Mechanical Engineering Department

Academic Year: 2024-25 Class: Second Year (A) Semester: II

Course Outcome: CO1, CO2, CO3, CO4, CO5, CO6

Programme Outcome: PO1, PO2, PO5, PO12

Innovative Teaching Method

Title of Innovative teaching method: Use of Psychrometry App

1. Name of faculty: Dr. A. A. Kapse

2. Subject: Applied Thermodynamics

3. Objective of method:

- i. To create awareness among students about mobile application of Psychrometry App.
- ii. To understand the easy and ready use of Psychrometry App in field.
- iii. To read the Psychrometric property values for the actual data point values.
- iv. To apply the actual data point values for Psychrometric process.
- **4. Topic covered through activity:** Understand the Psychrometric properties of moist air and identify the different processes.

5. Description of method with benefits

In this activity teacher assigned specific Psychrometric process to group of students. After that students need to think about detail locating the first point of process. After that student will get sufficient time to gather information about details of process. After that students need to locate the point on chart as per their skills and prepare snap-image and upload it on Google Classroom. Teacher will analyse their performance on the criteria mentions in rubrics.

Benefits:

- i. It will make students to think and study in depth readily and easily available Psychrometric point and processes.
- ii. It will provide platform to improve their soft skills, discuss among group of students and students will learn about how to use modern mobile app in the field.

6. Roles and responsibilities:

Teacher

- i. Assign particular process to the students and guide them about the activity.
- ii. Observe and check point located and processes marked by each student.
- iii. Observe processes marked by students during assessment and evaluate the performance of individual student as per criteria mentioned below (Rubrics).

Student

- i. Detail study of process which is assigned by teacher.
- ii. Prepare process and mark it on Psychrometric app.

7. Assessment tools with rubrics:

Assessment will be done by subject teacher on the basis of following rubrics

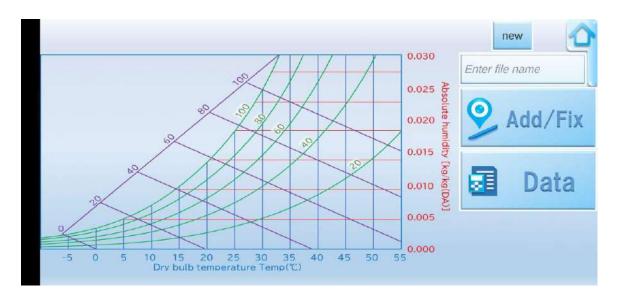
A	В	C
Understanding	Demonstration	Questions & Answers
02	05	03

