



DR. V.R.K WOMEN'S COLLEGE OF ENGINEERING AND TECHNOLOGY

Approved by AICTE & Promitted by Government of Telangana State
Affiliated to Jawaharlal Nehru Technological University Hyderabad
Aziznagar (V), Moinsabad (M), R.R. Dist. 500 075 - T.S.
Contact No. 7893044962 / 08413235962
Website : www.drvrkwomenscollege.com

INDEX

Academic Year (2018-19) Institutional Programme Brochure /Notice for Certificate / Value added Programs with Course Modules and Outcomes below mentioned Add-on Programs

S.No	Add-on Programme Name	Page No.
YEAR 5 (2018-2019)		
1	Mixed Reality	2 - 4
2	Distributed Computing	5 – 7
3	Web design and Development	8 – 10
4	IOT with Raspberry-PI	11 – 13
5	SCADA	14 – 17
6	Euler's Theorem In Graph Theory	18 - 21

ABOUT DR. V.R.K. WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

The dawn of globalization, liberalization and privatization in India gave impetus not just to the much needed economy but also to technical education. India can now boast of having the third largest pool of scientific and technical manpower in the world. The network of technical institutions which now span the country came into being in the 1990's. At present India is a leading force to reckon with in the fields of Software industry, Space science, Biotechnology, Nuclear science.

DR. V.R.K. Women's College of Engineering and Technology (VRKW) we keep that light of the nation ablaze. The institution, ever since its foundation in 2002 is in the constant pursuit of keeping high the self imposed standards of excellence. Quality, Modernity and High Degree of Scientific Temperament pervade every facet of the institution, be it technical education, laboratories or infrastructure facilities. The campus is the abode of discipline, harmony and intellectual pursuit and a buzz with intense academic activity.

Highly qualified fraternity, sprawling campus, state-of-the-art laboratories, well equipped library, spacious playground and above all ever enthusiastic management make DR. V.R.K. Women's College of Engineering And Technology (VRKW).

ABOUT COMPUTER SCIENCE AND ENGINEERING

The department has been rated very high in academic Circles. The graduates from this department include many renowned technocrats, researchers and academicians working all over the world. The department provides a platform for the faculty and students of engineering colleges in the country to pursue their interest in basic and applied research. The department conducts various conferences, seminars and workshops on frontier areas of research in technical institution in India.

CHIEF PATRON

Mr. Mohd. Shah Alam Rasool Khan,
Chairman-DR. V.R.K Educational
Society

PATRON

Dr.B.SASI KUMAR
Principal

CONVENER

Dr.G.KALAIMANI
Professor & HOD CSE Dept.

CO-ORDINATOR

Dr.Aleemuddin Ghorri
Professor/CSE Dept

NO REGISTRATION FEE

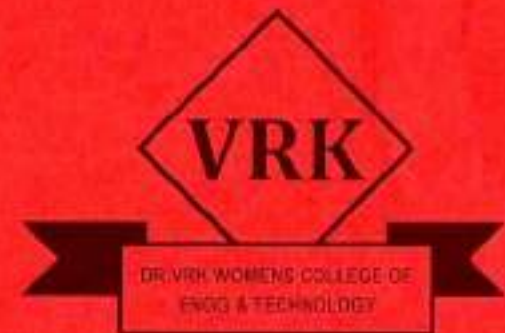
THREE WEEKS

ADD-ON PROGRAMME
FOR THE STUDENTS
of

Department of Computer Science and Engineering

ON

Mixed Reality
12-07-18 to 01-08-2018
(03:30PM to 05:30PM)



Organized by
Department of
Computer Science and Engineering

DR. V.R.K. Women's College of Engineering & Technology

(Affiliated to JNTUH & Approved by AICTE, New Delhi)
AzizNagar, Moimabad, Ranga Reddy District - 75,
Telangana-India.

<http://www.drvrkwomenscollege.com>



DR. V.R.K WOMEN'S COLLEGE OF ENGINEERING AND TECHNOLOGY

Approved by AICTE & Premitted by Government of Telangana State
Affiliated to Jawaharlal Nehru Technological University Hyderabad

Aziznagar (V), Moinabad (M), R.R. Dist. 500 075 - T.S.

Contact No. 7893044962 / 08413235962

Website : www.drvrkwomenscollege.com

Date:09-07-2018

Department of Computer Science and Engineering

Circular

All the students of II-B.Tech (CSE) are informed that Department of Computer Science and Engineering is proposed to conduct an **ADD-ON PROGRAM** on "Mixed Reality" from 12-07-18 to 01-08-18 (Monday to Saturday - 3:30 PM to 5:30 PM). The interested students are informed to enroll their names to Dr.Aleemuddin Ghori, Program Coordinator on or before 10-07-18.

