QUESTION BANK

B.TECH IV YEAR – II SEM (R15)
(2018-19)

DEPARTMENT OF
COMPUTER SCIENCE AND ENGINEERING

MALLA REDDY COLLEGE OF ENGINEERING & TECHNOLOGY

(Autonomous Institution – UGC, Govt. of India)

Recognized under 2(f) and 12 (B) of UGC ACT 1956

(Affiliated to JNTUH, Hyderabad, Approved by AICTE - Accredited by NBA & NAAC – 'A' Grade - ISO 9001:2015 Certified)

Maisammaguda, Dhulapally (Post Via. Hakimpet), Secunderabad – 500100, Telangana State, India

R13

JAWAHARLAL NEHRU TECHNOLOGICAL UNIVERSITY HYDERABAD
B. Tech IV Year I Semester Examinations, March - 2017
SOFTWARE PROJECT MANAGEMENT
(Common to CSE, IT)

Time: 3 Hours   Max. Marks: 75

Note: This question paper contains two parts A and B.

Part A is compulsory which carries 25 marks. Answer all questions in Part A. Part B consists of 5 Units. Answer any one full question from each unit. Each question carries 10 marks and may have a, b, c as sub questions.

Part- A

(25 Marks)

1.a)   What is late risk resolution?   [2]
 b)   What are various cost estimation models?   [3]
 c)   What is roundtrip engineering?   [2]
 d)   What are the top five principles of a modern process?   [3]
 e)   Define transition phase.   [2]
 f)   Write the typical release description outline.   [3]
 g)   Define product release milestone.   [2]
 h)   Who are stakeholders? List them.   [3]
 i)   Define rework and adaptability.   [2]
 j)   What are the major components of software cost? Why?   [3]

Part-B

(50 Marks)

2.a)   What are five necessary improvements in waterfall model?
 b)   Describe return on investments in different domains.   [5+5]

OR

3.a)   Give industrial software metrics top 10 list.
 b)   Briefly explain pragmatic software cost estimation.   [5+5]

4.a)   How to improve software processes?
 b)   What are the principles of modern software management?   [5+5]

OR

5.a)   Discuss about reuse with a neat diagram.
 b)   Describe transitioning to an iterative process.   [5+5]

6.   Explain about model-based architecture in a management perspective.   [10]

OR

7.a)   Explain about construction phase.
 b)   Distinguish between implementation set and deployment set.   [7+3]

8.a)   What are default agendas for the life-cycle architecture milestone?
 b)   Discuss about the cost and schedule estimating process.   [5+5]

OR

9.a) What are the activities of software architecture team?
  b) Explain in detail about software change orders. [5+5]

10.a) What are the seven core metrics? Explain.
  b) Give an example to distinguish small scale project and large scale project. [7+3]
                                      OR
11.a) What are the basic characteristics of a good metric? Explain.
  b) Give a common subsystem overview of CCPDS-R. [4+6]

R13

JAWAHARLAL NEHRU TECHNOLOGICAL UNIVERSITY HYDERABAD
B. Tech IV Year I Semester Examinations, November/December - 2016
SOFTWARE PROJECT MANAGEMENT
(Computer Science and Engineering)

Time: 3 Hours   **Max. Marks: 75**

Note: This question paper contains two parts A and B.
Part A is compulsory which carries 25 marks. Answer all questions in Part A.
Part B consists of 5 Units. Answer any one full question from each unit.
Each question carries 10 marks and may have a, b, c as sub questions.

Part- A
                                                                                (25 Marks)
1.a)   Define late design breakage.   [2]
  b)   What are the parameters of cost models?   [3]
  c)   What is configurable process?   [2]
  d)   What are five staffing principles?   [3]
  e)   Define elaboration phase.   [2]
  f)   What is WBS?   [3]
  g)   What are the responsibilities of SEEA?   [2]
  h)   Explain about configuration baseline.   [3]
  i)   What are the sources of architectural risks?   [2]
  j)   Define MTBF and maturity.   [3]

Part-B
                                                                                (50 Marks)
2.a)   Explain waterfall model.
  b)   Describe the three generations of software economics.   [5+5]
                                    OR
3.   Explain the following:
       a) Adversarial stakeholder relationships
       b) Requirements driven functional decomposition   [5+5]

4.a)   Explain about object-oriented methods and visual modeling.
  b)   What are the modern process approaches for solving conventional problems? [6+4]
                                    OR
5.a)   How to achieve required software quality? Explain.
  b)   Write and explain any ten principles of conventional software engineering. [5+5]

