is photo editing?

A definition
The meaning of photo editing is the act of altering an image, simply put. But that's oversimplifying a subject which is quite complex.

For example, some photo editing techniques are done manually, while others are conducted through automated software. Some photo editing is even done offline, on actual photographs, posters or other printed collateral.

Other terms for photo editing:

- Image editing
- Post-processing
- Image/photo manipulation
- Photoshopping
- Image/photo enhancement

What are the different types of photo editing?

There are many different types of photo editing. Some are simple and others are more complex. You can typically execute simple photo-editing techniques fairly easily and quickly. Complex techniques and digital editing may require a software program and more experience and training. Simple photo-editing techniques include:

1. Noise reduction: smoothing the picture out, typically accomplished by reducing the pixel size
2. White balance: the color of the light in the image
3. Contrast: higher contrast makes an image more punchy, while lower contrast makes it flatter in color
4. Exposure: the brightness of the photo
5. Lens correction: addresses any issues with the camera lens
6. Color adjustments: change the color of an item or element in the photo
7. Resizing and cropping: adjust the dimensions of the image
8. Background removal: delete the background from the image, isolating the subject (this is often used for white background product photography)

The more complex, advanced techniques include:

- Clipping paths: extract a subject or element from an image
- Portrait corrections: fix the complexion of people in images
- Drop and reflection shadow: create or adjust shadows
- Special effects: this can mean an array of things, from animation to adding weather conditions like fog or snow
- Adjusting text and visuals: add overlays or manipulate what's already there
- Photo stitching: when you seamlessly put two images together to make it look as though they were shot that way
- Photo masking and Layers: the process of hiding and revealing specified portions of an image

Pixel editing and parametric image editing

Two methods of digital photo editing are pixel editing and parametric image editing. Let's look at their definitions:

- Pixel editing: Pixel editing, or pixel level editing, is when you alter an image at the pixel level. Because you're altering the pixels themselves, this also permanently changes the image file. That's why pixel editing is considered a destructive form of photo editing because it's not as easy to undo the changes and restore the original file. Pixel editing allows you to make extremely detailed edits and accomplish certain functions that parametric image editing can't (like CMYK color modes, for example).
- Parametric image editing: Parametric image editing, sometimes called PIE, doesn't change the pixels of the image. Instead, these edits are recorded as a set of steps to follow to accomplish the final look. Thus, it's a non-destructive mode of photo editing. However, PIE doesn't always allow for all types of edits.

Many in the industry recommend starting with PIE, and then using pixel editing to refine the final details.

The history of photo editing

Photo editing wasn't always done so easily on a computer. Before today's digital image manipulation tools, photo editing was often done by hand. Creative Live takes a closer look at the history of the wet collodion method, photo editing, pointing to the 1850s discovery of the wet collodion method of putting multiple photos together (using negatives).

Shortly thereafter, photo manipulators used it to put silhouettes of ghosts on photos of deceased soldiers. One famous example is an image of Abraham Lincoln's spirit behind widow Mary, placed by William H. Mumler.

Fast forward to the 1980s, when Adobe announced the first digital photo-editing software which brought image editing into the modern age its line of products, and digital photo-editing tools which editors can use on their computers. Today, there are tons of photo-editing tools available, both paid and free. However, Adobe's Creative Cloud remains one of the most popular and well-known.

What is photo-editing software?

Photo-editing software is a tool which you can use to manipulate and enhance images. Because photos have an increasing number of uses — spanning from display ads to social media and print catalogs to posters — more businesses are finding ways to repurpose photos and use them on multiple channels.

To make this easier, editors use photo-editing software programs. There are many kinds of photo-editing software, each with its own costs, features and pros/cons.

Popular photo-editing software and programs include:
- Adobe Photoshop (and the entire Adobe Creative Cloud line of products)
- Serif Affinity Photo
- Pixlr
- Aviary
- Canva
- GIMP
- Microsoft Paint
-

Popular photo-editing mobile apps include:
- Snapseed
- VSCO
- Afterlight
- Instagram
- Enlight Photofox
-

What is a photo editor?

A photo editor can be one of two things: a tool which edits images, or a person who edits images. Let's start with the more straightforward one, the tool.

There are many tools that can automate different photo-editing tasks. Many photo-editing companies, for example, are actually tools that automate things such as clipping paths. This is great when you want to save time and use an automated tool on your own, but if you're paying to outsource your image-editing needs, you'll want to look for a company that does this by hand.

On that note, the person who edits images can either be freelance, employed by an outsourced company or agency, or someone who works in-house. There are many possible job titles for a photo editor, including digital photo editor, graphic designer or art director, among others.

A photo editor's typical duties will vary depending on the company and industry. Photo editors who work in-house at a major ecommerce brand, for example, may be spending most of their time prepping product photos to list on their site and manipulating lifestyle shots for use throughout the website. If they work at a photo-editing agency, then they may edit a range of photos from a diverse group of customers.

UNIFILE – ONLINE FILE STORAGE SYSTEM FOR UNIVERSITIES AND COLLEGES

This section is divided into three portions: (i) System Analysis (ii) Design (iii) Implementation.

2.1 System Analysis

UniFile features are basically divided into four main aspects. Out of the four, two aspects that play the most significant role are: (i) File Storage and Management (ii) File Sharing. The remaining two aspects are: (i) Personal Management (ii) Online Student Activities. We will begin by introducing the File Storage and Management features.

