No. of Printed Pages : 4
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121755

5th Sem./Mech./Mechatronics/Prod/T&D/CAD CAM/CNC

Subject: CnC M/C & Auto.

Time : 3 Hrs.

M.M. : 100

SECTION-A

Note: Objective type questions. All questions are compulsory (10x1=10)

Q.1 Give full form of CNC.

Q.2 Write full form of CBN.

Q.3 Write another name of non-feedback control system.

Q.4 Time dependent characteristics are called .... characteristics.(fill in the blank)

Q.5 Write the use of tachometer.

Q.6 Define part family.

Q.7 Define unrecoverable fault.

Q.8 Give another name of fixed automation.

(1)

Q.9 Write full form of CIM.

Q.10 Define group technology.

SECTION-B

Note: Very short answer type questions. Attempt any ten questions out of twelve questions. 10x2=20

Q.11 Name the types of tool positioning systems in CNC systems.

Q.12 Write any two applications of CNC Machines.

Q.13 Give any two criteria's for tool selection.

Q.14 Give composition of HSS.

Q.15 Give the block diagram of a transducer.

Q.16 Give types of tachometer.

Q.17 Explain any two G codes.

Q.18 Define part programming.

Q.19 Describe cutter radius compensation.

Q.20 Describe a logic-pulser.

Q.21 Write the tools used for finding on-line faults in CNC machines.

Q.22 Write any two advantages of automation.

SECTION-C

Note: Short answer type questions. Attempt any eight questions out of ten questions.   8x5=40

Q.23 Explain axis identification of a CNC system.

Q.24 Differentiate conventional and CNC machines.

Q.25 Write the advantages of Anti friction guide ways.

Q.26 List the main requirements of slide ways in a CNC system.

Q.27 Give classification of transducers.

Q.28 Differentiate between encoders and decoders.

Q.29 Discuss briefly the working of potentiometer.

Q.30 Write short note on subroutine.

Q.31 Explain the classification of faults in CNC machines.

Q.32 Give the five applications of robots.

SECTION-D

Note: Long answer type questions. Attempt any three questions out of four questions.   3x10=30

Q.33 Describe LVDT. Explain the construction working and advantages of LVDT in detail.

Q.34 Explain canned cycle with an example.

Q.35 Explain different types of automation along with advantages and limitation.

Q.36 Explain classification of robots in detail.