6.a)   Briefly discuss about engineering stages.
  b)   Explain in detail about test artifacts.   [5+5]
                                    OR
7.a)   Write the primary objectives of Construction and Transition phases.
  b)   What are engineering artifacts? Explain.   [5+5]

8.a)   Discuss about evolutionary work breakdown structures.
  b)   What are the activities of software assessment team? Explain.   [5+5]
                                    OR
9.a)   Explain in detail about planning guidelines.
  b)   Discuss about automation building blocks.   [6+4]

10.a) What are process discriminants? Briefly explain.
   b) Explain culture shifts for modern process transitions.   [5+5]
                                    OR
11.a) What are management indicators? Explain.
   b) Explain top ten software management principles.   [5+5]

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Code No: **RT4105C**

R13

Set No. 1

IV B.Tech I Semester Regular/Supplementary Examinations, Oct/Nov - 2018
SOFTWARE PROJECT MANAGEMENT
(Common to Computer Science and Engineering and Information Technology)

Time: 3 hours　　　　　　　　　　　　　　　　　　　　　　**Max. Marks: 70**

Question paper consists of Part-A and Part-B
Answer ALL sub questions from Part-A
Answer any THREE questions from Part-B
*****

PART–A *(22 Marks)*

1. a) What is software project management? [4]
   b) What is the impact of iterative development on evolving artifacts? [3]
   c) Write estimation techniques. [4]
   d) Define resource allocation schedules. [3]
   e) What is progress monitoring? [4]
   f) Defining a software quality. [4]

PART–B *(3x16 = 48 Marks)*

2. a) Explain software project management activities. [8]
   b) Describe project scope. [8]

3. a) Illustrate the first two phases of the life-cycle process. [8]
   b) Define Artifact? Write short notes on Engineering Artifacts. [8]

4. a) Explain detail about the effort estimation models. [8]
   b) Discuss in detail the bottom up estimation approach. [8]

5. a) Explain briefly nature of risk. [8]
   b) What is PERT? Describe PERT stages with suitable example. [8]

6. a) Explain in detail about creating the framework. [8]
   b) Define Scheduling resources with examples. [8]

7. a) Explain with neat diagram, the place of software quality in project planning. [8]
   b) What is capability maturity model? Explain. [8]

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Code No: **RT4105C**

R13

Set No. 2

IV B.Tech I Semester Regular/Supplementary Examinations, Oct/Nov - 2018
SOFTWARE PROJECT MANAGEMENT
(Common to Computer Science and Engineering and Information Technology)

Time: 3 hours   **Max. Marks: 70**

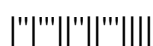*Question paper consists of Part-A and Part-B*
Answer ALL sub questions from Part-A
Answer any THREE questions from Part-B
*****

PART–A *(22 Marks)*

1. a) Write a short note on when to plan.   [4]
    b) What are the construction phase primary objectives?   [3]
    c) Define critical path analysis.   [3]
    d) Write short notes on PERT requires three estimates.   [4]
    e) Explain cost monitoring.   [4]
    f) List and explain quality factors.   [4]

PART–B *(3x16 = 48 Marks)*

2. a) Discuss challenges in software project.   [8]
    b) Explain in detail software projects and activities.   [8]

3. a) What are primary objectives and essential activities of elaboration phase? [8]
    b) Write engineering artifacts available at the life-cycle architecture milestone. [8]

4. a) Explain network planning models.   [8]
    b) Discuss in detail about the use case based estimation.   [8]

5. a) Explain about the risk identification.   [8]
    b) Discuss Monte Carlo simulation with neat diagram.   [8]

6. a) With neat diagram explain project reporting structure.   [8]
    b) Discuss about the identifying resource requirement.   [8]

7. a) Explain the importance of software quality.   [8]
    b) With neat diagram explain product and process metrics.   [8]

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Code No: **RT4105C**　　**R13**　　**Set No. 3**

IV B.Tech I Semester Regular/Supplementary Examinations, Oct/Nov - 2018
SOFTWARE PROJECT MANAGEMENT
(Common to Computer Science and Engineering and Information Technology)

Time: 3 hours　　　　　　　　　　　　　　　　　　　　　　Max. Marks: 70

Question paper consists of Part-A and Part-B
Answer ALL sub questions from Part-A
Answer any THREE questions from Part-B
*****

PART–A *(22 Marks)*

1. a) What is a project? [3]
   b) What are the construction phase primary objectives? [4]
   c) What are the estimation techniques? [4]
   d) Define Monte Carlo simulation. [3]
   e) What is defect tracking? [4]
   f) Defining a software quality. [4]

