

No	Question	Option A	Option B	Option C	Option D
1	Minimum clearance between overhead line and railway track upto 33KV	7.2 meter	7.6 meter	8.6 meter	10 meter
2	Wooden pole are used as line supports for voltage upto	11 kv	22 kv	66 kv	400 kv
3	Insulators used on EHT transmission lines are made of	PVC	Porcelain	Glass	Teflon
4	The clearance between underground cable and gas pipeline is	0.25 M	0.75 M	1.0 M	1.75 M
5	Which tests are performed before commissioning of cable	Conductor resistance test	Insulation resistance	Pressure test	All of above
6	In power transformer; the breather is provided to	filter transformer oil	to control the level of oil in the tank	fresh air for increasing cooling effect	to arrest flow of moisture into the tank
7	Buchholz relay is used on	Air cooled transformers	Oil cooled transformers	Welding transformers	Furnace transformers
8	Tappings in transformer usually provided on	L.V winding	H.V. winding	Primary winding	Secondary winding
9	The grid substations are generally	Indoor substations	Outdoor substations	Underground sub-stations	Pole-mounted sub-stations
10	Lightning arresters in normal condition provides	high resistance path between line and earth	high reactance path between line and earth	high impedance path between line and earth	low impedance path between line and earth
11	Series reactors are used to	improve transmission efficiency	improve the power factor of the system	improve voltage regulation	to bring down the fault level
12	Which of the following circuit breakers is preferred for EHT application	Air blast circuit breakers	minimum oil circuit breakers	Bulk oil circuit breakers	SF6 circuit breakers
13	In the circuit breaker, the arcing contacts are made of	electrolytic copper	copper tungsten alloy	aluminium	porcelain
14	Electric faults can be prevented by	increasing the value of earthing resistance	By avoiding overloading	By using inferior quality of material	By using proper rating protective devices
15	Rubber gloves are safe upto	1000 V	2000 V	3000 V	4000 V
16	The most common type of fault is	single phase to ground	phase-to-phase	two-phase-to-ground	three-phase to ground
17	Four alternators, each rated at 5 MVA, 11 kV, with 20% reactance are working in parallel. The short-circuit level at bus-bars is	6.25 MVA	20 MVA	25 MVA	100 MVA
18	If the positive, negative and zero sequence reactances of an element of a power system are 0.3, 0.3 and 0.8 pu respectively, then the element would be a	synchronous generator	synchronous motor	static load	transmission line
19	The Zero sequence fault currents are absent when the fault is	single line to ground	line to line	double line-to-ground	none of the above
20	The arc voltage in a circuit breaker is	in the phase with the arc current	lagging the arc current by 90°	leading the arc current by 90°	lagging the arc current by 180°
21	SF6 circuit breakers have the drawback(s) of	sealing problem of gas	ingress of moisture in the gas system dangerous	deterioration of SF6 with time	both (a) and (b)
22	During arc extinction SF6 gas gets	decomposed into SF4 and SF2	decomposed into S and F ions	reduced to SF2	oxidised
23	Insulation resistance of high voltage circuit breakers is more than	0.5 MΩ	1.0 MΩ	10 MΩ	200 MΩ
24	Circuit breakers employed in railway applications is	Air break	SF6	oil	Vacuum
25	For rural electrification the circuit breaker preferred is	Air break	oil	Vacuum	SF6
26	The making to breaking current ratio for an EHV circuit breaker is	more than 1	equal to 1	less than 1	a negative number
27	A 3-phase circuit breaker is rated at 2000 MVA, 33 kV, its making current will be	35 k A	49 k A	70 k A	89 k A
28	Purpose of back-up protection is	to increase the speed	to increase a reach	to leave no blind spot	to increase protection reliability
29	By burden of the relay, we generally mean	volt-ampere rating of relay.	current rating of relay.	voltage rating of relay.	watt rating of relay.
30	In an over-current protection the setting of the earth fault relay is	more than the phase fault relay.	equal to the phase fault relay.	less than the phase fault relay.	the two settings are unrelated to each other.
31	Directional over-current relay is used for protection of	long transmission line	large power transformer.	ring main distribution line.	radial distribution line.
32	A mho relay is	voltage restrained directional relay..	voltage restrained over current relay.	directional restrained over-current relay.	directional restrained over-voltage relay.
33	Mho relay is normally used for the protection of	short transmission lines.	medium transmission lines.	long transmission lines.	no length criterion.
