# FemBit

Summer 2019—A Newsletter by Department Of Computer Engineering Government Polytechnic for Girls, Ahmedabad

## Institute Vision

To carve a brighter prospect for the nation through excellence in technical education for fostering skills, ethical values and environmental consciousness among girl students while undertaking existing and forthcoming challenges.

## Institute Mission

- To nurture technical and creative skills through quality education.
- To strengthen industries interaction.
- To impart real life problem solving skills.
- To foster care for sustainability of environment and importance of social responsibility among girl students.

## Department Vision

To instill technical skills among students through excellence in education and develop them as computer professionals for forth coming challenges with moral values, environmental and societal consciousness.

## Department Mission

- To impart quality education for developing technical skills.
- To create awareness on emerging trends and technologies.
- To cultivate a sense of social responsibility with ethical and strong moral values.

## Message from Institute's Head

Dear Readers, Government Polytechnic for Girls started in 1968 with the aim to provide globally competent skilled girls technocrat in the field of Engineering as well as non technical areas like fashion designing. Initiating something new is always motto of institute. It is my great pleasure for the initiation taken by almost all departments to publish departmental newsletter. A concept behind these newsletters is to disseminate knowledge, skill and information amongst all stake holders. Students, Faculty members and Industrialists related to all diploma branches that are functioning at this institute gets platform to share the upcoming technologies, events in the department and achievement of students and faculties by these newsletters. It is the synergetic approach to transit from better to the best.

-Principal

## Message from Department's Head

Dear Readers, It is bliss for our department for the newsletter "FemBit" Summer-2019 issue. This will provide platform for all stakeholders to work in a group. At this stage, I would like to thank all the stake holders for their supports in publishing this newsletter by any means. It is a good platform for stake holders to share technological, innovative, creative and forth coming development in field of computer.

I again acknowledge the efforts put by my students team and faculty members including all the stake holders for this issue of "FemBit".

R.M.Shaikh
H.O.D. Computer Engg.

# About Department

Our department offer undergraduate Diploma program for girls only in Computer Engineering. We are affiliated with Gujarat Technological University (GTU) Ahmedabad .This undergraduate program prepare skills undergraduates. Our curriculum mainly covers both Hardware and Software courses. We focus on Outcome Base Education (OBE). Our department provide very good learning environment. Students acquire skills and knowledge through classrooms and laboratories. The department insures that students are motivated to acquire fundamental as well as advance knowledge in this continuously advancing field.

## Faculty Members

Sh. R.M. Shaikh

(Head Of Department)

&

Smt. J.J. Karagthala

Smt. J.D.Trivedi

Smt. D.S.Singh

Smt. A.I.Rangrej

Smt. N.R.Sheth

Smt. P.P.Patel

Ku. D.S.Baldev

Smt. S.G.Langnoja

Smt. R.K.Pandya

Smt. V.R. Ratwani

Smt. K.D.Virani

Smt. Z.R.Shah

Sh. D.M. Gohel

(LECTURERS)

## Technology Trend

### KOTLIN

### -Android Programming Language

Kotlin is a statically typed, general-purpose programming language with type inference. It is widely used to develop Android application. Kotlin is designed to interoperate fully with Java, and the JVM version of its standard library depends on the Java Class Library, but type inference allows its syntax to be more concise. Kotlin mainly targets the JVM but also compiles to JavaScript or native code. Kotlin is sponsored by JetBrains and Google, through the Kotlin Foundation. The reason for Kotlin's popularity is because of the unique features that it possesses. i.e. **Concise**, **Interoperability**, **Feature-rich**, **Easy**, **Less error-prone**.



```
public class User {
    private String firstName;

    private String lastName;

    public            eO {
        ret

    }

    public            String
    first:Na
        this           ne;
    }

    public            O {
        ret
    }

    public void setLastName(String
    lastName) {
        this.lastName = lastName;
    }
}
```

```
class User {
    var firstName: String? = null

    var lastName: String? = null
}
```