PART–B *(3x16 = 48 Marks)*

2. a) Explain software project management activities. [8]
   b) With neat diagram explain step-wise Objective and goals of project planning. [8]

3. a) Explain Inception and Construction phases. [8]
   b) Explain the life-cycle phases of a process in detail. [8]

4. a) Explain different three stages of COCOMO II model. [8]
   b) List and explain objectives of activity planning. [8]

5. a) Explain risk assessment. [8]
   b) Describe PERT stages with suitable example. [8]

6. a) Discuss Cost monitoring with suitable example. [8]
   b) List and explain seven categories of resources. [8]

7. a) Defining software quality in three specifications explain in detail. [8]
   b) What are the techniques for enhancing software quality? [8]

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Code No: **RT4105C**

R13

Set No. 4

IV B.Tech I Semester Regular/Supplementary Examinations, Oct/Nov - 2018
SOFTWARE PROJECT MANAGEMENT
(Common to Computer Science and Engineering and Information Technology)

Time: 3 hours   Max. Marks: 70

Question paper consists of Part-A and Part-B
Answer ALL sub questions from Part-A
Answer any THREE questions from Part-B
*****

PART–A *(22 Marks)*

1.	a)	What is software project management?	[4]
	b)	What is the impact of iterative development on evolving artifacts?	[4]
	c)	Define critical path analysis.	[3]
	d)	What is risk management?	[4]
	e)	What is resource scheduling?	[4]
	f)	List and explain quality factors.	[3]

PART–B *(3x16 = 48 Marks)*

2.	a)	Define the scope of software project management.	[8]
	b)	Explain in detail about Management.	[8]
3.	a)	Write a short notes on:	
		(i) Engineering stage	
		(ii) Production stage	[8]
	b)	Define Artifact. Write in detail about Management artifacts.	[8]
4.	a)	Explain in detail about COCOMO II Model.	[8]
	b)	Discuss in detail activity identification approaches.	[8]
5.	a)	Explain about Monte Carlo simulation.	[8]
	b)	Write about the top ten software project risks and strategies for risk reduction.	[8]
6.	a)	Briefly explain about the earned values.	[8]
	b)	List and explain seven categories of resources.	[8]
7.	a)	Briefly explain ISO-9016.	[8]
	b)	List and explain software quality measures.	[8]

1 of 1

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MALLAREDDYCOLLEGEOFENGINEERING&TECHNOLOGY

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DEPARTMENTOFCOMPUTERSCIENCEANDENGINEERING

Subject:WebServices

MODELPAPER-I

1.
   a. Whatareweb services?
   b. What arethefeaturesofweb services?
   c. WhatarethebenefitsofhavingXMLbasedWEB services?
   d. Whatisthe benefit ofaWeb servicesbeing looselycoupled?
   e. WhatisWSDL?Whatarethefeaturesof WSDL?
   f. Ifaclientsends anXMLrequesttoaserver,can weensure thatthe communication remainsconfidential?
   g. Howto handleNetworksecuritythreatsinWebservices?
   h. Is XML-RPC is platform-dependent?
   i. Which languageUDDI uses?
   j. Whatisthe purpose of ServiceProvider in Web Servicearchitecture?

2. (a)Discussthe anatomy ofWSDLdefinition document?
   (b)What are thetoolsthat can beused toimplementWSDL?
                    (OR)
3. Discussthe following?
   i) DigitalSignaturesii)XKMS Signatureiii)NETiv)J2EETechnologyw.r.twebservices

4. WhatistheroleofSOAP in developing web services?Whatare itslimitations?(OR)
5. (a)Explain theuses ofUDDI registry?
   (b)What arethelimitationsofUDDI?

6. DescribebrieflyaboutXML,SOAP, andWSDLinaweb service?
                    (OR)
7. Whatis thepurposeofServiceRequestor in Web Servicearchitecture?

8. Which componentofWebservicedescribesinterfacestoweb services?
                    (OR)
9. Whatarethe benefitsand challengesof usingweb services?

10. What are theprimarysecurityissueswithweb
                    services?(OR)
11. HowtohandleNetworksecuritythreatsin Webservices?

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DEPARTMENTOFCOMPUTERSCIENCEANDENGINEERING

Subject:WebServices

MODELPAPER-II

1.
   a. What thecomponentsofaWeb Service?
   b. HowDoes aWeb ServiceWork?
   c. Whatisthe purpose of ServiceRegistry inWeb Servicearchitecture?
   d. Whatis Synchronicity?
   e. WhatarethecoreRolesinWeb Servicearchitecture?
   f. WhatarethebenefitsofWeb Services?
   g. What doyoumean byInteroperability ofWebServices?
   h. What doyoumean bylooselycoupled architectureofWeb services?
   i. DoWebservicessupportsRemoteProcedureCalls(RPCs)?
   j. Whatarethebehavioralcharacteristicsofweb services?