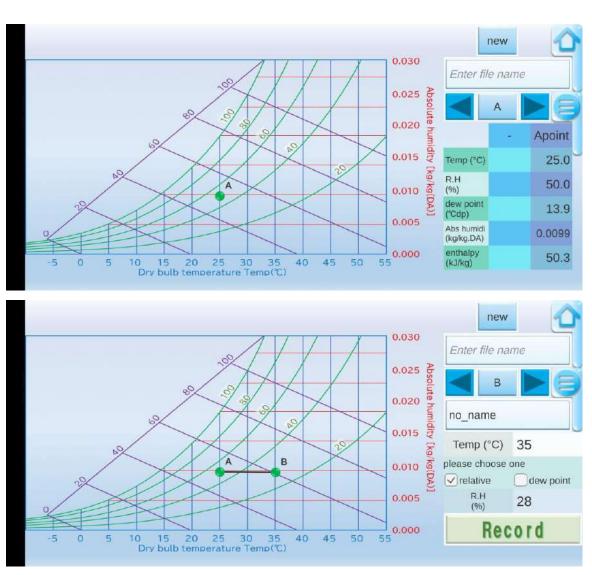
8. Evaluation sheet of Attendees

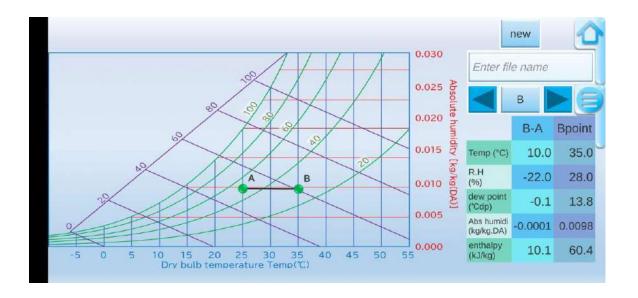
Sr. No	Name of Student	A	В	C	Marks (Out of 10)
1	Arpita Aandhale	2	5	2	9
2	Abhishekh Sonawane	2	3	2	7
3	Om Adhav	2	5	3	10
4	Aditya Khairnar	2	3	2	7
5	Chandrakant Aher	2	5	2	9
6	Krish Ahire	2	4	2	8
7	Rohit Ahire	2	5	2	9
8	Pushkar Ahirrao	2	4	2	8
9	Mahesh Apsunde	2	5	3	10
10	Vaibhav Apsunde	2	5	3	10
11	Ayush Landge	2	4	2	8
12	Shivam Bagul	2	5	3	10
13	Karunya Bhadane	2	5	3	10
14	Omkar Bhambere	2	5	2	9
15	Shreya Bokade	2	4	2	8
16	Gaurav Borse	2	4	2	8
17	Kirtesh Chaudhari	2	5	2	9
18	Niraj Chaudhari	2	5	3	10
19	Om Chaudhari	2	5	2	9
20	Saiprasad Chaudhari	2	5	2	9
21	Rahul Chitalkar	2	5	2	9
22	Ketan Darade	2	5	3	10
23	Shrutika Dawange	2	5	3	10
24	Deep Kulkarni	2	5	3	10
25	Siddhesh Deokar	2	5	3	10
26	Pranav Deore	2	5	3	10

27	Bhumika Desai	2	5	2	9
28	Abhishek Desale	2	5	3	10
29	Vaishnavi Dhanwate	2	5	2	9
30	Aayush Dhumal	2	5	3	10
31	Yogeshwari Dusane	2	5	3	10
32	Prasad Fadtale	2	3	2	7
33	Mahima Gadhave	2	5	2	9
34	Om Ghotekar	2	5	3	10
35	Nikhil Ghule		-		
		2	2	2	6
36	Sahil Handge	2	5	3	10
37	Shreyas Handore	2	5	3	10
38	Sadnya Hiray	2	5	2	9
39	Indrani Kulkarni	2	5	3	10
40	Saloni Ingale	2	4	3	9
41	Jay Jadhav	2	4	3	9
42	Kunal Jadhav	2	4	3	9
43	Sakshi Jadhav	2	5	3	10
44	Sarthak Jadhav	2	5	3	10
45	Swara Jadhav	2	3	3	8
46	Yash Jadhav	2	3	2	7
47	Yash Jadhav	2	4	2	8
48	Saurabh Joshi	2	3	2	7
49	Sahil Kakad	2	3	2	7
50	Bhavesh Kaklij	2	5	2	9
51	Shivam Kanade	2	3	2	7
52	Himanshu Kapadne	2	4	3	9
53	Ashish Katale	2	3	2	7
54	Mayur Kedare	2	5	3	10
55	Swati Khamkar	2	3	2	7
56	Nikhil Kharkar	2	5	2	9
57	Bhushan Khillare	2	5	3	10
58	Mukta Kolhe	2	5	3	10
59	Anushka Kudal	2	5	3	10
60	Om Kumbhar	2	4	3	9
61	Harshal Londhe	2	5	3	10
	1		1	·	1

Activity Images







9. Impact Analysis

Sr. No	3 – High / Excellent	2 – Moderate / Average	1- Slight / Poor
1. Do you understand the objective of activity?	95.6	4.4	-
2. Do you find this activity helpful in understanding the key concept of topic?	80.1	19.9	-
3. Does this method help to improve demonstration skills and communication skills?	78.1	21.9	-
4. Does contents covered are useful in lifelong learning?	77.2	22.8	-
5. Do you want to participate such activity again?	84.7	15.3	-

10. For review and critics contact: e-mail address of faculty and HOD kapse.arvind@kbtcoe.org, hod.mech@kbtcoe.org

Dr. A. A. Kapse Subject In charge Dr. S.B. Sonawane Module Coordinator

Dr. V. C. Shewale / Prof. V. V. Shinde

Dr. A. B. Kakade

IQAC Coordinator

HOD