

1. Before a mechanic get under a vehicle he should make sure that :
 - (A) The tyres are inflated
 - (B) He use a creeper
 - (C) The jack handle is down
 - (D) The vehicle is on safety stands
2. In automobile servicing concept what is meant by "Tear down"?
 - (A) Adjusting
 - (B) Disassembling
 - (C) Reassembling
 - (D) Machining
3. Which is most suitable to check spark plug gap?
 - (A) Feeler gauges
 - (B) Micrometer
 - (C) Wire gauges
 - (D) Vernier caliper
4. The reading of a metric micrometer is in :
 - (A) Centimetre
 - (B) Thousands of an inch
 - (C) Thousands of millimetre
 - (D) Metre
5. To measure the taperness of a cylinder a _____ is used.
 - (A) Dial indicator
 - (B) Vernier caliper
 - (C) Depth gauge
 - (D) Micrometer
6. Splines and keys in mechanical assemblies :
 - (A) Fasten studs into place
 - (B) Locks nuts to bolts
 - (C) Locks gears to shafts
 - (D) Used as set screws
7. Castle nuts are normally used with :
 - (A) Snap rings
 - (B) Cotter pins
 - (C) Bolt heads
 - (D) Lock washers
8. Gaskets are used to :
 - (A) Prevent any leakage of fluid
 - (B) Seals out pressure
 - (C) Takes up space as shims
 - (D) Any of the above

9. Taps are used to :
- (A) Cut internal threads
 - (B) Cut external threads
 - (C) Enlarge a hole
 - (D) Both (A) and (B)
10. A 'Clutch spring compressor' compresses _____ of the clutch while dismantling.
- (A) Cushioning springs
 - (B) Thrust springs
 - (C) Anti rattling springs
 - (D) Torsional springs
11. As piston moves towards TDC in compression stroke :
- (A) The mixture gets hotter
 - (B) Even distribution of mixture happens
 - (C) Pressure rise occurs
 - (D) All of the above
12. The stroke in which both the valves are closed is :
- (A) Suction
 - (B) Compression
 - (C) Expansion
 - (D) Both (B) and (C)
13. To further smoothen out the flow of power engines have:
- (A) Counter weights
 - (B) Fly wheels
 - (C) Crank pins
 - (D) Crank webs
14. To convert the reciprocating motion to rotary motion the engines have:
- (A) Cam shaft and crank shaft
 - (B) Pistons and connecting rods
 - (C) Connecting rods and crank shaft
 - (D) Cam shaft and rocker arms
15. How many times in minute the inlet valve of a four stroke engine working at 1000 RPM open and close?
- (A) 500
 - (B) 1000
 - (C) 1500
 - (D) 2000

16. Valve rotators are used for :
- (A) Rotating the valves on its own axis (B) Reducing the warping of valves
(C) Even wear distribution of valves (D) All of the above
17. VTEC stands for :
- (A) Variable valve Timing Electronic Cam shaft
(B) Variable valve Timing and lift Electronic control
(C) Valve Timing Electrical Cam shaft
(D) None of the above
18. Most commonly used valve actuating mechanism in modern cars is :
- (A) T-head (B) I-head
(C) L-head (D) F-head
19. The carbon deposits on the cylinder head is removed with :
- (A) Scrapper brush (B) Water jet
(C) Soap solution (D) Kerosene
20. In a single cylinder two stroke engine running at 2000 RPM the number of power strokes per minute is :
- (A) 1000 (B) 4000
(C) 2000 (D) none
21. In an Otto cycle engine, the operation sequence is :
- (A) Compression, exhaust, power (B) Power, induction, exhaust
(C) Compression, power, exhaust (D) Compression, power, induction
22. The factor for ignition in diesel engines is :
- (A) Pressure of injection (B) High compression ratio
(C) Abundance of air (D) All of the above
23. In a two stroke engine at the time of spark occurs :
- (A) Transfer port has just opened
(B) Fresh gas is being compressed
(C) Fresh charge is being transferred to inlet
(D) Any of the above

24. Which of the following is a rich air fuel ratio?
- (A) 9:1 (B) 11:1
(C) 13:1 (D) 15:1
25. The percentage of combustion heat, available at crank shaft for useful work output is :
- (A) 35% (B) 55%
(C) 60% (D) 20%
26. In an engine having swirl combustion chamber :
- (A) More air fuel mixture enters (B) Improved scavenging take place
(C) Improved combustion take place (D) Burned gas has no back pressure
27. The main purpose of piston pin offset is to :
- (A) Perfectly balance the piston during power stroke
(B) Prevent piston slip
(C) Centralise the piston
(D) Reduce piston slap
28. Some automobile engines have glow plugs to :
- (A) Warn the driver about engine overheat
(B) Preheat the fuel for easier starting
(C) Preheat the combustion chamber
(D) Warm the passenger area
29. The upper and lower ends of the combustion chamber is formed by :
- (A) Piston and cylinder block (B) Cylinder walls and piston
(C) Piston rings and cylinder head (D) Cylinder head and piston
30. Piston rings are provided to:
- (A) Completely seal the combustion gas
(B) Hold the piston concentric to cylinder walls
(C) Hold a fine oil film on cylinder walls
(D) Both (A) and (C)

