Q.24 What is the difference between capstan and turret lathes?

Q.25 Write a short note on lathe accessories.

Q.26 Explain the tool post grinder for lathe.

Q.27 Write a short note on drill holding device.

Q.28 Differentiate between drilling and boring.

Q.29 Explain with a sketch the working principle of planer.

Q.30 Explain working principle of shaper.

Q.31 Write a short note on types of broaching machine.

Q.32 Draw the sketch of broach tool with complete nomenclature.

Q.33 What is the difference between a jig and a fixture?

Q.34 Explain various methods of lubrication of machine tools.

Q.35 Give the difference between cutting fluid and lubricant.

SECTION-D

Note: Long answer type questions. Attempt any two out of three questions. (2x10=20)

Q.36 Explain any five lathe operations with diagram.

Q.37 Explain nomenclature of a Twist Drill with the help of neat sketch.

Q.38 What are clamping devices? Explain the principle of clamping in detail.

Roll No. .....

4th Sem. / Mech. Engg. (MSIL)

Subject : Workshop Technology - II

Time : 3 Hrs. M.M. : 100

SECTION-A

Note: Multiple choice Questions. All questions are compulsory (10x1=10)

Q.1 The carbide tools operating at very low cutting speeds.

a) reduces tool life
b) Increases tool life
c) Have no effect on tool life
d) Spoils the work piece

Q.2 Which of the following have a live centre?

a) Tail stock
b) Headstock
c) Tool post
d) None of the mentioned

Q.3 Which of the following can be effectively used for holding eccentric job?

a) Four jaw chuck
b) Three jaw chuck
c) Both three jaw chuck and four jaw chuck
d) Two jaw chuck

Q.4 Main cutting part of drill is

a) Body b) Point

c) Lip d) Chisel edge

Q.5 Producing circular hole in a solid metal by means of revolving tool is known as

a) Counter boring

b) Reaming

c) Boring

d) Drilling

Q.6 Process of enlarging the hole size and enhancing its surface finish in known as

a) Drilling b) Reaming

c) Boring d) Counter boring

Q.7 Which of the following act as housing for an operating mechanism in shaper?

a) Base b) Column

c) Cross Rail d) Table

Q.8 Why chip breakers are provided on the broach?

a) To reduce machining time

b) To increase the cutting force by breaking the chips

c) To reduce the friction between tool surface and the workpiece by breaking the chips

d) To break up the wide curling chips

Q.9 Which of the following is not correct about fixture?

a) It is used to hold the work

b) It is used to position the work

c) It assures high accuracy of parts

d) It is used to guide the cutting tool

Q.10 By increasing feed rate, amount of heat generated

a) Increases

(b) Decreases

(c) Remains constant

(d) None of the mentioned

SECTION-B

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

Q.11 What are the main constituent of high speed steel?

Q.12 What is capstan lathe used for?

Q.13 Define machining time.

Q.14 Define helix angle of drilling.

Q.15 Describe counter sinking.

Q.16 Name two types of boring tools.

Q.17 Name the parts of a shaping machine.

Q.18 Name principal elements of a broach.

Q.19 What is fixture?

Q.20 Define flash point of a lubricant.

SECTION-C

Note: Short answer type questions. Attempt any twelve questions out of fifteen questions. (12x5=60)

Q.21 What is tool signature? Explain its importance.

Q.22 What are the main sources of heat during metal cutting?

Q.23 How threads are cut in lathe?