Students or lecturers who wish to utilize the online file storage service must acquire an account in the system. Thus, by selecting the domain he or she is in (figure 1), the user is required to go through a simple registration process to create a new account. For lecturer, verification code is required to distinguish between a lecturer and a student.
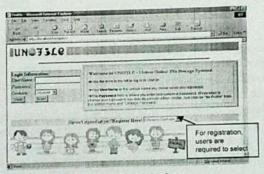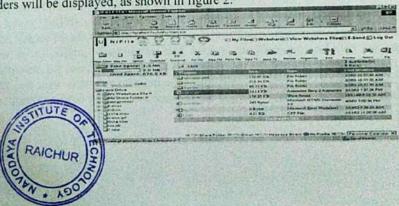
Fig.1. The Login and Registration Page

User is required to login into UniFile each time they wish to use UniFile by entering their username, password and specifying the domain they are in. By default, upon registration, a student will be given a storage space of 5MB and a lecturer with 10 MB. A folder named Inbox is automatically created for each user, which serves the purpose of receiving files sent by other UniFile members. This is rather similar to the function of the inbox in an email service. The interface of UniFile is easy-to-use and graphical, with some similarity with the Windows Explorer or the MacOS interface. In the left pane of the screen, shows a drive space meter and a tree view displays of all folders in the user's storage space. In the right pane, the detailed listing of files and folders will be displayed, as shown in figure 2.

20

All the files and folders in the user virtual storage space are displayed in a listing style that includes the name of the file, the size of the file in KB, the type of the file and the date when the file is last modified. Sorting is allowed for each header of the list (name, size, type and date). For better readability, two colored highlighting is used.

A row of instantly recognizable graphical tool buttons (see Figure 2) spans across the top part of the screen. These tools perform simple yet powerful functions, by assisting user in managing and organizing their remote online files with few simple mouse clicks. They are 16 functions altogether, namely: New Folder, New File, Upload, Download, Zip Download, Cut, Copy, Paste, CopyTo, MoveTo, Properties, Rename, Preview, Edit, Delete and Zip (figure 3).

To upload single file each time to one's remote folder would have been a tedious task. By enabling the user to multiple upload five files at once will save the user's trouble from waiting for one transfer to finish before initiating another (see figure 4). To enable faster transfer, zip download feature is supported so that file downloaded is compressed. It works similarly like the standard download, but the file is compressed into ZIP file before downloading.

Fig. 4. File Upload Form

Comprehensive information about each and every user's file, such as the type, size or creation date and time of the file, can be viewed by clicking the Properties tool in the toolbar. To know how much space the user has used and how much it is remaining, a Drive Space Meter is designed at the left hand corner of the screen (see figure 2) to serve the purpose of monitoring the utilization of the space in each user virtual drive. On top of that, the system supports the viewing and editing of files with certain extensions. Files that can be viewed from within the web browser include those with the extensions of gif, jpg, jpeg, png, bmp, jpe, htm, html, doc, ppt, xls, txt and swf. Whereas file extensions that are accepted for editing include htm, html, asp, asa, txt, inc, css, aspx, js, vbs, shtm, shtml, xml, xsl and log.

A student and lecturer domain in UniFile have slight distintion in terms of two aspects, the interface and the space allocated. In general, the page for Lecturer has similar functionality and features as with the student's except that lecturer has one privilege over student: Lecturer owns larger storage space as compared to student's. Aside that, the interface of Lecturer page is relative simple and uses technology color. Whereas, the student page's interface is brighter and livelier in colors.

Many people have the general conception that an online file storage system is basically used for the storage and retrieval of personal files. Nevertheless, nowadays, web communities are about sharing information. Thus, in UniFile application, we have incorporated several file sharing features, which we named it as websharing.

Every UniFile user can webshare their files in their personal folder. Webshared files are files to be shared by all UniFile members. All webshared files posted will be displayed in a page for view by all users. Pagination and sorting function are included for easier viewing. Brief description for each file is provided and UniFile member are free to download any files they want. User can also view the properties of any file, or view the contents for certain files. A search function is located at the top corner of the page to facilitate the user in search for any webshare file.
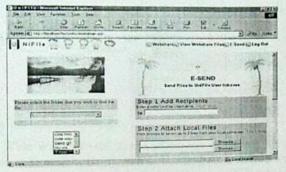
Fig. 5. Esend Page – transfering files to other UniFile members

With UniFile, students no longer need to submit their assignments by floppies to their respective lecturers, instead they can send the file to the lecturer's inbox from within their UniFile remote folder or from local drive. This special function is called E-send (figure 5), a function to facilitate the user in sending remote or local files to other UniFile users' inboxes. A whole listing of all the folders and files in the user's remote folder is displayed in the left pane of the screen for user selection. Addressing the intended recipient is done through entering the recipient's username. Before hitting the E-send button, user can choose whether to leave a message to the recipient in the message column.

Some students would have prefer to share their files within a group or small circle of peers. Thus, a folder sharing function is allocated to allow user to share any folder in their personal storage space with any friends they wish to add into their sharing lists.

Constantlystudents need to be reminded of certain important events, such as the date of submission for assignments and projects, quizzes, tests or date of final examinations. Thus, in UniFile we create an easy-to-use personal calendar which can act as an online organiser to UniFile users. The calendar is divided into two types, namely basic calendar and advance calendar. The calendar will allow the students to view upcoming events ranked by importance or date or color coded in calendar format. By frequently checking and maintaining an accurate calendar, user will be constantly reminded of their deadlines or appointments, thus minimizing the chance of missing any events.

Besides storing, and sharing files, we include some online activities to complement the usage of UniFile members. These activities, though not directly related to Online File Storage System, however are indeed useful for web communities. In a student community, students like to post up message or questions for discussions and look forward to receive answers and feedbacks from others. So by hosting a message board, UniFile members can assign his or her own boards for discussions or post up any upcoming news or society announcements.

