

Mechanic Diesel 1st Semester - Module 1 : Safety Workshop Practice

Questions: Level 1

1 Which is chemical Hazard?

- A Noise
- B Explosive
- C Vibration
- D Radiation

2 Which type of occupational health hazards involves "Toxic"?

- A Physical hazard
- B Chemical hazard
- C Biological hazard
- D Mechanical hazard

3 Which is the motive of occupational health and safety?

- A Decrease employee morale
- B Decreasing the quality
- C Reducing absenteeism
- D Minimising productivity

4 What type of safety covers the wearing of safety shoes in workshop?

- A General safety
- B Personal safety
- C Machine safety
- D Occupational safety

5 Which is the occupational mechanical hazard?

- A Sickness
- B Current leakage
- C Unguarded machinery
- D Wrong layout of machinery

6 Which is the Biological hazard?

- A Smoking
- B Sickness
- C Infection
- D Poor discipline

7 Which fire extinguisher used for flammable liquid fires?

- A Halon extinguisher
- B Dry powder extinguisher
- C CTC extinguisher
- D Water extinguisher

8 Which type of personal protection recommended to handle loads with rough surfaces and pointed projections?

- A Paper gloves
- B Rubber gloves
- C Leather gloves
- D Polythene gloves

9 Which is toxic in the automobile workshop?

- A Old bearings
- B Paper wrappers
- C Used lubricant
- D Old washer, bolts and nuts

10 Which is harmful to human health?

- A Oxygen
- B Water vapour
- C Carbon di oxide
- D Carbon mono oxide

11 Which gas is harmful to human health?

- A Nitrogen
- B Water Vapour
- C Carbon-di-oxide
- D Carbon- monoxide

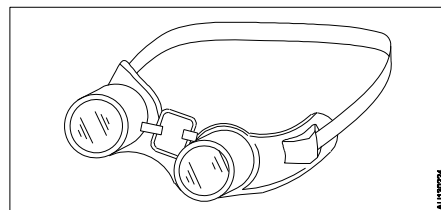
12 What is the effect of air borne dust in workshop?

- A Diarrhoea
- B Dehydration
- C Throat infection
- D Rise in blood pressure

13 Which device is used to remove toxic waste?

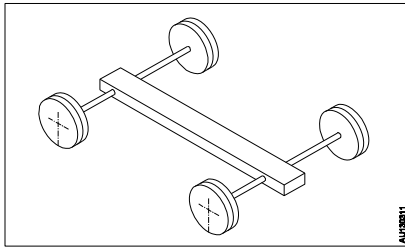
- A Water wash
- B Incinerators
- C Compressed air
- D Vacuum cleaner

14 What is the name of safety device?



- A Goggle
- B Hand gloves
- C Hand screen
- D Helmet screen

15 Which distance is known as wheel base of the vehicle?



- A Centre to centre distance between front wheels
- B Centre to centre distance between rear wheels
- C Centre to centre distance between front and rear wheels
- D End to end distance between front and rear wheels

Questions: Level 2

- 1 Which part of body is bleeding profusely is considered serious and need professional attention?
- A Leg of the human body
B Knee of the human body
C Wrist of the human body
D Thigh of the human body
-
- 2 How to treat burns and scalds?
- A Blow hot air to the burnt hand
B Blow cool air to the burnt hand
C Covering with water
D Covered hot water to the burnt hand
-
- 3 What is first aid?
- A It is the emergency medical treatment
B It is an immediate life saving treatment
C It is the intensive medical treatment
D It is the rule to assessing the treatment
-
- 4 What will you do if an electric shock victim unable to release his grip from the conductor?
- A Make sure the power is turned off
B Cover all burns with a dry loose dressing
C Place the victim on one side with head down
D Ask a by stander to help you to move the victim
-
- 5 Which class of fire involves liquified gases?
- A Class A
B Class B
C Class C
D Class D
-
- 6 Which fire extinguisher suitable for class "C" fire?
- A Foam filled extinguisher
B Water filled extinguisher
C Dry powder fire extinguisher
D Carbon-di-oxide fire extinguisher
-
- 7 Which factor isolate the fire from oxygen by blanketing?
- A Cooling
B starving
C Misfiring
D Smothering
-
- 8 Which class of fire involves wood?
- A Class 'A' fire
B Class 'B' fire
C Class 'C' fire
D Class 'D' fire

- 9 How the waste oil is disposed?
- A Hand over back to the customer
B Throw the removed oil in the drain
C Keep in small containers in remote corners
D Collect waste oil container and dispose to register vendors
-
- 10 Which type of energy to minimize the waste without affecting production?
- A Utilization of energy
B Modification of energy
C Conservation of energy
D Manipulation of energy
-
- 11 What type of energy reduce consumption by replacing old bulb with new LED?
- A Utilization of energy
B Modification of energy
C Manipulation of energy
D Conservation of energy
-
- 12 Which is the major energy conservation opportunities?
- A Stopping of leakage
B Replacement machineries
C Replacement of house hold appliance
D Laps in house keeping
-
- 13 Which type of energy conservation comes under the replacement of old machineries?
- A Minor energy conservation opportunities
B Major energy conservation opportunities
C Medium energy conservation opportunities
D Very minor energy conservation opportunities
-
- 14 Which type of energy conservation opportunity involves stopping of water leakage points?
- A Minor energy conservation opportunities
B Major energy conservation opportunities
C Medium energy conservation opportunities
D Extra major energy conservation opportunities
-
- 15 Which is medium energy conservation opportunities?
- A House keeping
B Stopping of water leakage
C Renovation of the old building
D Replacement of existing house hold appliances
-

Module 1 : Safety Workshop Practice - Key paper

Questions: Level 1

SL.No	Key
1	B
2	B
3	C
4	B
5	C
6	B
7	B
8	C
9	C
10	D
11	A
12	C
13	D
14	A
15	C

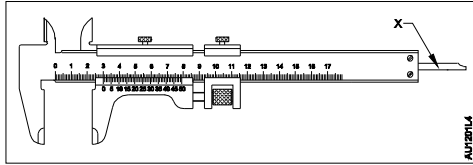
Questions: Level 2

SL.No	Key
1	C
2	C
3	B
4	A
5	C
6	C
7	D
8	A
9	D
10	C
11	D
12	B
13	B
14	A
15	D

Mechanic Diesel - 1st Semester - Module: 2 - Measuring, Marking and Practice

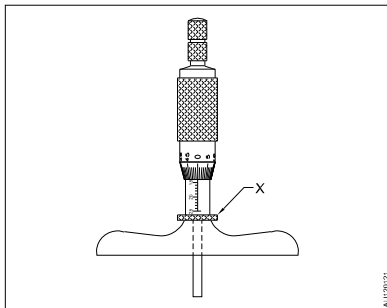
Questions: Level 1

1 What is the name of part marked as "X"?



- A Beam
- B Fixed jaw
- C Vernier scale
- D Depth measuring blade

2 What is the name of the part marked as 'X'?



- A Cap
- B Lock
- C Stock
- D Graduated sleeve

3 What is the least count of the metric outside micrometer?

- A 0.01 mm
- B 0.10 mm
- C 0.0001 mm
- D 0.00001 mm

4 Which part ensures uniform pressure on the measuring faces in the outside micrometer?

- A Barrel
- B Spindle
- C Thimble
- D Ratchet Slop

5 Which is the fixed measuring face of micrometer?

- A Anvil
- B Barrel
- C Spindle
- D Thimble

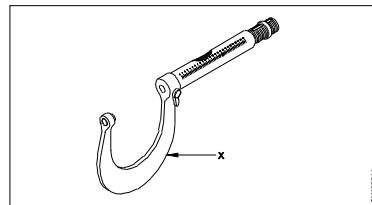
6 Which instrument is used to measure the diameter of cam shaft journals?

- A Depth micrometer
- B Three-point internal micrometer
- C Inside micrometer
- D Outside micrometer

7 Which material used in the outside micrometer anvil?

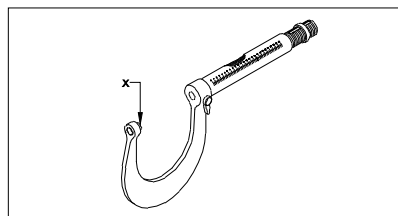
- A Brass
- B Bronze
- C Carbon
- D Carbide

8 What is the name of the part marked as 'X'?



- A Anvil
- B Frame
- C Spindle
- D Thimble

9 What is the name of the part marked as 'X'?



- A Anvil
- B Frame
- C Spindle
- D Thimble

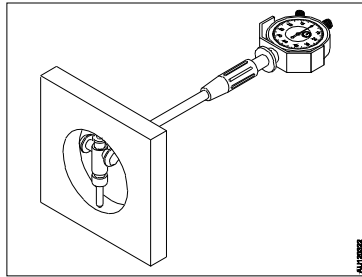
10 How many equal thimble divisions are made in outside micrometer?

- A 30 Divisions
- B 40 Divisions
- C 50 Divisions
- D 60 Divisions

11 What is the value of one thimble division reading in outside micrometer?

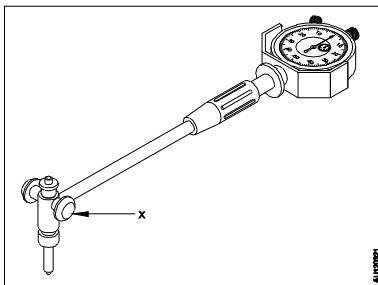
- A 0.05 mm
- B 0.01 mm
- C 0.02 mm
- D 0.03 mm

12 What is the name of the measuring instrument?



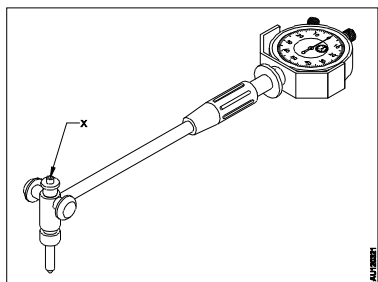
- A Depth gauge
- B Bore dial gauge
- C Telescopic gauge
- D Vernier gauge

13 What is the name of the part marked as 'X'?



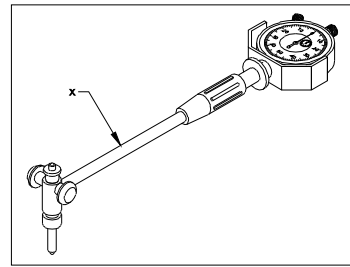
- A Spindle
- B Plunger
- C Centring shoes
- D Fixed anvil insert

14 What is the name of the part marked as 'X'?



- A Spindle
- B Plunger
- C Fixed Anvil Insert
- D Centering shoes

15 What is the name of the part marked as 'X'?



- A Stem
- B Plunger
- C Fixed Anvil Insert
- D Centering shoes

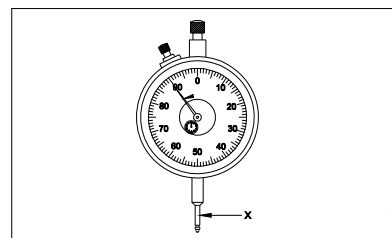
16 Which part actuates the movement of the dial for reading measurement of dial bore gauge?

- A Stem
- B Plunger
- C Fixed anvil
- D Centring shoe

17 Which instrument used to read the telescopic gauge measurement?

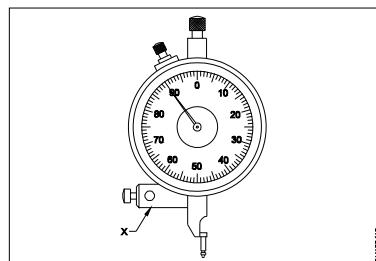
- A Depth micrometer
- B Inside micrometer
- C Outside micrometer
- D Three point internal micrometer

18 What is the name of the part marked as 'X'?



- A Anvil
- B Stem
- C Plunger
- D Pointer

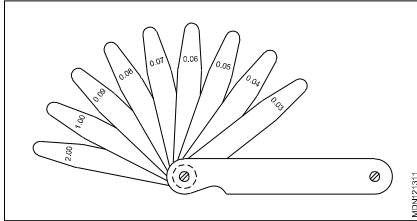
19 Name the part marked as 'X'.



- A Anvil
- B Clamp
- C Plunger
- D Stem

- 20 Which instrument is used to check the end-play of crank shaft?
- A Dial test indicator
 - B Telescopic gauge
 - C Bore dial gauge
 - D Slip gauge

- 21 What is the name of the gauge?



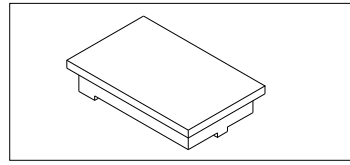
- A Feeler gauge
 - B Snap gauge
 - C Telescopic gauge
 - D Plug gauge
- 22 Which can be measured by feeler gauge?
- A Radius
 - B Screw pitch
 - C Surface roughness
 - D Gap between mating parts

- 23 Which marking media is used on the rough surfaces?
- A White wash
 - B Prussian blue
 - C Copper Sulphate
 - D Cellulose lacquer

- 24 Which marking media used to mark in the finished surfaces?
- A White wash
 - B Prussian blue
 - C Copper Sulphate
 - D Cellulose lacquer

- 25 Which marking media is poisonous?
- A White wash
 - B Prussian blue
 - C Copper sulphate
 - D Cellulose lacquer

- 26 What is the name of equipment?

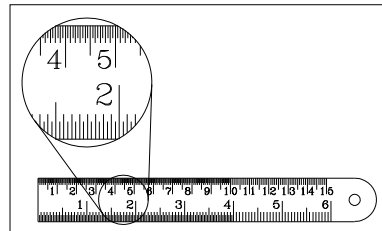


- A Surface plate
- B Angle plate
- C 'V' Block
- D Parallel Block

- 27 What is the basic unit of length as per SI unit?

- A Mm
- B Cm
- C Meter
- D Km

- 28 What is the least count of engineer steel rule?



- A 1 mm
- B 0.5 mm
- C 2 mm
- D 3 mm

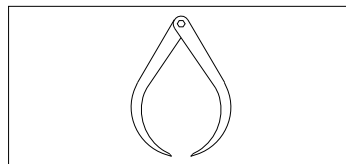
- 29 Which marking device used to scribe circle?

- A Jenny caliper
- B Inside caliper
- C Spring divider
- D Out side caliper

- 30 Which instrument is used to check the right angle?

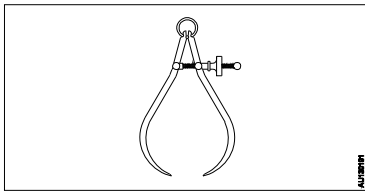
- A Steel rule
- B Try square
- C Firm joint caliper
- D Spring Joint caliper

- 31 What is the use of outside calliper?



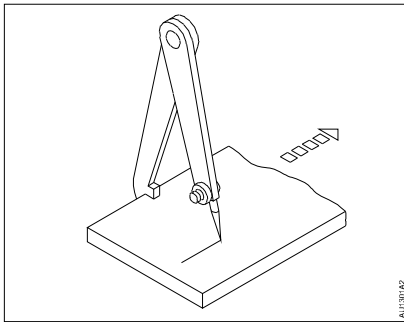
- A Check the flatness
- B Check the angle
- C Check the internal dia of the job
- D Check the external dia of the job

32 What is the name of the caliper?



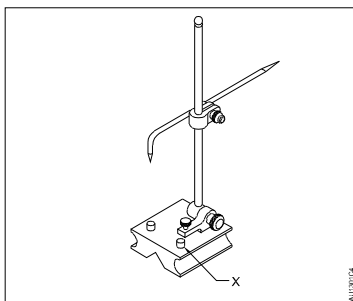
- A Inside caliper
- B Outside caliper
- C Firm joint caliper
- D Spring joint outside caliper

33 What is the name of calliper?



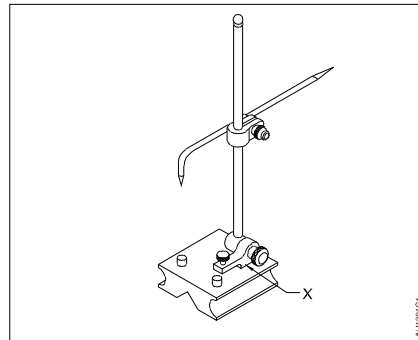
- A Firm joint caliper
- B Spring joint caliper
- C Inside caliper
- D Jenny caliper

34 Name the part marked as 'X'



- A Snug
- B Spindle
- C Guide pin
- D Rocker arm

35 Name the part marked 'X' in universal surface gauge?



- A Snug
- B Scriber
- C Rocker arm
- D Vee groove

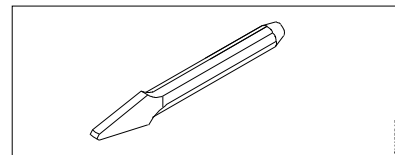
36 What is the point angle of centre punch?

- A 30°
- B 45°
- C 60°
- D 90°

37 What is the angle of prick punch?

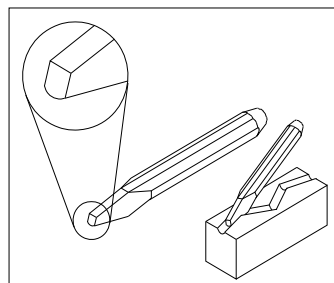
- A 60°
- B 90°
- C 120°
- D 180°

38 What is the name of the chisel?



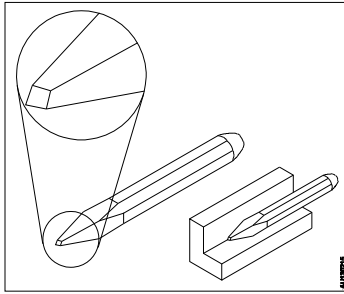
- A Flat chisel
- B Cross cut chisel
- C Half round nose chisel
- D Diamond point chisel

39 What is the name of the chisel?



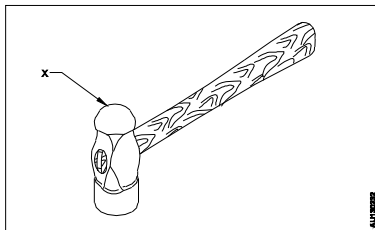
- A Flat chisel
- B Cross cut chisel
- C Half round nose chisel
- D Diamond point chisel

40 What is the name of the chisel?



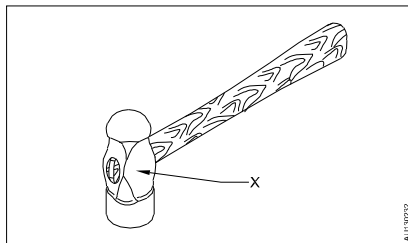
- A Flat chisel
- B Cross cut chisel
- C Half round nose chisel
- D Diamond point chisel

41 What is the name of part marked as 'X'?



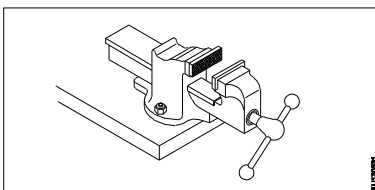
- A Face
- B Pein
- C Cheek
- D Eye hole

42 What is the name of the hammer part marked as 'X'?



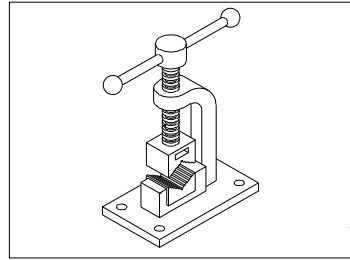
- A Cheek
- B Wedge
- C Face
- D Eye hole

43 What is the name of the device?



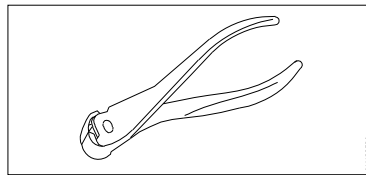
- A Pipe vice
- B Hand vice
- C Pin vice
- D Bench vice

44 What is the name of the vice?



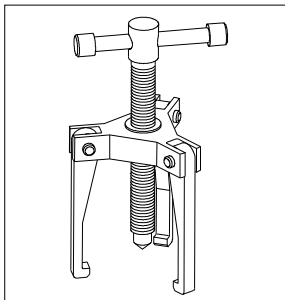
- A Pipe vice
- B Hand vice
- C Tool maker vice
- D Bench vice

45 What is the name of the plier?



- A Slip-joint plier
- B End cutting plier
- C Flat nose plier
- D Side cutting plier

46 What is the name of the tool?

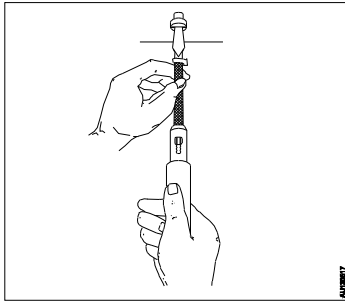


- A Jack
- B Puller
- C Wrench
- D Extractor

47 What is the working media of pneumatic tool?

- A Oil
- B Air
- C Water
- D Kerosene

48 What is the name of the screw driver?



- A Recess screw driver
- B Ratchet screw driver
- C Stumpy screw driver
- D Offset screw driver

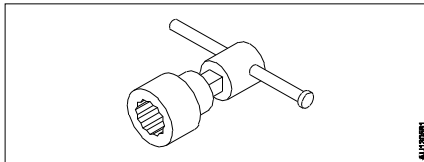
49 What is the material used to make Allen keys?

