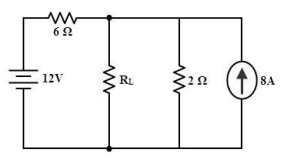
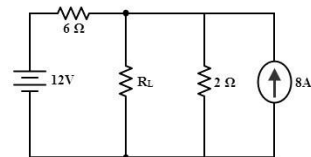
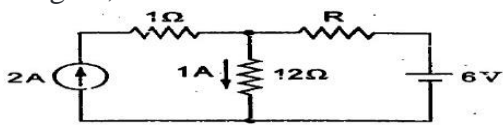
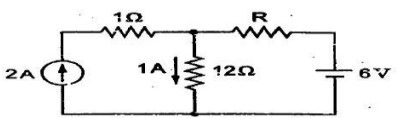
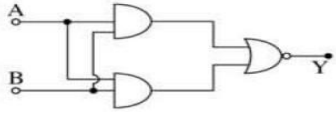
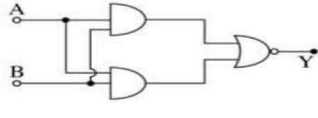
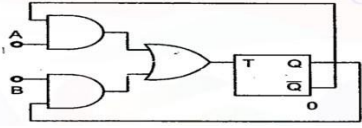
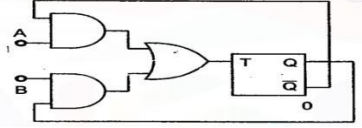
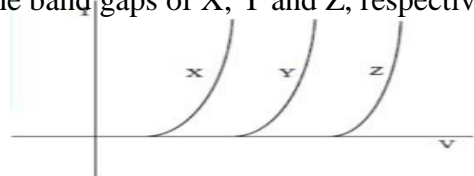
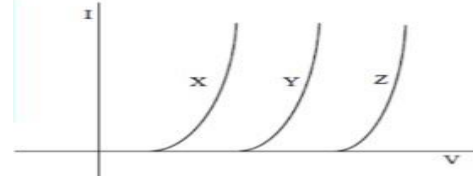
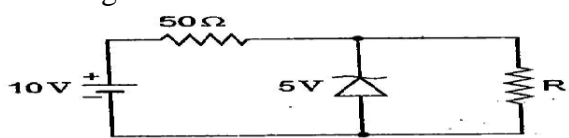
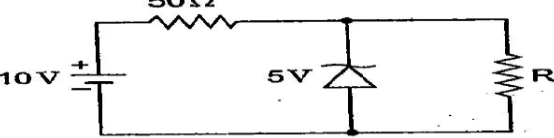


<p>explanation of A C) A is true but R is false D) A is false but R is true</p>	<p>D) <math>\frac{1}{\omega} \sin \omega t</math></p>
<p>2. The value of total potential difference created between the electrodes, when the cell is not connected to an external circuit is known as its: - A) Electromotive force      B) Electrostatic force C) Electromagnetic force D) Electrochemical force</p>	<p>4. The value of total potential difference created between the electrodes, when the cell is not connected to an external circuit is known as its: - A) Electromotive force      B) Electrostatic force C) Electromagnetic force      D) Electrochemical force</p>
<p>3. A <math>4\Omega</math> resistor is connected in series with a <math>10\text{ mH}</math> inductor, across a <math>100\text{ V}</math>, <math>50\text{ Hz}</math> voltage source. The impedance of the circuit will be - A) <math>5 - j 3.14</math>                      B) <math>5 + j 3.14</math> C) <math>4 - j 3.14</math>                      D) <math>4 + j 3.14</math></p>	<p>3. A <math>4\Omega</math> resistor is connected in series with a <math>10\text{ mH}</math> inductor, across a <math>100\text{ V}</math>, <math>50\text{ Hz}</math> voltage source. The impedance of the circuit will be - A) <math>5 - j 3.14</math>                      B) <math>5 + j 3.14</math> C) <math>4 - j 3.14</math>                      D) <math>4 + j 3.14</math></p>
<p>4. A <math>1\mu\text{F}</math> capacitor is connected to <math>12\text{ V}</math> battery. The energy stored in the capacitor is: A) <math>12 \times 10^{-6}\text{ J}</math>                      B) <math>24 \times 10^{-6}\text{ J}</math> C) <math>36 \times 10^{-6}\text{ J}</math>                      D) <math>72 \times 10^{-6}\text{ J}</math></p>	<p>4. A <math>1\mu\text{F}</math> capacitor is connected to <math>12\text{ V}</math> battery. The energy stored in the capacitor is: A) <math>12 \times 10^{-6}\text{ J}</math>                      B) <math>24 \times 10^{-6}\text{ J}</math> C) <math>36 \times 10^{-6}\text{ J}</math>                      D) <math>72 \times 10^{-6}\text{ J}</math></p>
<p>5. An open coil has - A) zero resistance and zero inductance B) infinite resistance and infinite inductance C) infinite resistance and zero inductance D) zero resistance and infinite inductance</p>	<p>5. An open coil has - A) zero resistance and zero inductance B) infinite resistance and infinite inductance C) infinite resistance and zero inductance D) zero resistance and infinite inductance</p>