To send a quick mail to other UniFile members can be done through a simple mail function created using JMail. HTML format of email message is supported and user can choose to attach a local file to his message.

Finally, for security concern, a log off button is provided for the user to close their connection to the UniFile server when he or she has finished with his current session. This prevents another user from accessing his or her account, if the user is working on a shared computer. A security feature is further added to automatically log off UniFile when the user remains idle for a period of 30 minutes.

2.1 System Design
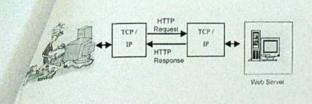In this section, we will describe the system architecture and design of UniFile.

Fig. 6. Connecting to UniFile web server

The World Wide Web is based on the Hypertext Transfer Protocol (HTTP). This protocol defines how a client browser will request a document from a web server once it has connected via sockets [4]. Figure 6 shows the protocol layers used in an HTTP request.

Before a user (client) can access the UniFile website, he must first have the connection to the Internet to fire up his web browser. A client browser connects to a web server using TCP/IP on port 80. When the client enters the UniFile's URL, the user's browser then makes a connection to the domain name service (DNS) and if the address is entered correctly, the client's browser will then request a socket connection to the HTTP "host".

Once the socket connection is successfully established, the client's browser communicates with the web server using HTTP. When the web server receives the page request, for example default.htm from the client browser, it returns a HTTP response.

For UniFile, we have chosen ASP and SQL Server as our development technology. ASP is one of the powerful site-server technologies and is a solution to providing a framework for building dynamic HTML pages that enable UniFile application to be interactive. SQL Server is chosen as the database solution for UniFile instead of Microsoft Access due to its high performance and capability in supporting high volume transaction processing as well as its full integrity with Microsoft's Internet Information Server.

2.2 System Implementation

The implementation of UniFile commences with setting up the development environment for UniFile. A server to hold the files is allocated and the IIS server is configured to host the site for UniFile. We create the SQL database for UniFile and make the connection to SQL server through ODBC in order to access the database from within the Active Server Pages.

Base on the conceptual data model constructed during database design, we create the respective tables to hold all data and information of the UniFile's users and files. The modules for UniFile are then coded. We use the File Access Component to work with files and to gain control of the file system of the file server. This component uses objects like FileSystemObject, TextStream, File, Folder and Drive. The FileSystemObject is used to deal with the creation and maintenance of a file or folder and it includes a number of methods for working with files and folders, such as CreateFolder, CreateTextFile, DeleteFile etc.

The uploading function for UniFile is developed using pure ASP instead of using any upload components that is currently available in the market. It has one advantage over any upload components, as it will work on any web server that supports ASP since no components are required to be installed.

SHORT TERM PROGRAM OF COMPUTING SKILLS ON ONLINE COMPUTING TOOLS

Following are the topics covered for II & III year students of CSE, ECE, and EEE departments during the training sessions on Online Computing Tools.

Topics Covered

Sessions	Date	Time	Topics Covered	Outcome
Session – 1	07/09/2019	2.00pm to 5.00pm	What is virus scanner, how we test them, seven ranked highest rated virus scanners in detail	Understand the impact of professional Engg solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
Session – 2	14/09/2019	2.00pm to 5.00pm	Photo editing, Pixel editing and parametric image editing, what is photo-editing software, what is photo editor	
Session – 3	21/09/2019	2.00pm to 5.00pm	Unifile: Online File Storage System- Analysis, Design, Implementation	

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 104

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-20

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON ONLINE COMPUTING TOOLS

Training program for CSE, EEE and ECE department students held on 21/09/2019 by Mr. Sandeep K.

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

ACADEMIC YEAR 2019-2020

INDEX FOR COMPUTING SKILLS

Sr. No.	Metric Number	Metric Type	Description of Proof	Page Number
1			Summary Sheet	01
2			Approval Letter	02
3	5.1.3	QnM	Circular	03
4			Resource Person Details	04
5			Student Enrollment List	05
6			Student Attendance Sheets	07
7			Study Material	09
8			Topics Covered	26
9			Photo	27

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-20

NET's

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR

SHORT TERM TRAINING PROGRAMME

1.	ACADEMIC YEAR	2019-2020
2.	TYPE OF THE PROGRAMME PROPOSED	Computing Skill
3.	TITLE OF THE PROGRAMME	Google Suite
4.	BROAD OBJECTIVE OF THE PROGRAMME	To boost the students to access and understand the different services used for Google suite.
5.	NAME OF THE DEPARTMENT	Mechanical, Civil
6.	TARGETED GROUP OF STUDENTS	Second and Third Year
7.	DATE/DURATION OF SUCH PROGRAMS CONDUCTED IF ANY IN THIS ACADEMIC YEAR	09 hrs
8.	NUMBER OF DAYS REQUIRED TO ORGANIZE THE PROGRAMME	03 days
9.	PROPOSED DATE AND DURATION OF THE PROGRAMME	12/10/2019, 19/10/2019, 26/10/2019
10.	TOTAL NUMBER OF PERIODS REQUIRED FOR THE PROGRAMME	09 hrs
11.	NUMBER OF HOURS REQUIRED PER DAY	03 hrs
12.	LOCATION DETAILS	NIT Auditorium
13.	MINIMUM NUMBER OF PARTICIPANTS	75
14.	DETAILS OF RESOURCE PERSONS	Mr. VijayKumar, Sharda D M
15.	EVENT ORGANISERS(STUDENTS)	B.Sreeja, Manasa Kotwal
16.	FACULTY COORDINATOR	Mr. Shivkumar
17.	PROGRAMME PROPOSED BY	CSE Department