- A Cast iron
- B Aluminium alloy
- C High speed steel
- D Chrome vanadium steel

50 What is the use of a bench vice?

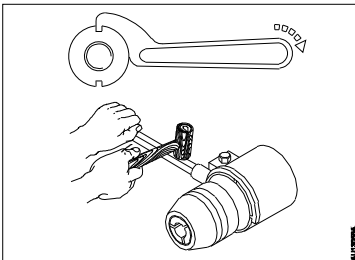
- A To hold a work piece
- B To hold a tool
- C To hold a work table
- D To hold a chuck

51 What is the name of the spanner?



- A Open spanner
- B Tubular spanner
- C Socket spanner
- D Ring spanner

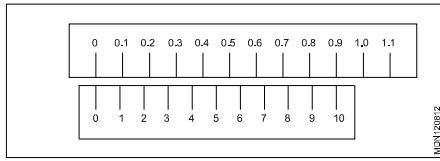
52 What is the name of the spanner?



- A Socket spanner
- B Tubular spanner
- C Hook spanner
- D Adjustable spanner

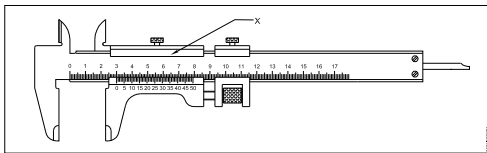
Questions Level 2

- 1 Calculate the value of 1 vernier scale in the figure.



- A 0.06 Units
- B 0.07 Units
- C 0.08 Units
- D 0.09 Units

- 2 What is the name of the part marked as 'X' in vernier caliper?



- A Beam
- B Lock screw
- C Sliding unit
- D Movable jaw

- 3 What is the least count of vernier caliper in metric system?

- A 0.1 mm
- B 0.01 mm
- C 0.02 mm
- D 0.001 mm

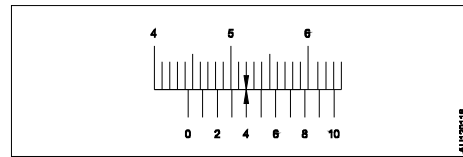
- 4 Which measuring instrument used to measuring inside, outside and depth of work piece?

- A Steel rule
- B Micrometer
- C Dial caliper
- D Vernier caliper

- 5 Which part of vernier caliper used to measure internal and external measurement?

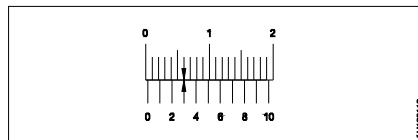
- A Beam
- B Sliding unit
- C Fixed jaw
- D Movable jaw

- 6 What is the reading of vernier caliper with the least count of 0.1 mm?



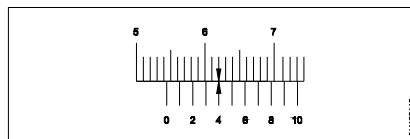
- A 44.8 mm
- B 44.4 mm
- C 44.6 mm
- D 45.2 mm

- 7 What is the reading of vernier caliper with the least count of 0.1 mm?



- A 0.03 mm
- B 0.3 mm
- C 0.003 mm
- D 1.03 mm

- 8 Name the part marked 'X' in vernier calliper.



- A 54.0
- B 54.2
- C 54.4
- D 55.4

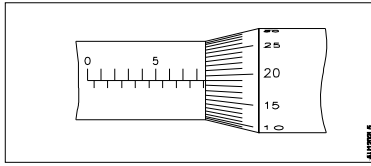
- 9 What is the smallest possible measurement that can be taken with the depth micrometer?

- A 0.01 mm
- B 0.02 mm
- C 0.001 mm
- D 0.002 mm

- 10 What is the measuring instrument used to measure diameter of a piston pin?

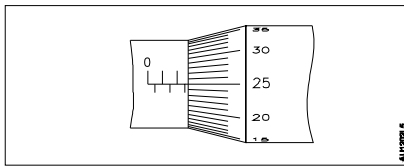
- A Depth micrometer
- B Inside micrometer
- C Outside micrometer
- D 3 point internal micrometer

- 11 What is the reading of the outside micrometer?



- A 8.20 mm
B 8.59 mm
C 8.69 mm
D 8.44 mm

- 12 What is the reading of the outside micrometer (0-25 mm)?



- A 2.25
B 2.50
C 2.75
D 20.75

- 13 Which instrument used to check inside size of slots?

- A Vernier caliper
B Outside micrometer
C Inside micrometer
D Telescopic gauge

- 14 What is to be checked with vacuum gauge?

- A Leak in the cooling system
B Leak in the air brake system
C Leak in the inlet-manifold system
D Leak in the hydraulic brake system

- 15 What is the Purpose of chisel?

- A Grinding
B Machining
C Reaming
D Chipping

- 16 Which chisel is used to remove metal from large flat surface?

- A Flat chisel
B Cross cut chisel
C Half round nose chisel
D Diamond point chisel

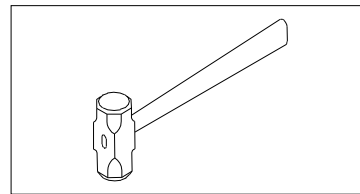
- 17 Which type of chisel used for squaring material at the corners?

- A Flat chisel
B Half round chisel
C Cross cut chisel
D Diamond point chisel

- 18 What is the purpose of the eye hole in an hammer?

- A Strike the job
B Fix the handle
C Reduce the weight
D Stamp the details

- 19 What is the use of lump hammer?



- A Strike the metal
B Punch the metal
C Spread the metal
D Light demolition work

- 20 What is the purpose of mallets?

- A Riveting operation
B Strike on soft metal
C Strike on hard metal
D Spread the metal to all sides

- 21 Which screw driver is used in the space limitation?

- A Cross-recess screw driver
B Ratchet screw driver
C Stumpy screw driver
D Offset screw driver

- 22 Which vice is used to hold a very small diameter job?

- A Pipe vice
B Hand vice
C Pin vice
D Tool maker's vice

Questions Level 3

- 1 Which condition the tyre pressure not to be checked?
- A Tyre is cold
 - B Tyre is carrying load
 - C Before start of journey
 - D Tyre is hot after long run
-

Module: 2 - Measuring, Marking and Practice - Key paper

Questions: Level 1

SL.No	Key
1	D
2	B
3	A
4	D
5	A
6	D
7	D
8	B
9	A
10	C
11	B
12	B
13	C
14	B
15	A
16	B
17	C
18	C
19	B
20	A
21	A
22	D
23	A
24	B
25	C
26	A
27	C
28	B
29	C
30	B
31	D
32	D
33	D
34	C
35	C
36	D
37	A
38	B

Questions: Level 2

SL.No	Key
39	C
40	D
41	B
42	A
43	D
44	A
45	B
46	B
47	B
48	B
49	D
50	A
51	C
52	C

SL.No	Key
1	D
2	C
3	C
4	D
5	D
6	B
7	B
8	C
9	A
10	C
11	C
12	C
13	D
14	C
15	D
16	A
17	D
18	B
19	D
20	B
21	C
22	C

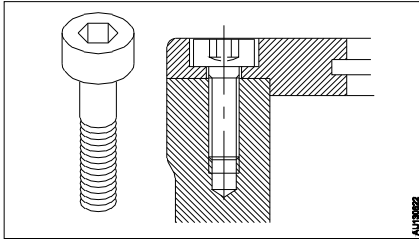
Question: Level 3

SL.No	Key
1	D

Mechanic Diesel - 1st Semester - Module 3 : Fastening and Fitting

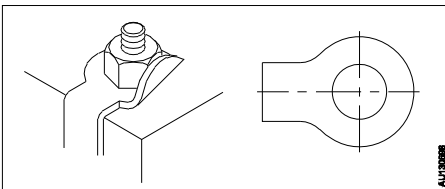
Questions: Level 1

1 What is the name of the screw?



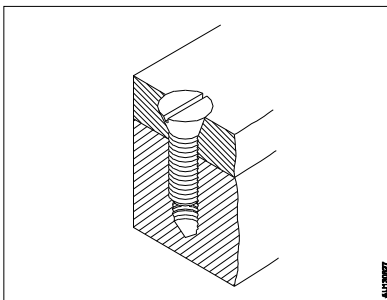
- A Hexagon head screw
- B Hexagon socket head cap screw
- C Square head counter sunk head screws
- D Thump screws

2 What is the name of the washer?



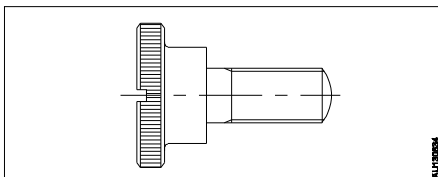
- A Plain washer
- B Tab washer
- C Spring washer
- D Tothed lock washer

3 What is the name of the screw?



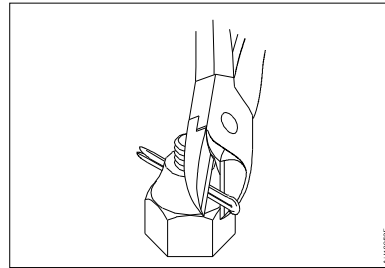
- A Grub screw
- B Thump screw
- C Hexagonal screw
- D Counter sink head scre

4 What is the name of the screw?



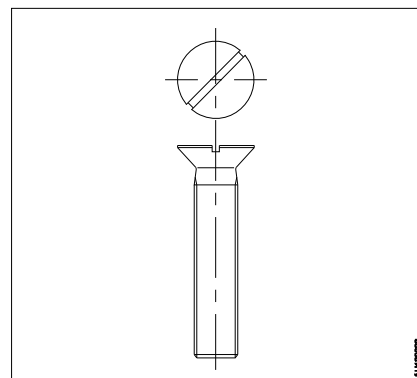
- A Set screw
- B Thump screw
- C Hexagonal screw
- D Grub screws

5 What is the name of the plier?



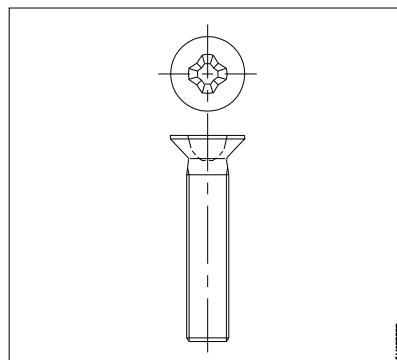
- A Side cutting plier
- B Nose plier
- C Circlip plier
- D end cutting plier

6 What is the name of the counter sink screw?



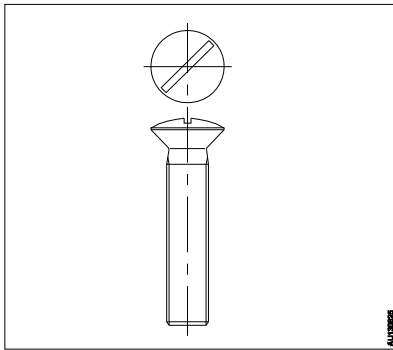
- A Slotted counter sink head screw
- B Slotted raised counter sink head screw
- C Cross-recessed counter sink head screw
- D Cross recessed raised counter sink head screw

7 What is the name of the counter sink screw?



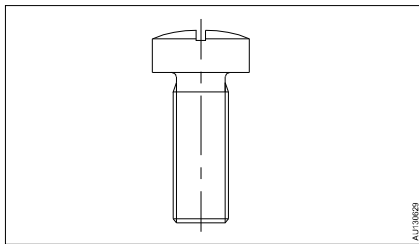
- A Slotted counter sink
- B cross-recessed counter sink head screw
- C Slotted raised counter sink
- D Cross recessed raised counter sink

8 What is the name of the counter sunk screw?



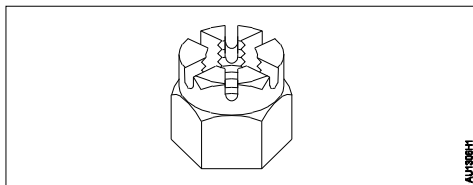
- A Slotted counter sunk screw
- B cross-recessed counter sunk head screw
- C Slotted raised counter sunk head screw
- D Cross recessed raised counter sunk head screw

9 What is the type of the machine screw head?



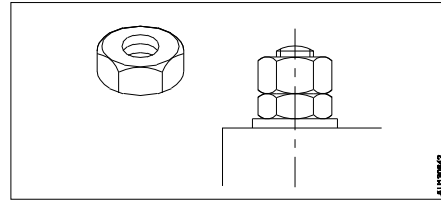
- A Pan head
- B Round head
- C Cheese head
- D Raised cheese head

10 What is the name of the nut?



- A Square nut
- B Lock nut
- C Castle nut
- D Self locking nut

11 What is the name of nut?

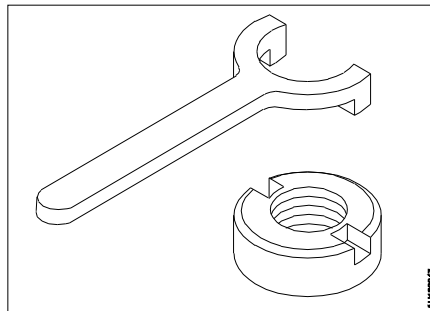


- A Lock nut
- B Castle nut
- C Square nut
- D Sloted round nut

12 Which nut is used for structural and machine tool construction?

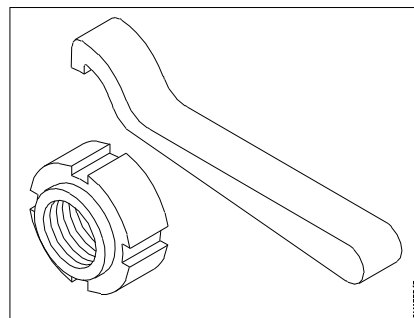
- A Square nut
- B Hexagonal nut
- C Wing nut
- D Castle nut

13 What is the name of the tool?



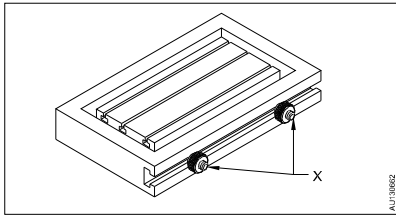
- A Face wrench
- B Hook wrench
- C Pin wrench
- D Face pin wrench

14 What is the name of the tool?



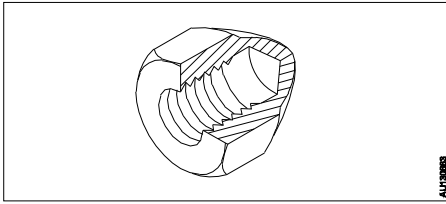
- A Face wrench
- B Hook wrench
- C Pin wrench
- D Face pin wrench

15 What is the name of the nut marked 'X'?



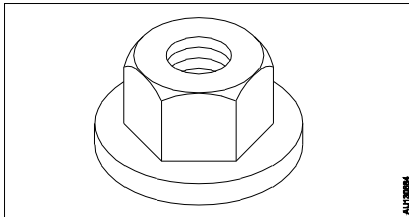
- A Chuck nut
- B Thumb Nut
- C Domed cap nut
- D Hexagonal nut with collar

16 What is the name of the nut?



- A Lock nut
- B Thumb nut
- C Domed cap nut
- D Hexagonal nut with collar

17 What is the name of the nut?

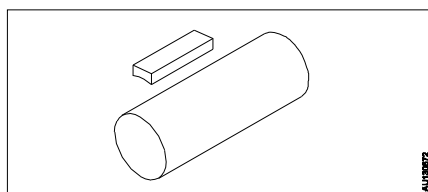


- A Thumb nut
- B Domed cap nut
- C Hexagonal nut with collar
- D chuck nut

18 Which type of nut required to align the axle shaft hole and slot of the nut for locking?

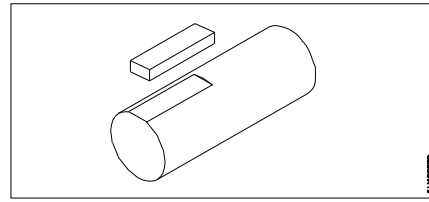
- A Castle nut
- B Chuck nut
- C Thumb nut
- D Self lock nut

19 What is the name of the key?



- A Hollow saddle key
- B Flat saddle key
- C Circular taper key
- D Parallel sunk key

20 What is the name of the key?

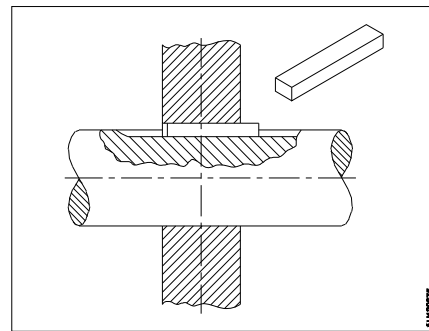


- A Hollow saddle key
- B Flat saddle key
- C Circular taper key
- D Parallel sunk key

21 Which type of locking device used on shaft and similar parts?

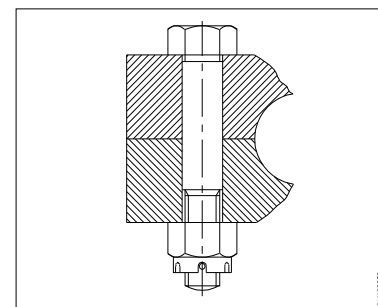
- A Split pin
- B Wire lock
- C Internal circlip
- D External circlip