<p>6. Determine the value of load resistance, <math>R_L</math> for which maximum power will transfer from source to load -</p>  <p>A) <math>R_L = 8\ \Omega</math>                      B) <math>R_L = 1.5\ \Omega</math> C) <math>R_L = 4\ \Omega</math>                      D) <math>R_L = 3\ \Omega</math></p>	<p>6. Determine the value of load resistance, <math>R_L</math> for which maximum power will transfer from source to load -</p>  <p>A) <math>R_L = 8\ \Omega</math>                      B) <math>R_L = 1.5\ \Omega</math> C) <math>R_L = 4\ \Omega</math>                      D) <math>R_L = 3\ \Omega</math></p>
<p>7. If a <math>12\Omega</math> resistor draws a current of <math>1\text{ A}</math> as shown in the figure, the value of resistance <math>R</math> is -</p>  <p>A) <math>4\ \Omega</math>      B) <math>6\ \Omega</math>      C) <math>8\ \Omega</math>      D) <math>18\ \Omega</math></p>	<p>7. If a <math>12\Omega</math> resistor draws a current of <math>1\text{ A}</math> as shown in the figure, the value of resistance <math>R</math> is -</p>  <p>A) <math>4\ \Omega</math>      B) <math>6\ \Omega</math>      C) <math>8\ \Omega</math>      D) <math>18\ \Omega</math></p>
<p>8. Twelve 1-ohm resistances are used as edge to form a cube. The resistance between two diagonally opposite corners of the cube is: A) <math>5/6\ \Omega</math>      B) <math>1\ \Omega</math>      C) <math>6/5\ \Omega</math>      D) <math>3/2\ \Omega</math></p>	<p>8. Twelve 1-ohm resistances are used as edge to form a cube. The resistance between two diagonally opposite corners of the cube is: A) <math>5/6\ \Omega</math>      B) <math>1\ \Omega</math>      C) <math>6/5\ \Omega</math>      D) <math>3/2\ \Omega</math></p>

	C) AB + ACB D) AB + AC + BC	
10.	PLAs, CPLDs, and FPGAs are all which type of device? A) SLD B) PLD C) EPROM D) SRAM	PLA)s, CPLD)s FPGA)s A) SLD) B) PLD) C) EPROM) D) SRAM)
11.	To multiply a number by 8 in 8085 Microprocessor we have to use RAL instruction: A) Once B) Twice C) Thrice D) Four times	8085 RAL instruction A) Once B) Twice C) Thrice D) Four times
12.	ASCII code is used as – A) An alphanumeric Code B) A Weighted Code C) A Cyclic Code D) An Alphabetic Code	ASCII code is used as – A) An alphanumeric Code B) A Weighted Code C) A Cyclic Code D) An Alphabetic Code
13.	Decimal Number (85) <sub>10</sub> is encoded as 11000101 in – A) 8421 Code B) 2421 Code C) 4421 Code D) 2221 Code	Decimal Number (85) <sub>10</sub> is encoded as 11000101 in – A) 8421 Code B) 2421 Code C) 4421 Code D) 2221 Code
14.	The circuit given below is functionally equivalent to: 	The circuit given below is functionally equivalent to:  A) Inhibit Gate B) NAND Gate C) Full Adder D) Comparator
15.	What is represented by the digital circuit given in the figure below: 	What is represented by the digital circuit given in the figure below:  A) A J-K Flip-Flop with A=J and B=K. B) An S-R Flip-Flop with A=S and B=R. C) An S-R Flip-Flop with A=R and B=S D) A J-K Flip-Flop with A=K and B=J.
