



1.	What is the primary component of crude oil?	
	a) Sulfur	b) Carbon
	c) Hydrogen	d) Nitrogen
2.	How is crude oil separated?	
	a) Crystallization	b) Fractional distillation
	c) Decantation	d) Sublimation
3.	What type of gas is LPG?	
	a) Gasoline	b) Kerosene
	c) Uncondensed	d) Heavy oil
4.	What is the boiling temperature of petro	1?
	a) 40-120°C	b) 120-180°C
	c) 180-250°C	d) 250-320°C
5.	Which fuel/oil is used for obtaining gas	oline through cracking process?
	a) Kerosene	b) Diesel
	c) Heavy	d) Naphtha
6.	5. Which of the following is not used as a lubricant?	
	a) Lubricating oil	b) Grease
	c) Asphalt	d) Petroleum jelly
7.	What is the function of petroleum coke?	?
	a) Lubrication	b) In candles
	c) As fuel	d) As solvent
8.	Removal of water is done by	
	a) Orsteds process	b) Kjeldahl's process
	c) Filtration	d) Cottrells process
9.	Crude oil is in the form of	





	a) emulsion of oil and brine	b) emulsion of oil and impurities
	c) emulsion of brine and impurities	d) emulsion of impurities and moisture
10.	To remove sulphur compounds from per	troleum, it is treated with
	a) copper nitrate	b) copper oxide
	c) magnesium chloride	d) sodium chloride
11.	The scales formed during the removal	l of harmful impurities can be removed by
	a) electrolysis	b) electroplating
	c) electrotyping	d) dehydration
12.	During refining the petroleum, in fract still?	ional distillation, what is the temperature in
	a) 800°C	b) 400°C
	c) 300°C	d) 100°C
13.	Which of the following fraction obtained	d on distillation used in dry cleaning?
	a) petroleum ether	b) heavy oil
	c) gas oil	d) naphtha
14.	What is the catalyst used in catalytic pol	ymerization?
	a) Phosphoric acid	b) Al ₂ O ₃
	c) Al ₂ (siO ₃) ₃	d) Zirconium oxide
15.	Heavy oil on refractionation produces _	
	a) Asphalt	b) diesel oil
	c) grease	d) kerosene oil
16.	In liquid phase thermal cracking, the yie	eld of petrol is
	a) 50%-60%	b) 60%-70%
	c) 70%-80%	d) 80%-90%





17.	In the catalytic cracking, what is the catalyst used?	
	a) Nacl	b) Kcl
	c) ZnSO ₄	d) Al ₂ O ₃
18.	The gasoline vapours are purified by	
	a) thermal cracking	b) catalytic cracking
	c) stabilization	d) knocking
19.	With increase in the number of carbon an	d hydrogen atoms in hydrocarbon molecules
	the density of petroleum products	
	a) Decreases	b) Increases
	c) Remains same	d) All of the mentioned
20.	Which of the following has maximum h	ydrogen/carbon ratio (by weight)?
	a) Naptha	b) Diesel
	c) Gasoline	d) Fuel oil
21.	Carbon percentage (by weight) in crude	petroleum may be about
	a) 65	b) 75
	c) 85	d) 95
22.	Solvent used for dewaxing of petroleum	products are
	a) Furfural	b) Methyl Ethyl Ketone
	c) Propane	d) Both (b) and (c)
23.	In catalytic cracking, the	
	a) Gasoline obtained has a very low octane number	b) Pressure & temperature is very high
24.	 c) Gasoline obtained has very high aromatic content Pressure & temperature maintained in car 	 d) Gasoline obtained has very high amount of gum forming compounds talytic cracking is about
	a) 2 atm & 500°C	b) 10 atm & 500°C
	c) 30 atm & 200°C	d) 50 atm & 750°C