22 Which type of the key used on the shaft and hub?



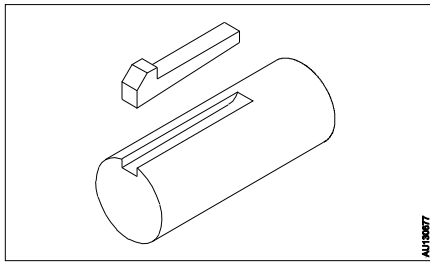
- A Hollow saddle key
- B Flat saddle key
- C Circular taper key
- D Parallel sunk key

23 What is the name of bolt?



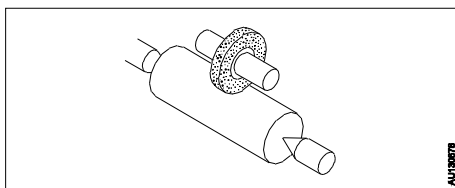
- A Anti fatigue bolt
- B Bolt with clearance hole
- C 'T' Bolt
- D Body fit bolt

24 What is the name of the key?



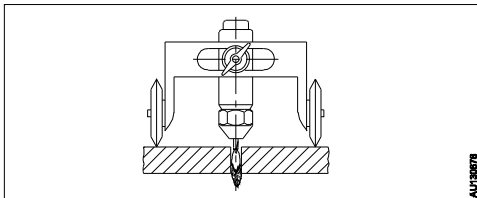
- A Circular taper key
- B Parallel sunk key
- C Gib-head key
- D Woodruff key

25 What is the method of the metal cutting operation?



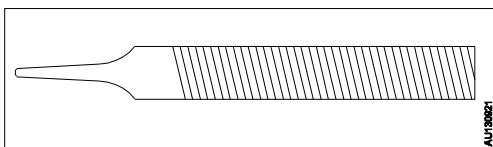
- A Abrasion
- B Fusion
- C Incision
- D Rough grinding

26 What is the method of metal cutting operation?



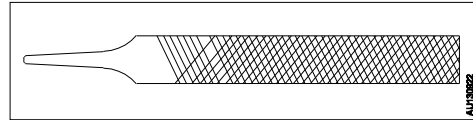
- A Abrasion
- B Fusion
- C Incision
- D Rough grinding

27 What is the name of the file?



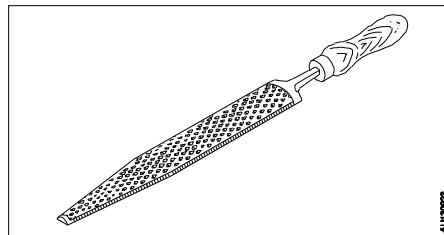
- A Single cut
- B Double cut
- C Rasp cut
- D Curved cut

28 What is the name of the file?



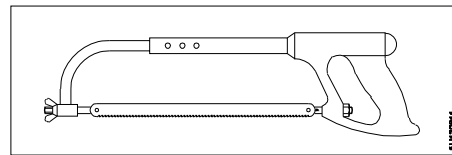
- A Single cut
- B Double cut
- C Rasp cut
- D Curved cut

29 What is the name of the file?



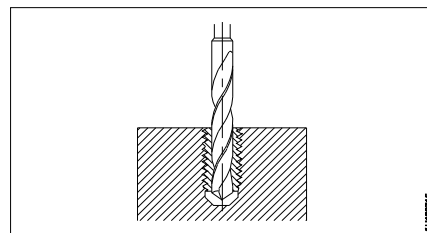
- A Single cut
- B Double cut
- C Rasp cut
- D Curved cut

30 What is the type of hacksaw frame?



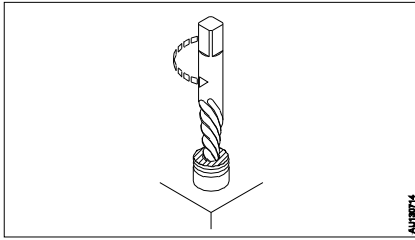
- A Deep cutting frame
- B Adjustable flat type frame
- C Adjustable tubular type frame
- D Solid frame

31 Name the method of removing broken stud?



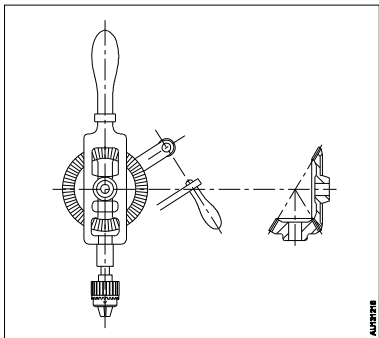
- A Prick punch method
- B Filling square form method
- C Making drill hole method
- D Ezy-out method

32 Name the method of removing broken stud?



- A Making drill hole method
- B Ezy-out method
- C Filling square form method
- D Prick punch method

33 What is the name of drilling machine?



- A Ratchet drilling machine
- B Bevel gear drilling machine
- C Pneumatic drilling machine
- D Breast drilling machine

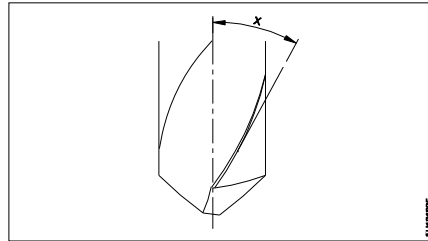
34 Which type of portable drilling machine have variable speed?

- A Breast hand drill
- B Heavy duty electric hand drill
- C Ratchet hand drill
- D Bevel gear hand drill

35 Which part of drill bit fits in to the slot of drilling machine spindle?

- A Body
- B Tang
- C Flute
- D Web

36 What is the name of the angle marked as 'x'?



- A Helix angle
- B Rake angle
- C Point angle
- D Clearance angle

37 What is the material of the hand tap?

- A Cast Iron
- B Low carbon steel
- C High speed steel
- D Stainless steel

-
- 15** What are the tools are used to remove the drills and sockets from the machine spindle?
- A** Screw driver and hammer
 - B** Spanner and hammer
 - C** Punch and hammer
 - D** Drift and hammer
-
- 16** Which angle helps in the penetration of the cutting edges in the material?
- A** Helix angle
 - B** Point angle
 - C** Clearance angle
 - D** Rake angle
-
- 17** Which tap in a set have 20° chamfer at its end?
- A** Intermediate tap
 - B** Taper tap
 - C** Plug tap
 - D** Second tap
-

Questions: Level 3

- 1** Why alternate teeth are staggered in hacksaw blade?
- A** For free cutting action
 - B** For curve cutting action
 - C** For coarse cutting action
 - D** For straight cutting action
-

Module 3 : Fastening and Fitting - Key paper

Questions: Level 1

SL.No	Key
1	B
2	B
3	D
4	B
5	A
6	A
7	B
8	C
9	A
10	C
11	A
12	B
13	A
14	B
15	B
16	C
17	C
18	A
19	A
20	B
21	D
22	D
23	D
24	C
25	A
26	B
27	A
28	B
29	C
30	C
31	C
32	B
33	B
34	B
35	B
36	B
37	C

Questions: Level 2

SL.No	Key
1	D
2	B
3	C
4	A
5	A
6	A
7	D
8	B
9	A
10	C
11	C
12	B
13	B
14	A
15	D
16	C
17	C

Question: Level 3

SL.No	Key
1	A

Mechanic Diesel - 1st Semester - Module 4 : Electrical and Electronics

Questions: Level 1

1 Which material resist the flow of electron?

- A Gold
- B Glass
- C Sliver
- D Copper

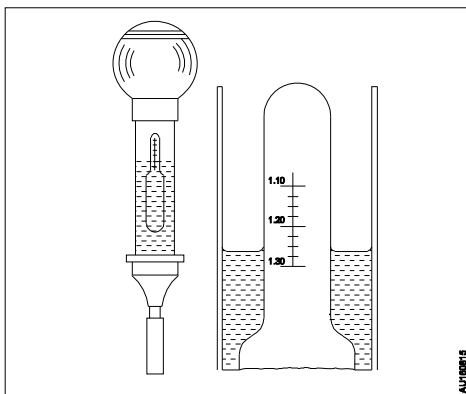
2 Which is measured by ammeter in an electrical circuit?

- A Power
- B Voltage
- C Current
- D Resistances

3 What is the unit of capacitance?

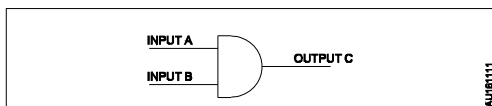
- A Ohm
- B voltage
- C farad
- D ampere

4 What is the name of the apparatus?



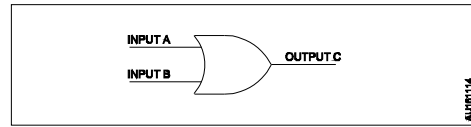
- A Hydrometer
- B Thermometer
- C Lactometer
- D Barometer

5 Name the logic gate shown in figure?



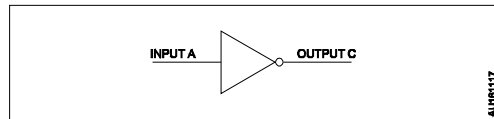
- A AND gate
- B OR gate
- C NOT gate
- D NAND gate

6 Name the logic gate shown in figure?



- A AND gate
- B OR gate
- C NOT gate
- D NAND gate

7 What is the name of the Symbol?

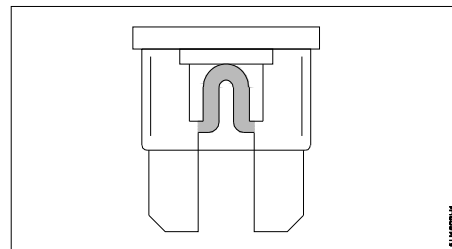


- A OR gate
- B AND gate
- C NOT gate
- D NAND gate

8 Which logic gate is called as "Inverter"?

- A OR gate
- B AND gate
- C NOT gate
- D NOR gate

9 What is the name of the electrical part?



- A Fuse
- B Plug
- C Bulb
- D Relay

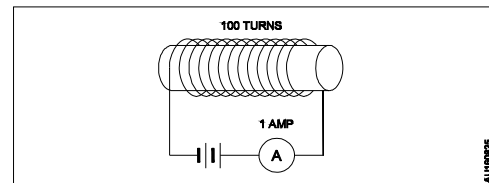
10 Which part is connected and complete the Horn circuit of the push button pressed?

- A Core
- B Tone disc
- C Horn points
- D Ground plate

- 11 What does number 25 in the cable size (25/0.012) indicate?
A Length of the strand
B Number of the strand
C Diameter of the strand
D Thickness of the cable
-
- 12 What is the purpose of colour code in cables?
A Colour refers the current rating
B Colour refers the voltage rating
C Easy identification of each circuit
D Refers the size of the wire
-
- 13 Which device have the ability to store electrical charge?
A Capacitor
B Resistor
C Insulator
D Conductor
-
- 14 What is the energy conversion of battery during discharge?
A Electrical energy into heat energy
B Chemical energy into electrical energy
C Electrical energy into chemical energy
D Electrical energy into mechanical energy
-
- 15 What is the energy conversion of battery during charging?
A Electrical energy into chemical energy
B Electrical energy into heat energy
C Chemical energy into electrical energy
D Electrical energy into mechanical energy
-
- 16 What is the material of positive plate in the lead acid battery?
A Tin
B Lead peroxide
C Antimony
D Spongy lead
-
- 17 Which acid is used in the lead acid battery?
A Nitric acid
B Sulphuric acid
C Hydro bromic acid
D Hydro chloric acid
-
- 18 What is the specific gravity of fully charged battery?
A 1.170 - 1.200
B 1.210 - 1.230
C 1.240 - 1.250
D 1.260 - 1.280

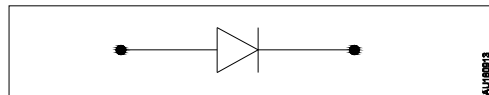
- 19 What type of emf is produced if the conductor moved and cut the magnetic field?
A Dynamically induced emf
B Statistically induced emf
C Electro-chemical induced emf
D Electro-magnetic induced emf

- 20 What is the effect of the soft Iron bar in a closed circuit?



- A** Shock effect
B Heating effect
C Magnetic effect
D Chemical effect

- 21 What is the name of the Electronic Symbol?



- A** Diode
B Switch
C Battery
D Transistor

- 22 Which electronic component is used as a solid state switch?

- A** Inductor
B Resistor
C Capacitor
D Transistor

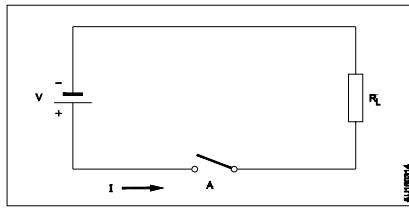
- 23 Which is a temperature sensitive resistor?

- A** Diode
B Thyristor
C Thermistor
D Transistor

- 24 What is the ampere hour rating of battery deliver 5 ampere and period of 20 hours?

- A** 80 Ampere hour
B 90 Ampere hour
C 100 Ampere hour
D 110 Ampere hour

25 What is the name of the circuit?



- A Open circuit
- B Short circuit
- C Closed circuit
- D Parallel circuit

26 What is the net resistance 'R' if 'R1' and 'R2' resistance are connected in series?

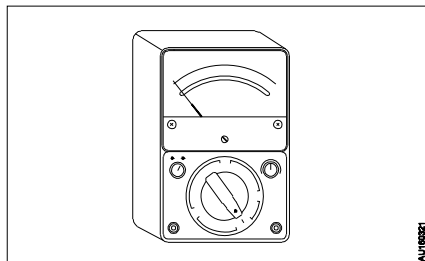
- A $R = R1 + R2$
- B $R = R1 - R2$
- C $R = R1 \times R2$
- D $R = R1/R2$

27 What is the name of electrical symbol?



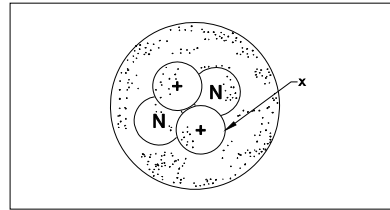
- A Cell
- B Battery
- C Earth
- D Resistance

28 What is the name of the electrical measuring instrument?



- A Ammeter
- B Voltmeter
- C Wattmeter
- D Multimeter

29 What is the name of the part marked 'X' in nucleus?



- A Atom
- B Proton
- C Neutron
- D Electron

30 Which is the semi conductor material?

- A Iron
- B Gold
- C Silicon
- D Carbon

31 Which component is made by semiconductor material?

- A Switch
- B Resistor
- C Capacitor
- D Transistor

32 What is the name of central part of an atom?

- A Proton
- B Electron
- C Neutron
- D Nucleus

33 How the flow of Electron is called

- A Current
- B Power
- C Voltage
- D Resistance

34 Which Law state that "The current indirectly propotional to the voltage and inversely propotional to the resistance"

- A Ohm's Law
- B Hook's Law
- C Boyle's Law
- D Newton's Law

Questions: Level 2

- 1 Which electrical measuring instruments is fitted on the vehicle panel board?
- A Ammeter
 - B Voltmeter
 - C Wattmeter
 - D Ohm meter
-
- 2 Which circuit the ballast resistor is used?
- A Horn circuit
 - B Wiper circuit
 - C Flasher circuit
 - D Head lamp circuit
-
- 3 What type of resistor is used in the vehicle flasher unit?
- A Ballast resistor
 - B Film resistor
 - C Printed resistor
 - D Integrated resistor
-
- 4 What is the advantage of free maintenance sealed battery?
- A No need for check and top up distilled water
 - B No need for recharging of battery
 - C No chance for sulphation of battery terminals
 - D No need for disconnect the terminals to remove battery
-
- 5 How the battery capacity is expressed?
- A Ampere - hour rating
 - B Voltage - hour rating
 - C Ampere rating
 - D Voltage rating
-
- 6 Which is the semi conductor materials?
- A Arsenic and boron
 - B Gallium and indium
 - C Germanium and silicon
 - D Aluminium and antimony
-

Module 4 : Electrical and Electronics - Key paper

Questions: Level 1

SL.No	Key
1	B
2	C
3	C
4	A
5	A
6	B
7	C
8	C
9	A
10	D
11	A
12	C
13	A
14	B
15	A
16	B
17	B
18	D
19	A
20	C
21	A
22	D
23	C
24	C
25	A
26	A
27	B
28	D
29	B
30	C
31	D
32	D
33	A
34	A

Questions: Level 2

SL.No	Key
1	A
2	C
3	A
4	A
5	A
6	C

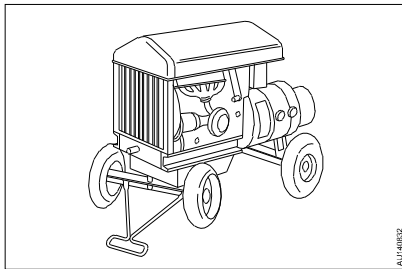
Mechanic Diesel - 1st Semester - Module 5 : Arc and Gas Welding

Questions: Level 1

1 What is the Quenching media of normalising?

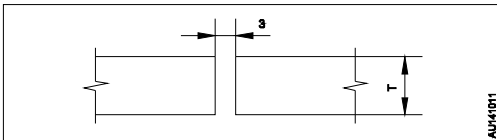
- A Water spray
- B Open air
- C Oil bath
- D Water bath

2 What is the name of welding device?



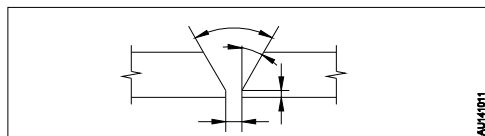
- A Motor generator
- B Engine generator
- C Regulator
- D Alternator

3 What is the name of edge preparation and setup in welding process?



- A Square butt
- B Flange butt
- C Lap butt
- D Corner butt

4 What is the name of edge preparation method used in welding process?



- A Single 'V' Butt
- B Soldering
- C Riveting
- D Brazing

5 Which type of physical transformation takes place during arc welding process?

- A Colour transfer
- B Metal transfer
- C Current transfer
- D Heat transfer

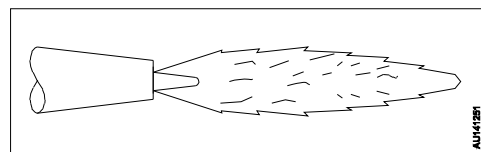
6 What is the colour of acetylene gas cylinder?

