Roll No.: _____

COURSE CODE: 13B1WCI831                                    MAX. MARKS: 35
COURSE NAME: Service Oriented Architecture
COURSE CREDITS: 3                                           MAX. TIME: 2 Hrs

*Note:* *Attempt all the questions. Carrying of mobile phone during examinations will be treated as case of unfair means.*

**Que.1: a)** *[3 Marks]* In case of Entity-Centric Business Service Design, what services are to be built (entity, task and application) and how to organize them on different layers? Explain.

**b)** *[2 Marks]* What features are provided by WS-*extensions which are required by SOA? Explain.

**Que.2: a)** *[2 Marks]* Explain SOAP. In addition, explain all building blocks with appropriate examples.

**b)** *[3 Marks]* Explain the relationship between SOA and Enterprise architecture. How the reference architecture is maintained using SOA? Explain.

**Que.3: a)** *[2 Marks]* What is WSIT? List and explain WSIT Web Services Features.

**b)** *[3 Marks]* WSIT uses or extends existing features at SOA and adds new support for interoperable web services. What are extended technologies? Explain.

**Que.4: a)** *[2 Marks]* Explain CLR runtime in detail.

**b)** *[2 Marks]* How SOA support is provided in .NET? Explain.

**Que.5: a)** *[2 Marks]* Explain the automatic Data Binding. Also, write WS-* Specifications.

**b)** *[2 Marks]* Explain WSE Architecture. Also provide WSE feature in detail.

**Que.6: a)** *[2 Marks]* Explain different Web Service Composition Methods. Also, explain how BPEL Web Services are Coordinating?

**b)** *[2 Marks]* What is a typical BPEL process? Explain in detail.

**Que.7: a)** *[2 Marks]* What is WSDL? Explain.

**b)** *[2 Marks]* Explain different architectural Models.

**Que.8: a)** *[2 Marks]* Discuss different Security Challenges for Web Services.

**b)** *[2 Marks]* Defines a model to express the properties as policies of Web Service entities.