# Student Achievements
## University Exam Winter-2018

### 1st Semester

**SPI out of 10**

PANDYA GNEYA MILANBHAI  - 9.86

PITRODA KHUSHI PRAVINBHAI - 9.55

THAKKAR DHARA MANISHKUMAR - 9.55

TIYA NILESH MEHTA - 9.55

SHAH SHRUVI JATINBHAI - 9.41

### 3rd Semester

**SPI out of 10**

SHARMA TRIPTI BRIJESH - 9.84

CHOKSI NEER ANIRUDDH - 9.77

PANDYA PRIYANSHI RAJESHKUMAR - 9.61

JETHWA JHANAVI DINESHBHAI - 9.55

THAKKAR ZEEL SANDIPKUMAR - 9.55
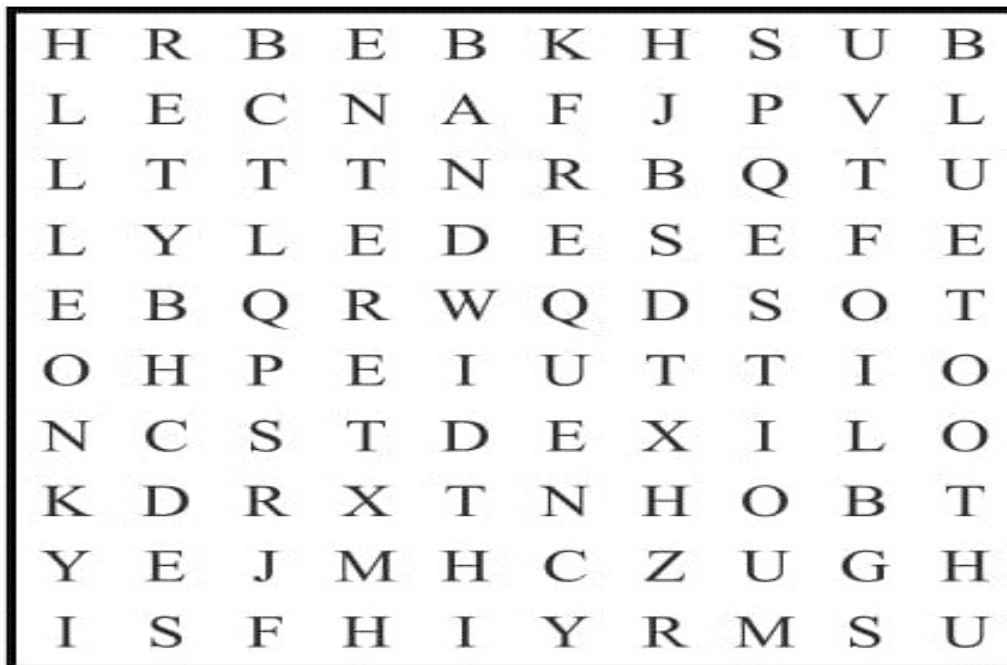
### 5th Semester

**SPI out of 10**

RUSHANGI SANGHAVI - 10

SHARMA TRISHA BRIJESH - 10

DHOLARIA DHWANI KANTILAL - 9.83

MEHTA PALAK JIGNESH - 9.83

RUTVI RAJESH - 9.83

VYAS ASHEETI BHARGAV - 9.83

# TechFun

### Activity 1

Find me in below box:

1. Amount of data that can be transferred from one point to another within a network in a specific amount of time, is known as : _____

2. Number of cycles per second is known as: _____

3. A standard for the short-range wireless interconnection of mobile phones, computers, and other electronic devices. Known as : _____

4. When you want to go in a new line in a document you press : _____

5. A group of binary digits or bits (usually eight) operated on as a unit. _____

6. Binary digit is known as : _____

```
H  R  B  E  B  K  H  S  U  B
L  E  C  N  A  F  J  P  V  L
L  T  T  T  N  R  B  Q  T  U
L  Y  L  E  D  E  S  E  F  E
E  B  Q  R  W  Q  D  S  O  T
O  H  P  E  I  U  T  T  I  O
N  C  S  T  D  E  X  I  L  O
K  D  R  X  T  N  H  O  B  T
Y  E  J  M  H  C  Z  U  G  H
I  S  F  H  I  Y  R  M  S  U
```

Key: 1. Bandwidth 2. Frequency 3. Bluetooth 4. Enter 5. Byte 6. Bit

# TechFun

## Activity 2

Choose appropriate Answer:

1. **The basic architecture of computer was developed by**
   **A**. John von Neumann **B**. Garden Moore **C**. Charles Babbage **D**. Blaise Pascal

2. **Which protocol provides e-mail facility among different hosts?**
   **A**. TELNET **B**. SMTP **C**. SNMP **D**. FTP

3. **GUI Stands for**
   **A**. Graph User Interface
   **B**. Graphical User Interface
   **C**. Graph Universal Interface
   **D**. Graph Unique Interface

4. **What is smallest unit of the information?**
   **A**. A bit **B**. A byte **C**. A block **D**. A nibble

5. **What is the decimal equivalent of the binary number 10111?**
   **A**. 33 **B**. 21 **C**. 23 **D**. 26

**Ans.** 1.A 2.B 3.B 4.A 5.C

## Faculty Achievements

### TRAINING DETAIL

| Faculty Name | Training Name | Duration | Place |
|---|---|---|---|
| J. J. KARAGTHALA | Web Application Development With Open Source Framework | 18/05/2019 to 22/05/2019 | RCTI, Ahmedabad |
| J. D. TRIVEDI | Web Application Development With Open | 18/05/2019 to 22/05/2019 | RCTI, Ahmedabad |
| D. S. SINGH | Web Application Development With Open | 18/05/2019 to 22/05/2019 | RCTI, Ahmedabad |
| D. S. BALDEV | Network Administra- | 06/05/2019 to | AVPTI, Rajkot |
| R. K. PANDYA | Network Administra- | 06/05/2019 to | AVPTI, Rajkot |