- A Red
- B Maroon
- C Black
- D Peacock blue

7 What is the colour of oxygen gas cylinder?

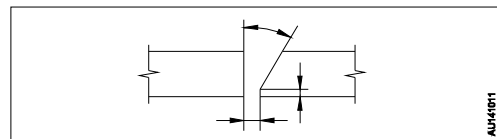
- A Red
- B Maroon
- C Black
- D Peacock blue

8 What is the name of oxy- acetylene gas flame?



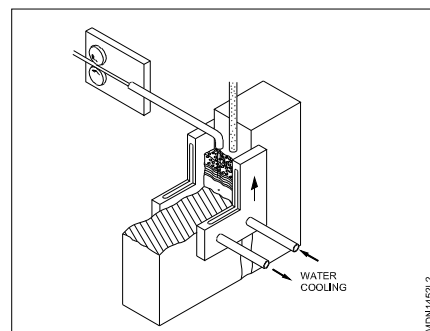
- A Arc flame
- B Neutral flame
- C Carburising flame
- D Oxidising flame

9 What is the name of the weld joint?



- A Double 'V' butt
- B Double 'U' butt
- C Single bevel butt
- D Double j butt

10 Name the welding process?



- A Plasma arc welding
- B Electro - slag welding
- C Gas metal arc welding
- D Submerged arc welding

11 What is the dia of medium coated MS electrode used in fillet weld lap joint with 110/120 Amps welding current?

- A 1.0 mm
- B 1.5 mm
- C 2.5 mm
- D 3.15 mm

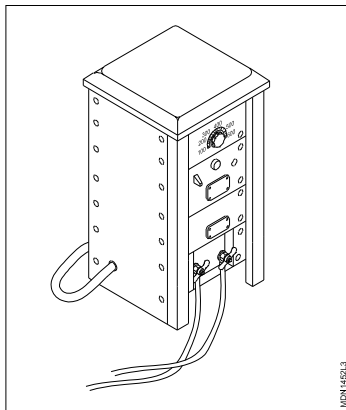
12 What is the electrode angle with weld line?

- A 70° to 80°
- B 50° to 60°
- C 45° to 50°
- D 35° to 40°

13 Which is protecting the eyes from harmful rays of the electric arc welding?

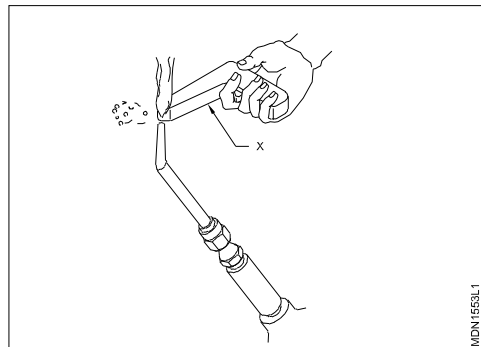
- A Helmet
- B Lather apron
- C Lather gloves
- D Welding helmet screen

14 What is the name of equipment?



- A Motor generator set
- B Engine generator set
- C DC generator machine
- D Alternating current welding machine

15 What is the name of part marked as 'X'?



- A Regulator
- B Blow pipe
- C Spark lighter
- D None - return disc

16 Which solution is used for acetylene gas connection leakage test?

- A Kerosene
- B Naked fire
- C Soap water
- D Fresh water

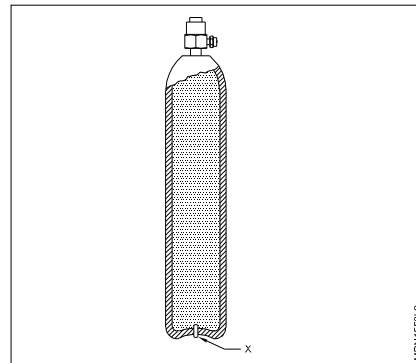
17 What is the colour of hose carrying oxygen?

- A Red
- B Black
- C Maroon
- D Peacock blue

18 What is the colour of hose carrying acetylene?

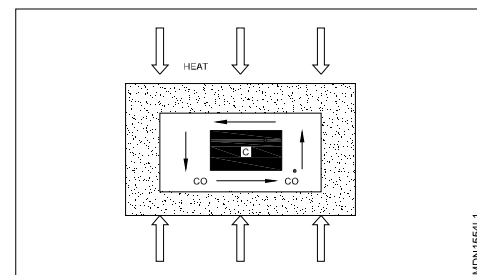
- A Red
- B Black
- C Maroon
- D Peacock blue

19 What is the name of part marked as 'X'?



- A Safety plug
- B Valve socket
- C Valve spindle
- D Dissolved acetylene

20 What is the name of process?



- A Annealing
- B Carburising
- C Normalising
- D Case hardening

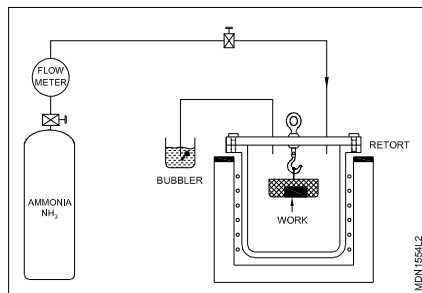
21 Which type of hardening used eddy current in the metal bar?

- A Flame hardening
- B Nitriding hardening
- C Induction hardening
- D Annealing hardening

22 Which type of hardening used for cam shaft production?

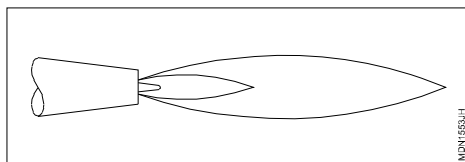
- A Annealing
- B Carburising
- C Normalising
- D Induction hardening

23 What is the name of process?



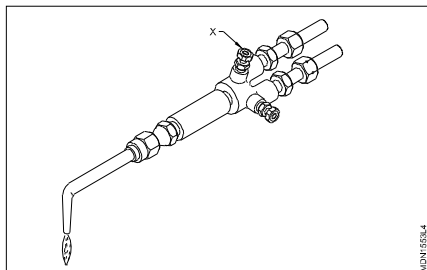
- A Nitriding
- B Annealing
- C Carburising
- D Induction hardening

24 What is the name of gas flame?



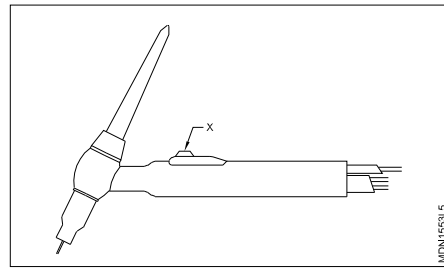
- A Neutral flame
- B Starting flame
- C Oxidising flame
- D Carburising flame

25 What is the name of part marked as 'X'?



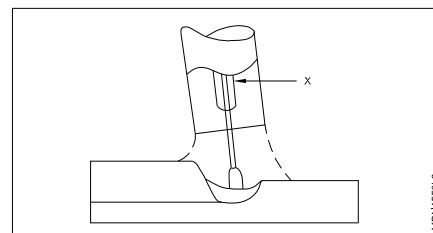
- A Nozzle
- B Handle
- C Oxygen control valve
- D Acetylene control valve

26 What is the name of part marked as 'X'?



- A Switch
- B Ceramic nozzle
- C Welding current
- D Tungsten electrode

27 What is the name of part marked as 'X'?



- A Pilot arc
- B Electrode
- C Weld pool
- D Contact tube

Questions: Level 2

1 Which one is the heat treatment process?

- A Casting
- B Machining
- C Welding
- D Annealing

2 Which quenching media applied in the flame hardening process?

- A Still air
- B Oil bath
- C Brine solution bath
- D Water spray

3 What is the purpose of hardening?

- A Increase ductility
- B Increase malleability
- C Increase strength
- D Increase brittleness

4 What is the purpose of annealing?

- A Improve hardness
- B Improve machinability
- C Improve brittleness
- D Improve weldability

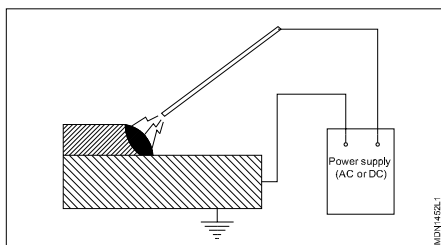
5 What is the advantage of AC arc welding machine?

- A More initial cost
- B Freedom from arc blow
- C More maintenance cost
- D Un suitable for non ferrous metal

6 What is the advantage of using rectifier set in arc welding machine?

- A Suitable for all ferrous and non-ferrous
- B Initial cost is higher
- C Maintenance cost is more
- D Special safety precaution required

7 What is the name of welding process?



- A Arc welding
 - B Carbon arc welding
 - C Plasma arc welding
 - D Submerged arc welding
-

8 Which machine can be used any where in the field for welding away from electric main supply?

- A Motor generator set
- B Engine generator set
- C AC arc welding machine
- D AC welding transformer with a rectifier

9 Which one of the following metals cannot be welded by AC welding machine?

- A Brass
- B Cast iron
- C Mild steel
- D High carbon steel

10 Which is the safety method for carry the oxy-acetylene gas cylinders?

- A Rolling
- B Sliding
- C Dragging
- D Use a trolley

11 Which is the stage of heat treatment process?

- A Cooling the metal
- B Heating the metal slowly
- C Hold at a given temperature
- D Heat and cool the metal as soon as possible

12 What is the importance of case hardening?

- A To increase softness
 - B To withstand wear resistance
 - C To withstand heavy load
 - D To decrease the brittleness
-

Questions: Level 3

- 1 Which valve to be closed first while gas flame snaps out and back fire?
- A Oxygen valve in cylinder
 - B Oxygen valve at blow pipe
 - C Acetylene valve in cylinder
 - D Acetylene valve at blow pipe
-
- 2 Which gas cutting process is suitable for all position, location and under water?
- A Gas cutting
 - B Plasma cutting
 - C Manual cutting
 - D Machine cutting
-

Module 5 : Arc and Gas Welding - Key paper

Questions: Level 1

SL.No	Key
1	B
2	B
3	A
4	A
5	B
6	B
7	C
8	B
9	C
10	D
11	D
12	A
13	D
14	D
15	C
16	C
17	B
18	C
19	A
20	B
21	C
22	D
23	A
24	D
25	C
26	A
27	D

Questions: Level 2

SL.No	Key
1	D
2	D
3	C
4	B
5	B
6	A
7	B
8	B
9	A
10	D
11	B
12	B

Question: Level 3

SL.No	Key
1	B
2	B

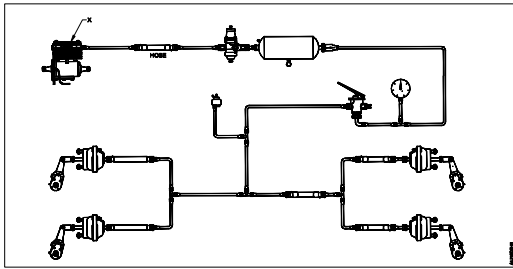
Mechanic Diesel 1st Semester - Module 6 : Hydraulics and Pneumatics

Questions: Level 1

1 Which device is used in hydraulic brake system?

- A Air tank
- B Master cylinder
- C Pressure gauge
- D Un loader cylinder

2 What is the name of the part marked as 'X'?



- A Air tank
- B Air pressure gauge
- C Brake valve
- D Compressor

3 Which type of pump used in the hydraulic jack?

- A Gear pump
- B Plunger pump
- C Vane pump
- D Internal gear pump

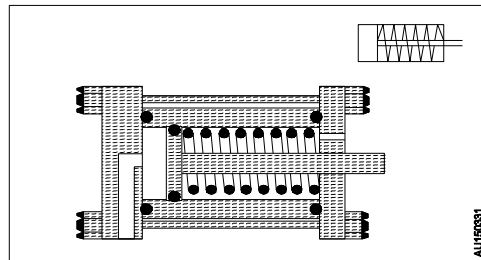
4 Which device converts mechanical into pneumatic energy?

- A Actuator
- B Generator
- C Alternation
- D Compressor

5 Which device converts hydraulic energy into mechanical energy?

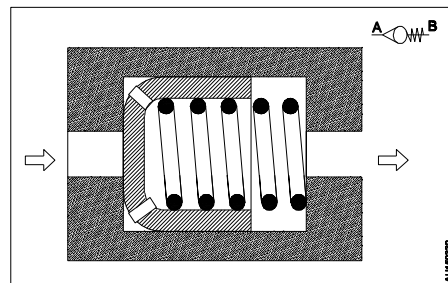
- A Actuator
- B Regulator
- C Compressor
- D Control Valve

6 What is the name of the hydraulics cylinder?



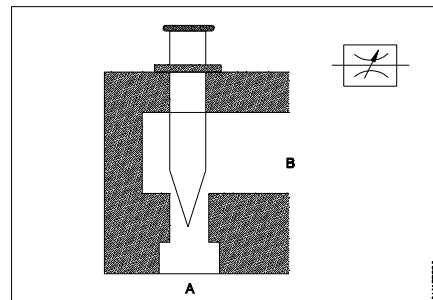
- A Double rod cylinder
- B Double acting cylinder
- C Single acting cylinder
- D Rotary acting cylinder

7 What is the name of the valve?



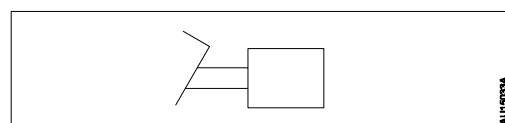
- A Pressure relief valve
- B Bypass valve
- C Check valve
- D Inlet valve

8 What is the name of the valve?



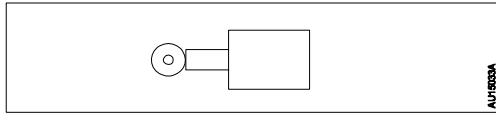
- A Check valve
- B Choke valve
- C Throttle valve
- D Pressure relief valve

9 What is the name of the manual symbol?



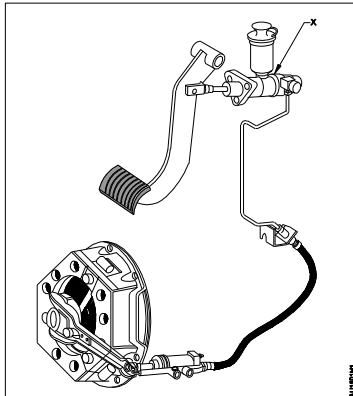
- A Rollar operated
- B Foot pedal
- C Push Button
- D General button

10 What is the name of the mechanical symbol?



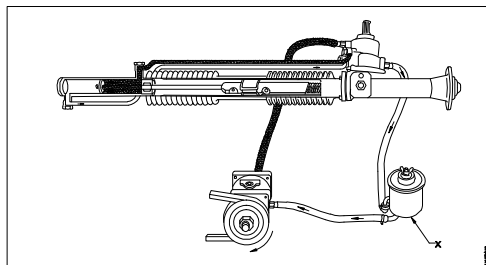
- A Plunger
- B Push button
- C Rollar
- D Foot Pedal

11 What is the name of the part marked as 'X'?



- A Slave cylinder
- B Master cylinder
- C Air cylinder
- D Wheel cylinder

12 What is the name of the part marked as 'X'?

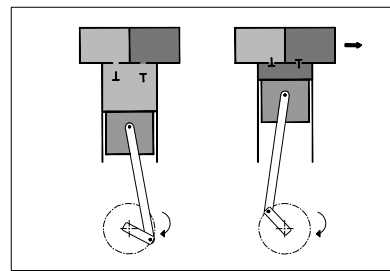


- A Steering gear
- B Piston rod
- C Pressure line
- D Fluid reservoir

13 Which is the power source of the pneumatic system?

- A Actuator
- B Control value
- C Air Compressor
- D Air Service unit

14 What is the type of the compressor?



- A Gear type
- B Vane type
- C Rotary type
- D Reciprocating type

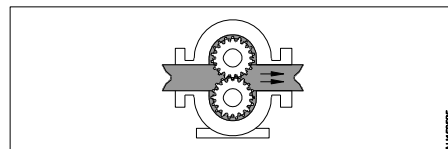
15 Which law is applied in hydraulic brake system?

- A Boyle's law
- B Charles law
- C Pascal's law
- D Newton's law

16 Which act as a seal in the external gear pump?

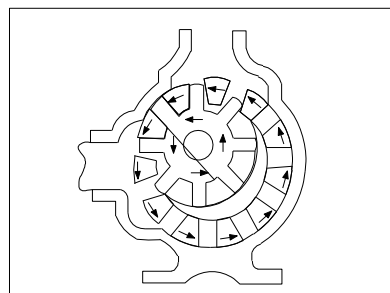
- A Housing
- B Drive gear
- C Driver gear
- D Gear meshing

17 What is the name of drive pump?



- A Van pump
- B Plunger pump
- C Internal gear drive pump
- D External gear drive pump

18 What is the name of pump?

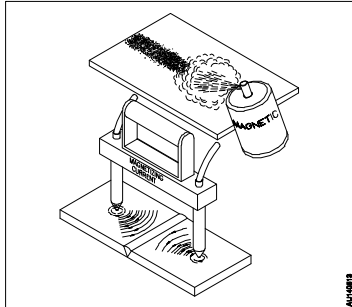


- A Rotor Pump
- B Plunger pump
- C Internal gear pump
- D External gear pump

19 Which type of clutch system used in the slave cylinder?

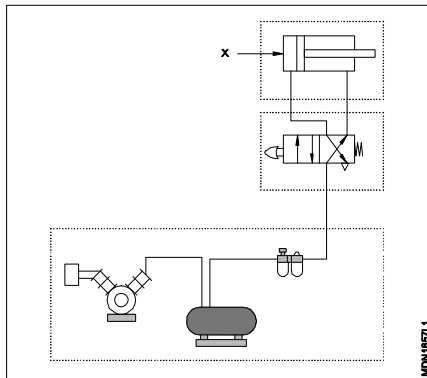
- A Vacuum clutch
- B Hydraulic clutch
- C Over running clutch
- D Electro magnetic clutch

20 What is the name of NDT method?



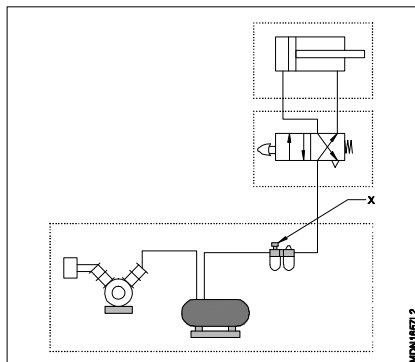
- A Ultrasonic test
- B Eddy current test
- C Magnetic particle test
- D Radio graphic test

21 What is the name of pneumatic component marked as 'X'?



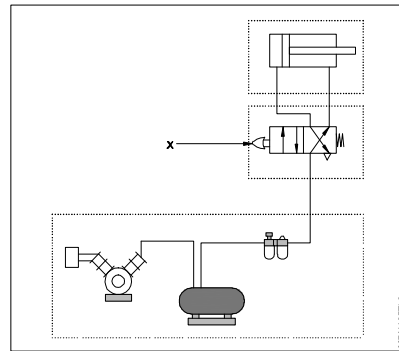
- A Actuator
- B Compressor
- C Control valve
- D Reservoir tank

22 Name the pneumatic component marked as 'X'?



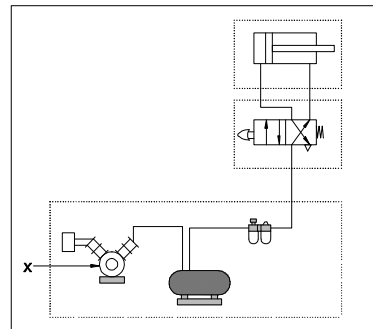
- A FRL
- B Actuator
- C Compressor
- D Reservoir tank

