**NBKR INSTITUTE OF SCIENCE & TECHNOLOGY :: VIDYANAGAR**

*(AUTONOMOUS)*

**CIVIL ENGINEERING**

SCHEME OF INSTRUCTION AND EVALUATION

(With effect from the batch admitted in the academic year 2013-2014)

**IV YEAR OF FOUR YEAR B.TECH. DEGREE COURSE – II SEMESTER**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| S.No. | CourseCode | Course Title | ContactHours/Week | Credits | Evaluation |
| SessionalTest-I | SessionalTest-II | Total Sessional Marks (Max. 40) | SemesterEnd Examination | Max.Total Marks |
| **THEORY** | L | P | T |  | Durationin Hours | Max.Marks | Durationin Hours | Max.Marks | 0.8(Better of two sessional tests)+0.2(Other) | Durationin Hours | Max.Marks |  |
| 1 | 13CE4201 | Design & Drawing Of Irrigation Structures | 1 | 3 | - | 4 | 2 | 40 | 2 | 40 | 3 | 60 | 100 |
| 2 | 13CE4202 | Environmental Studies | 4 | - | - | 4 | 2 | 40 | 2 | 40 | 3 | 60 | 100 |
| 3 | 13CE42EX | Elective - III | 4 | - | - | 4 | 2 | 40 | 2 | 40 | 3 | 60 | 100 |
|  | **PRACTICALS** |  |  |  |  |
| 1 | 13CE42P1 | CAAD Laboratory | - | 3 | - | 2 | - | - | - | - | Day to day evaluation and a test(100 Marks) |  | - | 100 |
| 2 | 13CE42PR | Project Work | - | 3 | - | 6 | - | - | - | - | Continuous Assessment and seminar(80 Marks) |  | 120 | 200 |
|  |  | **TOTAL** | **09** | **09** |  | **20** | **6** | **-** | **6** | **-** | **300** | **9** | **300** | **600** |

**Elective – III:**

13CE42E1 Remote Sensing & GIS 13CE42E2 Finite Element Analysis

13CE42E3 Advanced Highway Engineering 13CE42E4 Ground Improvement Techniques

13CE42E5 Environmental Pollution and Control

**13CE4201 - DESIGN AND DRAWING OF IRRIGATION STRUCTURES**

|  |  |  |  |
| --- | --- | --- | --- |
| **Course category:** | Program core | **Credits:** | 4 |
| **Course Type:** | Theory | **Lecture - Tutorial - Practical:** | 3 - 1 - 0 |
| **Prerequisite:** | **Irrigation Engineering** | **Sessional Evaluation :****Univ.Exam Evaluation:****Total Marks:** | 4060100 |

|  |  |  |
| --- | --- | --- |
| **Course Outcomes** | CO1 | Be able to design surplus weir |
| CO2 | Be able to design tank sluice with tower head |
| CO3 | Be able to design canal drop and canal regulator |
| CO4 | Be able to design syphon well drop |
| CO5 | Be able to design syphon aqueduct. |
| **Course Content** | **Design and Drawing of** 1. Surplus weir
2. Tank sluice with a tower head
3. Canal drop-notch type
4. Syphon well drop
5. Canal regulator
6. Syphon Aqueduct ( Type – II)

( Under tunnel) |
| **Text Books and reference Books:** | **TEXT BOOKS:**1. “Water Resources Engineering Principles and Practice” by C.S. Murthy.

**REFERENCE BOOKS:**1. “Irrigation Engineering Structures” by Elhis. 2. “Irrigation Engineering and Hydraulic Structures” by Sharma R.K. |