Coordinator

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 101

NAVODAYA INSTITUTE OF TECHNOLOGY
DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

To,
The Principal
NIT, Raichur

Date: 08.08.2019

Subject: Approval of training program and resource persons for II and III year students of Mechanical and Civil department for academic year 2019-2020

Respected Sir,

This is with respect to the approval of training program on Google suite and resource persons for II and III year students of Mechanical and Civil department for academic year 2019-2020. Following are the details.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Sharda D M	B.E	CSE	1 year	12/10/2019, 19/10/2019, 26/10/2019
III	Mr. VijayKumar	M. Tech	Computer Science	12 Years	12/10/2019, 19/10/2019, 26/10/2019

I request you to approve for the same. Thanking you in anticipation.

Yours Sincerely,

Forwarded to Principal Sir for kind approval.

PRINCIPAL
Navodaya Institute of Technology
RAICHUR-584

Coordinator

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10

NET/NIT/PO/CIR/2019-20/ 10

14/08/2019

CIRCULAR

The HoD of Mechanical and Civil department are here by informed that department of CSE is organizing training sessions for all the II & III year students of Mechanical and Civil departments. The training sessions on Google suite will be conducted as per the following schedule. All the students should attend the training class without fail.

Session – 1 : 12/10/2019 – Time: 2.00pm to 5.00pm

Session – 2 : 19/10/2019 – Time: 2.00pm to 5.00pm

Session – 3 : 26/10/2019 – Time: 2.00pm to 5.00pm

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 10

Copy to,

1) Notice Board
2) HoD's – Mechanical, Civil
3) Principal Office.

PRINCIPAL
Navodaya Institute of Technology (NIT)
RAICHUR-584 103

RESOURCE PERSON DETAILS

Following are the details of resource persons conducting Google Suite training classes to all the II & III year students of Mechanical, Civil departments.

Year	Name of the resource person	Degree	Specialization	Experience	Date
II	Sharda D M	B.E	CSE	1 year	12/10/2019, 19/10/2019, 26/10/2019
III	Mr. VijayKumar	M. Tech	Computer Science	12 Years	12/10/2019, 19/10/2019, 26/10/2019

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 101

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-20

SHORT TERM PROGRAM OF COMPUTING SKILLS ON GOOGLE SUITE

STUDENT ENROLLMENT LIST (MECHANICAL)

Sr. No.	USN Number	Name
SECOND YEAR		
1	3NA17ME021	Sohail Khan
2	3NA18ME004	Md Abdul Sameer
3	3NA18ME005	Md Najmal Huda
4	3NA18ME006	Md Sameer Hussain
5	3NA18ME007	Md Zain Ahmed
6	3NA18ME010	Nihal Ahmed
7	3NA19ME400	Vishwanath Reddy
8	3NA19ME401	Purshottam
THIRD YEAR		
1	3NA15ME036	Soumya
2	3NA16ME014	Md Afridi
3	3NA16ME016	Md Ashfaq
4	3NA16ME018	Md Isaq
5	3NA16ME031	Roma E
6	3NA16ME434	Vikas Naik
7	3NA17ME406	Raghu Yadav
8	3NA17ME408	Stephonson
9	3NA15ME025	Prakash V Talwar
10	3NA16ME024	Pavan Kumar B
11	3NA16ME028	Praveen Rathod
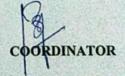
COORDINATOR

SHORT TERM PROGRAM OF COMPUTING SKILLS ON GOOGLE SUITE

STUDENT ENROLLMENT LIST (CIVIL)

SECOND YEAR

Sr. No.	USN Number	Name
1	3NA17CV028	MOHAMMED KHAJA MOINUDDIN FAIZ
2	3NA17CV032	MD SIMNANUDDIN
3	3NA17CV042	RASUL
4	3NA18CV001	AAMER
5	3NA18CV002	AKSHATA KULAGERI
6	3NA18CV003	ASIF AHMED
7	3NA18CV005	BHAVANI PATIL
8	3NA18CV006	HASHEEM ABDUL KHADER
9	3NA18CV007	LAVANYA
10	3NA18CV029	SARVESH SHASTRI

THIRD YEAR

Sr. No.	USN Number	Name
1	3NA15CV054	SOUDAGAR AAMER
2	3NA15CV055	SUGURESHWARA
3	3NA16CV010	FAISAL MD KAROBARI
4	3NA16CV012	KIRAN
5	3NA16CV015	Md. FAIZAN SHARAQ
6	3NA16CV024	PRANITH KUMAR REDDY
7	3NA16CV030	SANJEEV NAYAK
8	3NA17CV009	H HANUMESH
9	3NA17CV011	K VASANTH KUMAR

COORDINATOR

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-10

SHORT TERM PROGRAM OF COMPUTING SKILLS ON GOOGLE SUITE

STUDENT ATTENDANCE SHEET (CIVIL)

SECOND YEAR

Sr. No.	USN Number	Name	12/10/2019	19/10/2019	26/10/2019
1	3NA17CV028	MOHAMMED KHAJA MOINUDDIN FAIZ			
2	3NA17CV032	MD SIMNANUDDIN			
3	3NA17CV042	RASUL			
4	3NA18CV001	AAMER			
5	3NA18CV002	AKSHATA KULAGERI			
6	3NA18CV003	ASIF AHMED			
7	3NA18CV005	BHAVANI PATIL	Bhavani	AB	Bhavani
8	3NA18CV006	HASHEEM ABDUL KHADER	Abdul	Abdul	Abdul
9	3NA18CV007	LAVANYA			
10	3NA18CV029	SARVESH SHASTRI	Sarvesh	Sarvesh	Sarvesh