2. Whatis thepurposeoflayers inWeb ServiceProtocolStack?
<div align="center">(OR)</div>

3. Whatis HTTP?WhatisXML-RPC?Howrequestandresponseissent inXML-RPC?
4. Whatis therole ofSOAP in developingwebservices?Whatareits limitations?
<div align="center">(OR)</div>

5. (a)Explain theuses ofUDDI registry?
   (b)What arethelimitationsofUDDI?
6. Whatarethe corelayersinWeb Service ProtocolStack?
<div align="center">(OR)</div>

7. Whatis WSDL?What arethefeaturesofWSDL?
8. a Whatdoyoumeanby Web services manageability?
   b. IsXML-RPC isplatform-dependent?
<div align="center">(OR)</div>

9) What arethecorelayersinWeb Service ProtocolStack?
10) Ifa client connectsto aweb service,howdo weidentifythe user? Istheuserauthorizedtouse theservice?
<div align="center">(OR)</div>

11) Ifa client sends an XMLrequestto a server, canweensurethatthe communicationremainsConfidential?

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DEPARTMENTOFCOMPUTERSCIENCEANDENGINEERING

Subject:WebServices

MODELPAPER-III

1
   a. WhatarethecorelayersinWeb Service ProtocolStack?
   b. Whatisthe purpose of layers inWebServiceProtocolStack?
   c. Which languageUDDI uses?
   d. Is XML-RPC is platform-dependent?
   e. Whataretheprimarysecurityissueswith webservices?
   f. Whatarethestepsinvolved implementingwebservice withjava?
   g. Ifa clientconnects toa web service,howdo weidentify theuser? Is theuserauthorizedtousethe service?
   h. WhatisSOAP?Whatarethefeaturesof SOAP?
   i. Whatarethefeatures of XML-RPC?
   j. WhatisWSDL?Whatarethefeaturesof WSDL?

2)   What is Distributedcomputing ?Explainthe importance ofDistributedComputing?
                                                            (OR)
3)   ExplaintheserviceorientedArchitecture?

4)   Explain thebasicSOAP messageprotocol?
                                                            (OR)
5)   Explain theSOAP RPCCommunication protocol

6)   Explain WebserviceLifecycle?Explain thesectionsofWSDLfile?
                                                            (OR)
7)   Explain theUDDI Registries?Whataretheuses ofUDDI Registry?

8)   7.Whatdoyoumean byWeb servicesmanageability?
                                                            (OR)
9)   What doyoumean byInteroperability ofWebServices?

10)   Discuss theanatomyof WSDLdefinition document?
                                                            (OR)
11)   Howto handleNetworksecuritythreatsinWebservices?

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DEPARTMENTOFCOMPUTERSCIENCEANDENGINEERING

Subject:WebServices

MODELPAPER-IV

1.

    a. Whatareweb services? What arethe featuresofwebservices?

    b. WhatarethebenefitsofhavingXMLbasedWEB services?

    c. Which languageUDDI uses?

    d. Is XML-RPC is platform-dependent?

    e. Whataretheprimarysecurityissueswith webservices?

    f. Whatisthe purpose ofServiceRegistry inWeb Servicearchitecture?

    g. Whatis Synchronicity?

    h. WhatarethecoreRolesinWeb Servicearchitecture?

    i. What doyoumean byInteroperability ofWebServices?

    j. What doyoumean bylooselycoupled architectureofWeb services?

2) a) Explain theimportance ofDistributedComputing?

    b) Differentiate itfromtheotherexisting technologies.

                             (OR)

3) Explain brieflythetools and technologiesused inwebserviceimplementation.

4) Explain thestepsinvolved intheimplementation anddevelopmentofwebservices

                             (OR)

5) a)ExplaintheSOAP messagestructure.

    b) Explain theSOAPcommunicationmodeland SOAPsecurity

6) What arethebenefitsand challenges of usingwebservices?

                             (OR)

7) Explain theUDDI Registries? What aretheuses ofUDDIRegistry?

8) DiscusstheanatomyofWSDLdefinition document?

                             (OR)

9) Whatarethe toolsthatcanbeusedtoimplementWSDL?

10) Whatarethe primary securityissueswithweb services?

                             (OR)

11) Whatis therole ofSOAP in developing webservices ?Whatareitslimitations?