To

All the students of CSE (B.Tech)

Dr.Aleemuddin Ghori, Professor in CSE, Program coordinator

Copy to:

1. The Principal
2. IQAC.
3. Department Notice Board

DR. V.R.K WOMEN'S COLLEGE
OF ENGINEERING AND TECHNOLOGY

HON
CSE DEPARTMENT

HEAD OF THE DEPARTMENT
COMPUTER SCIENCE & ENGINEERING
DR. VRK WOMEN'S COLLEGE
ENGINEERING & TECHNOLOGY





DR. V.R.K WOMEN'S COLLEGE OF ENGINEERING AND TECHNOLOGY

Approved by AICTE & Premitted by Government of Telangana State
Affiliated to Jawaharlal Nehru Technological University Hyderabad

Aziznagar (V), Moinabad (M), R.R. Dist. 500 075 - T.S.

Contact No. 7893044962 / 08413235962

Website : www.drvrkwomenscollege.com

Date: 07-07-2018

Department of Computer Science and Engineering

ADD-ON PROGRAM

ON

Mixed Reality (MIXR01)

Curriculum and Syllabus(2018-19)

12-07-2018 to 01-08-2018

Total Hours: 32 HRs

PROGRAM OBJECTIVES:

- To impart the fundamental aspects and principles of mixed reality technologies.
 - To know the internals of the hardware and software components involved in the development of mixed reality enabled applications.
 - To learn about the graphical processing units and their architectures.
 - To gain knowledge about mixed reality application development.
- To know the technologies involved in the development of mixed reality based applications.

PROGRAM OUTCOMES: At the end of the course participants will be able to:

- 1: Demonstrate the understanding of the basic concepts of Mixed reality
- 2: Use the tools and technologies related to Mixed Reality
- 3: Develop the Virtual Reality applications in different domains
- 4: Design of various models using modeling techniques
- 5: Implement the concept of Virtual Reality and Mixed Reality Programming with toolkits.

Module :1 Introduction to Virtual Reality and Mixed Reality – Definition – Introduction to Trajectories and Hybrid Space-Three I's of Virtual Reality.

Module :2 MR COMPUTING ARCHITECTURE, Computing Architectures of VR – Rendering Principle – Graphics and Haptics Rendering – PC Graphics Architecture.

Module: 3 MR MODELING, Modeling – Geometric Modeling – Virtual Object Shape – Object Visual Appearance – Kinematics Modeling.

Module: 4 PROGRAMMING AND APPLICATIONS, VR Programming – Toolkits and Scene Graphs – World ToolKit.

Module: 5 MIXED REALITY TECHNOLOGIES, synchronizing Time – Tangible & Ubiquitous – Vision Based Tracking – Sensing Technologies – Seamless Design – Assembling Interaction.


PROGRAM COORDINATOR



ABOUT DR. V.R.K. WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

The dawn of globalization, liberalization and privatization in India gave impetus not just to the much needed economy but also to technical education. India can now boast of having the third largest pool of scientific and technical manpower in the world. The network of technical institutions which now span the country came into being in the 1990's. At present India is a leading force to reckon with in the fields of Software industry, Space science, Biotechnology, Nuclear science.

DR. V.R.K. Women's College of Engineering and Technology (VRKW) we keep that light of the nation ablaze. The institution, ever since its foundation in 2002 is in the constant pursuit of keeping high the self imposed standards of excellence. Quality, Modernity and High Degree of Scientific Temperament pervade every facet of the institution, be it technical education, laboratories or infrastructure facilities. The campus is the abode of discipline, harmony and intellectual pursuit and a buzz with intense academic activity.

Highly qualified fraternity, sprawling campus, state-of-the-art laboratories, well equipped library, spacious playground and above all ever enthusiastic management make DR. V.R.K. Women's College of Engineering and Technology (VRKW)

ABOUT COMPUTER SCIENCE AND ENGINEERING

The department has been rated very high in academic Circles. The graduates from this department include many renowned technocrats, researchers and academicians working all over the world. The department provides a platform for the faculty and students of engineering colleges in the country to pursue their interest in basic and applied research. The department conducts various conferences, seminars and workshops on frontier areas of research in technical institution in India

CHIEF PATRON

Mr. Mohd. Shah Alam Rasool Khan,
Chairman-DR. V.R.K Educational
Society

PATRON

Dr.B.SASI KUMAR
Principal

CONVENER

Dr.G.KALAIMANI
Professor & HOD CSE Dept.

CO-ORDINATOR

Dr.L.C.Manikandan
Professor/CSE Dept.