# Proposed Important dates for forthcoming term

| Activity | SEMESTER – 3rd & 5th | | SEMESTER - 1st | |
|---|---|---|---|---|
| | From | To | From | To |
| **ACADEMIC** | | | | |
| Term Date | 17/06/2019 | 16/10/2019 | 01/08/2019 | 20/12/2019 |
| Teaching phase-1 | 17/06/2019 | 06/09/2019 | 01/08/2019 | 11/10/2019 |
| Attendance review-1 | 05/09/2019 | 06/09/2019 | 10/10/2019 | 11/10/2019 |
| Partial Term work Evaluation | 03/09/2019 | 07/09/2019 | 05/10/2019 | 09/10/2019 |
| Mid-Sem. Exam-1 | 09/09/2019 | 16/09/2019 | 14/10/2019 | 18/10/2019 |
| Mid-Sem-1 Exam Result | 23/09/2019 | --- | 25/10/2019 | --- |
| Teaching phase-2 | 17/09/2019 | 16/10/2019 | 21/10/2019 | 20/12/2019 |
| Attendance review-2 | 30/9/2019 | 1/10/2019 | 18/11/2019 | 19/11/2019 |
| Mid-Sem. Exam-2 (5th) | 3/10/2019 | 10/10/2019 | — | — |
| Mid-Sem. Exam-2 (3rd) | 10/10/2019 | 16/10/2019 | — | — |
| FINAL Attendance review | 10/10/2019 | | 10/12/2019 | |
| Final Term work Submission | 10/10/2019 | 16/10/2019 | 10/12/2019 | 12/12/2019 |
| Practical Exam. (Sem-1/3) | 10/10/2019 | 16/10/2019 | 10/12/2019 | 12/12/2019 |
| Practical Exam. (Sem-5) | As per GTU | | — | — |

| Co-Curricular Activities (Industrial Visit / Workshops / Seminars / Expert Lecture) | Activities | Sem 5/3 | Sem 1 |
|---|---|---|---|
| | Seminar | June-3rd Week | Sep- 3rd Week |
| | Expert Lecture | July-1st Week | — |
| | Workshop | June-4th Week | — |
| | Orientation | — | 1st Day of Term |

| ACADEMIC REVIEW/FEEDBACK SCHEDULE | | | | |
|---|---|---|---|---|
| Academic Review-1 | 13/8/2019 | 14/8/2019 | 3/10/2019 | 4/10/2019 |
| Mid Sem Feedback of ALL Students on Faculty Performance | 13/8/2019 | 14/8/2019 | 3/10/2019 | 4/10/2019 |
| FINAL Academic Review | 10/10/2019 | 16/10/2019 | 10/12/2019 | 12/12/2019 |
| Feedback of Students on Faculty Performance | 10/10/2019 | 16/10/2019 | 10/12/2019 | 12/12/2019 |
| Course End (Sem-1/3) Exit Survey (Sem-5) | 10/10/2019 | 16/10/2019 | 10/12/2019 | 12/12/2019 |

| | | | | |
|---|---|---|---|---|
| HOLIDAYS – 12th august 2019,15th August 2019,17th August 2019, 2nd Sep 2019,11th Sep 2019, 2nd Oct 2019, 2nd & 4th Saturday of month. | | | | |
| VACATION – 24th Oct 2019 - 13th Nov 2019 | | | | |

| Extra-Curricular Activity | 21/6/2019 | Yoga Day Celebration | 1st week October | Gandhi Week |
|---|---|---|---|---|
| | 2nd week October | Gopi Raas | 3rd week October | Rangoli Competition |

Note – * All parents/guardian are welcome to meet Course faculties for feedback of their child's progress on 1st and 3rd working Saturday of every month except holidays.

This calendar is prepared by taking proposed GTU academic calendar as reference.

As on 16th April, 2019 Computer Department has arranged Techno Sarita– 2019, a technical project fair of final year students. The projects were developed by the students during last year on various topics and using various technologies. The projects were short listed by the faculties of department. These shortlisted projects were presented for the review of experts from Industry and Engineering Colleges. The experts selected three of the best projects.

**1.** Autonomous RC car **2.** Fashion wheel **3.** Foodie

Expert Panel:

**Mr. Rajesh Sardhara**, Web Designer, Creart, Ahmedabad

**Mr.Krunal Jani**, Branch Head CEO, Way to Web, Ahmedabad

**Ms Hardi Shah**, Android Developer, Silverwing Technologies, Ahmedabad.



**AUTONOMOUS RC CAR**
166140307098  KHUSHI RAVAL
166140307100  RIDDHI JOTANEEYA

A prototype model of "Autonomous RC Car", which will detect obstacles, traffic signals and stop signs. Autonomous cars or self-driving cars are vehicles that guide themselves without the human input. It involves the use of mechatronics and Artificial Intelligence (AI) to control the vehicle.