16.	The phase correcting circuit is: A) High-pass filter B) Low-pass filter C) All-pass filter D) Band-pass filter	The phase correcting circuit is: A) High-pass filter B) Low-pass filter C) All-pass filter D) Band-pass filter
17.	The response of an LTI/LSI system is given by the _____ of input and impulse response: A) Convolution B) Correlation C) Superposition D) None	The response of an LTI/LSI system is given by the _____ of input and impulse response: A) Convolution B) Correlation C) Superposition D) None

	<p>B) The value of sensitivity on the highest scale</p> <p>C) The value of sensitivity on the lowest scale</p> <p>D) The smallest signal which result in a detectable output</p>	<p>C) <math>\frac{1}{4} \text{ mV}</math> or <math>\frac{1}{4} \text{ mV}</math></p> <p>D) <math>\frac{1}{4} \text{ mV}</math> or <math>\frac{1}{4} \text{ mV}</math> <math>4 \text{ V}</math> or <math>\frac{1}{4} \text{ mV}</math></p>
20.	<p>Ratio error in the current transformer is attributed to:</p> <p>A) Power factor of the primary</p> <p>B) Leakage flux</p> <p>C) Exciting current</p> <p>D) Wattless component of the current in primary</p>	<p>Ratio error in the current transformer is attributed to?</p> <p>A) Power factor of the primary</p> <p>B) Leakage flux</p> <p>C) Exciting current</p> <p>D) Wattless component of the current in primary</p>
21.	<p>The memory that communicates directly with CPU is called:</p> <p>A) Auxiliary memory      B) USB storage</p> <p>C) Main memory</p> <p>D) Micro-Program Memory</p>	<p>The memory (CPU) that communicates directly with CPU is called:</p> <p>A) Auxiliary memory      B) USB storage</p> <p>C) Main memory              D) Micro-Program Memory</p>
22.	<p>The following property of semiconductors cannot be determined from Hall effect:</p> <p>A) Semiconductor is n-type or p-type</p> <p>B) The carrier concentration</p> <p>C) The mobility of semiconductor</p> <p>D) The atomic concentration of semiconductor</p>	<p>The following property of semiconductors cannot be determined from Hall effect?</p> <p>A) n - type or p - type</p> <p>B) Carrier concentration</p> <p>C) Mobility of semiconductor</p> <p>D) Atomic concentration of semiconductor</p>
23.	<p>The components of full-wave voltage double circuit are:</p> <p>A) 2 diodes and 1 capacitor</p> <p>B) 2 diodes and 2 capacitors</p> <p>C) 4 diodes and 1 capacitor</p> <p>D) 4 diodes and 2 capacitors</p>	<p>The components of full-wave voltage double circuit are:</p> <p>A) 2 diodes and 1 capacitor</p> <p>B) 2 diodes and 2 capacitors</p> <p>C) 4 diodes and 1 capacitor</p> <p>D) 4 diodes and 2 capacitors</p>
24.	<p>Fermi level in a p-type semiconductor lies close to which one of the following?</p> <p>A) The top of the valance band.</p> <p>B) The bottom of the valance band.</p> <p>C) The top of the conduction band.</p> <p>D) The bottom of the conduction band</p>	<p>Fermi level in a p-type semiconductor lies close to which one of the following?</p> <p>A) The top of the valance band.</p> <p>B) The bottom of the valance band.</p> <p>C) The top of the conduction band.</p> <p>D) The bottom of the conduction band</p>
25.	<p>A region of negative differential resistance is observed in the current voltage characteristics of a silicon PN junction if-</p> <p>A) both the P-region and the N-region are heavily doped</p> <p>B) the N-region is heavily doped compared to the P-region</p> <p>C) the P-region is heavily doped compared to the N-region</p> <p>D) an intrinsic silicon region is inserted between the P-region and the N-region</p>	<p>A region of negative differential resistance is observed in the current voltage characteristics of a silicon PN junction if-</p> <p>A) P- region and N- region are heavily doped</p> <p>B) N- region is heavily doped compared to the P- region</p> <p>C) P- region is heavily doped compared to the N- region</p> <p>D) an intrinsic silicon region is inserted between the P- region and the N- region</p>