34	The relay used for phase fault protection of short transmission lines is	reactance relay	impedance relay	mho relay	IDMT relay
35	Differential relays are used for protection of equipment against	internal faults	over-current	reverse current	reverse power
36	Zero-sequence current is used for relaying purposes only in the case of	phase over-current relay	phase impedance relay	ground over-current relay	ground impedance relay

37	The boundary of a protective system is determined by the location of	circuit breakers	transformers	CTs	PTs
38	Any winding of a power transformer develops short-circuit owing to	loose connection	insulation failure	impulse voltage	mechanical vibrations
39	For the protection of transformers, harmonic restraint is used to guard against	magnetising in-rush current	unbalanced operation	lightning	switching overvoltage
40	The bus-bar zone faults are generally	phase-to-phase faults.	single-line-to-ground faults	double line-to-ground faults	3-phase short-circuits
41	A line trap in a long transmission line is used to	improve the power factor.	dampen the over-voltage oscillations.	confine the carrier signals in the line.	protect the line against direct lightning stroke.
42	Overhead ground wires are used to protect a transmission line against	line-to ground faults.	arcing earths.	voltage surges due to direct lightning stroke.	high voltage oscillations due to switching.
43	Surge modifiers are employed for	reducing the steepness of wave front.	reducing the current of wave front.	reducing the voltage of wave front.	modify the shape of the wave front.
44	For a transmission line the standing wave ratio is the ratio of	peak voltage to rms voltage.	maximum current to minimum current.	maximum voltage to minimum voltage.	maximum impedance to minimum impedance.
45	An overhead line with surge impedance of 400 Ω is terminated through a resistance R, for zero reflection at the junction. The value of R is	100 Ω	200 Ω	400 Ω	800 Ω
46	In comparison to line insulation, the insulation level of the station equipment is	less	more	equal	not related directly with each other.
47	Solid earthing is done for voltage below	400 V	600 V	33 kV	66 kV
48	Which one of the following grounding methods is used to reduce the tower footing resistance where earth resistance is low?	Single driven rod	Multiple rods.	Counter poises	plates.
49	Grounding transformer in a system is usually connected is	delta/delta	star/delta	zig-zag/delta	star/star
50	In tap changing transformers, the tappings are provided on	secondary winding	primary winding	tertiary winding.	high voltage winding.
51	Which of the following devices automatically interrupts the supply in the event of surges?	Earthing switch	Isolator.	Lightning switch.	Circuit breaker.
52	The power transmission capacity of a transmission line is	proportional to transmission voltage.	proportional to the square of transmission voltage.	inversely proportional to transmission voltage.	inversely proportional to the square of transmission voltage.
53	The stability of the power system is not affected by	generator reactance	line reactance	line losses	excitation of generators
54	Equal area criterion gives the information regarding	stability region.	absolute stability.	relative stability.	swing curves.
55	With fault clearing time, the transient stability limit of a power system	increases.	decreases.	first increases and then decreases.	first decreases and then increases.
56	The transient stability of the power system can be effectively improved by	excitation control.	phase shifting transformer.	single pole switching of circuit breakers.	increasing the turbine valve opening.
57	Load-flow studies involve, solving simultaneous	linear algebraic equations.	non-linear algebraic equations.	linear differential equations.	non-linear differential equations.
58	Gauss-Seidel interactive method can be used for solving a set of	linear differential equations only.	linear algebraic equations only.	both linear and non-linear algebraic equations.	both linear and non-linear differential equations.
59	For a 15-bus power system with 3 voltage controlled bus, the size of Jacobian matrix is	11 X 11	12 X 12	24 X 24	25 X 25
60	The skin effect of conductors does not depend on	size of wire	supply frequency	ambient temperature	nature of material
61	Conductors used in high-tension transmission lines are stranded because	it is cheap	it is easy to handle	it increase conductivity	it increases tensile strength.
62	Two most suitable materials for insulation are	Toughened glass and PVC	PVC and Porcelain	Toughened glass and Porcelain	PVC and Fibre glass
63	A distribution transformer usually is a	star-star transformer	delta-delta transformer	star-delta transformer	delta-star transformer.
64	Transmission lines link	distribution transformer to consumer's area	line in the consumer area to the premises of the consumer.	generating station with receiving end substation	receiving end substation to distribution transformer.
65	For power transmission over a distance of 100 km, the transmission voltage should be	11 kV	33 kV and above.	66 kV	132 kV
66	Ferrenti effect occurs in a long transmission line when	line is lightly loaded	line runs at UPF	line voltage decreases	line is heavily loaded
67	The "capacity" of a transmission line can be increased if	line inductive reactance is increased by 'loading'	line inductive reactance is reduced	transmission voltage is upgraded	(b) and (c) both
68	In HV transmission lines, the effect of capacitance can be neglected when the length of line is less then	80 km	110 km	150 km	210 km
69	With increase in series reactive loss in a transmission system,	frequency drops	system voltage degrades	Ferranti effect appears	low frequency oscillation appears.

