

Code No: R05410806

R05**Set No. 2**

IV B.Tech I Semester Examinations, November 2010
CORROSION ENGINEERING
Chemical Engineering

Time: 3 hours**Max Marks: 80**

Answer any FIVE Questions
All Questions carry equal marks

1. With a neat diagram, explain the cathodic protection of an underground tank by galvanic coupling. [16]
2. (a) Write briefly the metallurgical aspects of corrosion
(b) What are the environmental effects of corrosion. Explain briefly. [8+8]
3. Discuss the short circuited zinc and hydrogen electrode cell. [16]
4. (a) Explain selective leaching with the help of examples.
(b) Explain dezincification mechanism and its prevention. [6+10]
5. Explain the effects of velocity on :
(a) Corrosion rate of a normal metal
(b) Electrochemical behaviour of a corroding active-passive metal. [16]
6. Explain vapor phase inhibitors. [16]
7. (a) What is the minimum test time for checking results of corrosion?
(b) Explain the importance of planned interval tests for corrosion testing. [6+10]
8. Explain the mechanism of pitting corrosion. [16]

Code No: R05410806

R05**Set No. 4**

IV B.Tech I Semester Examinations, November 2010

CORROSION ENGINEERING

Chemical Engineering

Time: 3 hours

Max Marks: 80

Answer any FIVE Questions
All Questions carry equal marks

1. Discuss the short circuited zinc and hydrogen electrode cell. [16]
2. Explain vapor phase inhibitors. [16]
3. (a) Write briefly the metallurgical aspects of corrosion
(b) What are the environmental effects of corrosion. Explain briefly. [8+8]
4. Explain the effects of velocity on :
(a) Corrosion rate of a normal metal
(b) Electrochemical behaviour of a corroding active-passive metal. [16]
5. With a neat diagram, explain the cathodic protection of an underground tank by galvanic coupling. [16]
6. (a) Explain selective leaching with the help of examples.
(b) Explain dezincification mechanism and its prevention. [6+10]
7. (a) What is the minimum test time for checking results of corrosion?
(b) Explain the importance of planned interval tests for corrosion testing. [6+10]
8. Explain the mechanism of pitting corrosion. [16]

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R05**Set No. 1****IV B.Tech I Semester Examinations, November 2010****CORROSION ENGINEERING****Chemical Engineering****Time: 3 hours****Max Marks: 80**

Answer any FIVE Questions
All Questions carry equal marks

1. (a) Explain selective leaching with the help of examples.
(b) Explain dezincification mechanism and its prevention. [6+10]
2. (a) What is the minimum test time for checking results of corrosion?
(b) Explain the importance of planned interval tests for corrosion testing. [6+10]
3. Explain the effects of velocity on :
(a) Corrosion rate of a normal metal
(b) Electrochemical behaviour of a corroding active-passive metal. [16]
4. Explain the mechanism of pitting corrosion. [16]
5. Explain vapor phase inhibitors. [16]
6. With a neat diagram, explain the cathodic protection of an underground tank by galvanic coupling. [16]
7. (a) Write briefly the metallurgical aspects of corrosion
(b) What are the environmental effects of corrosion. Explain briefly. [8+8]
8. Discuss the short circuited zinc and hydrogen electrode cell. [16]

Code No: R05410806

R05**Set No. 3**

IV B.Tech I Semester Examinations, November 2010

CORROSION ENGINEERING

Chemical Engineering

Time: 3 hours

Max Marks: 80

Answer any FIVE Questions
All Questions carry equal marks

1. (a) Write briefly the metallurgical aspects of corrosion
(b) What are the environmental effects of corrosion. Explain briefly. [8+8]
2. Explain the mechanism of pitting corrosion. [16]
3. Explain vapor phase inhibitors. [16]
4. Explain the effects of velocity on :
(a) Corrosion rate of a normal metal
(b) Electrochemical behaviour of a corroding active-passive metal. [16]
5. Discuss the short circuited zinc and hydrogen electrode cell. [16]
6. (a) What is the minimum test time for checking results of corrosion?
(b) Explain the importance of planned interval tests for corrosion testing. [6+10]
7. (a) Explain selective leaching with the help of examples.
(b) Explain dezincification mechanism and its prevention. [6+10]
8. With a neat diagram, explain the cathodic protection of an underground tank by galvanic coupling. [16]