	<p>by applying +ve bias to gate</p> <p>D) <math>V_{GS} = V_{GS(th)} + \sqrt{\frac{I_D}{K}}</math> (MOSFET) <math>V_{GS} = V_{GS(th)} + \sqrt{\frac{I_D}{K}}</math></p>
<p>27. The I-V characteristics of three types of diodes at the room temperature, made of semiconductors X, Y and Z, are shown in the figure. Assume that the diodes are uniformly doped and identical in all respects except their materials. If <math>E_{gX}</math>, <math>E_{gY}</math> and <math>E_{gZ}</math> are the band gaps of X, Y and Z, respectively, then</p>  <p>A) <math>E_{gX} &gt; E_{gY} &gt; E_{gZ}</math>          B) <math>E_{gX} = E_{gY} = E_{gZ}</math>          C) <math>E_{gX} &lt; E_{gY} &lt; E_{gZ}</math>          D) No relationship among these band gaps exists</p>	<p><math>V_{GS} = V_{GS(th)} + \sqrt{\frac{I_D}{K}}</math></p> <p><math>V_{GS} = V_{GS(th)} + \sqrt{\frac{I_D}{K}}</math></p>  <p>A) <math>E_{gX} &gt; E_{gY} &gt; E_{gZ}</math>          B) <math>E_{gX} = E_{gY} = E_{gZ}</math>          C) <math>E_{gX} &lt; E_{gY} &lt; E_{gZ}</math>          D) No relationship among these band gaps exists</p>
<p>28. The large signal bandwidth of an op-amp is limited by its:</p> <p>A) Loop gain                      B) Slew rate          C) Output impedance          D) Input frequency</p>	<p>op-amp (op-amp) <math>f_{max} = \frac{1}{2\pi RC}</math></p> <p>A) Loop gain                      B) Slew rate          C) Output impedance          D) Input frequency</p>
<p>29. In a full wave rectifier with input frequency of 50 Hz, the frequency of the output is:</p> <p>A) 200 Hz                      B) 150 Hz          C) 100 Hz                      D) 50 Hz</p>	<p>50 Hz input frequency, full wave rectifier output frequency is 100 Hz.</p> <p>A) 200 Hz                      B) 150 Hz          C) 100 Hz                      D) 50 Hz</p>
<p>30. In a single stage RC coupled CE amplifier, phase shift at lower 3-dB frequency is –</p> <p>A) 0                      B) 135°                      C) 180°                      D) 225°</p>	<p>CE amplifier, phase shift at lower 3-dB frequency is 180°.</p> <p>A) 0                      B) 135°                      C) 180°                      D) 225°</p>
<p>31. FET phase-shift oscillator uses –</p> <p>A) Voltage Series feedback          B) Voltage Shunt feedback          C) Current Series feedback          D) Current Shunt feedback</p>	<p>FET phase-shift oscillator uses Voltage Series feedback.</p> <p>A) Voltage Series feedback                      B) Voltage Shunt feedback          C) Current Series feedback                      D) Current Shunt feedback</p>
<p>32. The 6V Zener diode as shown in the circuit below has zero Zener resistance and a knee current of 5 mA. Then what is the minimum value of R so that the voltage across it does not fall below 6 V?</p>  <p>A) 1200 Ohms                      B) 80 Ohms          C) 60 Ohms                      D) 40 Ohms</p>	<p>10V DC source, 50 Ohm resistor, 6V Zener diode, load resistor R.</p>  <p>A) 1200 Ohms                      B) 80 Ohms          C) 60 Ohms                      D) 40 Ohms</p>













































35.	A lead compensator network includes a parallel combination of R and C in the feed forward path. If the transfer function of the compensator is $G(S) = (s+2)/(s+4)$ , the value of RC is- A) 2                    B) 1                    C) 0.25                    D) 0.5	$G(S) = \frac{s+2}{s+4}$ RC का मान क्या है? A) 2                    B) 1                    C) 0.25                    D) 0.5
