DHARMSINH DESAI UNIVERSITY, NADIAD
FACULTY OF TECHNOLOGY

B.TECH. SEMESTER VII [Information Technology]

SUBJECT: (IT 717) Distributed Computing

Examination	**: Online Second Sessional**	**Seat No.**	**:**
Date	**: 07/08/2021**	**Day**	**: Wednesday**
Time	**: 01:45 PM to 02:30 PM**	**Max. Marks**	**: 16**

INSTRUCTIONS:

1. Figures to the right indicate maximum marks for that question.
2. The symbols used carry their usual meanings.
3. Assume suitable data, if required & mention them clearly.
4. Draw neat sketches wherever necessary.

Q.2 Attempt Any Two of the following questions. **[08]**

(a) Draw and discuss the structure WSDL document. **[04]**

(b) i) List down the services provided by the ESB [02] **[04]**

ii) Differentiate the Flow and Sequence BPEL activities. [02]

(c) Considering the following statement and select and write name of the appropriate webservice implementation approach to provide the solution of the problem defined in the statement. **[04]**

"A programmer must define the implementation independent interface first for the Log in Webservice that takes two values, username and password as an input and reply with the appropriate login message depending on the validity of the username and password". Also write steps to create code for it and client code to test the webservice.

Q.3 Attempt following questions **[08]**

(a) Design a BPEL process and application in such a way that it composes the Two Web Services named ArithmeticService and ScientificService, to get a result of Sin(A+B). **[08]**

i) Write code of Both of these webservices **[02]**

ii) Steps to create interface for getting two input from the end user **[02]**

iii) illustrate the BPEL process with diagram **[02]**

iv) Write down client application code to test the composite application **[02]**

OR

Q.3 Attempt following questions **[08]**

(a) Create an application which allows the message exchange in asynchronous way between to two independent clients with a help of Message Oriented Middleware technology. **[08]**

i) Write code of Sender and Receiver **[03]**

ii) Write code of notifier i.e. when message is arrived it prints message on console **[03]**

iii) write down steps to test the application, **[02]**