Introductory course on Mobile based app

Target Group – Professors, Scientists, RA, SRF, YP-II, Students& staff of the University

Date of Training	09th to 11thFeb, 2021
Time	09:00 a.m. – 10:30 p.m.
Location	CoAE, JNKVV, JABALPUR

1. Training Objective

Introductory course on Mobile based appTraining Programunder NAHEP-CAAST-CSDA Project.

2. Contents of event

Date	Speaker	Course Topic
09th February 2021	Vikram Singh Rajput	• An Overview of Mobile Devices and Developing Mobile Applications • Introduction of Mobile Apps. • Why Mobile Apps Needed. • Scope of the Mobile App • Mobile Devices: Advantages & Dis-Advantages
10th February 2021	Vikram Singh Rajput	➤ How to Prepare Mobile App. ➤ Development Environments ➤ Overview of Android Versions
11th February 2021	Vikram Singh Rajput	➤ Where Can I Get Apps? ➤ How to Use Mobile Applications ➤ Some Common Application.
3. Discussion with participants	Thank you for a great Training Program conducted by NAHEP-CAAST-CSDA**.** During the program the participants were trained on advanced system administration options inMobile based app**,** Great presentation style with lots of opportunities to ask questions and talk Mobile based app.	
Impact of training	Two hundred eighty four participants registered for in mobile based app and out of these one hundred five students and faculties have attended on training on the subject.	

Participants
Coordinator - Dr. A. K. Rai (Co-Pi – Product Development),
Technical Coordinator–Er. Alok Rajpoot (RA- Computer) Om PrakashPrajapati (SRF – Crop Production), Dr. Arpna Bajpai (SRF – Agricultural Egg.) Dr. MinakshiMeshram (SRF – Skill Development), &SumitKakade (SRF – Plant Protection).

TechnicalSupport - Krishna Singh (YP – II Computer), RachitNema (YP – II Computer) & Anjali Patel (YP – II Computer) and PratimaPathak.

Students - VanshikaPanjwani, Updesh Bhandarkar, Uma Damor, Suraj Raghuvanshi, SmitaNagaria, Siddharth Baghel, Shweta Choubey, MOHD TABISH, Alex Khalkho, Akshay Sharma

Number of Participation					Percentage of participation of Category				
Gender	UR	SC	ST	OBC	Total	UR	SC	ST	OBC
Male	80	21	16	64	181	44	12	9	35
Female	63	8	6	26	103	61	8	6	25
	143	29	22	90	284	50	10	8	32

| Date	Attendance
09th Feb 2021	**172**
10th Feb 2021	89
11th Feb 2021	56

Attendance
- 18%
- 28%
- 54%
- 09th Feb 2021
- 10th Feb 2021
- 11th Feb 2021

The "Smart"phone

- Some Basic Features of a Smartphone
  - 3G/4G connectivity
  - WiFi connectivity
  - Bluetooth connectivity
  - accelerometer w/compass
  - ambient light sensor
  - proximity sensor
  - GPS
  - gyroscope

Development Environments

- Most platforms have an SDK that you can download and build against
- Every platform has an emulator that you can use to test your apps
- Most emulators are configurable to match a variety of mobile devices
  - Various screen sizes, memory limitations, etc.

What is Android

- Android is an open source operating system, created by Google specifically for use on mobile devices (cell phones and tablets)
- Linux based (2.6 kernel)
- Can be programmed in C/C++ but most app development is done in Java (Java access to C Libraries via JNI (Java Native Interface))
- Supports Bluetooth, Wi-Fi, and 3G and 4G networking

What is iOS

- Apple's mobile OS for phones (iPhone), tablets (iPad), handhelds (iPod),
- based on BSD Unix
- Application programming done in Objective C
- Supports Bluetooth, Wi-Fi, and 3G and 4G networking

