Q.21 Define Refractories and its type with suitable examples. (CO5)

Q.22 Write chemical composition and application of lead glasses.

SECTION-D

Note: Long answer type questions. Attempt any two questions out of three questions. (2x8=16)

Q.23 What are factors affecting adsorption of gases on solids? (CO4)

Q.24 What is producer gas? Give its composition, properties and uses. (CO2)

Q.25 a) Explain Tyndall effect. (CO1)

b) Explain Brownian movement.

(**Note:** Course outcome/CO is for office use only)

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220423

2nd Sem. / Ceramic

Subject : Chemistry Applications

Time : 3 Hrs. M.M. : 60

SECTION-A

Note: Multiple choice questions. All questions are compulsory (6x1=6)

Q.1 Symbol of element Ca is _____ (CO1)

a) N b) C

c) Ca d) He

Q.2 What is formula for producer gas? (CO2)

a) $CO+H_2$ b) $CO+N_2$

c) CO+C d) CO+P

Q.3 What is degree of freedom at triple point of water system? (CO3)

a) 1 b) 0

c) 2 d) 3

Q.4 Absorption is which type of phenomena? (CO4)

a) Bulk Phenomena

b) Surface Phenomena

c) Both type of Phenomena

d) None of them

Q.5 Chemical bond formation occurs in ____ (CO5)

a) Physiosorption b) Chemisorption

c) Semisorption d) None of these

Q.6 A paint contains: (CO6)

a) Pigment b) Drying Oil

c) Polymerisation d) All of the above

SECTION-B

Note: Objective/ Completion type questions. All questions are compulsory. (6x1=6)

Q.7 Molar mass of NaOH is _____ (CO1)

Q.8 Formula for water gas is _____ (CO2)

Q.9 Size of colloidal particles will be in the range of _____ (CO3)

Q.10 Brownian motion involve which type of motion _____ (CO5)

Q.11 Liquid loving sols are lyphillic or Lyphobic sols? (CO4)

Q.12 The enamels provide _____ type of film. (CO6)

SECTION-C

Note: Short answer type questions. Attempt any eight questions out of ten questions. (8x4=32)

Q.13 a) Calculate the molecular mass of Calcium Carbonate. (CO1)

b) Write the molecular formula for Sodium Hydroxide and Aluminium Chloride. (CO1)

Q.14 Balance the following equation by hit and trial method. (CO1)

a) H_2+O_2 ® H_2O

b) CH_4+Cl_2 ® CCl_4+HCl

Q.15 What is the importance of ultimate analysis? (CO2)

Q.16 What is bio gas? Write its three uses. (CO2)

Q.17 Define freezing and vaporization curve. (CO3)

Q.18 Define phase, component and degree of freedom. (CO3)

Q.19 Write four differences between Physical and Chemical absorption. (CO4)

Q.20 Explain Tyndall effect. (CO4)