R13

JAWAHARLAL NEHRU TECHNOLOGICAL UNIVERSITY HYDERABAD
B. Tech IV Year II Semester Examinations, April - 2018
WEB SERVICES
(Computer Science and Engineering)
Time: 3 hours
Max. Marks: 75

Note: This question paper contains two parts A and B.
Part A is compulsory which carries 25 marks. Answer all questions in Part A. Part B consists of 5 Units. Answer any one full question from each unit. Each question carries 10 marks and may have a, b, c as sub questions.

PART - A

(25 Marks)

1.a)	Discuss the various building blocks of web services architecture.	[2]
b)	Explain the web services operational model.	[3]
c)	What is the importance of Faultcode element in SOAP fault?	[2]
d)	Define deserialization.	[3]
e)	Discuss the limitations of WSDL.	[2]
f)	What are the various functionalities provided by WSDL tools?	[3]
g)	Explain SOA in brief.	[2]
h)	Differentiate between public and private UDDI registries.	[3]
i)	What are digital signatures?	[2]
j)	Define non-repudiation and integrity.	[3]

PART - B

(50 Marks)

2. Briefly explain the following:
   a) Simple Object Access Protocol.
   b) Web Service Description Language
   c) Universal Description, Discovery and Integration. [10]

OR

3. Explain the role of J2EE and XML in distributed computing. [10]

4. Explain how SOAP encoding is done for the following with examples:
   a) Structure types
   b) Multiple references in Arrays
   c) Enumeration. [10]

OR

5. Explain how SOAP web services are developed using java with an example. [10]

6. Explain how SOAP binding is done in WSDL with an example. [10]

OR

7. Briefly explain the various structural elements of a WSDL document with an example.
   [10]

8.a) Discuss the various UDDI specifications.
 b) Explain the various UDDI data structures. [5+5]

OR

9. Explain the following functions in Publishing API:
 a) save_xx
 b) delete_xx [5+5]

10.a) Explain how is interoperability achieved in web services.
 b) Explain the steps involved in creating a java client for a web service. [5+5]

OR

11. Write short notes on:
 a) Symmetric ciphers.
 b) Asymmetric ciphers.
 c) Digital certificates.
 d) XML encryption. [10]

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JAWAHARLAL NEHRU TECHNOLOGICAL UNIVERSITY HYDERABAD
B. Tech IV Year II Semester Examinations, May - 2017
WEB SERVICES
(Computer Science and Engineering)

Time: 3 hours   Max. Marks: 75

Note: This question paper contains two parts A and B.
        Part A is compulsory which carries 25 marks. Answer all questions in Part A. Part B
        consists of 5 Units. Answer any one full question from each unit. Each question carries
        10 marks and may have a, b, c as sub questions.

PART - A

(25 Marks)

1.a)   What are the reasons for choosing Web services over Web applications?   [2]
  b)   Give the advantages of distributed computing compared to a traditional standalone
       application?   [3]
  c)   Give the SOAP 1.1 specifications?   [2]
  d)   Write a SOAP request message to get book price information for the book
       "Introduction to Web services".   [3]
  e)   What are the two important namespaces of <definitions> element   [2]
  f)   What are the four pieces of information of a WSDL definition?   [3]
  g)   What are the two ways of interacting with a UDDI Registry Service.   [2]
  h)   Compare Public and Private UDDI Registries?   [3]
  i)   Define Digital certificate? What is the role of Certification Authority in it? [2]
  j)   Define the goals of cryptography?   [3]

PART - B

(50 Marks)

2.a)   Discuss about Java RMI architectural model. Give its advantages and disadvantages.
  b)   Describe the role of xml and ebxml in web services.   [5+5]

OR

3.a)   Explain the basic operational model of Web Services.
  b)   Discuss about CORBA architectural model? Give its advantages and disadvantages.
                                                                                    [5+5]

4.a)   Describe the SOAP Envelope and Header elements of a SOAP message with pseudo
       code listings.
  b)   Write notes on Java and Axis.   [5+5]

OR

5.   Explain the two types of communication models supported by SOAP.   [10]

6.a)   Describe the seven key structural elements of a WSDL definition document.
  b)   What are the functionalities provided by WSDL tools? List the famous WSDL tools in
       the Java Web services space.   [5+5]

OR

7.   Discuss in detail Web service life cycle and WSDL bindings.   [10]

8. Describe the Primary UDDI data structures. [10]

OR

9.a) Explain the two XML-based programming APIs used for communicating with the UDDI registry node.
  b) Write the programming steps for publishing. [5+5]

10.a) Discuss the basic concept of .NET framework.
   b) Explain the various available implementations of XML Encryption. [5+5]

OR

11. Describe XML encryption by example. [10]

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