THIRD YEAR

Sr. No.	USN Number	Name	12/10/2019	19/10/2019	26/10/2019
1	3NA15CV054	SOUDAGAR AAMER	Aamer	Aamer	Aamer
2	3NA15CV055	SUGURESHWARA			
3	3NA16CV010	FAISAL MD KAROBARI	faizal	faizal	faizal
4	3NA16CV012	KIRAN	Kiran	Kiran	Kiran
5	3NA16CV015	Md. FAIZAN SHARAQ	Faizal	Faizal	Faizal
6	3NA16CV024	PRANITH KUMAR REDDY	Pranith	Pranith	Pranith
7	3NA16CV030	SANJEEV NAYAK	Senjv	Senjv	Senjv
8	3NA17CV009	H HANUMESH	Hanumesh	Hanumesh	Hanumesh
9	3NA17CV011	K VASANTH KUMAR	AB	V. Kumar	V. Kumar

Coordinator

NAVODAYA INSTITUTE OF TECHNOLOGY

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-20

SHORT TERM PROGRAM OF COMPUTING SKILLS ON GOOGLE SUITE

STUDENT ATTENDANCE SHEET (MECHANICAL)

Sr. No.	USN Number	Name	12/10/2019	19/10/2019	26/10/2019
1	3NA17ME021	Sohail Khan	*(signature)*	*(signature)*	*(signature)*
2	3NA18ME004	Md Abdul Sameer	*(signature)*	*(signature)*	*(signature)*
3	3NA18ME005	Md Najmal Huda	Najmal	AB	Najmal
4	3NA18ME006	Md Sameer Hussain	Sameer	Sameer	Sameer
5	3NA18ME007	Md Zain Ahmed	Zain	Zain	Zain
6	3NA18ME010	Nihal Ahmed	*(signature)*	*(signature)*	*(signature)*
7	3NA19ME400	Vishwanath Reddy	AB	V.Reddy	V.Reddy
8	3NA19ME401	Purshottam	*(signature)*	*(signature)*	*(signature)*
THIRD YEAR					
1	3NA15ME036	Soumya	*(signature)*	*(signature)*	*(signature)*
2	3NA16ME014	Md Afridi	Afridi	Afridi	Afridi
3	3NA16ME016	Md Ashfaq	Ashfy	Ashfy	Ashfy
4	3NA16ME018	Md Isaq	*(signature)*	*(signature)*	*(signature)*
5	3NA16ME031	Roma E	Roma	Roma	Roma
6	3NA16ME434	Vikas Naik	Vikas	Vikas	Vikas
7	3NA17ME406	Raghu Yadav	R.Yadav	R.Yadav	R.Yadav
8	3NA17ME408	Stephonson	Stephonson	-AB-	Stephon.
9	3NA15ME025	Prakash V Talwar	Prakash	Prakash	Prakash
10	3NA16ME024	Pavan Kumar B	Pavan	Pavan.	Pavan
11	3NA16ME028	Praveen Rathod	P.Rathod	P.Rathod.	AB

Coordinator

Guidelines on the use of G Suite
provided by ELSA

Why do we use G Suite?

Information Technology (*read more on page 30 of the ICMDB*) continues to be a very important dimension in the area of Internal Management, with many crucial elements to our day-to-day work in ELSA. Mailing has been a particularly central tool of communication for years, and its importance remains essential as a basic part of our ELSA work.

ELSA International has signed up for Google's suite of free tools to support communication, known as *G suite for Education*. The idea was to create a unified system under which the entire ELSA Network can easily function. In the extension of our identity as a large association, it would seem obvious that personalising the visibility and branding of ELSA is essential.

What do we use G Suite for?

G Suite is used

- for communication – Gmail, Hangouts, Calendar, and Google +
- for collaboration – Docs, Sheets, Slides, Forms, and Sites
- for storage – Drive
- for managing users and services – Admin panel and Vault.

Furthermore, G Suite adds enterprise features such as custom email addresses at a domain (@elsa.org in our case), unlimited cloud storage, additional administrative tools and advanced settings, as well as 24/7 phone and email support.

Document created by

Andrei Dumbrava
Assistant for IT

Sebastian K. Aguirre
Assistant for International Internal Meeting

Narmin "Nana" Aliyeva
Secretary General
ELSA International 2017/2018

USERS AND ADMINS

The G Suite is managed with a system of users and administrators. Board Members of National and Local Groups in ELSA will be classified as users, whereas Presidents and Secretaries General of National Boards are assigned the administrator role.

Regular users have access to all of the Google Apps mentioned above, while administrators have access to a panel where he/she can manage the users in his/her National or Local Group. For example, the administrator of G Suite of the National Group of ELSA Ciulnița will be able to
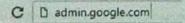
- View user list
- Create a user
- Rename users
- Reset password
- Force password change
- Add/remove alias
- Suspend users
- Delete users
- View user profile
- View enabled services
- View groups
- View licenses
- View security settings
- View admin roles

The use of G Suite for Admins

Having defined basic terms and functions available to us, it's time we start using the system.

1. **Logging in**

    a) Type *admin.google.com* in the address bar

    C   □ admin.google.com

    b) Fill in your username and password

Google

Sign in
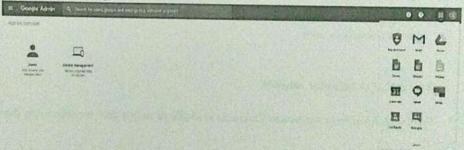
to continue to Admin console

Email or phone

|

Forgot email?