23 Name the pneumatic component marked as 'X'?



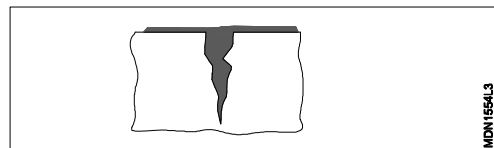
- A Actuator
- B Compressor
- C Control valve
- D Reservoir tank

24 Name the pneumatic component marked as 'X'?



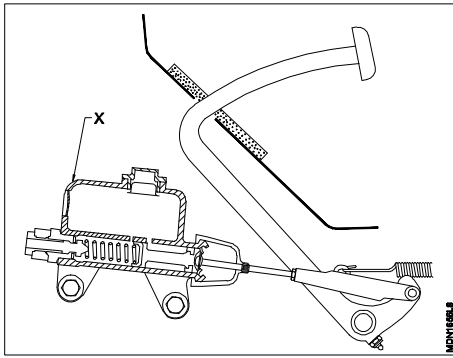
- A Actuator
- B Compressor
- C Control valve
- D Reservoir tank

25 What is the name of NDT method?



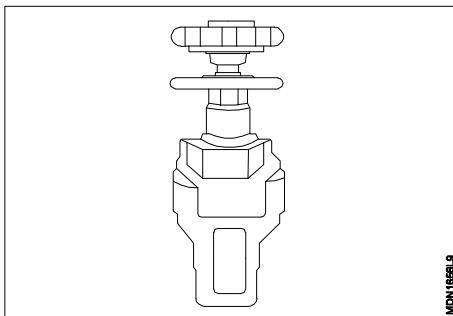
- A Ultra sonic testing
- B Radiographic testing
- C Liquid penetrate testing
- D Electro magnetic yoke testing

26 What is the name of part marked as 'X'?



- A Pedal
- B Return spring
- C Wheel cylinder
- D Master cylinder

27 What is the name of valve?



- A Non return valve
- B Flow control valve
- C 4/2 normally open
- D Pressure relief valve

Questions: Level 2

- 1 What the function of brake valve in the pneumatic brake system?
- A Allow the air pressure to the system
 - B Release the air to the atmosphere
 - C Maintain air pressure in the tank
 - D Allow air pressure to pressure gauge
-
- 2 What is the direction of rotation of driven gear meshing in the external driving gear?
- A Same direction
 - B Inclined direction
 - C Opposite direction
 - D Perpendicular direction
-
- 3 Which part in the internal gear pump act as seal?
- A Gears
 - B Gasket
 - C Sealing ring
 - D Crescent-shaped spacer
-
- 4 Which type of NDT method used ferrous particles are applied to the area between the poles?
- A Ultra sonic testing
 - B Radiographic testing
 - C Liquid penetrate testing
 - D Electro magnetic yoke testing
-

Module 6 : Hydraulics and Pneumatics - Key paper

Questions: Level 1

SL.No	Key
1	B
2	D
3	B
4	D
5	A
6	C
7	C
8	C
9	B
10	C
11	B
12	D
13	C
14	D
15	C
16	D
17	D
18	C
19	B
20	C
21	A
22	A
23	C
24	B
25	C
26	D
27	D

Questions: Level 2

SL.No	Key
1	A
2	C
3	D
4	D

**Mechanic Diesel - 1st Semester -
Module: 7 Specification and Service Equipments**

Questions: Level 1

- 1 When did first car rolled out in the street of calcutta?
A 1810
B 1887
C 1910
D 1950

- 2 Which year Hindustan motor established Ambassador car industry in India?
A 1900
B 1920
C 1940
D 1980

- 3 When did maruti car launched in India?
A 1920
B 1940
C 1983
D 1990

- 4 What is indicate 2498 CC in vehicle specification?
A Engine capacity
B Full tank capacity
C Single bore capacity
D Master cylinder capacity

- 5 What is the term for 2 WD in vehicle specification?
A Two wheel drive
B Four wheel drive
C Rear wheel drive
D Front wheel drive

- 6 Which increasing the torque in the steering system?
A Drop arm
B Gear box
C Fluid plump
D Knuckle arm

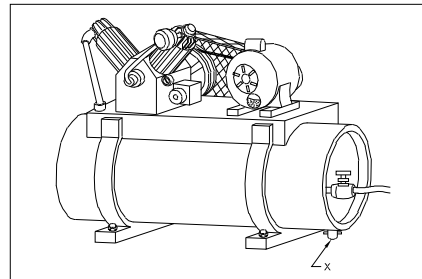
- 7 What is the information given by 6J x 15?
A Rim size
B Tyre size
C Engine size
D Vehicle size

- 8 Which is the digit indicate the engine type in the groups of VDC 17 digit of VIN number?
A 2
B 3
C 5
D 8

- 9 What is indicate 12 - 17 digit in 17 digit VIN number?
A Body type
B Vehicle type
C Serial number
D Plant of product

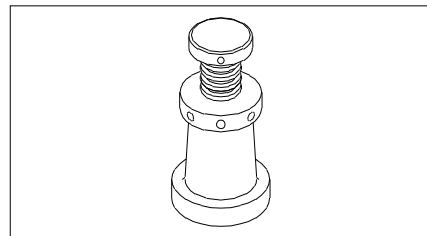
- 10 Which is the Ministry of India regulate the motor vehicle activities?
A Minister of finance
B Minister of defence
C Minister of rural and development
D Minister of road transport and highways

- 11 What is the name of part marked as 'X'?



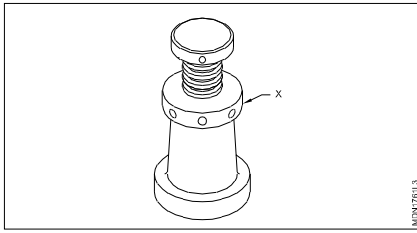
- A** Belt
B Cock
C Motor
D Drain plug

- 12 What is the name of equipment?



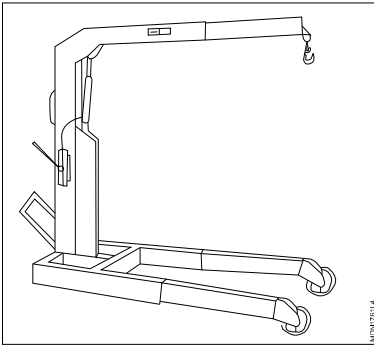
- A** Jack stand
B Hydraulic Jack
C Mechanical Jack
D Hydraulic car hoist

13 What is the name of part marked as 'X'?



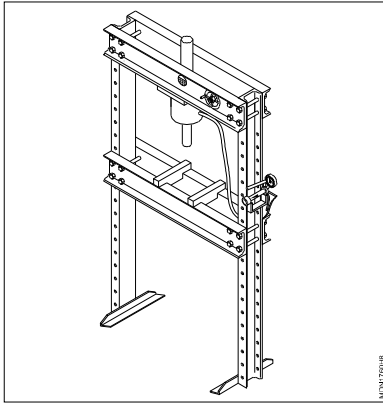
- A Split pin
- B Top plate
- C Centre rod
- D Revolving disc

14 What is the name of the equipment?



- A Car hoist
- B Engine hoist
- C Hydraulic jack
- D Hydraulic press

15 What is the name of the equipment?



- A Car hoist
- B Grease gun
- C Hydraulic jack
- D Hydraulic press

Questions: Level 2

- 1 Which type of vehicle capable of sensing its environment and navigating without human input?
- A Diesel car
 - B Petrol car
 - C Electric car
 - D Driver less car
-
- 2 Which type of service equipment used to hold the lifted vehicle for a long period?
- A Hoist
 - B Jack stand
 - C Arbor press
 - D Hydraulic jack
-
- 3 Which type service equipment used in car service station to lift the car?
- A Arbor press
 - B Hydraulic jack
 - C Hydraulic hoist
 - D Hydraulic press
-
- 4 Which is used for quick inspection under the chassis of a car?
- A Stands
 - B Screw jack
 - C Trolley jack
 - D Two post hoist
-

Module 7 : Specification and Service Equipments - Key paper

Questions: Level 1

SL.No	Key
1	B
2	C
3	C
4	A
5	A
6	B
7	A
8	D
9	C
10	D
11	D
12	C
13	D
14	B
15	D

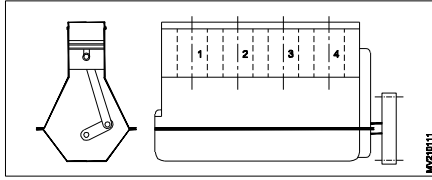
Questions: Level 2

SL.No	Key
1	D
2	A
3	C
4	C

Mechanic Diesel 2nd Semester - Module 1 : Diesel Engine Overview

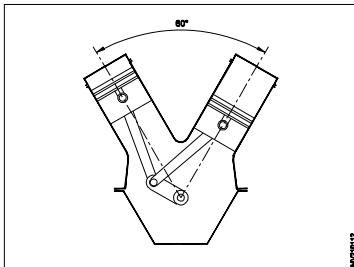
Questions: Level 1

1 What is the type of engine?



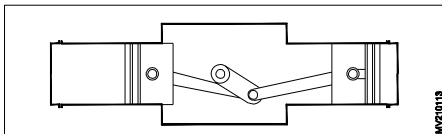
- A In-line engine
- B V engine
- C Opposed engine
- D Radial engine

2 What is the type of engine?



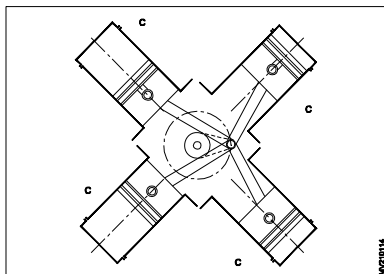
- A In line engine
- B 'V' engine
- C Opposed engine
- D Radial engine

3 What is the type of engine?



- A Inline engine
- B 'V' engine
- C Opposed engine
- D Radial engine

4 What is the type of engine?



- A Inline engine
- B 'V' engine
- C Opposed engine
- D Radial engine

5 What is called the distance between TDC to BDC?

- A Stroke
- B Cycle
- C Power
- D Torque

6 What is the formula for BHP?

- A $\frac{2\pi NT}{4500}$
- B $\frac{4\pi NT}{4500}$
- C $\frac{6\pi NT}{4500}$
- D $\frac{8\pi NT}{4500}$

7 What is the formula for IHP?

- A $\frac{PLAN}{4500} k$
- B $\frac{VLAN}{4500} k$
- C $\frac{AVLAN}{4500} k$
- D $\frac{PVLN}{4500} k$

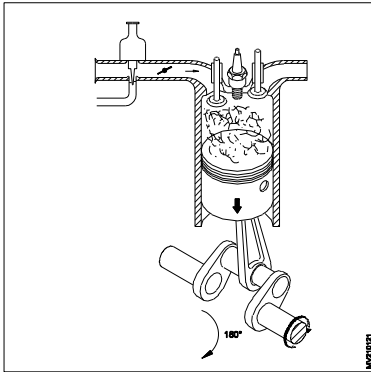
8 What is the formula for compression ratio?

- A $\frac{VS + VC}{VC}$
- B $\frac{VS + VC}{VS}$
- C $\frac{VC}{VS + VC}$
- D $\frac{VS}{VS + VC}$

9 What is the formula for mechanical efficiency?

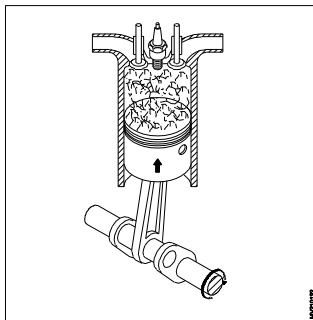
- A $\frac{BHP}{IHP} \times 100$
- B $\frac{IHP}{BHP} \times 100$
- C $\frac{BHP - IHP}{BHP} \times 100$
- D $\frac{IHP - BHP}{IHP} \times 100$

10 What is the name of the stroke?



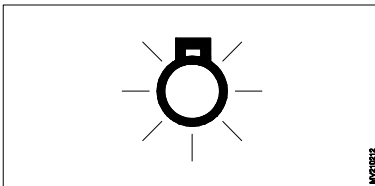
- A Compression stroke
- B Power stroke
- C Suction stroke
- D Exhaust stroke

11 What is the name of the stroke?



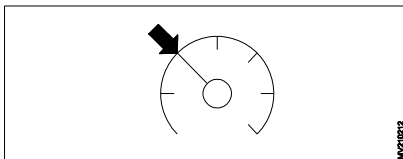
- A Suction stroke
- B Compression stroke
- C Power stroke
- D Exhaust stroke

12 What is the name of the indicator?



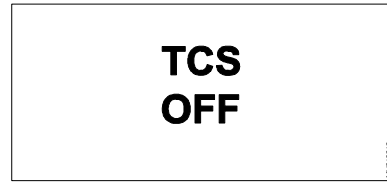
- A Dead bulb
- B Cruise control
- C Traction control
- D Stability control

13 What is the name of the indicator?



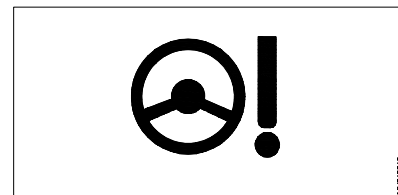
- A Dead bulb
- B Cruise control
- C Traction control
- D Stability control

14 What is the name of the indicator?



- A Dead bulb
- B Cruise control
- C Traction control
- D Stability control

15 What is the name of the indicator?



- A Centre differential lock
- B Proximity sensor
- C Economy mode
- D Electric power steering

16 What is the name of the indicator?



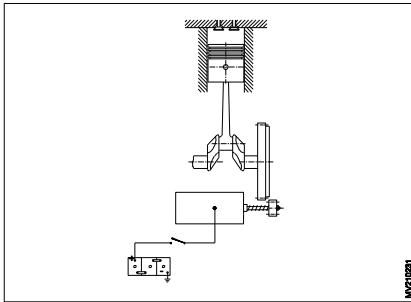
- A Seat belt indicator
- B Air bag indicator
- C Brake indicator
- D ABS indicator

17 What is the name of the indicator?



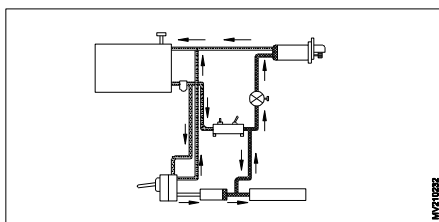
- A Seat belt
- B Air bag
- C Brake
- D ABS

18 What is the name of the starting system?



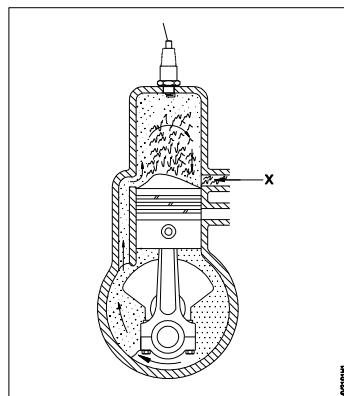
- A Compressed air cranking
- B Hydraulic cranking
- C Electric motor cranking
- D Gasoline engine starting

19 What is the name of the starting system?



- A Compressed air cranking
- B Hydraulic cranking
- C Electric motor cranking
- D Gasoline engine cranking

20 What is the name marked as 'x'?



- A Intake port
- B Exhaust port
- C Transfer port
- D Injection port

Questions Level 2

1 Which is the engine having cylinders at 60°?

- A Inline
- B 'V' engine
- C Opposed engine
- D Radial engine

2 Which is the engine having cylinders in 90° each of 4 cylinders?

- A Inline engine
- B 'V' engine
- C Opposed engine
- D Radial engine

3 Which is the engine most preferred in aeroplanes?

- A Inline engine
- B 'V' engine
- C Opposed engine
- D Radial engine

4 Which type of engine has more engine speed and more combustion pressure?

- A Radial engine
- B 'V' engine
- C Opposed engine
- D Inline engine

5 Which engine is more economical and compact?

- A Radial engine
- B Opposed engine
- C 'V' engine
- D Inline engine

6 Which is the high fuel efficient engine?

- A Opposed engine
- B 'V' engine
- C Radial engine
- D Inline engine

7 Which is the engine also called as constant pressure cycle engine?

- A Otto cycle
- B Diesel cycle
- C Dual cycle
- D Rankave cycle

8 What is called the distance between centre of the crank pin to the centre of the main journal?

- A Stroke
- B Cycle
- C Throw
- D Efficiency

9 How the piston stroke is defined as?

- A Double the throw
- B Half of the throw
- C Equal to the throw
- D 4 times of throw

10 What is firing order?

- A Sequence of power stroke occurrence
- B Sequence of suction stroke occurrence
- C Sequence of compression stroke occurrence
- D Sequence of exhaust stroke occurrence

11 What is the use of bourdon gauge?

- A To measure pressure
- B To measure temperature
- C To measure volume
- D To measure heat

12 Which is used to start a heavy earth moving engines?

- A Hand cranking
- B Electric motor cranking
- C Compressed air cranking
- D Gasoline engine cranking

13 Which is the engine adopts hand cranking?

- A Small engine
- B LMV engine
- C Heavy vehicles
- D Stationary engine

14 Which is the most preferred starting system in LMV?

- A Hand cranking
 - B Compressed air cranking
 - C Gasoline engine cranking
 - D Electric motor cranking
-

Module 1 : Diesel Engine Overview - Key paper

Questions: Level 1

SL.No	Key
1	A
2	B
3	C
4	D
5	A
6	A
7	A
8	A
9	A
10	C
11	B
12	A
13	B
14	C
15	D
16	A
17	C
18	C
19	B
20	B

Questions: Level 2

SL.No	Key
1	B
2	D
3	D
4	A
5	C
6	C
7	B
8	C
9	A
10	A
11	A
12	D
13	A
14	D

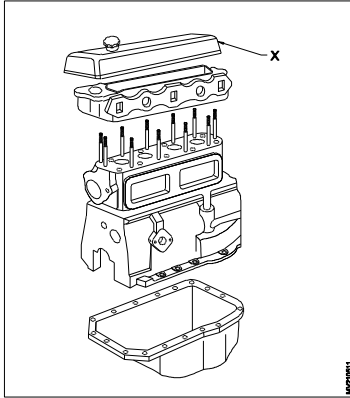
Mechanic Diesel 2nd Semester - Module 2 : Diesel Engine components

Questions: Level 1

1 What is the material of cylinder block?

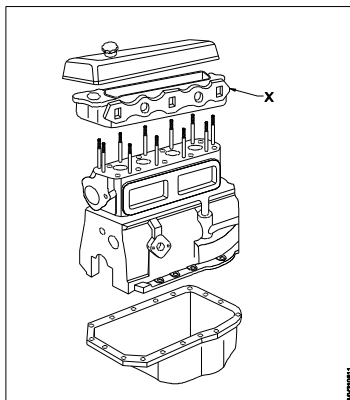
- A Cast iron
- B Bronze
- C Brass
- D Zinc alloy

2 What is the name of the part marked as 'x'?



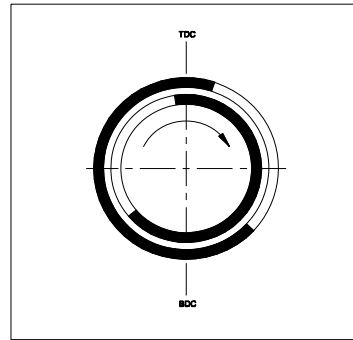
- A Valve door cover
- B Cylinder head
- C Engine block
- D Oil pan