This autonomous car is the prototype to the self-driving cars which is the advanced technology.
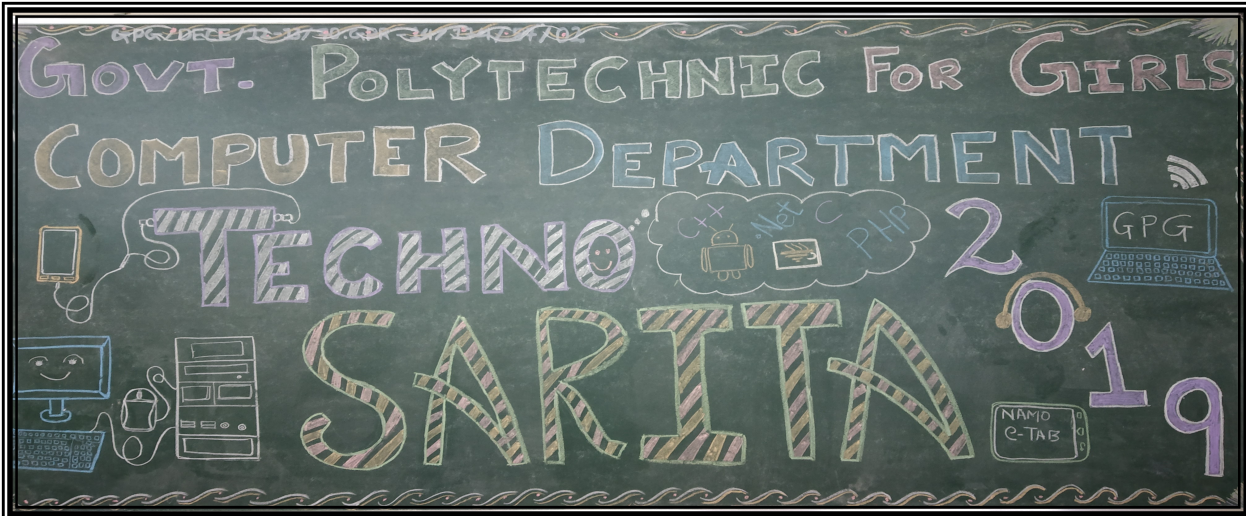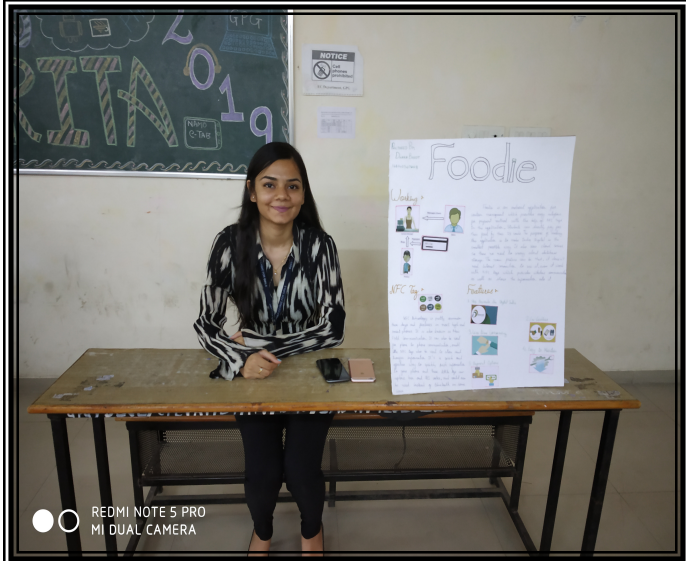
## FASHION WHEEL

| | |
|---|---|
| 166140307021 | SHREYA DALWADI H. |
| 166140307026 | DHWANI DHOLARIA K. |
| 166140307027 | URVI DOBARIYA R. |
| 166140307028 | AMISHA DOMADIYA J. |

FashionWheel.com is website that provides feature to create a virtual wardrobe on our website by upload their clothes. User can hire a designer for their virtual wardrobe to approve their request, the designer will be able to access virtual wardrobe. Designers can upload their sketches/Designs that are viewed by the users and they can also order the designs of designer.

## FOODIE

166140307008 DHARA A. BAROT

The main feature of this application is that people don't need to buy any external card for transaction they can directly pay by their ID cards with the help of NFC tags. It can be used in different places like school canteen, collage canteen, office canteen or any organization's canteen. Basically it is a replacement of Credit card or debit card for payment.

## Newsletter Editorial Committee....