36.	Which of the following statements is correct for a system with gain margin close to unity or a phase margin close to zero? A) The system is relatively stable B) The system is highly stable C) The system is highly oscillatory D) None of the above	निम्नलिखित में से कौन सा कथन सही है जो एक प्रणाली के लिए है जिसका लाभ मार्जिन एकता के करीब है या फेज मार्जिन शून्य के करीब है? A) प्रणाली अपेक्षाकृत स्थिर है B) प्रणाली अत्यधिक स्थिर है C) प्रणाली अत्यधिक दोलकीय है D) उपरोक्त में से कोई नहीं
37.	Which technique gives quick transient and stability response? A) Root locus                    B) Bode C) Nyquist                    D) Nichols	कौन सा तकनीक तेज प्रतिक्रिया और स्थिरता प्रतिक्रिया देती है? A) V को प्लॉट करना                    B) बीडे C) निक्विस्ट                    D) निचोल्स
38.	By increasing impurity content in the metal alloy, the residual resistivity always- A)Decreases                    B)Increases C)Remains constant D)Becomes temperature independent	धातु मिश्रण में अशुद्धि सामग्री बढ़ाने से शेष प्रतिरोध हमेशा - A) घटता है                    B) बढ़ता है C) स्थिर रहता है                    D) ताप से स्वतंत्र बन जाता है
39.	Electron occupying the ground state is at its: - A)Lowest Energy Level                    B)Fermi Level C)Highest Energy Level                    D)Zero total energy Level	भूस्थिति में स्थित इलेक्ट्रॉन का स्तर - A) निम्नतम ऊर्जा स्तर                    B) फर्मी स्तर C) उच्चतम ऊर्जा स्तर                    D) शून्य कुल ऊर्जा स्तर
40.	For an FM receiver with an input signal-to noise ratio for 29 dB, a noise figure of 4 dB and an FM improvement factor of 16 dB, the pre-detection and post-detection signal to-noise ratios are: A) 30 dB and 41 dB                    B)30 dB and 49 dB C)25 dB and 49 dB                    D)25 dB and 41 dB	एक FM रीसेवर में इनपुट सिग्नल-टू-नॉइस अनुपात 29 dB है, नॉइस फिगर 4 dB है और FM सुधार कारक 16 dB है, प्र-डिटेक्शन और पोस्ट-डिटेक्शन सिग्नल-टू-नॉइस अनुपात क्या हैं: A) 30 dB और 41 dB                    B) 30 dB और 49 dB C) 25 dB और 49 dB                    D) 25 dB और 41 dB
41.	Noise is added to a signal in a communication system A)At the receiving end B)At transmitting antenna C)In the channel D)During regeneration of the information	शोर एक सिग्नल में एक संचार प्रणाली में कहाँ जोड़ा जाता है? A) रीसेविंग एंड में B) ट्रांसमिटिंग एंटीना में C) चैनल में D) सूचना के रीजेनरेशन के दौरान
42.	The analog signal $m(t)$ is given below $m(t) = 4\cos 100\pi t + 8\sin 200\pi t + \cos 300\pi t$ , the Nyquist sampling rate will be: A)1/100                    B)1/200 C)1/300                    D) 1/600	एनालॉग सिग्नल $m(t)$ निम्नलिखित है: $m(t) = 4\cos 100\pi t + 8\sin 200\pi t + \cos 300\pi t$ , नियुक्स्ट सैंपलिंग दर क्या होगी: A) 1/100                    B) 1/200 C) 1/300                    D) 1/600

	C) An integrator D) A Voltage-to-frequency converter	C) $\frac{1}{s}$ D) $\frac{1}{s^2}$
45.	Range of frequencies allotted for commercial VHF TV broadcast is- A) (470 - 2300) MHz      B) (470 - 2300) kHz C) (47 - 230) MHz      D) (47 - 230) kHz	D) 30-60 MHz A) (470 - 2300) MHz      B) (470 - 2300) kHz C) (47 - 230) MHz      D) (47 - 230) kHz
46.	If an FM wave is represented by the equation $e = 10 \sin(9 \times 10^8 t + 4 \sin 1500 t)$ , then what is the carrier frequency? A) 127.32 MHz      B) 200.00 MHz C) 286.62 MHz      D) 143.31 MHz	$e = 10 \sin(9 \times 10^8 t + 4 \sin 1500 t)$ A) 127.32 MHz      B) 200.00 MHz C) 286.62 MHz      D) 143.31 MHz
47.	The process of assigning a discrete value from a prescribed set of a finite numbers of such discrete values to each one of the sample values of the message signal, is called : A) Filtering      B) Noise removal C) Decoding      D) Quantization	A) Quantization      B) Noise removal C) Decoding      D) Filtering