NO REGISTRATION FEE

THREE WEEKS

**ADD-ON PROGRAMME
FOR THE STUDENTS**

of
Department of
COMPUTER SCIENCE AND ENGINEERING

ON

DISTRIBUTED COMPUTING

01-11-18 to 24-11-2018
(03:30PM to 05:30PM)



Organized by

Department of
COMPUTER SCIENCE AND ENGINEERING
DR. V.R.K. Women's College of Engineering &
Technology

(Affiliated to JNTUH & Approved by AICTE, New Delhi)
Aziz Nagar, Moinabad, Ranga Reddy District - 75,
Telangana, India.

<http://www.drvrkwomenscollege.com>



DR. V.R.K WOMEN'S COLLEGE OF ENGINEERING AND TECHNOLOGY

Approved by AICTE & Premitted by Government of Telangana State
Affiliated to Jawaharlal Nehru Technological University Hyderabad

Aziznagar (V), Moinabad (M), R.R. Dist. 500 075 - T.S.

Contact No. 7893044962 / 08413235962

Website : www.drvrkwomenscollege.com

Date:29.10.2018

Department of Computer Science and Engineering

Circular

All the students of II-B.Tech (CSE) are informed that Department of Computer Science and Engineering is proposed to conduct an **ADD-ON PROGRAM** on "Distributed Computing" from 01-11-18 to 24-11-18 (Monday to Saturday - 3:30 PM to 5:30 PM). The interested students are informed to enroll their names to Dr.L.C.Manikandan, Program Coordinator on or before 31-10-18.

To

All the students of CSE (B.Tech)

Dr.L.C.Manikandan, Professor in CSE, Programme coordinator

Copy to:

1. The Principal
2. IQAC.
3. Department Notice Board

DR. V.R.K WOMEN'S COLLEGE
OF ENGINEERING AND TECHNOLOGY



K. Kalaj
HOD

CSE DEPARTMENT

HEAD OF THE DEPARTMENT
COMPUTER SCIENCE & ENGINEERING
DR. VRK WOMEN'S COLLEGE
ENGINEERING & TECHNOLOGY



DR. V.R.K WOMEN'S COLLEGE OF ENGINEERING AND TECHNOLOGY

Approved by AICTE & Premitted by Government of Telangana State
Affiliated to Jawaharlal Nehru Technological University Hyderabad
Aziznagar (V), Moinabad (M), R.R. Dist. 500 075 - T.S.
Contact No. 7893044962 / 08413235962
Website : www.drvrkwomenscollege.com

30.10.2018

Department of Computer Science and Engineering ADD-ON PROGRAM (2018-2019)

ON DISTRIBUTED COMPUTING (DISC02)

Curriculum and Syllabus 01-11-2018 to 24-11-2018

Total Hours: 34 HRs

PROGRAM OBJECTIVES:

- This course introduces participants to Distributed Computing tools and best practices for deploying, evaluating, monitoring and operating production ML systems on Cloud.
- Distributed Computing is a discipline focused on the deployment, testing, monitoring, and automation of ML systems in production.
- Machine Learning Engineering professionals use tools for continuous improvement and evaluation of deployed models

PROGRAM OUTCOMES: At the end of the course participants will be able to:

- Build upon the Cloud computing and data engineering concepts
- Apply Machine Learning Engineering to real-world projects
- You will dive into emerging topics in Machine Learning including Distributed Computing

Module :1 Fundamentals-Evolution of Distributed Computing Systems, System Models, Distributed Computing Environment.

Module :2 Message Passing-Inter Process Communication, Issues In IPC by Message, Synchronization.

Module: 3 Remote Procedure Calls-The RPC Model, Transparency of RPC, Implementing RPC Mechanism, Stub Generation.

Module: 4 Distributed Shared Memory-Design and Implementation Issues of DSM, Granularity, Structure of shared memory space, Consistency Models.

Module: 5 Synchronization-Clock Synchronization, Event Ordering, Mutual Exclusion.




PROGRAM COORDINATOR

ABOUT DR. V.R.K. WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

The dawn of globalization, liberalization and privatization in India gave impetus not just to the much needed economy but also to technical education. India can now boast of having the third largest pool of scientific and technical manpower in the world. The network of technical institutions which now span the country came into being in the 1990's. At present India is a leading force to reckon with in the fields of Software industry, Space science, Biotechnology, Nuclear science.

DR. V.R.K. Women's College of Engineering and Technology (VRKW) we keep that light of the nation ablaze. The institution, ever since its foundation in 2002 is in the constant pursuit of keeping high the self imposed standards of excellence. Quality, Modernity and High Degree of Scientific Temperament pervade every facet of the institution, be it technical education, laboratories or infrastructure facilities. The campus is the abode of discipline, harmony and intellectual pursuit and a buzz with intense academic activity.

Highly qualified fraternity, sprawling campus, state-of-the-art laboratories, well equipped library, spacious playground and above all ever enthusiastic management make DR. V.R.K. Women's College of Engineering And Technology (VRKW).