3 What is the name of the part marked as 'x'?



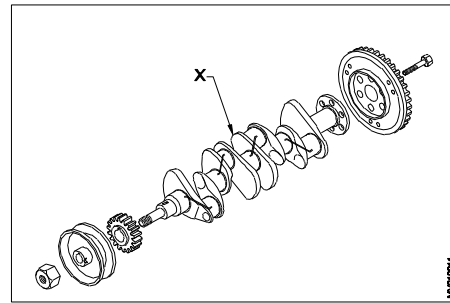
- A Valve door cover
- B Cylinder head
- C Engine block
- D Oil pan

4 What is the name of the diagram?



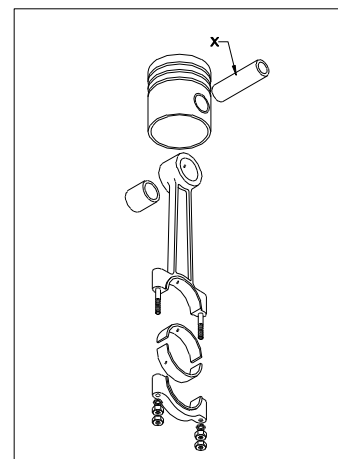
- A Injection timing
- B Port timing
- C Valve timing
- D Ignition timing

5 What is the name of the part marked as 'x'?



- A Crank pin
- B Crank arm
- C Balancing weight
- D Main journal

6 What is the name of the part marked as 'X'?

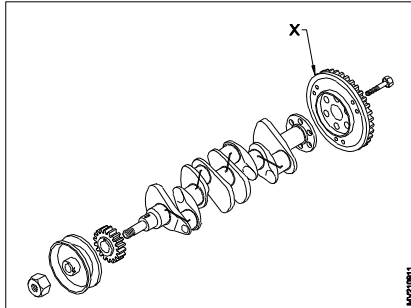


- A Gudgeon pin
- B King pin
- C Connecting rod
- D Piston pin hole

7 What is the material of piston pins?

- A Nickel chromium steel
- B Cast iron
- C HSS
- D Bronze

8 What is the name of the part marked as 'X'?

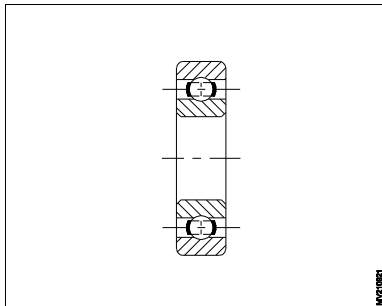


- A Drive product
- B Vibration damper
- C Fan pulley
- D Fly wheel

9 What is the material used to produce crank shaft?

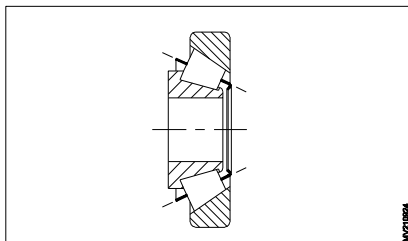
- A Chromium vanadium nickel steel
- B High speed steel
- C Cast iron
- D Wrought iron

10 What is the name of the bearing?



- A Ball bearing
- B Roller bearing
- C Needle bearing
- D Tappet roller bearing

11 What is the name of the bearing?



- A Ball bearing
- B Roller bearing
- C Needle bearing
- D Tapper roller bearing

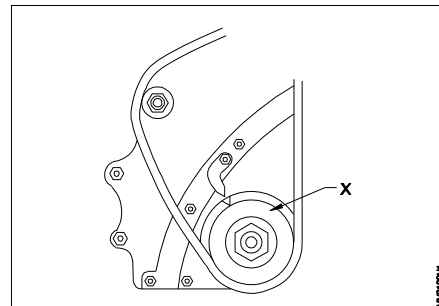
12 What is the name the portion below the piston boss?

- A Land of the piston
- B Ring section of the piston
- C Crown of the piston
- D Skirt of the piston

13 Which part is connect the piston with crank pin?

- A Push rod
- B Connecting rod
- C Cam Shaft
- D Crank Shaft

14 What is the name of part marked as 'X'?



- A Alternator pully
- B Water pump pully
- C Crank shaft pully
- D Dynamo pully

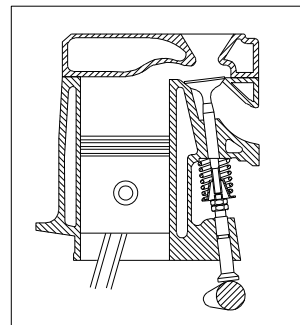
15 Which tool used to remove the crank shaft pully?

- A Double and spanner
- B Ring spanner
- C Pipe wrench
- D Puller

16 What is the material of inlet valve?

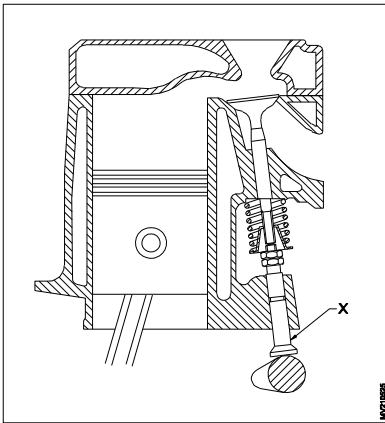
- A Nickel steel alloy
- B Aluminium alloy
- C Copper alloy
- D Chromium alloy

17 What is the nameof the valve mechanism?



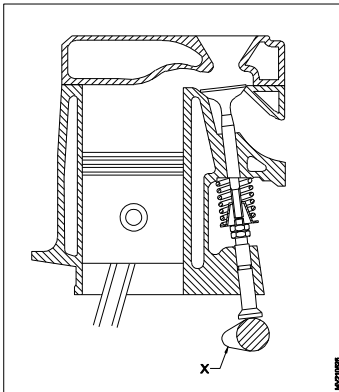
- A Over head valve
- B Side head valve
- C Rotary valve
- D Reed valve

18 What is the name of the part marked as 'x'?



- A Cam lobe
- B Tappet
- C Valve seat
- D Rocker arm

19 What is the name of the part marked as 'x'?

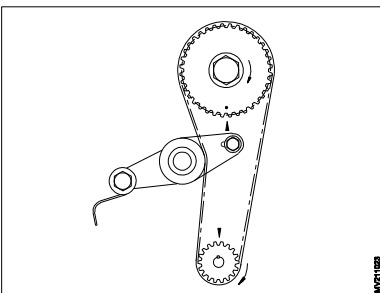


- A Cam lobe
- B Tappet
- C Valve seat
- D Rocker arm

20 What is the material of cam shaft?

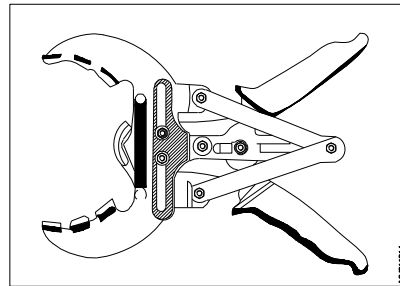
- A Forged alloy steel
- B Copper alloy
- C Aluminium alloy
- D Zinc alloy

21 What is the name of the drive?



- A Belt drive
- B Chain drive
- C Rope drive
- D Gear drive

22 What is the name of the tool?

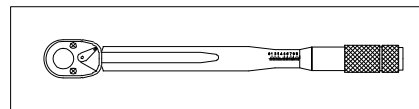


- A Torque wrench
- B Piston ring compressor
- C Piston ring expander
- D Circlip player

23 Which measuring instrument used to check the fly wheel face out?

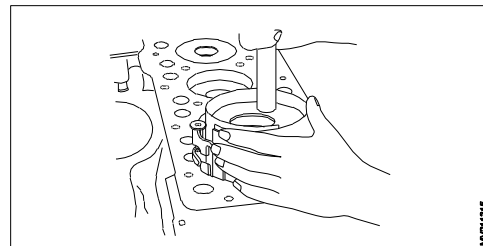
- A Dial indicator
- B Compression gauge
- C Outside micrometer
- D Feeler gauge

24 What is the name of the tool?



- A Dial type torque wrench
- B Scale type torque wrench
- C Ratchet type torque wrench
- D Torsion has type torque wrench

25 What is the name of the tool?



- A Torque wrench
- B Piston ring expander
- C Piston ring compressor
- D Circlip player

26 Which instrument is used to check the leakage of the cylinder?

- A Compression gauge
- B Dial gauge
- C Vacuum gauge
- D Wire gauge

-
- 27** Which instrument is used to check the tappet clearance?
- A** Depth gauge
 - B** Pitch gauge
 - C** Feeler gauge
 - D** Wire gauge
-
- 28** What is the measuring instrument used to find the diameter of piston
- A** Inside micrometer
 - B** Depth micrometer
 - C** Outside micrometer
 - D** Three point internal micrometer
-
- 29** Which tool is used to measure the diameter of the crank shaft main journal?
- A** Inside micrometer
 - B** Outside micrometer
 - C** Three point internal micrometer
 - D** Master ring gauge
-

Questions Level 2

- 1 Which is connected with piston through piston pin?
A Gudgeon pin
B Connecting rod
C Cam shaft
D Rocker arm
-
- 2 Which is joining piston and connecting rod?
A Gudgeon pin
B Rocker arm
C Cam shaft
D King pin
-
- 3 Which is transferring energy for the piston to crankshaft?
A Gudgeon pin
B King pin
C Connecting rod
D Cam shaft
-
- 4 Which is the key element in converting reciprocating motion in to rotary motion?
A Connecting rod
B Gudgeon pin
C King pin
D Cam shaft
-
- 5 What is the type of hardening done on crank shaft?
A Induction hardening
B Case hardening
C Flame hardening
D Surface hardening
-
- 6 Which load taken by the roller bearing?
A Radial load
B Axial load
C Thrust load
D Radial and axial load
-
- 7 What is the load taken by taper roller bearing?
A Radial load
B Axial load
C Thrust load
D Radial and axial load
-
- 8 Which is the bearing used in differential and wheel of a heavy vehicles?
A Ball bearing
B Roller bearing
C Needle bearing
D Taper roller bearing
-

- 9 Which bearing used in fly wheel and water pump?
A Ball bearing
B Roller bearing
C Needle bearing
D Taper roller bearing
-
- 10 Which bearing used in gear boxes?
A Ball bearing
B Roller bearing
C Needle bearing
D Taper roller bearing
-
- 11 Where the bush bearing preferred?
A Connecting rods
B Fly wheel and water pumps
C Differential and wheel hub
D Gear boxes
-
- 12 What is the cause for double knock in the piston?
A Piston wormout
B Piston ring wormout
C Piston pin and boss wormout
D Liner wormout
-
- 13 What type of bearing fitted in the connecting rod big end?
A Needle bearing
B Ball bearing
C Taper roller bearing
D Shell bearing
-
- 14 Where the compression ring is fitted in the piston?
A Above the oil ring in piston
B Bottom of the piston skirt
C Piston between oil ring and piston pin
D Connecting rod between piston pin and bottom of skirt
-
- 15 What is the first step in removal method of fly wheel?
A Unlock the lock plate/wire
B Unscrew the fastening bolts
C Lock the fly wheel with wooden piece
D Remove the fly wheel ring
-
- 16 Where the fly wheel is fitted in the engine?
A Cam shaft
B Crank shaft
C Rocker arm shaft
D Primary shaft
-

17 Which valve allows one direction flow only?

- A** Poppet valve
- B** Rotary valve
- C** Reed valve
- D** Sleeve valve

18 What is the term used to refer when a valve open before TDC?

- A** Lead
- B** Lag
- C** Over lap
- D** Retard

19 What is the term used to refer when a valve closes after BDC?

- A** Lead
- B** Advance
- C** Lag
- D** Over lap

20 What is the term used to refer when both valves open position?

- A** Lead
- B** Lang
- C** Overlap
- D** Advance

21 Which is used to convert rotary into reciprocating motion?

- A** Cam Shaft
- B** Connecting rod
- C** Rocker arm
- D** Main shaft

22 Which is the drive source of a cam shaft?

- A** Crank Shaft
- B** Fly wheel
- C** Self motor
- D** Gear box

23 What is the speed ratio cam shaft to crank shaft?

- A** Half
- B** Equal
- C** Double
- D** Triple

24 Which tool is required to remove the valves?

- A** Torque wrench
 - B** Valve spring lifter
 - C** Box spanner
 - D** Scraper
-

25 What is ovality of a bore?

- A** Difference in dia measured top to bottom
- B** Difference in dia thrust to non thrust side of cylinder
- C** Difference in dia measured only at top
- D** Difference in dia measured only at bottom

26 When it is required to coincide the mark with timing gears?

- A** During assembling water pump
- B** During assembling oil pump
- C** During assembling cam shaft
- D** During assembling radiator

27 Which gauge used to measure the cylinder bore weariness?

- A** Compression gauge
- B** Vacuum gauge
- C** Dial gauge
- D** Depth gauge

28 What is the purpose of the timing chain?

- A** To connect water pump pulley
- B** To connect alternator
- C** To connect crank and cam shaft gear
- D** To connect A/C compressor

29 What is the purpose of the fly wheel timing mark?

- A** To coincide the gears
 - B** To set the engine timing
 - C** To set the F.I.P timing
 - D** To set the valve clearance
-

|

Module 2 : Diesel Engine components - Key paper

Questions: Level 1

SL.No	Key
1	A
2	A
3	B
4	C
5	B
6	A
7	A
8	D
9	A
10	A
11	D
12	D
13	B
14	C
15	D
16	A
17	B
18	B
19	A
20	A
21	A
22	C
23	A
24	B
25	C
26	C
27	C
28	C
29	B

Questions: Level 2

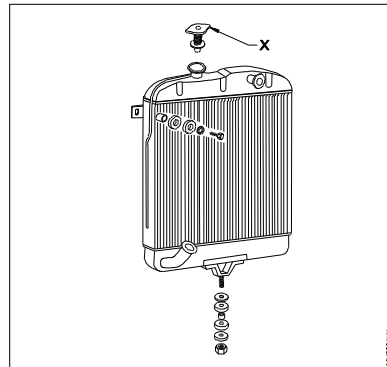
SL.No	Key
1	B
2	A
3	C
4	A
5	A
6	D
7	D
8	D
9	B
10	A
11	A
12	C
13	D
14	A
15	A
16	B
17	C
18	A
19	C
20	C
21	A
22	A
23	A
24	B
25	B
26	C
27	C
28	C
29	B

Mechanic Diesel 2nd Semester - Module 3 : Cooling and Lubricating System

Questions: Level 1

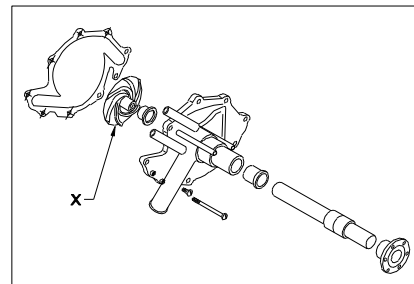
- 1 In which type of cooling system used fins on the cylinder head?
 - A Oil cooling
 - B Water cooling
 - C Liquid cooling
 - D Air cooling
- 2 Which part helps to decipate the heat in air cooling engine?
 - A Engine piston
 - B Engine crank shaft
 - C Exhaust pipe
 - D Cylinder and head fins
- 3 In which types of cooling system's rate of cooling is very low?
 - A Thermo siphon system
 - B Air cooling system
 - C Forced feed system
 - D Pump circulation system
- 4 Which part is forced to circulate the water in forced feed engine cooling system?
 - A Pump
 - B Thermostat
 - C Density of water
 - D Water jacket
- 5 Which part prevent leakage of water in the water pump?
 - A Impeller
 - B Bearing
 - C Seal
 - D Pully
- 6 Where the water in cooling system?
 - A Radiator upper tank
 - B Radiator lower tank
 - C Engine water jacket
 - D Expansion tank
- 7 Where is the thermostat valve fitted in pressurised cooling system?
 - A Water outlet of water pump
 - B Water outlet of radiator
 - C Water outlet of water jacket
 - D Water outlet of cylinder head

- 8 What is the name of the part marked as 'x'?



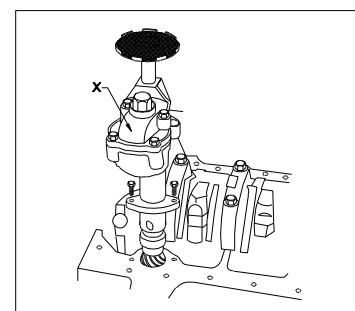
- A Radiator upper tank
- B Radiator lower tank
- C Radiator drain plug
- D Radiator cap

- 9 What is the name of the part marked as 'x'?



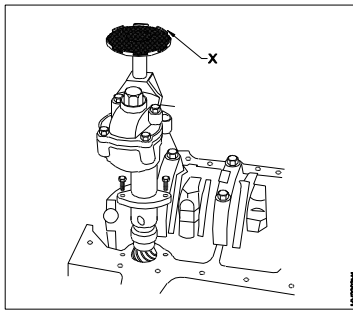
- A Water pump pully
- B Water pump impeller
- C Water pump housing
- D Water pump shaft

- 10 What is the name of the assembly marked as 'X'?



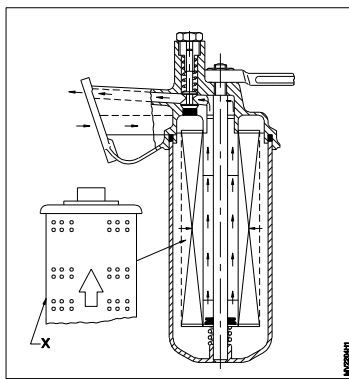
- A Water pump
- B Hydraulic pump
- C Fuel pump
- D Oil pump

11 What is the name of the part marked as 'x'?



- A Oil pump
- B Water pump
- C Oil pump strainer
- D Hydraulic pump

12 What is the name of the part marked as 'x'?



- A Air filter
- B Oil filter
- C Water filter
- D Fuel filter

13 Which is the properties of a lubricant?

- A Boiling temperature should be low
- B Should develop foam
- C Oil viscosity should not be same in hot and cold condition
- D Oil viscosity should be suit the operating conditions

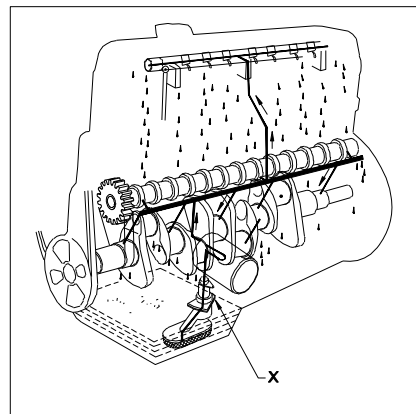
14 Which lubrication system used separate oil tank?