25.	The frictional mean effective pressure increased	as the compression ratio is
	a) increases	b) decreases
	c) remains same	d) none of the mentioned
26.	is the speed of journal, n	nore will be the oil pulled into the apex of
	the wedge of oil in the clearances space.	
	a) Lower	b) Higher
	c) Constant	d) None of the mentioned
27.	An increase in supporting pressure will	l the oil film thickness, and
	decreases the eccentricity.	
	a) increases	b) decreases
	c) remains same	d) none of the mentioned
28.	The frictional power (F.P) is given by	
	a) $F.P. = B.PI.P.$	b) F.P. = I.PB.P.
	c) F.P. = B.P./I.P.	d) $F.P. = I.P./B.P.$
29.	Crankcase mechanical friction is about _	of total engine friction
	a) 15 to 20 percent	b) 25 to 30 percent
	c) 35 to 40 percent	d) 45 to 60 percent
30.	Blow by losses are reduced as the engine	e speed is
	a) lowered	b) Remains same
	c) Decreased	d) Increased
31.	is the loss occurring	due to the pumping work required to pump
	gases into and out of the pre-combustion	chamber.
	a) Exhaust and inlet system throttling	b) Combustion chamber pumping loop
	losses	losses
	c) Crankcase mechanical friction	d) Blow by losses
32.	The effect of stroke to bore ratio on engi	ne friction is





	a) Remains same	b) Very small
	c) Big	d) very big
33.	The friction and economy improves as a	are used
	a) smaller number of larger	b) larger number of larger cylinders
	cylinders	
	c) smaller number of smaller cylinders	d) larger number of smaller cylinders
34.	Friction mean effective pressure increase	es as the compression ratio is
	a) lowered	b) Remains same
	c) Decreased	d) Increased
35.	Engine friction increases rapidly as the s	peed
	a) lowered	b) Remains same
	c) Decreased	d) Increased
36.	Higher the oil viscosity greater is the fric	ction loss
	a) Greater	b) Same
	c) Less	d) Smaller
37.	in cooling water tempera	ture reduces engine friction through its effect
	on oil viscosity	
	a) lower	b) reduction
	c) Decrease	d) Increase
38.	Among the following, which is not the fu	unction of lubrication oil
	a) Operate the working parts	b) Lubricate the working parts
	c) Cleaning	d) Cooling
39.	In hydrostatic bearing,	
	a) The axis of journal is eccentric with respect to axis of bearing	b) The axis of journal is concentric with respect to axis of bearing





c) The axis can be either eccentric or d) All of the above concentric depending upon speed

40. For hydrodynamic lubrication

	 a) There should be relative motion between the surfaces of the journal and the bearing and wedge shaped clearance space c) There should be elastic deformation 	b) There should be external source like pump to supply lubricant under pressured) There should be metal to metal contact
	of the parts in contact	
41.	For hydrostatic lubrication	
	a) There should be relative motion between the surfaces of the journal and the bearing and wedge shaped clearance space	b) There should be external source like pump to supply lubricant under pressure
	c) There should be elastic deformation	d) There should be metal to metal contact
	of the parts in contact	
42.	For elasto-hydrodynamic lubrication	
	a) There should be relative motion between the surfaces of the journal and the bearing and wedge shaped clearance space	b) There should be external source like pump to supply lubricant under pressure
	c) There should be elastic	d) There should be metal to metal contact
	deformation of the parts in contact	
43.	In Petroff's equation, it assumed that the	e lubricant film is
	a) Converging	b) Diverging
	c) Uniform	d) Converging diverging
44.	A thick film bearing is a bearing	
	a) Where the surfaces of journal and the bearing are completely separated by a film of lubricant	b) Where the surfaces of journal and the bearing are partially separated by a film of lubricant and there is partial metal to metal contact
	c) Where the surfaces of journal and the bearing are separated by a film created by elastic deflection of parts	d) Where there is no lubricant

45. In hydrodynamic bearing,



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46.	 a) The axis of journal is eccentric with respect to axis of bearing c) The axis can be either eccentric or concentric depending upon speed The property of the bearing material to 	b) The axis of journal is concentric with respect to axis of bearingd) All of the aboveyield and adopt its shape to that of journal is
	called	
	a) Embeddability	b) Conformability
	c) Viscosity	d) Endurance limit stress
47.	When the bearing is subjected to fluctua	ting or impact load the bearing characteristic
	number should be times its m	inimum value
	a) 5 times	b) 10 times
	c) 15 times	d) 20 times
48.	As compared with oil with VI=80, a lub	ricating oil with VI=90
	a) Has more viscosity	b) Has less viscosity
	c) Has more rate of change of viscosity	d) Has less rate of change of viscosity
	with respect to temperature	with respect to temperature
49.	Thick film lubrication describes a phe	enomenon where two surfaces are
separated.		
	a) Completely	b) Partially
	c) Not	d) Fewly
50.	A journal bearing is a conta	act bearing working on the hydrodynamic
	lubrication and which supports load in	direction.
	a) Sliding, Axial	b) Rolling, Radial
	c) Sliding, Radial	d) Rolling, Axial
51.	When the load of bearing is carried by d	irect surface to surface contact is called
	a) Full film condition	b) Boundary condition
	c) Dry condition	d) All of the above
52.	Hydrostatic bearing usually use as	lubricant