More options   NEXT

N.B. In the ELSA G Suite, only Presidents and the Secretaries General are administrators.

2. How to access Google services

a) Open the list of Google services by clicking the button on the upper right corner as shown in the image
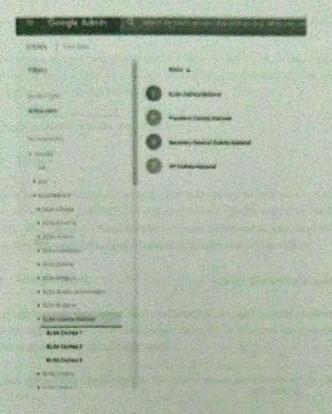
b) Press on the service you wish to use

3. Managing users

a) Access the users list by clicking the Users icon (add, rename and manage users).
b) Click on your National Group in the left sidebar to manage the accounts of your National Board (ELSA Ciulniṭa in this case) and its Local Boards.
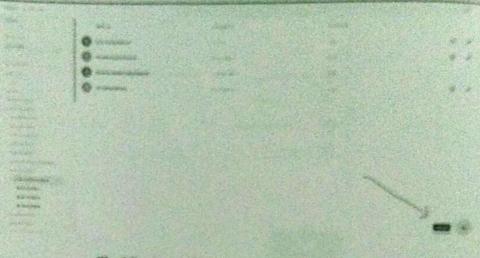
i. Below you see three quick action buttons on the right side, which can be used for resetting the password, renaming the user, and delete, suspend or send an email to the user.

N.B. *You cannot see the password set by the user—you can only reset it.*

ii. To add a new user press on the '+' button on the bottom right side of the screen

The following window will appear

Create a new user   ✕

First name   Last name

Primary email address   @ elsa.org   ▾

Temporary password will be assigned. Set Password

ADDITIONAL INFO   CANCEL   CREATE

Fill in First name, Last name, Primary email address and choose your domain
from the dropdown menu which comes after '@'. For example in the case of
National Group ELSA Culniţa the domain will be 'ci.elsa.org' and the email
address of the Secretary General will be 'secgen@ci.elsa.org'

GOOGLE APPS

The most useful trait of the G Suite in a daily ELSA work, is that this software works mostly in the cloud. It can be used to enhance productivity and collaboration within the Board and different team within the Network.

The Apps available for our use include:

- **Gmail**

Gmail is an email service. Currently, you may create an unlimited number of email addresses. These addresses end with ELSA's domain name (@elsa.org). For National Groups, e.g. ELSA Ciulnița: @cl.elsa.org. Other features include unlimited storage and the ability to synchronise the Gmail account with Microsoft Outlook and other email providers.

- **Google Drive**

Google Drive is a file storage and synchronisation service used to store the ELSA archives and any other relevant data. It is, as Google describe "a place where you can create, share, collaborate, and keep all of your stuff".

You can upload any file format to the cloud, share them with others, and access them from any other device.

- **Google Docs, Sheets, Slides and Forms**

Google Docs, Sheets and Slides are a word processor, a spreadsheet and a presentation program, respectively. They enable several users to view and edit documents, spreadsheets and presentations together simultaneously through a computer or any other device. Changes are saved automatically with a revision history keeping track of any changes made.

Another very useful tool is Google Forms that allows you to collect information from anyone via a personalised survey or quiz. The information is then collected and automatically connected to a spreadsheet that will give you all the results from the survey immediately.

- **Google Sites**

Google Sites is one of the simplest ways to create and edit websites. This does not necessarily require any special skills or knowledge. It is a great tool for gathering a lot of different information such as videos, calendars, presentations, attachments and text in one place. This information can then be easily shared for viewing or editing purposes with different groups of people.

- **Google Calendar**

Google Calendar is an online calendar intended to help keep track of time and schedules. Users can easily add events from email messages in Gmail directly to the calendar.

- **Google Hangouts**

Google Hangouts is a messaging service that supports text, voice and video conversations (video for up to 25 participants). The service is cross-platform on the web, Android and iOS.

As part of G Suite, Google Hangouts comes with additional features, such as:

- Participants can share their screens.
- The screen automatically focuses on the person who is speaking, aided by "intelligent muting" to prevent any background noise.
- The ability to host Hangouts on Air where public livestreams can be automatically saved to the YouTube account.
- Integration with Google Calendar for one-click start of a Hangouts conversation at the beginning of a meeting.
- Custom controls for admins, including limiting access, turning chat history off, and the ability to eject participants for privacy.
- Custom status messages.

- **Google+**

Google+ is Google's social networking service, creating a social layer across all of Google's services. Its aim is to allow for team members to communicate with a stream featuring posts, comments and Google+ Communities based on common goals. The service can be used to discuss and share ideas throughout the ELSA network. Through the Collections feature, posts can be grouped by topic, making it easier to follow the topics that matters most to the individual user.

While we are not limited to the aforementioned Google Apps, these are the ones most essential to our daily work. However, this does not mean that you will not find benefit in exploring the remaining apps available to you.

The services will be available to all regular users managed by administrators.

8

GOOGLE GROUPS

a) What are Google Groups

You can create and manage groups for your organisation using the Groups control in the Admin console. The Groups control can be used to create basic groups for mailing lists in the organisation. This enables users to use email the entire group, invite the group to a meeting or to share a document, using just a single address. The Admin console groups make it easy to:

Communicate with groups of people. For example, groups can be useful for departments, project teams, classes, office locations, special-interest groups, and more.

