**ANURAG GROUP OF INSTITUTIONS**

(Formerly CVSR COLLEGE OF ENGINEERING)

Venkatapur (V), Ghatkesar (M), R. R. Dist.

**(Autonomous)**

**DEPARTMENT OF MECHANICAL ENGINEERING**

Name of the Course: **MATHEMATICS - III**

Name of the course coordinator: **Dr. P. RAVIKANTH RAJU**

**Course Outcomes:**

After completion of this course the students will be able to:

1. Know and understand various types of special functions.
2. Solve potential functions, stream functions and velocity potential.
3. Understand functions of complex variables place a vital role in many areas in engineering for example the motion of fluids, the transfer of heat, the processing of signals, electromagnetic and electrostatic field theory.
4. Classify and solve the contour integration of complex functions
5. Know the complex variable techniques and knowledge of mapping and transforms play a major role in several areas of engineering.

**Articulation matrix of CO’s with PO’s and PSO’s**

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | **Program Outcome’s** | | | | | | | | | | | | **PSO’s** | | |
| **PO1** | **PO2** | **PO3** | **PO4** | **PO5** | **PO6** | **PO7** | **PO8** | **PO9** | **PO 10** | **PO 11** | **PO12** | **PSO1** | **PSO2** | **PSO3** |
| **CO1** | **3** | **2** | **-** | **2** | **2** | **-** | **-** | **-** | **2** | **-** | **-** | **-** | **1** | **3** | **2** |
| **CO2** | **3** | **2** | **-** | **-** | **1** | **-** | **-** | **-** | **2** | **-** | **-** | **-** | **1** | **1** | **1** |
| **CO3** | **3** | **3** | **-** | **-** | **1** | **-** | **1** | **-** | **2** | **-** | **-** | **-** | **2** | **2** | **1** |
| **CO4** | **3** | **3** | **-** | **-** | **2** | **-** | **-** | **-** | **2** | **-** | **-** | **-** | **2** | **3** | **1** |
| **CO5** | **3** | **2** | **-** | **2** | **2** | **-** | **-** | **-** | **2** | **-** | **1** | **-** | **2** | **1** | **-** |
| **AVG** | **3** | **2** | **-** | **2** | **2** | **-** | **1** | **-** | **2** | **-** | **1** | **-** | **2** | **2** | **1** |

***Note*: 1 - Slight**

**2 - Moderate**

**3 - Substantial**

**Signature of the Course Coordinator**