ABOUT COMPUTER SCIENCE AND ENGINEERING

The department has been rated very high in academic Circles. The graduates from this department include many renowned technocrats, researchers and academicians working all over the world. The department provides a platform for the faculty and students of engineering colleges in the country to pursue their interest in basic and applied research. The department conducts various conferences, seminars and workshops on frontier areas of research in technical institution in India.

CHIEF PATRON

Mr. Mohd. Shah Alam Rasool Khan,
Chairman-DR. V.R.K Educational
Society

PATRON

Dr.B.SASI KUMAR
Principal

CONVENER

Dr.G.KALAIMANI
Professor & HOD/CSE Dept.

CO-ORDINATOR

Dr.G.KALAIMANI
Professor/CSE Dept.

NO REGISTRATION FEE

THREE WEEKS

ADD-ON PROGRAMME FOR THE STUDENTS

of
Department of Computer Science and Engineering

ON

WEB DESIGN AND DEVELOPMENT

03-01-2019 to 25-01-2019
(03:30PM to 05:30PM)



Organized by

Department of
Computer Science and Engineering

DR. V.R.K. Women's College of Engineering & Technology

(Affiliated to JNTUH & Approved by AICTE, New Delhi)
AzizNagar, Moinabad, Rangia Reddy District - 76,
Telangana, India.

<http://www.drvrkwomenscollege.com>



DR. V.R.K WOMEN'S COLLEGE OF ENGINEERING AND TECHNOLOGY

Approved by AICTE & Permitted by Government of Telangana State
Affiliated to Jawaharlal Nehru Technological University Hyderabad
Aziznagar (V), Moinabad (M), R.R. Dist. 500 075 - T.S.
Contact No. 7893044962 / 08413235962
Website : www.drvrkwomenscollege.com

Date:21-12-2018

Department of Computer Science and Engineering

Circular

All the students of II-B.Tech (CSE) are informed that Department of Computer Science and Engineering is proposed to conduct an **ADD-ON PROGRAM** on “ **WEB DESIGN AND DEVELOPMENT**” from 03-01-2019 to 25.01.2019 (Monday to Saturday - 3:30 PM to 5:30 PM). The interested students are informed to enroll their names to Dr.G.KALAIMANI, Program Coordinator on or before 31-12-2018.

To

All the students of CSE (B.Tech)
Dr.G.KALAIMANI, Professor in CSE, Program coordinator

Copy to:

1. The Principal
2. IQAC.
3. Department Notice Board

DR. V.R.K WOMEN'S COLLEGE
OF ENGINEERING AND TECHNOLOGY

[Signature]
HOD
CSE DEPARTMENT

HEAD OF THE DEPARTMENT
COMPUTER SCIENCE & ENGINEERING
DR. VRK WOMEN'S COLLEGE OF
ENGINEERING & TECHNOLOGY

[Handwritten mark]





DR. V.R.K WOMEN'S COLLEGE OF ENGINEERING AND TECHNOLOGY

Approved by AICTE & Premitted by Government of Telangana State
Affiliated to Jawaharlal Nehru Technological University Hyderabad
Aziznagar (V), Moinsabad (M), R.R. Dist. 500 075 - T.S.
Contact No. 7893044962 / 08413235962
Website : www.drvrkwomenscollege.com

Date: 31-12-2018

Department of Computer Science and Engineering

ADD-ON PROGRAM

ON

Web Design and Development (WEBD03)

Curriculum and Syllabus(2018-19)

03-01-2019 to 25-01-2019

Total Hours: 34 HRS

PROGRAM OBJECTIVES:

- To explain the standards and protocols of internet
- To design web pages using HTML and CSS
- To apply client scripts for designing responsive web pages
- To understand the XML usage in Web Applications
- To implement web application using server-side programming script
- To use Model View Controller (MVC) architecture in the implementation of web applications

PROGRAM OUTCOMES: At the end of the course participants will be able to:

1. To design web pages using HTML and CSS
2. To apply client scripts for designing responsive web pages
3. To use XML elements in the Web Applications
4. To implement web application using server-side programming script
5. To use Model View Controller (MVC) architecture in the implementation of web applications

Module :1 Introduction web Technology –Web Standards and Accessibility – Client Server Model - Internet Protocols – FTP – Email Protocols – HTTP –TCP /IP – IP -Web & Application Server Markup Languages


Module :2 Javascript – Variables – Literals – Operators – Control Structures – Arrays - functions - Objects – Forms Validation – Form Object and Elements – Data Entry and Validation - Event Handling.

Module: 3 Introduction to eXtensible Markup Language (XML) – Elements – Attributes – Validation – Namespace – DTD – Element Type Declarations.

Module: 4 Introduction to PHP – Operators and Flow Controls – Strings and Arrays – Creating functions – PDF Generation.