	a) Oil	b) Grease
	c) Fuel	d) All of the above
53.	Hydrostatic bearing enters Hydrodynam	ic state when the journal is
	a) Stationary	b) Rotating
	c) Both A and B	d) None of the above
54.	The lubrication in which load of bearing	g is carried solely by a film of fluid and there
	is no contact between the two bearings s	surface is called
	a) Full film condition	b) Boundary condition
	c) Dry condition	d) All of the above
55.	A high temperature lubricants used may	undergo
	a) To reduce the operating cost	b) To reduce the number of parts
	c) To reduce the operating friction	d) To reduce the toe-out during the turns
56.	What is the angle between the vertical w	when the top of the wheel slants outward?
	a) Negative camber	b) Negative castor
	c) Positive camber	d) Positive castor
57.	Find the value of pivot center distance in	f the angle of inside lock is 40°C and the angle
	of the outside lock is 35°C and the whee	lbase is 5.5 m
	a) 1.3 m	b) 8.5 m
	c) 6.5 m	d) 3.2 m
58.	Among the following, which is not the	force acting on Kingpin Bearing
	a) Reaction force on Wheel	b) Load on lower knuckle bearing
	c) Load of Steering wheel	d) Load on upper knuckle bearing
59.	A high temperature lubricants used may	undergo
	a) vulcanization	b) volatilization
	c) lubrication	d) combustion





60.	The reduction in friction is only when _	of the oil film is than
	that of the metal.	
	a) shear strength, more	b) shear strain, less
	c) shear strain, more	d) shear strength, less
61.	The friction is needed to be reduced bec	ause
	a) It will increase the load	b) It will increase the consumption
		electricity
	c) it will be reducing the excess heat	d) It will increase the excess the heat
	generation	generation
62.	Oil emulsions are the most effective lub	ricants in
	a) heavy cuttings	b) light cutting
	c) engines	d) gears
63.	The lubricant in internal combustion is e	exposed to
	a) high pressure	b) low pressure
	c) low temperature	d) high temperature
64.	The lubricants that are suitable for inte	ernal combustion engines must have
	viscosity index.	
	a) high	b) low
	c) no	d) minimum
65.	In gears, the lubricants are exposed to	
	a) high pressure	b) low pressure
	c) low temperature	d) high temperature
66.	The lubricants for gears must possess	
	a) less oiliness	b) effected by centrifugal force
	c) resistance to oxygen	d) low load carrying capacity
67.	What are the lubricants used for railway	tracks?





	a) graphite	b) grease
	c) coconut oil	d) vegetable oil
68.	What is the best lubricant for tractor rol	ler?
	a) graphite	b) heavy oil
	c) grease	d) vegetable oil
69.	The lubricants for transformers must ha	ve quality of good
	a) dielectric strength	b) less oiliness
	c) no resistance to oxygen	d) low load capacity
70.	In textile industries are adde	ed to the lubricants.
	a) catalyst	b) inhibitors
	c) oxygen	d) carbon
71.	The lubricants used in refrigerators will	have
	a) no pour point	b) high viscosity
	c) high pour point	d) low cloud point
72.	In solid lubricants, the will	be low.
	a) coefficient of friction	b) calorific value
	c) stability	d) cleanliness
73.	One of the advantages of the solid lubri	cants is
	a) unstable in radiation	b) high coefficient of friction than liquid
	a) low coefficient of friction	lubricants
74	C) low coefficient of friction	the
/4.	a) multiple and	h) composite meterial
	a) film	d) surface
75	C) IIIII	u) surrace
13.	Soaps are metal saits of	





	a) fatty acids	b) carboxylic acids
	c) amino acids	d) inorganic acids
76.	The lubricant should have	vapor pressure.
	a) High	b) Extreme
	c) Moderate	d) Low
77. The more friction of the greases is due to their high		es is due to their high
	a) velocity	b) viscosity
	c) temperature coefficient	d) buoyancy
	a) Mass	b) Stiffness
	c) Mass and stiffness	d) Stiffness and eccentricity