31. Thermostat valve helps the engine to :
- (A) Keep the oil temperature at operating values
 - (B) Keep the coolant temperature at operating values
 - (C) Prevents the engine from overheating
 - (D) Both (B) and (C)
32. In a four stroke engine the cam shaft turns at :
- (A) Same speed as the crank shaft
 - (B) Double the speed as the crank shaft
 - (C) Half the speed of the crank shaft
 - (D) One fourth the speed of the crank shaft
33. Mechanic X says that all OHC engines have rocker arms. Mechanic Y says that some use bucket tappets and no rocker arms. Who is correct?
- (A) Mechanic X
 - (B) Mechanic Y
 - (C) Both X and Y
 - (D) Neither X nor Y
34. Valve overlap occurs at :
- (A) the end of exhaust stroke
 - (B) the beginning of power stroke
 - (C) the beginning of compression stroke
 - (D) the end of power stroke
35. The rate at which work is done, is measured in terms of :
- (A) Energy
 - (B) Torque
 - (C) Inertia
 - (D) Power
36. The volume of air contained above the piston when the piston is at TDC is :
- (A) Clearance volume
 - (B) CC
 - (C) Swept volume
 - (D) Stroke volume
37. The condition of exploding the end charge before the completion of normal combustion is :
- (A) Pre-ignition
 - (B) Rumble
 - (C) Detonation
 - (D) Stalling
38. Low Cetane fuel implies that :
- (A) It takes longer time to ignite
 - (B) It takes lesser time to ignite
 - (C) Ignites as soon as it enters the cylinder
 - (D) Both (B) and (C)

39. Mechanical fuel pumps are operated by :
- (A) Cam in the cam shaft (B) Eccentric in the crank shaft
(C) Skew gear in the cam shaft (D) Eccentric in the cam shaft
40. Taper needle jet is found in :
- (A) Solex carburettor (B) SU carburettor
(C) Zenith carburettor (D) Carter carburettor
41. Generally turbo charger is operated by :
- (A) A belt driven by the engine crank shaft
(B) A gear attached to the cam shaft
(C) A chain and sprocket drive
(D) Exhaust gas
42. Qualitative governing is best suited for :
- (A) High speed engines (B) Slow speed engines
(C) Diesel engines (D) Petrol engines
43. Growler is associated with :
- (A) Battery (B) Armature
(C) CB point (D) FIP
44. High compression ratio result in :
- (A) Increased NO_x emission (B) More soot in exhaust
(C) Reduced HC and CO emission (D) All of the above
45. PCV valve is located between :
- (A) Crank case and inlet manifold (B) Crank case and carburettor
(C) Air cleaner and crank case (D) Air cleaner and carburettor
46. CO in the exhaust of a vehicle should not be more than :
- (A) 0.5% (B) 1%
(C) 1.5% (D) 2%
47. The temperature below which the oil will not flow is :
- (A) Fire point (B) Flash point
(C) Pour point (D) Flow point

48. Transfer case is a type of _____ in four wheel drive vehicles.
- (A) Crank case (B) Gear Box
(C) Transmission shaft (D) Differential
49. Gear Clash while shifting is due to :
- (A) Incorrect clutch adjustment (B) Damaged synchronizer unit
(C) Low level gear oil (D) Any of the above
50. In case of front engine rear wheel drive cars the drive shaft has :
- (A) Minimum one universal joint (B) Maximum two universal joint
(C) Minimum two universal joint (D) Two slip joints
51. A slip joint permits changes in :
- (A) Wheel base (B) Wheel track
(C) Wheel alignment (D) None
52. Alternator produces electricity in its :
- (A) Stator windings (B) Rotor field windings
(C) Commutator (D) Regulator
53. While trying to start an engine it cranks slowly but doesn't start .It may be due to :
- (A) Low temperature (B) Run down battery
(C) Damaged fuel system (D) Any of the above
54. Approximate starter pinion-ring gear, gear ratio is :
- (A) 5:1 (B) 15:1
(C) 25:1 (D) 30:1
55. When it is needed to top up the lead acid battery frequently, it is due to :
- (A) Sulfation (B) Overloading
(C) Overcharging (D) Long standing period
56. Hydrometer is device used to check :
- (A) Voltage of a cell (B) Specific gravity of acid
(C) Voltage of a battery (D) Temperature of electrolyte

57. In hydraulic system Brake binding is due to :
- (A) Incorrect free pedal play adjustment (B) Blocked by pass port
(C) Blocked air vent in master cylinder (D) Any of the above
58. Double de-clutching is associated with :
- (A) Constant mesh gear box (B) Synchromesh gear box
(C) Hydraulic clutch (D) Magnetic clutch
59. Gear clash during shifting may be caused by any one of the following except :
- (A) Defective synchronizer (B) Incorrect pedal play
(C) Too low idle speed (D) Unadjusted shift mechanism
60. How many synchronizer units are there in a three speed transmission?
- (A) One (B) Two
(C) Three (D) Four
61. How many gears are there in the main shaft of a four speed transmission?
- (A) Six (B) Five
(C) Four (D) Three
62. Pick the odd one out :
- (A) Half shaft (B) Clutch shaft
(C) Main shaft (D) Lay shaft
63. A humming noise from the under body of a rear wheel drive vehicle is due to :
- (A) Bend propeller shaft (B) Incorrect differential meshing
(C) Faulty gear box (D) Binding brake
64. The type of front axle in which the king pin is usually fixed in the stub axle forging and its ends turn in the forked end of the axle beam is :
- (A) Lemoine (B) Inverted lemoine
(C) Reversed elliot (D) Elliot
65. The tilt of the front wheels from vertical is called :
- (A) Caster (B) Camber
(C) King Pin Inclination (D) Toe in