- A Wet sump lubrication
- B Splash lubrication
- C Petrol-oil lubrication
- D Dry sump lubrication

15 Which type of lubrication system used in two stroke engine?

- A Dry sump lubrication
- B Wet sump lubrication
- C Petrol-oil lubrication
- D Splash lubrication

16 Which part of the engine marked as 'x'?



- A Suction pump
- B Oil filter
- C Oil pump
- D Oil strainer

17 Which part drive oil pump?

- A Crank Shaft
- B Cam Shaft
- C Crank pully
- D Timing gears

18 Which part of the crank shaft flow oil to crank pin?

- A Crank web
- B Crank shaft thrust bearing
- C Crank shaft main journal
- D Crank pully

19 Which device suckes oil from oil sump?

- A Strainer
- B Suction pipe
- C Pump
- D Filter

Questions Level 2

1 Where the metal fins are provided in the air cooled engine?

- A Cylinder and head
- B Exhaust pipe
- C Valve door
- D Intake manifold

2 How the water circulation is obtained in thermosyphon system?

- A By forced feed of water
- B By density of water of hot and cold water
- C By gravity of water
- D By water jackets

3 What is the effect of the water level falls down in thermo syphon system?

- A Circulation continue
- B Circulation low
- C Circulation discontinue
- D Circulation high

4 How the water pump get drive in pump circulation cooling system?

- A By belt
- B By gear
- C By chain
- D By coupling

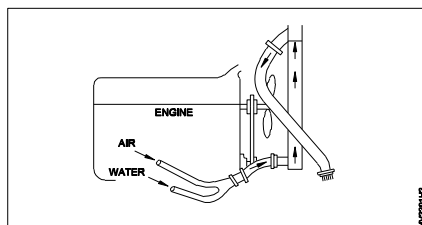
5 Which condition thermostat valve open?

- A Low temperature of engine
- B High temperature of engine
- C Operating temperature of engine
- D Freezing temperature of engine

6 Which is related to radiator removing procedure?

- A Top up water in radiator
- B Disconnect the all connections with radiator
- C Connect the top water hose
- D Connect the bottom water hose

7 What is the name of this cleaning method?



- A Pressure flushing system
- B Reverse flushing system
- C Engine cooling system
- D Water draining system

8 Which method is used in radiator reverse flushing cleaning?

- A Flushing water with air (gun) pressure
- B Flushing water with engine oil
- C Flushing water with coolant oil
- D Flushing water with soap oil

9 Where is the oil cooler fitted in the engine?

- A Engine block
- B Cylinder head
- C Exhaust manifold
- D Oil sump

10 What is the main purpose of the lubricant?

- A Minimise the friction
- B Increase the friction
- C Increase the wearness
- D Increase the noise

11 Which is related to lubrication system?

- A Provide a cushioning effect to oil filter
 - B Increase the wear and tear of the moving parts
 - C Increase the blow by gases by providing an oil
 - D Minimise the wear and tear of the moving parts
-

Questions Level 3

- 1** Which method used to descale the water passages in the engine block?
- A** By injecting water solvent
 - B** By injecting oil solvent
 - C** By injecting fresh air
 - D** By cleaning tools
-
- 2** How to check the damaged radiator core tubes?
- A** Check visually
 - B** Check with special tools
 - C** Check with computer
 - D** Check with bore dial gauge
-

Module 3 : Cooling and Lubricating System - Key paper

Questions: Level 1

SL.No	Key
1	D
2	D
3	A
4	A
5	C
6	B
7	D
8	D
9	B
10	D
11	C
12	B
13	D
14	D
15	C
16	C
17	B
18	C
19	C

Questions: Level 2

SL.No	Key
1	A
2	B
3	C
4	A
5	C
6	B
7	B
8	A
9	A
10	A
11	D

Questions: Level 3

SL.No	Key
1	A
2	A

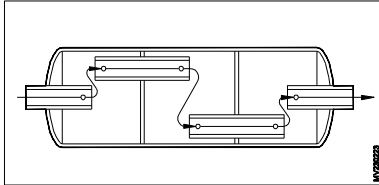
Mechanic Diesel 2nd Semester - Module 4 : Intake and Exhaust system

Questions: Level 1

1 Where is turbocharger mounted?

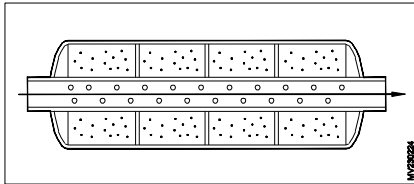
- A Exhaust manifold
- B Inlet manifold
- C Air cleaner
- D Cylinder head

2 Name the type of muffler?



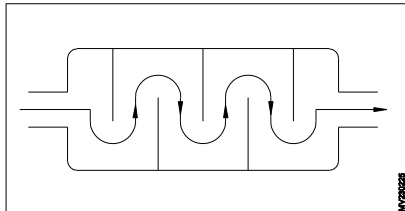
- A Reverse flow muffler
- B Straight through muffler
- C Baffle type muffler
- D Electronic muffler

3 Name the type of muffler?



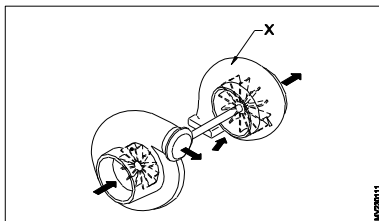
- A Reverse flow muffler
- B Straight through muffler
- C Baffle type muffler
- D Electronics muffler

4 Name the type of muffler?



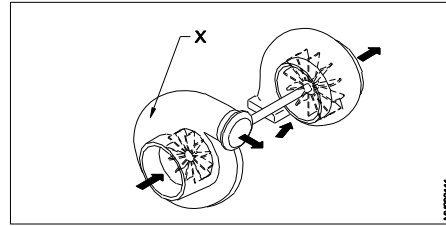
- A Reverse flow muffler
- B Straight through muffler
- C Baffle type
- D Electronic muffler

5 Name the part marked as 'x'?



- A Turbine unit
- B Compressor unit
- C Exhauster unit
- D Charger unit

6 Name the part marked as 'x'?



- A Turbine unit
- B Compressor unit
- C Exhauster unit
- D Charger unit

7 What is the material generally used for manufacturing inlet manifold?

- A Aluminium alloy
- B Copper
- C Steel
- D Plastic

8 What material is used for manufacturing exhaust manifold?

- A Cast iron
- B Aluminium alloy
- C Copper
- D Steel

9 Name the drive of turbo charger?

- A Engine drive
- B Electric motor drive
- C Exhaust gas pressure
- D Compressed air

10 What type of filter element is used in dry type air cleaner?

- A Paper element
- B Cloth element
- C Wire mesh element
- D Strainer element

Questions Level 2

- 1 Where the turbo charger compressor housing outlet connected?
- A Connected to air cleaner
 - B Connected to inlet-manifold
 - C Connected to exhaust - manifold
 - D Connected to oil filter
-
- 2 During engine back fire, which act as a flame arrester?
- A Oil filter
 - B Fuel filter
 - C Air filter
 - D Muffler
-
- 3 Which type of muffler produces anti noise without restricting the exhaust flow in a silencer?
- A Baffle type
 - B Electronic type
 - C Resonance type
 - D Reverse flow type
-
- 4 Which type of muffler is fitted with sensors, microphone and speakers?
- A Baffle type muffler
 - B Reverse flow type muffler
 - C Electronics type muffler
 - D Straight through muffler
-
- 5 What is the purpose of muffler in exhaust system?
- A Reduce the heat
 - B Reduce the noise
 - C Reduce the vibration
 - D To filter exhaust gases
-
- 6 Name the drive of impeller type exhauster?
- A Auxiliary drive shaft
 - B Electric motor drive
 - C Exhaust gas pressure
 - D Compressed air
-
- 7 Which helps engine at high altitudes where the density of air is less?
- A Air cleaner
 - B Vane type exhauster
 - C Impeller type exhauster
 - D Turbo charger
-

Questions Level 3

- 1 What is the reason for decrease the volumetric efficiency in the exhaust system?
- A Low noise
 - B High temperature
 - C Excessive back pressure
 - D Low temperature
-

Module 4 : Intake and Exhaust system - Key paper

Questions: Level 1

SL.No	Key
1	A
2	A
3	B
4	C
5	A
6	B
7	A
8	A
9	C
10	A

Questions: Level 2

SL.No	Key
1	B
2	C
3	B
4	C
5	B
6	A
7	D

Questions: Level 3

SL.No	Key
1	C

Mechanic Diesel - 1st Semester - Module 5 : Diesel Fuel System

Questions: Level 1

- 1 Which part build up fuel injection pressure in fuel injector?
A Solenoid
B Regulator
C Common rail
D Fuel pump

- 2 How the CRDI injectors pressure control valve operated?
A Mechanically
B Electronically
C Manually
D Hydraulic

- 3 Which electronic unit gives signal to operate IAC valve?
A ECM
B EDU
C Solenoid
D SCV

- 4 Where is the pressure discharge valve fitted in CRDI fuel system?
A Common rail
B Fuel pump
C Injectors
D Fuel filter

- 5 How many fuel chamber's are in HEUI?
A One
B Two
C Three
D Four

- 6 Which is develop diesel pressure in the CRDI engine
A ECM
B Injection
C Fuel tank
D High pressure pump

- 7 How much maximum pressure, develops by high pressuer diesel pump in CRDI engine
A 500 Kg/cm²
B 800 Kg/cm²
C 2000 Kg/cm²
D 1600 Kg/cm²

- 8 Which type of pump ensures in built and uniform delivery to all injectors in diesel engine?
A Jerk type pump
B In line pump
C Rotary type pump
D Servo type pump

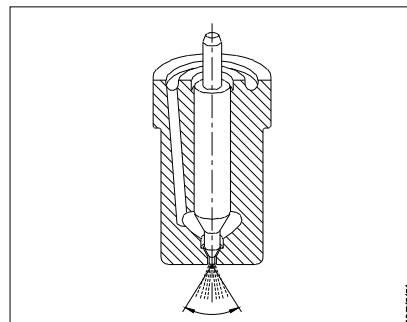
- 9 What is the name of the governor in which the control rack connected with counter weight floating lever?
A Mechanical governor
B Pneumatic governor
C Hydraulic governor
D Servo governor

- 10 Which fuel related with cetane number?
A Petrol
B Diesel
C Coal
D Kerosene

- 11 Where the diesel fuel is obtained?
A Crude oil
B Vegetable oil
C Animal oil
D Synthethic oil

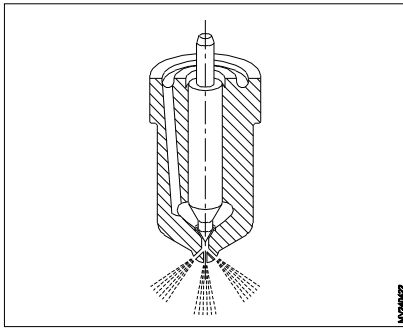
- 12 Which fuel pipe line is provided between fuel filter and injectors?
A Suction pipe
B Pressure pipe
C Vacuum pipe
D Over flow pipe

- 13 What is the name of nozzle?



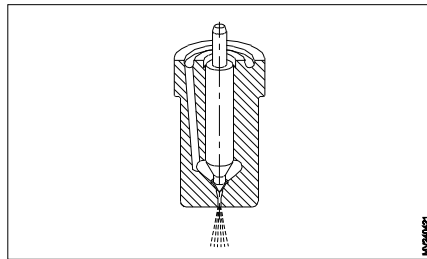
- A** Single hole nozzle
- B** Multi hole nozzle
- C** Delay nozzle
- D** Pintle nozzle

14 What is the name of nozzle?



- A Single hole nozzle
- B Multi hole nozzle
- C Pintle nozzle
- D Pintaux nozzle

15 What is the name of nozzle?



- A Single hole nozzle
- B Multi hole nozzle
- C Pintle nozzle
- D Pintaux nozzle

16 Which part is atomise the fuel into engine cylinder?

- A Injector
- B FIP
- C Governor
- D Feed pump

17 Which type of fuel system is best suited for less fuel consumption, more power and reduce the exhaust emission?

- A Inline pump system
- B Rotary pump system
- C Distributor pump system
- D CRDI system

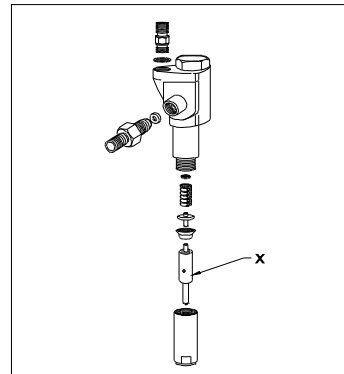
18 Which fuel system develop the high diesel pressure by hydraulic energy?

- A Inline FIP
- B Distributor FIP
- C CRDI fuel system
- D HEUI fuel system

19 What is the expansion of HEUI?

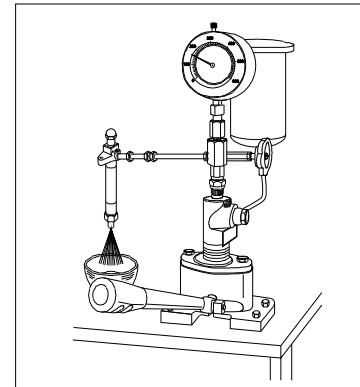
- A Hydraulically actuated electronically controlled unit injector
- B Hydraulically actuated electrically controlled unit injector
- C Hydro-electric controlled unit injector
- D Hydraulic effective controlled unit injector

20 What is the name of the part marked as 'x'?



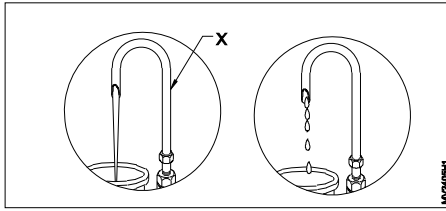
- A Nozzle
- B Nozzle holder
- C Spindle
- D Injector body

21 What is the name of equipment?



- A FIP tester
- B Injector tester
- C Pump tester
- D Compression tester

22 What is the name of the part marked as 'x'?



- A Swan neck pipe
- B Diesel pipe
- C 'U' band pipe
- D Leakage pipe

23 Which part in the fuel injection pump compress the diesel?

- A Governor
- B Rack rod
- C Sleeve
- D Plunger

24 What is the advantages of CRDI system?

- A Increase engine noisy
- B Reduce the engine torque
- C Increase fuel consumption
- D Above 25% of power developed

25 Which feed system reduces above 50% unburnt hydro carbon?

- A In line fuel injection system
 - B Distributor fuel injection system
 - C Electronic control system
 - D Air blast fuel injection system
-

Questions: Level 2

1 Which electronic device controls the engine system?

- A Regulator
- B Ecm
- C Fuse
- D Switch

2 In CRDI engine fuel system, where the excessive fuel return?

- A Reside in the rail itself
- B Return to high pressure pump
- C Return to the fuel tank
- D Return to fuel filter

3 What is the function of heater plug?

- A Warm up fuel pump
- B Warm up combustion chamber
- C Warm up injector
- D Warm up valves

4 Why fuel filter is essential in diesel engine?

- A Increase the power
- B Prevent dirty smoke
- C Easy starting
- D Mirror polishing finish in nozzle and FIP

5 How the pressure, is maintaining in the high pressure pipe line of FIP?

- A Control rack
- B Delivery valve
- C Barrel
- D Plunger

6 How much maximum fuel pressure developed in fuel injection pump?

- A 100 to 200 Kgf/cm²
- B 200 to 300 Kgf/cm²
- C 300 to 400 Kgf/cm²
- D 400 to 700 Kgf/cm²

7 How the quantity of fuel delivery vary in running diesel engine?

- A By plunger
- B By control sleeve
- C By control rack
- D By injection

8 What is the purpose of glow plug in pre-combustion chamber in diesel engine?

- A Completing combustion
- B Delaying combustion
- C Advance combustion
- D Initiating combustion

9 What is the purpose over flow valve in fuel filters

- A To supply more fuel to filter
- B To send back excess diesel to fuel tank
- C To supply clean diesel
- D To take the leaking fuel

10 Why baffles are provided in the fuel tank?

- A Minimize the slashing of fuel in the tank
- B To strengthen the fuel tank
- C To make chambers in the fuel tank
- D To make square and lengthy fuel tank

11 Why an auxillary spray hole provided in the pintaux nozzle?

- A To assist easy starting under cold condition
- B To assist stop under cold condition
- C To provide rich fuel under cold condition
- D To provide very less fuel supply

12 Which nozzle having an auxillary spray hole with main hole?

- A Single hole nozzle
- B Multi hole nozzle
- C Pintle nozzle
- D Pintaux nozzle

13 Which type of fuel system has high pressure oil pump in diesel engine?

- A Inline FIP
- B Rotary FIP
- C CRDI fuel system
- D HEUI fuel system

14 Which is control the minimum and maximum speed of the diesel engine?

- A FIP
- B Governor
- C Injector
- D Feed pump

15 How much time taken to give signals to ECM after ignition switch on?

- A One second
 - B Two second
 - C Three second
 - D Four second
-

Questions: Level 3

- 1** What is the effect of detonation occurs in diesel engine?
- A** Knocking sound in engine
 - B** More engine power
 - C** High engine speed
 - D** Suddenly stop the engine
-

Module 5 : Diesel Fuel System - Key paper

Questions: Level 1

SL.No	Key
1	A
2	B
3	A
4	A
5	B
6	D
7	C
8	C
9	A
10	B
11	A
12	D
13	D
14	B
15	A
16	A
17	D
18	D
19	A
20	A
21	B
22	A
23	D
24	D
25	C

Questions: Level 2

SL.No	Key
1	B
2	C
3	B
4	B
5	B
6	D
7	C
8	D
9	B
10	A
11	A
12	D
13	C
14	B
15	B

Question: Level 3

SL.No	Key
1	A

Mechanic Diesel 2nd Semester - Module 6 : Marine and Stationary Engine

Questions: Level 1

1 Where the air starting system is used?

- A Cars
- B Bikes
- C Trucks
- D Marine

2 Which automotive engine is cranked through hydraulic system?

- A Trains
- B Trucks
- C Marines
- D Air crafts

3 Which system an accumulator is used?

- A Cooling system
- B Starting system
- C Electrical system
- D Hydraulic system

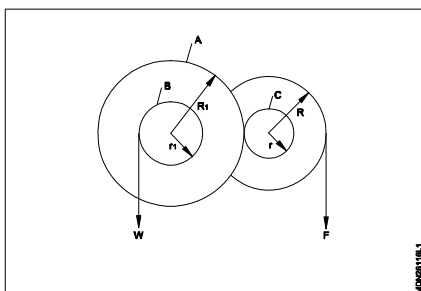
4 Which is the commonly used cooling medium in the marine engine?