Module: 5 Introduction to MVC framework – MVC Pattern – Installing MVC Framework




PROGRAM COORDINATOR

ABOUT DR. V.R.K. WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

The dawn of globalization, liberalization and privatization in India gave impetus not just to the much needed economy but also to technical education. India can now boast of having the third largest pool of scientific and technical manpower in the world. The network of technical institutions which now span the country came into being in the 1990s. At present India is a leading force to reckon with in the fields of Software industry, Space science, Biotechnology, Nuclear science.

DR. V.R.K. Women's College of Engineering and Technology (VRKW) we keep that light of the nation ablaze. The institution, ever since its foundation in 2002 is in the constant pursuit of keeping high the self imposed standards of excellence. Quality, Modernity and High Degree of Scientific Temperament pervade every facet of the institution, be it technical education, laboratories or infrastructure facilities. The campus is the abode of discipline, harmony and intellectual pursuit and a buzz with intense academic activity.

Highly qualified fraternity, sprawling campus, state-of-the-art laboratories, well equipped library, spacious playground and above all ever enthusiastic management make DR. V.R.K. Women's College of Engineering And Technology (VRKW)

ABOUT ELECTRONICS AND COMMUNICATION ENGINEERING

The department has been rated very high in academic Circles. The graduates from this department include many renowned technocrats, researchers and academicians working all over the world. The department provides a platform for the faculty and students of engineering colleges in the country to pursue their interest in basic and applied research. The department conducts various conferences, seminars and workshops on frontier areas of research in technical institution in India

CHIEF PATRON

Mr. Mohd. Shah Alam Rasool Khan,
Chairman-DR. V.R.K Educational
Society

PATRON

Dr.B.Sasi Kumar
Principal

CONVENER

Dr.Shaik Saidulu
Professor & HOD ECE Dept.

CO-ORDINATOR

Dr.C. SenthilSingh
Professor/ECE Dept.

NO REGISTRATION FEE

THREE WEEKS

**ADD-ON PROGRAMME
FOR THE STUDENTS**

of

Department of Electronics and Communication
Engineering

ON

IOT with Raspberry-PI
12-07-18 to 01-08-2018
(03:30PM to 05:30PM)



Organized by

Department of
Electronics and communication Engineering

**DR. V.R.K. Women's College of Engineering &
Technology**

(Affiliated to JNTUH & Approved by AICTE, New Delhi)

Aziz Nagar, Moinabad, Ranga Reddy District - 75,

Telangana, India.

<http://www.drvrkwomenscollege.com>



Dr. VRK WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

Approved by AICTE & Permitted by Government of Telangana State
Affiliated to J.N.T.U, Hyderabad.

Aziznagar (V), Molinabad (M), R.R. Dist 500 075 - T.S.
Contact No. 7893044962 / 08413235962

COUNSELING CODE	
EAMCET	VRKW
ECET	VRKW
PGEET	VRKW

Date:06-07-2018

Department of Electronics and Communication Engineering

Circular

All the students of II-B.Tech (ECE) are informed that Department of Electronics and Communication Engineering is proposed to conduct an **ADD-ON PROGRAM** on " **IOT WITH RASBERRY-PI**" from 12-07-2018 TO 01-08-2018 (Monday to Saturday - 3:30 PM to 5:30 PM). The interested students are informed to enroll their names to Dr.C.Senthilsingh, Program Coordinator on or before 10-07-2018.

To

All the students of ECE (B.Tech)

Dr.C.Senthilsingh, Professor in ECE, Program coordinator

Copy to:

1. The Principal
2. IQAC.
3. Department Notice Board



**HOD
ECE DEPARTMENT**

**HEAD OF THE DEPARTMENT
ELECTRONICS & COMMUNICATION & ENGINEERING
DR. VRK WOMEN'S COLLEGE OF
ENGINEERING & TECHNOLOGY**



Dr. VRK WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

Approved by AICTE & Permitted by Government of Telangana State
Affiliated to J.N.T.U. Hyderabad.

Aziznagar (V), Moinsabad (M), R.R. Dist. 500 075 - T.S.
Contact No. 7893044962 / 08413235962

COUNSELING CODE	
EAMCET	VRKW
ECET	VRKW
PGETET	VRKW

09-07-2018

Department of Computer Science and Engineering
ADD-ON PROGRAM (2018-2019)
ON
IOT WITH RASBERRY -PI(ECE001)
Curriculum and Syllabus
12-07-2018 TO 01-08-2018

Total Hours: 32 HRs

PROGRAM OBJECTIVES:

- This course introduces participants to Distributed Computing tools and best practices for deploying, evaluating, monitoring and operating production ML systems on Cloud.
- Distributed Computing is a discipline focused on the deployment, testing, monitoring, and automation of ML systems in production.
- Machine Learning Engineering professionals use tools for continuous improvement and evaluation of deployed models

PROGRAM OUTCOMES: At the end of the course participants will be able to:

- Build upon the Cloud computing and data engineering concepts
- Apply Machine Learning Engineering to real-world projects
- You will dive into emerging topics in Machine Learning including Distributed Computing

Module :1 Fundamentals-Evolution of Distributed Computing Systems, System Models, Distributed Computing Environment.