48.	How many bits are required to encode 64 level PCM? A) 7      B) 6 C) 5      D) 4	64 levels A) 7      B) 6 C) 5      D) 4
49.	Bandwidth is determined by the minimum pulse width in which of the following- A) PPM      B) PDM C) QAM      D) All of these	A) PPM      B) PDM C) QAM      D) All of these
50.	The electric transmission of a document at a distant place via telephone line is called – A) Modem      B) Radar C) Fax      D) None of these	A) Modem      B) Radar C) Fax      D) None of these
51.	In optical communication, wavelength 1550 nm is used nowadays. What is the possible reason? A) Dispersion is very low B) Loss is very low C) WDM is feasible D) Optical amplification is feasible	A) Dispersion is very low B) Loss is very low C) WDM is feasible D) Optical amplification is feasible
52.	Which type of fiber optic cable has/have its/their core with the size of about 480 $\mu\text{m}$ to 980 $\mu\text{m}$ & made up of polymethylmethacrylate (PMMA)? A) Glass fiber optic cable B) Plastic fiber optic cable C) Plastic clad silica fiber optic cable D) All of the above	A) Glass fiber optic cable B) Plastic fiber optic cable C) Plastic clad silica fiber optic cable D) All of the above

	B) High power oscillator C) Low gain amplifier D) Not an oscillator	C) $\frac{1}{2} \rho v$ D) $\frac{1}{2} \rho v^2$
55.	The Poynting vector measures: A) Power B) Energy C) Energy Density D) Power Density	$\vec{U} = \vec{E} \times \vec{H}$ A) $\vec{E}$ B) $\vec{H}$ C) $\vec{E} \cdot \vec{H}$ D) $-\vec{E} \cdot \vec{H}$
56.	Which one of the following modes has the highest cut-off wavelength in a rectangular waveguide? A) $TM_{11}$ B) $TM_{01}$ C) $TE_{01}$ D) $TE_{10}$	Which mode has the highest cut-off wavelength? A) $TM_{11}$ B) $TM_{01}$ C) $TE_{01}$ D) $TE_{10}$
57.	If the maximum and minimum voltages on a transmission line are 4V and 2V, respectively for a typical load VSWR is: A) 1.0 B) 0.5 C) 2.0 D) 4.0	$V_{max} = 4V$ , $V_{min} = 2V$ VSWR = $\frac{V_{max}}{V_{min}} = 2$ A) 1.0 B) 0.5 C) 2.0 D) 4.0
58.	An antenna above its critical frequency is- A) Resistive B) Capacitive C) Inductive D) Any of the above	Antenna above critical frequency is- A) Resistive B) Capacitive C) Inductive D) Any of the above
59.	IEEE has defined the specifications for a wireless LAN, called _____, which covers the physical and data link layers. A) IEEE 802.3 B) IEEE 802.5 C) IEEE 802.11 D) IEEE 802.2	IEEE 802.11 covers physical and data link layers. A) IEEE 802.3 B) IEEE 802.5 C) IEEE 802.11 D) IEEE 802.2
60.	Which of the following is true regarding the VLANs? A) You must have at least two VLANs defined in every Cisco switched network. B) All VLANs are configured at the fastest switch and, by default, propagate this information to all other switches. C) You should not have more than 10 switches in the same VTP domain. D) VTP is used to send VLAN information to switches in a configured VTP domain.	Which is true regarding VLANs? A) You must have at least two VLANs defined in every Cisco switched network. B) All VLANs are configured at the fastest switch and, by default, propagate this information to all other switches. C) You should not have more than 10 switches in the same VTP domain. D) VTP is used to send VLAN information to switches in a configured VTP domain.
61.	Which of the following is wrong example of Network Layer? A) Internet Protocol (IP) – ARPANET B) X.25 Packet Level Protocol (PLP)-ISO C) Source routing and domain naming-USENet D) X.25 level 2-ISO	Which is wrong example of Network Layer? A) Internet Protocol (IP) – ARPANET B) X.25 Packet Level Protocol (PLP) -ISO C) Source routing and domain naming-USENet D) X.25 level 2-ISO

	D) The broadcast address of the subnet is 10.16.3.241 255.255.254.0.	
