TIME & VENUE

Date: 01st - 04th November 2022
Time: 9:00 AM to 5:00 PM
Venue: Simulation Lab,
Department of Chemical Engineering
RGUKT Basar

REGISTRATION

Registration Link: bit.ly/chemical_aspenworkshop

Registration fee: **Rs 200/-**

Gpay/Phonepe: 9013530295   Manikanta

Note: Registration fee once paid will not be refunded in any case.

Selection Criteria: Registration is limited to 80 participants only, on first come first serve basis.

IMPORTANT DATES

Last date of registration: 30th October 2022

Event Dates: 01st - 04th November 2022

Register here:

bit.ly/chemical_aspenworkshop

CHIEF PATRON

Prof. V. Venkata Ramana
Vice Chancellor- RGUKT

PATRON

Prof.P. Sathish Kumar
Director- RGUKT

HEAD OF THE DEPARTMENT

Mr. S. Ravi Kumar
Head of the Department
Dept of Chem Engg.

CONVENOR

Mr. K. Srikanth
Assistant Professor
Dept of Chem Engg.

CO-CONVENOR

Mr. S. Vinay Kumar
Assistant Professor
Dept of Chem Engg.

RESOURCE PERSON

Prof. Ravichand Kancharla
Process Simulation Expert
Hyderabad

ORGANIZING TEAM

- V. Sai Kiran
- J. Ruchitha
- U. Prathyusha
- K. Gouthami
- K. Karthikeya
- K. Goutham
- S. Rajesh
- S. Sneha
- A. Vishesh
- P. Venkatesh
- J. Pooja

(Certificates will be provided to the participants who have having logged attendance of 85% and above.)

RAJIV GANDHI UNIVERSITY OF KNOWLEDGE TECHNOLOGIES, BASAR, NIRMAL, TELANGANA - 504107, INDIA.

SHORT TERM TRAINING PROGRAMME
ON
ASPEN PLUS

01st - 04th, November, 2022

9:00AM to 5:00PM

Organized by

DEPARTMENT
of
CHEMICAL ENGINEERING

ABOUT THE INSTITUTION

RAJIV GANDHI UNIVERSITY OF KNOWLEDGE TECHNOLOGIES (RGUKT) has been established by the Government of erstwhile combined Andhra Pradesh in 2008, and the Basar has been taken over by the Government of Telangana, after due amendment of the Rajiv Gandhi University for Knowledge Technologies Act, 2008.

ABOUT CHEMICAL ENGINEERING

The department of Chemical Engineering was established in the year 2008 to offer an undergraduate(UG) program aiming to be a global center of academic and research excellence in Chemical Engineering. The Department has a strong fundamental curriculum integrated by electives in the main emerging areas and industry-ready courses.

ABOUT RESOURCE PERSON

Mr. Ravichand Kancharla is graduated from OUCT, and did his Masters in IITB and PhD in IICT, OUCT.
He is well experienced in teaching (Petroleum Engineering) and He is having 7+ years of experience on SimSci PRO/II and also he having 4 years of experience as a Process Engineer at NH3 Plant (EPC contract).

ABOUT ASPEN PLUS

Aspen Plus is the leading Chemical Process Simulator in the market. It is a software that will allow the user to build a process model and then simulate it using complex calculations(models, equations, math calculations, regressions, etc).It will Maximize profits using a plant-wide simulation solution that combines unparalleled accuracy and engineering collaboration with time-saving workflows.

LEARNING OUTCOMES

After having attended this training Programme, participants will

- Be able to define input-output products and process parameters which are essential step
- for simulation of chemical and petrochemical plants,
- Have insight in process simulation, unit operation, heat transfer processes, control basics,and analyzing thermodynamic behavior of processes.
- Be able to use Simulation Environment Analysis Tools: Sensitivity Analysis &
- Optimization with Constraints
- Reporting Relevant Results (Graphs, Charts, Tables, etc...)

CONTENTS OF THE PROGRAMME

- Database definition (determining required feedstock)
- Property methods, the importance and way to select, building a flow sheet
- Model the most basic unit operations of a chemical plant such as Pump, Heat exchangers, Heater, etc.
- Defining process parameters, Generating pressure-composition, temperature composition, and viscosity-temperature curves, etc.,
- Running some process examples.

OBJECTIVES

The workshop covers both fundamentals and branch specific concepts with hands on sessions. This would immensely help the students at large.
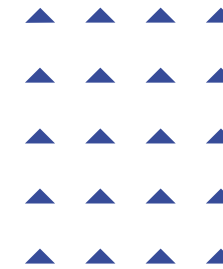
- To improve employability skills of Engineering students
- To bridge the skill gaps and make students Industry Ready
- To provide an opportunity to students to develop inter-disciplinary skills
- To create awareness of Aspen Plus in Engineering Applications
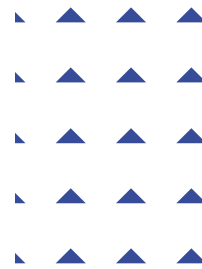
Rajiv Gandhi University of Knowledge Technologies, Basar

Department of Chemical Engineering
A Short Term Training Programme on ASPEN PLUS   (1st – 4th November, 2022)
<u>Programme Schedule</u>

Date	Session	Time	Topic
1st Nov 2022 (Day-1)		09:30AM-09:40AM	Inaugural Session by Convener
		09:40AM-09:45AM	Address by Chief Patron, Prof. V. Venkata ramana, Vice Chancellor, RGUKT Basar
		09:45AM-09:50AM	Address by Patron, Prof. P. Sathish Kumar, Director, RGUKT Basar
		09:50AM-10:00AM	Address by Head of the Department Mr. Ravi Kumar Goud, Head, Chemical Engg.
	1	10:00AM-11:00AM	Introduction to Simulation
	Break		
	2	11:15AM-12:30PM	Introduction to flow sheeting
	Lunch		
	3	02:00PM-03:15PM	Basic chemical engineering problems
	Break		
	4	03:30PM-05:00PM	Hands on training
2nd Nov 2022 (Day-2)	1	09:00AM-11:00AM	Unit Operation Models
	Break		
	2	11:15AM-12:30PM	Cyclo-hexane flow sheet
	Lunch		
	3	02:00PM-03:15PM	Pressure changers, Heat exchangers
	Break		
	4	03:30PM-05:00PM	Hydrocarbon gas compressor simulation
	1	09:00AM-11:00AM	Heat exchanger design
	Break		
	2	11:15AM-12:30PM	Rating for cumene plant

3rd Nov 2022 (Day-3)		Lunch	
	3	**02:00PM-03:15PM**	Rigorous reactor models
		Break	
	4	**03:30PM-05:00PM**	Reactor model for Ethyl acetate reactor
4th Nov 2022 (Day-4)	1	**09:00AM-11:00AM**	Distillation Column Simulation
		Break	
	2	**11:15AM-12:30PM**	Cyclo-hexane flow sheet with distillation unit
		Lunch	
	3	**02:00PM-03:15PM**	Flow sheet Convergence
		Break	
	4	**03:30PM-05:00PM**	Calculator Blocks
	5	**04:45PM-05:00PM**	Valedictory Session & Vote of Thanks by Co-Convener

Note: All the lectures are to be delivered by Prof. K. Ravichand, Process Simulation Expert, Hyderabad.