Module :2 Message Passing-Inter Process Communication, Issues In IPC by Message, Synchronization.

Module: 3 Remote Procedure Calls-The RPC Model, Transparency of RPC, Implementing RPC Mechanism, Stub Generation.

Module: 4 Distributed Shared Memory-Design and Implementation Issues of DSM, Granularity, Structure of shared memory space, Consistency Models.

Module: 5 Synchronization-Clock Synchronization, Event Ordering, Mutual Exclusion.




PROGRAM COORDINATOR

ABOUT DR. V.R.K. WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

The dawn of globalization, liberalization and privatization in India gave impetus not just to the much needed economy but also to technical education. India can now boast of having the third largest pool of scientific and technical manpower in the world. The network of technical institutions which now span the country came into being in the 1990's. At present India is a leading force to reckon with in the fields of Software industry, Space science, Biotechnology, Nuclear science.

DR. V.R.K. Women's College of Engineering and Technology (VRKW) we keep that light of the nation ablaze. The institution, ever since its foundation in 2002 is in the constant pursuit of keeping high the self imposed standards of excellence. Quality, Modernity and High Degree of Scientific Temperament pervade every facet of the institution, be it technical education, laboratories or infrastructure facilities. The campus is the abode of discipline, harmony and intellectual pursuit and a buzz with intense academic activity.

Highly qualified fraternity, sprawling campus, state-of-the-art laboratories, well equipped library, spacious playground and above all ever enthusiastic management make DR. V.R.K. Women's College of Engineering And Technology (VRKW)

ABOUT ELECTRICAL AND ELECTRONICS ENGINEERING

The department has been rated very high in academic Circles. The graduates from this department include many renowned technocrats, researchers and academicians working all over the world. The department provides a platform for the faculty and students of engineering colleges in the country to pursue their interest in basic and applied research. The department conducts various conferences, seminars and

workshops on frontier areas of research in technical Institution in India

CHIEF PATRON

Mr. Mohd. Shah Alam Rasool Khan,
Chairman-DR. V.R.K Educational
Society

PATRON

Dr.B.Sasi Kumar
Principal

CONVENER

Dr.Prema Latha
Professor & HOD EEE Dept.

CO-ORDINATOR

Mr.Shaik Nagur Basha
Assistant Professor EEE Dept

NO REGISTRATION FEE

THREE WEEKS

**ADD-ON PROGRAMME
FOR THE STUDENTS**

of
Department of
Electrical and Electronics Engineering

ON

SCADA

12-07-18 to 01-08-2018
(03:30PM to 05:30PM)



Organized by

Department of

Electrical and Electronics Engineering

**DR. V.R.K. Women's College of Engineering &
Technology**

(Affiliated to JNTUH & Approved by AICTE, New Delhi)
Aziz Nagar, Moinabad, Ranga Reddy District - 75,
Telangana, India.

<http://www.drvrkwomenscollege.com>



Dr. VRK WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

Approved by AICTE & Permitted by Government of Telangana State
Affiliated to J.N.T.U, Hyderabad.

Aziznagar (V), Moinsabad (M), R.R. Dist. 500 075 - T.S.
Contact No. 7893044962 / 08413235962

COUNSELING CODE	
EAMCET	VRKW
ECET	VRKW
PGEET	VRKW

Date:04-07-18

Department of Electrical and Electronics Engineering.

Circular

All the students of II B.Tech (EEE) are informed that Department of Electrical and Electronics Engineering is proposed to conduct an **ADD-ON PROGRAM** on "SCADA" from 12-07-18 to 01-08-18 (Monday to Saturday - 3:30 PM to 5:30 PM). The interested students are informed to enroll their names to Mr. Shaik Nagar Basha Assistant Professor, Program Coordinator on or before 11-07-18.

To

All the students of EEE (B.Tech)

Mr. Shaik Nagar Basha Assistant Professor, in EEE, Program coordinator

Copy to:

1. The Principal
2. IQAC.
3. Department Notice Board



HOD
EEE DEPARTMENT

H.O.D. - E.E.E.
Dr. V.R.K. Women's College of Engg. & Tech
Aziz Nagar, R. R. Dist.



Dr. VRK WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

Approved by AICTE & Promoted by Government of Telangana State
Affiliated to J.R.T.U. Hyderabad.