63.	The network address of 172.16.0.0/19 provides how many subnets and hosts? A) 7 subnets, 30 hosts each B) 8 subnets, 8,190 hosts each C) 8 subnets, 2,046 hosts each D) 7 subnets, 2,046 hosts each	172.16.0.0/19 A) 7 subnets, 30 hosts each B) 8 subnets, 8,190 hosts each C) 8 subnets, 2,046 hosts each D) 7 subnets, 2,046 hosts each
64.	Which of the following is true regarding access lists applied to an interface? A) You can place as many access lists as you want on any interface until you run out of memory. B) You can apply only one access list on any interface. C) One access list may be configured, per direction, for each layer 3 protocol configured on an interface. D) You can apply two access lists to any interface.	A) You can place as many access lists as you want on any interface until you run out of memory. B) You can apply only one access list on any interface. C) One access list may be configured, per direction, for each layer 3 protocol configured on an interface. D) You can apply two access lists to any interface.
65.	Which of the following is not a layer in the TCP/IP model? A) Application                      B) Session C) Transport                        D) Internet	A) Application                      B) Session C) Transport                        D) Internet
66.	Which statement about IPv6 addresses is true? A) An IPv6 address is 128 bits long, represented in hexadecimal. B) An IPv6 address is 32 bits long, represented in hexadecimal. C) An IPv4 address is 128 bits long, represented in decimal. D) An IPv6 address is 32 bits long, represented in decimal.	A) An IPv6 address is 128 bits long, represented in hexadecimal. B) An IPv6 address is 32 bits long, represented in hexadecimal. C) An IPv4 address is 128 bits long, represented in decimal. D) An IPv6 address is 32 bits long, represented in decimal.
67.	PSTN stands for _____ A) Personal switched telephone network B) Personal switched telephone node C) Public switched telephone node D) Public switched telephone network	A) Personal switched telephone network B) Personal switched telephone node C) Public switched telephone node D) Public switched telephone network
68.	In telephone systems, load is expressed in the unit of- A) Bells    B) decibels    C) erlangs    D) watts	A) Bells    B) decibels    C) erlangs    D) watts
69.	In which frequency range do the cordless phones mostly work? A) 88-108 MHz                      B) 43-50 MHz C) 540-1600 kHz                    D) 200-540 kHz	A) 88-108 MHz                      B) 43-50 MHz C) 540-1600 kHz                    D) 200-540 kHz



	B.Saubhagya Scheme C. Atal Bhujal Yojana D. National LED Programme	B.  C.  D. 
2	Which among the following is not a Tiger reserve? A. Pench B. Kanha C. Bhandhavgarh D. Palamu	  A.  B.  C.  D. 
3	Who won Five international gold medals in just three weeks in 2019? A. Sakshi Malik C. Deepika Kumari B. Hima Das D. P V Sindhu	2019     A.  B.  C.  D. 
4	What is MPATGM? A. India's indigenous anti-tank missile B. India's Advanced Multi-role Combat Aircraft C. Self Propelled Howitzer manufactured by L&T D. None of the above	MPATGM  ? A.  4  B.   5  C.   6  D.  4 
5	Which of the following schemes aims to transform India into a digitally empowered society and knowledge economy? A. Digital India B. Skill India C. Uddan Scheme D. Startup India	    4 A.  B.  C.  D. 
6	What is the position of India in the World Bank's ease of doing business 2020 report? A. 63 <sup>rd</sup> B. 77 <sup>th</sup> C. 79 <sup>th</sup> D. 62 <sup>nd</sup>	  A. 63  B. 77  C. 79  D. 62 
7	Which of the following schemes aims to promote infrastructure development in educational institutions? A. HRIDAY B. PRASAD C. RISE D. NESIDS	  A.  B.  C.  D. 
8	Which of the following is considered as India's coal capital? A. Singrauli B. Talchar C. Dhanbad D. Korba	  A.  B.  C.  D. 
9	Dhokra craft and bhitti chitra are the arts and craft in which of the following states? A. Jharkhand B. Chattisgarh C. Nagaland D. Mizoram	  A.  B.  C.  D. 
10	Which of the following states has an Elephant Festival which includes a tug-of-war between humans and elephants? A. Kerala B. Rajasthan C. Tamil Nadu D. Andhra Pradesh	  A.  B.  C.  D. 
11	Which of the following states does not fall under Western Ghat? A. Goa B. Maharashtra C. Karnataka D. Gujrat	  A.  B.  C.  D. 