70	By the presence of series capacitor the convergence of which method of solution is affected?	Gauss Seidel method	Newton-Raphson method	a and b both	Fast Decoupled Load Flow method
71	If the transmission line is terminated by characteristic impedance, the line will behave as	a cable	infinite line	lossless line	short transmission line
72	The charging current in a cable	leads the voltage by 90°	lags the voltage by 90°	lags the voltage by 180°	leads the voltage by 180°
73	Bundle conductors are used in transmission lines, the effective capacitance and inductance will respectively	Decrease and increase	Increase and decrease	Remain same and increase	Decrease and remain same
74	Transmission lines are transposed to	Reduce Ferranti effect	Reduce skin effect	Reduce transmission loss	Reduce interference with neighbouring communication lines
75	The per unit value of a 2 ohm resistor at 100 MVA base and 10 kV base voltage is	4 pu	2 pu	1/2 pu	0.2 pu
76	If a line, resistance and reactance are found to be equal and regulation is zero, then load will have	unity pf	zero pf	0.707 leading pf	0.707 lagging pf
77	A short line with R/X ratio 1, the zero regulation is obtained when the power factor of the load is	0.5 lagging	unity	0 leading	0.707 leading
78	Surge impedance of 400 Ω means	Line can be theoretically loaded upto 400 Ω	Line can be practically loaded up to 400 Ω	Open circuit impedance of 400 Ω	Short circuit impedance of 400 Ω
79	In loadflow analysis, the load at bus is represented as	A voltage dependent impedance at bus.	Constant real and reactive powers drawn from bus.	A constant impedance connected at bus.	A constant current drawn from the bus.
80	In a power system lightning arresters are used to protect the electrical equipment against	Power frequency of over-voltages	Direct strokes of lightning	Overcurrent due to lightning stroke	Overvoltages due to indirect lightning stroke
81	Who is the founder of e-mail?	Bill Gates	Ray Tomlinson	Jonathan Swift	Fredrick Cohen
82	A hygrometer is used to	measure relative density of liquids	measure sound under water	measure levels of humidity	measures the pressure of gas
83	Which element is called Devil's Copper?	Nickel	copper	Gold	Silver
84	The world's first Nuclear Power Station was built in	France	Russia	China	USA
85	Find the correct combination	Electric razor - King C. Gillette	Quantum Theory - Plank	Tape recorder - M. Lammond	Refrigerator - Walter Hunt
86	In which country was the first world Cup Football Tournament held?	Uruguay	Brazil	Argentina	Belgium
87	In which year was the Nobel Prize instituted in Sweden?	1903	1901	1889	1899
88	India's first modern warship is	INS Nilgiri	INS Magar	INS Investigator	INS Ajay
89	Which is the highest dam in India?	Koyna	Damodar	Hirakud	Bhakra-Nangal
90	Where can you find India's largest and the oldest museum?	Salar Jung Museum, Hyderabad	Indian Museum, Kolkata	Kelkar Museum, Kolkata	National Museum, New Delhi
91	Choose the meaning of the idiom or phrase :- Gives her a cold shoulder	Pushes her with his shoulder whenever they meet.	Insults her in presence of others.	Argues with her on any issue.	Tries to be unfriendly by taking no notice of her
92	Choose the meaning of the idiom or phrase :- Save one's bacon	To escape	To participate	To deny	To pretend
93	Choose the meaning of the idiom or phrase :- Cool as a cucumber	Dead	Cool and composed	Fainted	Nervous
94	Find part of sentence with grammatical or idiomatic error in it :- We have to just to put our signature on the form and submit it.	We have to	just to put our	signature on the form	and submit it.
95	Find part of sentence with grammatical or idiomatic error in it :- No sooner did he give a whistle than we all start running in that direction.	No sooner did he	give a whistle than	we all start running	in that direction.
96	Find part of sentence with grammatical or idiomatic error in it :- I think, she has no other books to read because she has not enough money to buy them	I think she has no	other books to read	because she has not enough	money to buy them
97	Find part of sentence with grammatical or idiomatic error in it :- Sohan had not studied so that he failed and had lost the confidence of his friends.	Sohan had not studied	so that he failed	and had lost the	confidence of his friends
98	Research has also _____ the illusion that childhood dreams are pure innocence.	established	accepted	observed	dispelled

99	The Prime Minister has _____ people to restore peace.	applauded	exhorted	reprimanded	consoled
100	Corruption charges forced him to _____ the throne.	abdicate	fulfil	avoid	abduct