



UNIVERSITY OF PETROLEUM AND ENERGY STUDIES
End Semester Examination, December 2021

Course: Oil and Gas Informatics
Program: B.Tech-GIE
Course Code: CSOG4003P

Semester: VII
Time: 03 hrs.
Max. Marks: 100

Instructions: all questions are compulsory

SECTION A

(5Qx 4M = 20 Marks)

S. No.	Write short notes on the following [30-40 words]	Marks	CO
Q 1	Differentiate between knowledge & Information.	4	CO1
Q2	Identify the working principle of GPS.	4	CO1
Q3	Explain the working principle of Gravimeter.	4	CO2
Q4	Identify the different types of faults.	4	CO3
Q5	Innumerate are the different types of rocks.	4	CO2

SECTION B

(4Qx10M = 40 Marks)

	All questions are compulsory. Q9 has internal option [100-150 words]	Marks	CO
Q6	Elaborate on architecture of PLC.	10	CO3
Q7	Differentiate between magnetometer and gravimeter.	10	CO2
Q8	Identify the application areas of GIS in E&P process.	10	CO4
Q9	Explain in detail the architecture of SCADA. OR Explain the block diagram of SCADA software architecture.	10	CO4

SECTION-C

(2Qx 20M= 40 Marks)

	Q10 is compulsory and choose any 1 question from Q11 [200+ words]	Marks	CO
Q 10	Enumerate and Analyze the different application of GIS in Oil and Gas industry.	5+15	CO5
Q11	Analyze in detail how SCADA is applied in Upstream & Downstream sector. OR Identify & Explain the working principle of an antenna.	20	CO5