Aziznagar (V), Moinsabed (M), R.R. Dist. 500 075 - T.S.
Contact No. 7893044962 / 08413235962

COUNSELLING CODE	
BAMCET	VRKW
EGET	VRKW
PQECET	VRKW

Date:11-07-2018

Department of Electrical and Electronics Engineering

ADD-ON PROGRAM

ON

SCADA (EEE001)

Curriculum and Syllabus

32 (HOURS)

COURSE OBJECTIVES:

1. Introduce fundamental principles and concepts of SCADA systems in the context of electrical and electronics engineering.
2. Foster analytical skills to design, implement, and troubleshoot SCADA solutions for various industrial processes.
3. Develop expertise in integrating SCADA technologies for efficient monitoring and control of electrical systems.
4. Examine the cybersecurity aspects related to SCADA implementations in electrical and electronics engineering.
5. Encourage innovative thinking to propose solutions for challenges in SCADA applications.

COURSE OUTCOMES:

Students will be able to :

1. Demonstrate a profound understanding of SCADA systems and their applications in electrical and electronics engineering.
2. Apply analytical skills to design, implement, and troubleshoot SCADA solutions for diverse industrial processes.
3. Develop the ability to integrate SCADA technologies for efficient monitoring and control of electrical systems.
4. Evaluate the cybersecurity aspects associated with SCADA implementations in electrical and electronics domains.
5. Demonstrate proficiency in proposing innovative solutions to challenges in SCADA applications.

MODULE I: Introduction to SCADA Systems

Overview of SCADA in Electrical and Electronics Engineering, Architecture and Components of SCADA Systems, Communication Protocols in SCADA

MODULE II: Design and Implementation of SCADA Solutions

SCADA System Design Principles, Data Acquisition and Control Strategies, Human-Machine Interface (HMI) Design

MODULE III: Integration of SCADA in Electrical Systems

SCADA Applications in Power Distribution, SCADA in Process Automation, SCADA for Industrial Control Systems

MODULE IV: Cybersecurity in SCADA Systems

Threats and Vulnerabilities in SCADA, Security Measures for SCADA Implementations, Case Studies on SCADA Security Incidents



Ravafubashe
PROGRAM COORDINATOR

ABOUT DR. V.R.K. WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

The dawn of globalization, liberalization and privatization in India gave impetus not just to the much needed economy but also to technical education. India can now boast of having the third largest pool of scientific and technical manpower in the world. The network of technical institutions which now span the country came into being in the 1990's. At present India is a leading force to reckon with in the fields of Software industry, Space science, Biotechnology, Nuclear science.

DR. V.R.K. Women's College of Engineering and Technology (VRKW) we keep that light of the nation ablaze. The institution, ever since its foundation in 2002 is in the constant pursuit of keeping high the self-imposed standards of excellence. Quality, Modernity and High Degree of Scientific Temperament pervade every facet of the institution, be it technical education, laboratories or infrastructure facilities. The campus is the abode of discipline, harmony and intellectual pursuit and a buzz with intense academic activity.

Highly qualified fraternity, sprawling campus, state-of-the-art laboratories, well equipped library, spacious playground and above all ever enthusiastic management make DR. V.R.K. Women's College of Engineering and Technology (VRKW)

ABOUT HUMANITIES AND SCIENCES

The department has been rated very high in academic Circles. The graduates from this department include many renowned technocrats, researchers and academicians working all over the world. The department provides a platform for the faculty and students of engineering colleges in the country to pursue their interest in basic and applied research. The department conducts various conferences, seminars and workshops on frontier areas of research in technical institution in India

CHIEF PATRON

Mr. Mohd. Shah Alam Rasool Khan,
Chairman-DR. V.R.K Educational
Society

PATRON

Dr.B.Sasi Kumar
Principal

CONVENER

Dr. Touseef Humaira
Professor, HOD H&S Dept.

CO-ORDINATOR

Mrs. Trupti Patra
Assistant Professor/H&S Dept.

NO REGISTRATION FEE

THREE WEEKS

**ADD-ON PROGRAMME
FOR THE STUDENTS
OF**

Department of Humanities & Sciences

ON

"EULER'S THEOREM IN GRAPH THEORY"

from 02-08-2018 to 22-08-2018
(03:30PM to 05:30PM)



Organized by

Department of
HUMANITIES AND SCIENCES

**DR. V.R.K. Women's College of Engineering &
Technology**

(Affiliated to JNTUH & Approved by AICTE, New Delhi)
Aziz Nagar, Moinabad, Ranga Reddy District - 75,
Telangana, India.

<http://www.drvrkwomenscollege.com>



Dr. VRK WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

Approved by AICTE & Permitted by Government of Telangana State
Affiliated to J.N.T.U, Hyderabad.