Commonly Used Packages

- User interface controls and widgets
- User interface layout
- Secure networking and web browsing
- Structured storage and relational databases (SQLite RDBMS)
- 2D and 3D Graphics SGL and OpenGL
- Audio and visual media support
- Access to optional hardware (GPS)
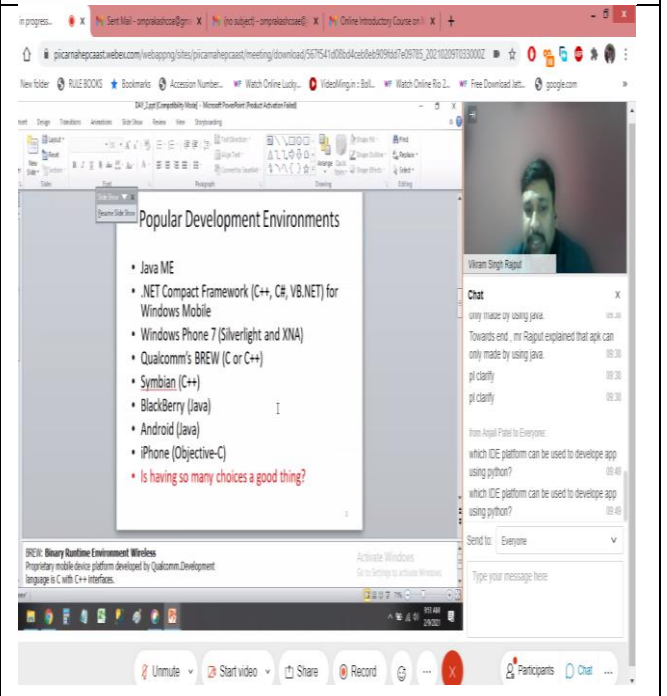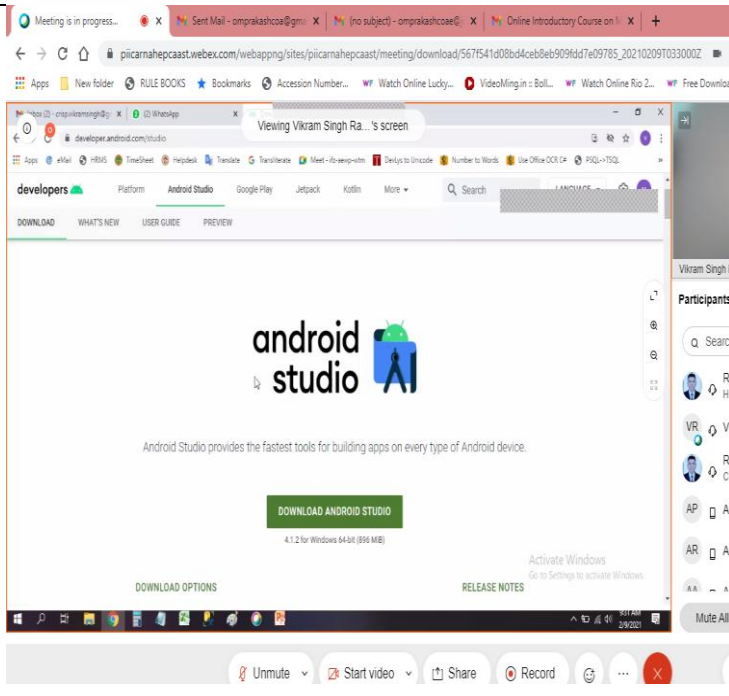
Eclipse and Android Emulator
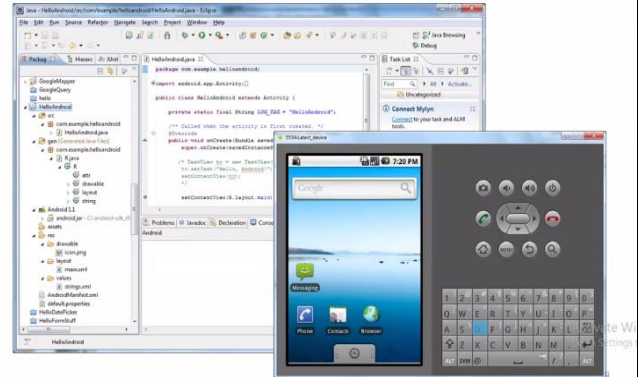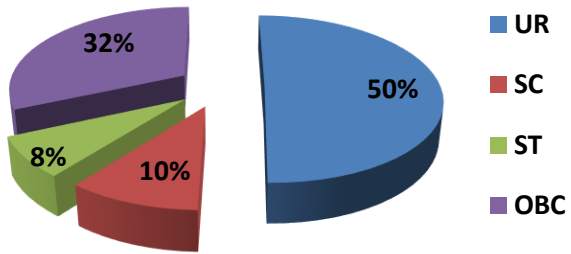

Mobile Applications

- What are they?
  - Any application that runs on a mobile device
- Types
  - Web apps: run in a web browser
    - HTML, JavaScript, Flash, server-side components, etc.
  - Native: compiled binaries for the device
- Economics
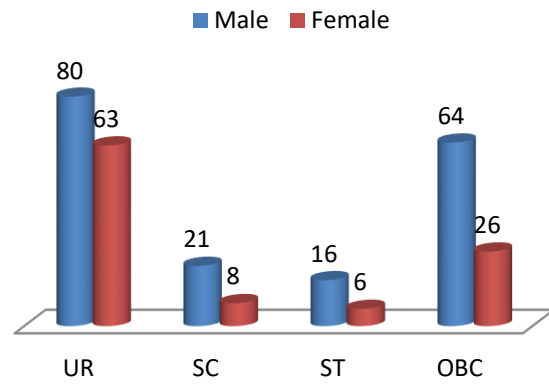 - Free (often ad-supported) vs. paid

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Percentage of participation of Category

284 responses

- UR — 50%
- SC — 10%
- ST — 8%
- OBC — 32%

Gender & Category

■ Male ■ Female

Category	Male	Female
UR	80	63
SC	21	8
ST	16	6
OBC	64	26

Qualification

284 responses

- B. Sc. — 48%
- M. Sc. — 19%
- Ph. D. — 30%
- Others — 3%