- A Fan
- B Coolant
- C Sea water
- D Cooling water

5 Which is the fuel system adopted in the modern marine engines?

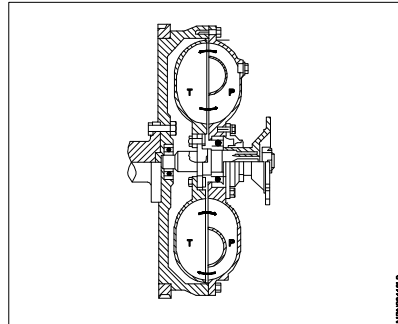
- A CRDI
- B In-line pump
- C Rotary pump
- D Reciprocating pump

6 What is the type of drive?



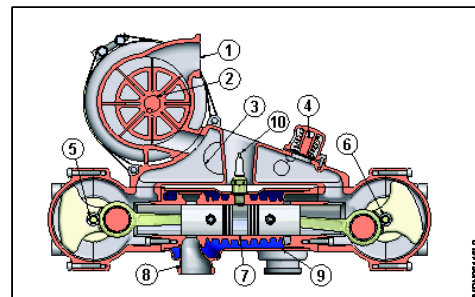
- A Electromagnetic
- B Single reduction
- C Double reduction
- D Hydraulic fluid coupling

7 Name the type of transmission device?



- A Fluid coupling
- B Electro magnetic coupling
- C Universal coupling
- D Flange coupling

8 What is the name engine?



- A Double acting engine
- B Opposed piston engine
- C Single acting reciprocating engine
- D Double acting reciprocating engine

Questions Level 2

- 1 Which automotive engine is propelling by auxiliary engine?
- A Trucks
 - B Marines
 - C Sports cars
 - D Stationary engine
-
- 2 Which is the device used to transmit the rotary motion?
- A Hydraulic jack
 - B Hydraulic brake
 - C Hydraulic actuator
 - D Hydraulic coupling
-
- 3 Which engine is used sea water cooling, water cooled in marine engine?
- A Aircraft engine
 - B Marine engine
 - C Heavy vehicle engine
 - D Light motor vehicle engine
-
- 4 How the fluid coupling is termed?
- A Static device
 - B Aero dynamic device
 - C Hydro dynamic device
 - D Electro dynamic device
-
- 5 Which device used to increase the torque?
- A Clutch
 - B Engine
 - C Flywheel
 - D Gear reduction drive
-

Module 6 : Marine and Stationary Engine - Key paper

Questions: Level 1

SL.No	Key
1	D
2	C
3	B
4	C
5	A
6	C
7	A
8	B

Questions: Level 2

SL.No	Key
1	B
2	D
3	B
4	C
5	D

Mechanic Diesel - 1st Semester - Module 7 : Emission Control System

Questions: Level 1

- 1 Which is the hydro carbon emission released directly from engine to the atmosphere
- A Crank case and exhaust system
B Fuel tank and carburettor
C Fuel tank and crank case
D Fuel tank and exhaust
-
- 2 Which engine emits more amount of nitrogen oxides (NOx)?
- A Spark ignition engine
B Compressed ignition engine
C Two stroke engine
D LPG engine
-
- 3 Which is a green house effect gas?
- A O₂
B Co
C Co₂
D N₂
-
- 4 Which pollutant is released more from diesel engine during weak compression?
- A Co
B Particulate matter
C HC
D NOx
-
- 5 Which one is a non pollution gas?
- A Co
B No
C HC
D O₂
-
- 6 Which is the source of pollutant gases with hydro carbon?
- A From fuel tank evaporation
B From carburettor evaporation
C From crank case blow by
D From exhaust system
-
- 7 Which is less harmful emission elements after convert by catalytic converter?
- A Co₂ + Hc + H₂O
B NOx + Co₂ + Pm
C H₂O + Co₂ + Nitrogen
D Pb + Co₂ + NOx
-
- 8 Which is harm full emission element produced by an internal combustion engine?
- A Co₂ + Hc + H₂O
B Co + Hc + NOx
C NOx + Co₂ + Ph
D Pb + Co₂ + NOx
-
- 9 Where the positive crank case ventilation fitted?
- A Muffler and air cleaner
B Controller and air cleaner
C Feed pump and air cleaner
D Engine breather and air cleaner
-
- 10 What is the use of catalytic converters?
- A Control the noise
B Control the emission
C Control the temperature
D Control the fuel consumption
-
- 11 What is the purpose of EGR (Exhaust gas recirculation) valve?
- A Reduce NOx
B Reduce Co
C Reduce Co₂
D Reduce So₂
-
- 12 What is the acronym for DPF in exhaust emission system?
- A Diesel pressure filter
B Diesel primary filter
C Diesel particulate filter
D Direct particulate filter
-

Questions: Level 2

- 1 What is the purpose of EVAP canister?
A to trap the exhaust gas
B to trap fresh air
C to trap the leak off
D to trap the fuel vapour
-
- 2 Which of the hydro carbon emission released after the combustion of the engine?
A From fuel tank
B From carburettor
C From crank case blow by
D From exhaust system
-
- 3 What does the evaporation emission control eliminate?
A Co
B Co₂
C HC
D NO_x
-
- 4 Which engine uses EVAP canister?
A Diesel engine
B Petrol engine
C LPG engine
D CNG engine
-
- 5 Which is used to absorb fuel vapour in the EVAP canister?
A Banian cloth
B Cotton roll
C Paper filter
D Activated charcoal
-
- 6 Name the emission control technique when some amount of gases feed into the intake manifold of a running engine?
A Exhaust gas recirculation
B Positive crank case ventilation
C Catalytic convention
D Selective catalytic reduction
-
- 7 What is the purpose of selective catalytic reduction (SCR)?
A Reduce Co₂
B Reduce PM
C Reduce NO_x
D Reduce HC
-

Questions: Level 3

- 1 What is the reason for the emission of particulate matter?
- A Due to complete combustion
 - B Due to incomplete combustion
 - C Due to excess air supplied
 - D Due to atmospheric mixture
-
- 2 How do we achieve near zero emission diesel engine?
- A Combo of PCV and EGR
 - B Combo of EGR and SCR
 - C Combo of PCV and 3 way catalytic connection
 - D Combo of DPF and EGR
-
- 3 What is the purpose of crank case ventilation?
- A To prevent pressure build up
 - B To prevent temperature build up
 - C To increase the blow by gas
 - D To reduce the combustion leak
-
- 4 What is positive crank case ventilation?
- A Use of back pressure to increase efficiency
 - B HC present in blow by drawn out
 - C HC present in the blow by reused
 - D Increase the crank case dilution
-
- 5 Where EGR valve connected?
- A Exhaust system and intake system
 - B Crank case and intake system
 - C Crank case and exhaust system
 - D Exhaust system and catalytic converter
-

Module 7 : Emission Control System - Key paper

Questions: Level 1

SL.No	Key
1	A
2	B
3	C
4	B
5	D
6	D
7	C
8	B
9	D
10	B
11	A
12	C

Questions: Level 2

SL.No	Key
1	D
2	D
3	C
4	B
5	D
6	A
7	C

Question: Level 3

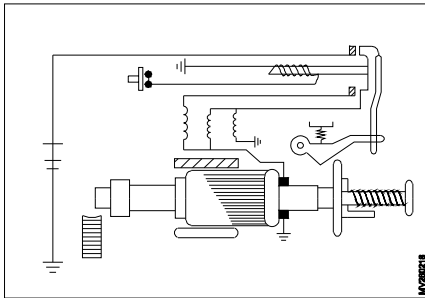
SL.No	Key
1	B
2	B
3	A
4	C
5	A

Mechanic Diesel - 1st Semester - Module 8 : Charging and Starting System

Questions: Level 1

- 1 Which one is strong electro magnetic switch in starting system?
- A Starter switch
 - B Solenoid switch
 - C Ignition switch
 - D Starter push switch

- 2 What is the name of the drive mechanism?



- A Over running clutch drive
- B Bendix drive
- C Axial drive
- D Non axial drive

- 3 What is the function of the regulator in an alternator

- A Limits the alternator field current as necessary
- B Permits current to flow in one direction only
- C Takes heat from the diodes
- D To increase the current flow

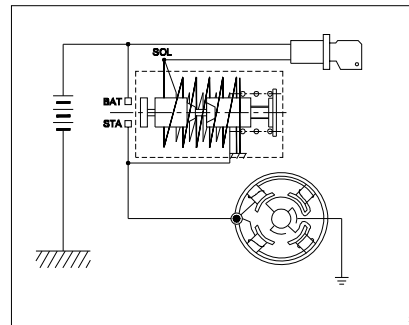
- 4 Which part prevent back flow of current in alternator?

- A Regulator
- B Rotor coil
- C Slip ring
- D Rectifier diode

- 5 Which one is connected to the starter motor shaft?

- A Drive pinion
- B Ring gear
- C Drive pulley
- D Drive coupling

- 6 What is the name of the circuit?

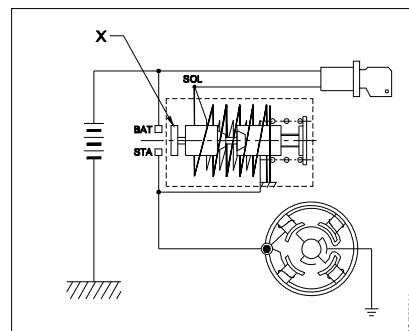


- A Charging circuit
- B Lighting circuit
- C Ignition circuit
- D Starting circuit

- 7 Which one is connected in the circuit between battery and starting motor?

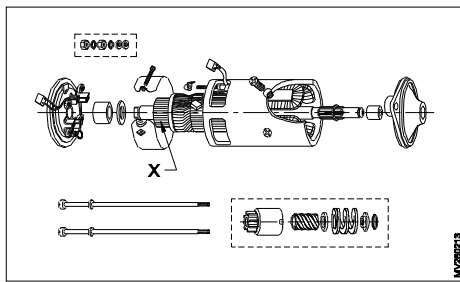
- A Starter switch
- B Solenoid switch
- C Plunger
- D Ignition switch

- 8 What is the name of part marked as 'x'?



- A Solenoid winding
- B Battery
- C Plunger
- D Starting motor

9 What is the name of the part, marked as 'x'?



- A Armature
- B Drive pinion
- C Field coil
- D Commutator

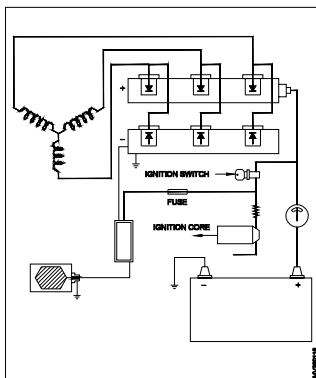
10 Where the carbon brushes are contact in a starting motor?

- A Armature
- B Armature shaft
- C End cover
- D Commutator

11 Which part is produce electricity in a vehicle?

- A Battery
- B Starting motor
- C Alternator
- D Ignition coil

12 What is the name of the circuit?



- A Lighting circuit
- B Ignition circuit
- C Starting circuit
- D Charging circuit

13 Which is the rotating part of an alternator?

- A Stator winding
- B Rotor winding
- C Yoke
- D Carbon brush

14 Which part is used to allow current in only one direction in alternator?

- A Field coil
- B Armature
- C Voltage regulator
- D Diode

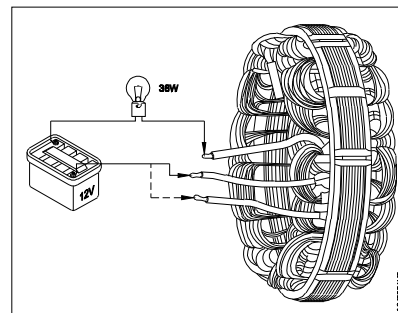
15 Which one produces AC supply?

- A Dynamo
- B Alternator
- C Self motor
- D Transformer

16 Which one produces DC supply?

- A Dynamo
- B Alternator
- C Self motor
- D Ignition coil

17 What is the name of the test carried out?



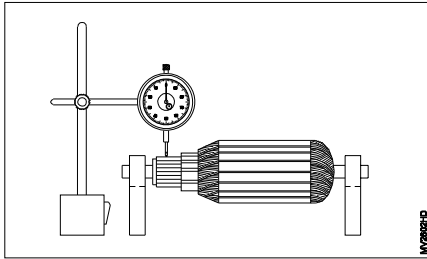
- A Full load test
- B Short circuit test
- C Open circuit test
- D No load circuit

Questions: Level 2

- 1 Which system is used to crank the engine?
A Charging system
B Lighting system
C Starting system
D Cooling system
-
- 2 Which is used to turn the engine fly wheel in starting system?
A Drive pinion
B Drive pulley
C Drive coupling
D Drive shaft
-
- 3 Which winding helps to produce the magnetic field in starting system?
A Armature winding
B Field winding
C Solenoid winding
D Compound winding
-
- 4 Which one of the components is used to convert AC to DC in an alternator?
A Field coil
B Pole pieces
C Voltage regulator
D Rectifier
-
- 5 How does the alternator get drive from the engine?
A By coupling
B By gear
C By chain
D By belt
-
- 6 Where is a slip ring used?
A Dynamo
B Alternator
C Self motor
D Transformer
-
- 7 Where is a commutator used?
A Dynamo
B Alternator
C Transformer
D Ignition coil
-

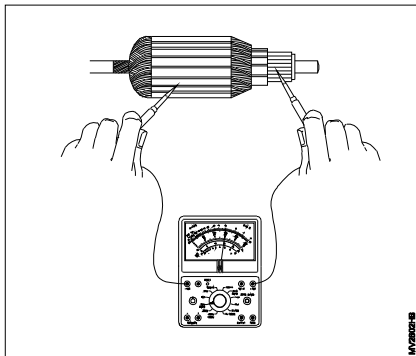
Questions: Level 3

1 What is the name of the test carried out?



- A Growler test
- B Continuity test
- C Insulation test
- D Commutator run out test

2 What is the name of test carried out?



- A Insulation test
- B Growler test
- C Continuity test
- D Open circuit test

3 What is the possible cause for no charge when engine is running?

- A Slip ring proper seating
- B Battery with half-charge
- C Defective starting motor
- D Defective diode

4 Which one of the cause for low voltage output from alternator?

- A Loose connection
- B Loose mountings
- C Fused indicator lamp
- D Broken drive belt

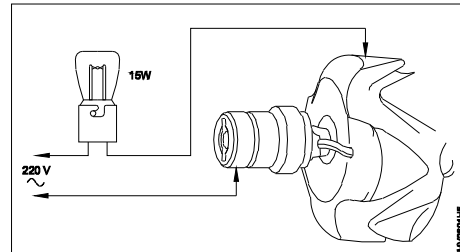
5 Which one is the possible cause for charges at high rate?

- A Loose mounting
- B Blown fuse wire
- C Broken drive belt
- D Voltage regulator winding open

6 Which one of the possible cause for alternator noisy?

- A Loose mounting
- B Blown fuse wire
- C Broken drive belt
- D Voltage regulator winding open

7 What is the name of the test carried out?



- A Full load test
- B No load test
- C Short circuit test
- D Open circuit test

Module 8 : Charging and Starting System - Key paper

Questions: Level 1

SL.No	Key
1	B
2	C
3	A
4	D
5	A
6	D
7	B
8	C
9	D
10	D
11	C
12	D
13	B
14	D
15	B
16	A
17	C

Questions: Level 2

SL.No	Key
1	C
2	A
3	B
4	D
5	D
6	B
7	A

Question: Level 3

SL.No	Key
1	D
2	C
3	D
4	A
5	D
6	A
7	C

Mechanic Diesel 2nd Semester - Module 9 : Trouble Shooting

Questions: Level 3

- | | |
|--|---|
| <p>1 What is the effect of taper and ovality of a bore?</p> <p>A Compression loss
B Mis firing
C Difficult starting
D False valve timing</p> | <p>8 What is the reason for engine over heating?</p> <p>A Radiator pressure cap defective
B Discharged battery
C Clogged fuel tank vent hole
D Excessive valve guide clearance</p> |
| <p>2 What is the reason for high fuel consumption in diesel engine?</p> <p>A Oil level high
B Air cleaner clogged
C Fuel level in tank is high
D High compression pressure</p> | <p>9 What is the reason for engine low power generation?</p> <p>A Weak compression
B Defective alternator
C External leakage of oil
D Clogged thermostat valve</p> |
| <p>3 What is the reason for engine over heating?</p> <p>A Defective starting motor
B External fuel leak
C Improper injection timing
D Oil pressure high.</p> | <p>10 What is the mechanical cause for engine does not start?</p> <p>A No air in fuel system
B Clogged exhaust manifold
C Battery full charge
D Starter motor engage properly</p> |
| <p>4 What is the mechanical causes for engine does not start?</p> <p>A Loose fan belt
B Clogged fuel tank vent hole
C Defective regulator
D Battery full charge</p> | <p>11 What is the reason for low oil pressure in engine?</p> <p>A Defective pressure relief valve assembly
B Defective pressure gauge
C Loose battery clamp
D Clogged air cleaner</p> |
| <p>5 What is the mechanical causes engine does not start?</p> <p>A Starter motor mounting bolt loose
B Defective alternator
C Defective thermostat valve
D Clogged fuel filter</p> | <p>12 What is the reason for low oil pressure in engine?</p> <p>A Worn out crank and cam shaft bearing
B Defective injector
C Weak compression
D Defective battery</p> |
| <p>6 What is the reason for engine over heating?</p> <p>A Defective pressure relief valve
B Clogged silencer
C Air in fuel system
D Water in fuel system</p> | <p>13 What is the reason for engine low power generation?</p> <p>A Piston ring wornout
B Defective oil relief valve
C Loose fan belt
D Defective alternator</p> |
| <p>7 What is the mechanical cause for engine does not start?</p> <p>A Defective oil pump
B Defective starter switch
C Improper valve timing
D No water in fuel</p> | <p>14 What is the reason for high oil consumption?</p> <p>A Defective pressure gauge
B Improper valve timing
C Excessive valve guide clearance
D Clogged fuel filter</p> |
| | <p>15 What is the reason for high oil consumption?</p> <p>A Defective pressure relief valve
B Fuel filter clogged
C Improper valve timing
D Worn out liner</p> |

16 What is the reason for engine over heating?

- A** Clogged fuel filter
- B** Fuel leakage
- C** External leakage of oil
- D** Defective thermostat valve

17 What is the reason for high fuel consumption of diesel?

- A** Defective thermostatic valve
- B** Low compression
- C** Loose battery terminals
- D** Water in the fuel system

18 What is the possible cause of high oil consumption?

- A** Clogged air cleaner
- B** Clogged fuel filter
- C** Worn out of piston rings
- D** Low oil level

19 What is the cause of low power generation?

- A** Clogged oil filter
- B** Clogged fuel filter
- C** Correct injection timing
- D** More supply of fuel

20 What is the possible cause of low power generation?

- A** More supply of air
- B** More supply of fuel
- C** Incomplete combustion of fuel
- D** Defective oil filter

21 What is the possible cause of engine over heating?

- A** High air draft
- B** High circulation of water
- C** Radiator core blocked
- D** High water level in radiator

22 What is the possible cause of engine over heating?

- A** High water level
- B** High oil level
- C** Faulty water pump
- D** Faulty injector

23 What is the possible cause of excessive fuel consumption?

- A** High fuel in tank
 - B** Low fuel in tank
 - C** High compression
 - D** Weak compression
-

24 What is the remedy if engine over heats?

- A** Top up oil level
 - B** Top up fuel level
 - C** Top up coolant level
 - D** Top up electrolyte level
-

Module 9 : Trouble Shooting - Key paper

Questions: Level 3

SL.No	Key
1	A
2	B
3	C
4	B
5	D
6	B
7	C
8	A
9	A
10	B
11	A
12	A
13	A
14	C
15	D
16	D
17	B
18	C
19	B
20	C
21	C
22	C
23	D
24	C