Manage access to documents, sites, videos, and calendars. Users can share their content with groups rather than having to enter individual addresses.

Search across archives of discussions and messages.

Manage your own group memberships.

Create forums and collaborative inboxes to host community discussions, or to process support tickets or sales inquiries.

Moderate messages before they are sent to the rest of the group. This allows you to do quality assurance before messages are shared with the entire group.

b) Adding members outside of the organisation to a Google Group

Open the basic permissions submenu and tick the following checkbox:

Create a Group & Choose Group Settings

You can use Google Groups to create an online group for your team, organisation, class, or other group to do things like:

- Email each other
- Organise meetings
- Etc.

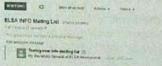You can also change your group's type, name, description, and choose who can join, post, and view topics.

Create a Group

1. Sign in to Google Groups.
2. Near the top left, click **Create group**.
3. Enter info and choose settings for the group.
4. Click **Create**.

Make your group an email list or web forum

You can change you're the type of an already created group at any time to match your group's communication style and workflow.

1. Sign in to Google Groups.
2. Click **My Groups**.
3. Choose a group.
4. Near the top right, click **Manage**. A menu appears on the left.

5. On the left, click **Information > Advanced**.

6. To select a new group type, click the **Down arrow** ▼ next to "Select a group type". You can choose between:

> **Email list**: An email list allows users to post from the web or by email. This is a mailing list group.
>
> **Web forum**: Members use the Google Groups web forum to communicate with each other.
>
> **Q&A forum**: This is a type of web forum that allows members to ask and answer each other's questions.
>
> **Collaborative inbox**: Members can assign topics to other members as tasks.

7. Click **Reset this group**.
8. In the box that pops up, click **Reset group**.

Change your group's name, description & email settings

1. Sign in to Google Groups.
2. Click **My Groups**.
3. Choose a group.
4. Near the top right, click **Manage**. A menu appears on the left.
5. On the left, click **Information > General information**.
6. Make your changes.
7. Click **Save**.

Add people to your group

You can add someone to your group in three ways:

- Invite someone via email
- Add someone without getting their approval
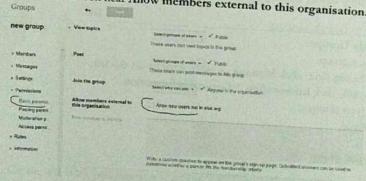- Approve people who applied to join

Invite people to your group

1. Sign in to Google Groups.
2. Click **My Groups**.
3. Choose a group.
4. Near the top right, click **Manage**.
5. On the left, click **Members > Invite members**.
6. Enter the email addresses of people you wish to invite.
   Optional: Enter text in the "Write an invitation message" field.
7. Click **Send invites**.

To change pending invitations, click **Members > Join requests**. Click **Resend invitation** or **Revoke invitation**.

Add members to your Group

1. Sign in to Google Groups.
2. Click **My Groups**.
3. Choose a group.
4. Near the top right, click **Manage**.
5. On the left, click **Members > Direct add members**.
6. Enter the email addresses of the people to add.
7. Enter a welcome message.
8. Set how members will get email from the group.
9. Click **Add**.
10. **N.B.** For adding members outside of the organisation (email addresses that do not end with ...@..elsa.org) repeat steps 1-4, then:
    5. On the left, click **Permissions > Basic permissions**.
    6. Check the box near **Allow members external to this organisation**.

Accept requests to join your Group

You can view requests to join your group and accept or deny them on an individual basis.

to Google Groups.

2. Click **My Groups**
3. Choose a group.
4. Near the top right, click **Manage**.
5. On the left, click **Members > Join requests**
6. Check the box next to the person who wishes to join your group. Click **Approve applicant** or **Reject applicant**.

View all members of a group

You can view all members, including members who have been banned.

1. Sign in to Google Groups.
2. Click **My Groups**.
3. Choose a group.
4. Near the top right, click **Manage**.
    To see a list of current members, near the top left, click **Members**.
    To see a list of all banned members, near the top left, click **Banned**.
5. To search by role, whether members are banned, and other features, use the search bar on the "Group Members" page. You need the "View members permission" to search by role.

Invite a Google Group to an event using Google Calendar

You can add an entire group to an event using Google Calendar.

1. Using Google Calendar, create an event.
2. When editing the event options, in the "Add guests" box, type the name of the group you'd like to invite. After you add the group, to see the list of group members, to the left of the group name, click the Down arrow ▾ .
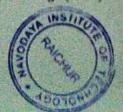3. Click **Save**.

Export a list of names and email addresses

You can download a file with a list of your group members and their email addresses to a CSV file. You can load the list into a spreadsheet to manage group membership, count members, or organise smaller groups within your group.

1. Sign in to Google Groups.
2. Click **My Groups**.
3. Choose a group.
4. Near the top right, click **Manage**.
5. At the top, click **Export members**

If your group has more than 5,000 members, you can use this script to create the list.