Aziznagar (V), Moinabad (M), R.R. Dist. 500 075 - T.S.
Contact No. 7893044962 / 08413235952

COUNSELING CODE	
EAMCET	VRKW
ECET	VRKW
PGEET	VRKW

Date: 26-07-2018

Department of Humanities and Sciences

Circular

All the students of I Yr.-B.Tech (CSE) are informed that Department of Humanities and Sciences is proposed to conduct an **ADD-ON PROGRAM on "EULER'S THEOREM IN GRAPH THEORY"** from **02-08-2018 to 22-08-2018** (Monday to Saturday - 3:30 PM to 5:30 PM). The interested students are informed to enroll their names to Mrs. Trupti Patra, Program Coordinator on or before 01-08-2018.

To

All the students of CSE (B.Tech)

Mrs. Trupti Patra, Assistant Professor in H&S, Program coordinator

Copy to:

1. The Principal
2. IQAC.
3. Department Notice Board



[Signature]
HOD
H&S DEPARTMENT

**LEAD OF THE DEPARTMENT
HUMANITIES AND SCIENCE
DR.V.R.K WOMEN'S COLLEGE
OF ENGINEERING AND TECHNOLOGY**



Dr. VRK WOMEN'S COLLEGE OF ENGINEERING & TECHNOLOGY

Approved by AICTE & Permitted by Government of Telangana State
Affiliated to J.N.T.U, Hyderabad.
Aziznagar (V), Moinabad (M), R.R. Dist. 500 075 - T.S.
Contact No. 7893044962 / 08413235962

COUNSELING CODE	
EAMCET	VRKW
ECET	VRKW
PGEET	VRKW

Date:21-07-2018

Department of Humanities & Sciences
ADD-ON PROGRAM
ON
EULER'S THEOREM IN GRAPH THEORY(HS0001)
Curriculum and Syllabus
(02-08-2018to 22-08-2018)

Total Hours: 32 Hrs

PROGRAM OBJECTIVES:

- The objective of the three-week course on Euler's Theorem in graph theory is to equip students with a comprehensive understanding of the theorem and its applications.
- The program aims to provide a strong foundation in graph theory, emphasizing Eulerian paths and circuits, multigraphs, and related concepts.
- Students will gain both theoretical knowledge and practical skills through hands-on problem-solving and real-world applications, fostering a deeper appreciation for the relevance of Euler's Theorem in various fields.

Program Outcomes : By the end of the course, students should be able to:

1. **Demonstrate Understanding:**
Define and explain fundamental concepts in graph theory, including vertices, edges, paths, and cycles.
Understand the significance of Eulerian paths and circuits in graph theory.
2. **Apply Euler's Theorem:**
Apply Euler's Theorem to analyse and solve problems related to Eulerian graphs.
Implement algorithms such as Fleury's and Hierholzer's to find Eulerian paths and circuits.
3. **Analyse Multigraphs:**
Analyse and solve problems involving Multigraphs, extending their understanding beyond simple graphs.
4. **Apply Euler's Theorem in Real-world Contexts**
Identify and apply Eulerian concepts to real-world scenarios, such as transportation networks or network planning problems.

Week 1: Introduction to Graph Theory and Basics of Graphs

Day 1-2: Introduction to Graphs

- Definition of graphs, vertices, and edges
- Types of graphs: directed and undirected
- Graph representations: adjacency matrix, adjacency list

Day 3-4: Basic Graph Properties

- Degree of a vertex

- Handshaking lemma
- Path, cycle, and connected graphs

Day 5-6: Eulerian Paths and Circuits

- Definition of Eulerian paths and circuits
- Euler's Theorem for connected graphs
- Examples and illustrations

Week 2: Advanced Concepts in Eulerian Graphs

Day 7-8: Eulerian Graphs Continued

- Fleury's Algorithm for finding Eulerian paths
- Hierholzer's Algorithm for finding Eulerian circuits
- Examples and applications

Day 9-10: Multigraphs and Eulerian Graphs

- Introduction to multigraphs
- Euler's Theorem for multigraphs
- Solving problems involving multigraphs

Day 11-12: Applications of Eulerian Graphs

- Real-world applications (e.g., transportation networks)
- Eulerization of graphs
- Case studies and problem-solving

Week 3: Further Applications and Review

Day 13-14: Hamiltonian Paths and Circuits

- Definition of Hamiltonian paths and circuits
- Dirac's Theorem
- Ore's Theorem
- Examples and proofs

Day 14-15: Planar Graphs and Euler's Formula

- Definition of planar graphs
- Euler's formula for connected planar graphs
- Kuratowski's Theorem
- Coloring and dual graphs

Day 16-17: Review and Problem-solving

- Review of Euler's Theorem, algorithms, and applications
- Problem-solving sessions
- Q&A and clarifications

Day 17: Assessment Examination



Smey

PROGRAM COORDINATOR