Sending a message (email) to a Google Group

From the Compose window

1. Open Gmail.
2. Click Compose.
3. In the **To:** field, enter the first few letters of the name of the contact group you wish to send a message to.
4. Select your contact group from the list of addresses the auto-complete feature suggests. If the desired contact group does not show, fill in the email of your Google Group (you can find it in **Google Groups > My Groups > (name of your Google Group) > About (right part of the page) > Group email.**

TRANSITION TO GMAIL

Moving from your old system to the new G Suite can seem to be challenging, but in reality you are just a few clicks away from making the change. To make the process correct and smooth, follow the instructions below:

1. **Linking your old email address to the new one will ensure that emails sent to the old email address are forwarded to the new one**

Go to **Settings** => **Accounts and import**, then select **Add an email account** from **Check**

General   Labels   Inbox   **Accounts and import**   Filters and Blocked Addresses   Forwarding and POP/IMAP   Add-ons   Chat   Labs   Offline   Themes

Change account settings:	Google Account settings Change your password and security options and access other Google services.
Import mail and contacts: Learn more	Import from Yahoo!, Hotmail, AOL, or other webmail or POP3 accounts Import mail and contacts
Send mail as: (Use The European Law Students' Association Mail to send from your other email addresses) Learn more	Secretary General Ciulnița National <secgen@cl.elsa.org> Add another email address
Check email from other accounts: Learn more	Add an email account
Grant access to your account: (Allow others to read and send mail on your behalf) Learn more	Add another account ● Mark conversation as read when opened by others ○ Leave conversation as unread when opened by others
Add additional storage:	Using 0 GB. Need more space? Purchase additional storage

email from other accounts

2. **Transfer the emails and data to the new system**

Check emails from other accounts

Get all messages

How to import both old and new messages from another email account.

Note: You can only move messages, not folders or labels from your other account.

Step 1: Change the settings in your other account

If your other account is part of Yahoo, Outlook, or other email service, make sure your other account has POP access.

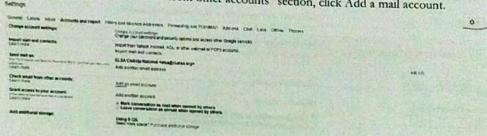**If your other account is another Gmail account**

1. On your computer, sign in to the <u>Gmail</u> account you want to import from.

2. In the top right, click Settings ⚙ > Settings.
3. Click the Forwarding and POP/IMAP tab.
4. In the "POP Download" section, select Enable POP for all mail.
5. Recommended: Next to "When messages are accessed with POP", select keep Gmail's copy in the inbox.
6. At the bottom, click Save Changes.

Step 2: Change your Gmail settings

1. On your computer, sign in to the Gmail account you want to import to.
2. In the top right, click Settings ⚙ > Settings.
3. Click the Accounts and Import or Accounts tab.
4. In the "Check mail from other accounts" section, click Add a mail account.

5. A new window will appear. Type the email address of the other account, then click Next Step.
6. Type your email address again in the "Username" field.
7. Type your password.
8. In the "POP Server" field type pop.gmail.com
9. From the dropdown list at "Port" choose 995.
10. Check the boxes next to the options below:
    "Always use a secure connection (SSL) when retrieving mail"
    "Label incoming messages"
    "Archive incoming messages (Skip the Inbox)"
    Leave the other boxes unchecked.

It should look like this:
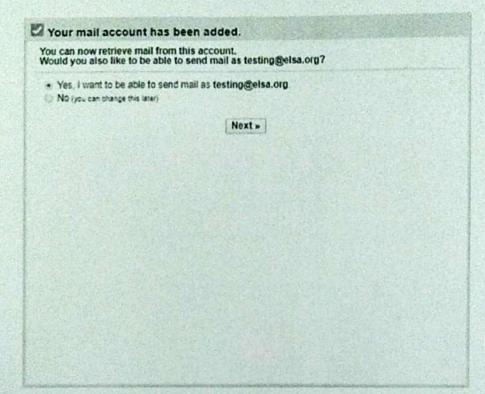
Add an email account

Enter the mail settings for testing@elsa.org. Learn more

    Email address: testing@elsa.org
      Username: testing@elsa.org
      Password: ●●●●●●●●
    POP Server: pop.gmail.com   Port: 995 ▾

  ☐ Leave a copy of retrieved message on the server. Learn more
  ☑ Always use a secure connection (SSL) when retrieving mail. Learn more
  ☑ Label incoming messages: testing@elsa.org ▾
  ☑ Archive incoming messages (Skip the Inbox)

[Cancel] [« Back] [**Add Account »**]

11. Click Add Account.
12. You'll get this window:

☑ **Your mail account has been added.**

You can now retrieve mail from this account.
Would you also like to be able to send mail as testing@elsa.org?

- Yes, I want to be able to send mail as **testing@elsa.org**
- No (you can change this later)

[Next »]

Click No, then press Finish.

SHORT TERM PROGRAM OF COMPUTING SKILLS ON GOOGLE SUITE

Following are the topics covered for II & III year students of Mechanical and Civil departments during the training sessions, on Google Suite.

Topics Covered

Sessions	Date	Time	Topics Covered	Outcome
Session – 1	12/10/2019	2.00pm to 5.00pm	Why do we use G Suite? What do we use G Suite for? The use of G Suite for Users and Admins	Recognize the need for, and have the preparation and ability to engage in independent and lifelong learning in broadcast context of technological change.
Session – 2	19/10/2019	2.00pm to 5.00pm	Google Apps: Google drive, Google Docs, Sheets, Slides and Forms, Calendar, Hangouts	
Session – 3	26/10/2019	2.00pm to 5.00pm	Detail study of Google groups, transition to Gmail	

Coordinator

HOD

Head of Department
Computer Science & Engineering
Navodaya Institute of Technology
RAICHUR-584 101

NAVODAYA INSTITUTE OF TECHNOLOGY, RAICHUR
ACADEMIC YEAR 2019-20

DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

SHORT TERM TRAINING PROGRAM ON GOOGLE SUITE

Training program for Mechanical and Civil department students held on 26/10/2019 by Mr. Vijay Kumar