14	Which of the following cricket player scored three double centuries in ODI cricket history? A. Rohit Sharma                      B. Virat Kohli C. Sachin Tendulkar                  D. Ravi Shastri	<p>300 200 100 50 25 10 5 2 1 0</p> <p>300 200 100 50 25 10 5 2 1 0</p> <p>A. 300 200                                      B. 200 100</p> <p>C. 100 50                                      D. 50 25</p>
15	India is planning satellite surveillance of ships with which of the following country? A. France      B. USA      C. Russia      D. Sri Lanka	<p>300 200 100 50 25 10 5 2 1 0</p> <p>300 200 100 50 25 10 5 2 1 0</p> <p>A. 300                      B. 200                      C. 100                      D. 50</p>
16	Which is the next number in the given series? 6, 15, 36, 75, ? A. 231                      B. 138                      C. 214                      D. 216	<p>300 200 100 50 25 10 5 2 1 0</p> <p>6, 15, 36, 75, ?</p> <p>A. 231                      B. 138                      C. 214                      D. 216</p>
17	The average age of a class of 40 students is 12 years. If the teacher's age is also included, the average age increases by one year. The teacher's age is : A. 52 years      B. 53 years      C. 51 years      D. 54 years	<p>40 30 20 10 5 2 1 0</p> <p>40 30 20 10 5 2 1 0</p> <p>A. 52                      B. 53                      C. 51                      D. 54</p>
18	A merchant sold an article for Rs 75 at a profit percent equal to his cost price. The cost price of the article was A. Rs 45      B. Rs 50      C. Rs 54      D. Rs 60	<p>300 200 100 50 25 10 5 2 1 0</p> <p>300 200 100 50 25 10 5 2 1 0</p> <p>A. 45                      B. 50                      C. 54                      D. 60</p>
19	Zinc and copper are in the ratio of 5 : 3 in 200 g of an alloy. how much grams of copper be added to make the ratio as 3:5? A. 133 1/3      B. 1/200      C. 72                      D. 66	<p>200 100 50 25 10 5 2 1 0</p> <p>200 100 50 25 10 5 2 1 0</p> <p>A. 133 1/3                      B. 1/200                      C. 72                      D. 66</p>
20	A, B and C working alone, can do a piece of work in 11 days, 20 days and 55 days, respectively. How soon can the work be done if A is assisted by B and C on alternate days? A. 7 days      B. 8 days      C. 9 days      D. 10 days	<p>A, B, C 10 5 2 1 0</p> <p>A, B, C 10 5 2 1 0</p> <p>A. 7                      B. 8                      C. 9                      D. 10</p>
21	Seven men can complete a piece of work in 12 days. How many additional men will be required to complete double the work in 8 days? A. 28                      B. 21                      C. 14                      D. 7	<p>300 200 100 50 25 10 5 2 1 0</p> <p>300 200 100 50 25 10 5 2 1 0</p> <p>A. 28                      B. 21                      C. 14                      D. 7</p>
22	A train of length 150 m takes 40.5 seconds to cross a tunnel of length 300 m. The speed of the train (in kmph) is A. 13.33                      B. 26.67                      C. 40                      D. 400	<p>300 200 100 50 25 10 5 2 1 0</p> <p>150 40.5 300</p> <p>A. 13.33                      B. 26.67                      C. 40                      D. 400</p>
23	A goes on a picnic trip and meets a women B who is the sister of A's wife. how is B related to A? A. Sister                      B. Sister-in-law C. Brother                      D. Brother-in-law	<p>A 100 50 25 10 5 2 1 0</p> <p>A 100 50 25 10 5 2 1 0</p> <p>A.                      B.                      C.                      D.</p>
24	Which fraction is the largest? A. 1/2                      B. 4/5                      C. 5/8                      D. 7/10	<p>300 200 100 50 25 10 5 2 1 0</p> <p>1/2 4/5 5/8 7/10</p> <p>A. 1/2                      B. 4/5                      C. 5/8                      D. 7/10</p>

	price of 20 books, the loss per cent is A. 16                  B. 20                  C. 24                  D. 25	20 पुस्तकوں کے قیمت پر, 20% کا نقصان ہوا تو فیصد کا نقصان کیا ہے? A. 16                  B. 20                  C. 24                  D. 25
28	If A and B together can complete a piece of work in 15 days, and B alone in 20 days. In how many days can A alone complete the work? A. 60                  B. 45                  C. 40                  D. 30	A اور B مل کر 15 دنوں میں کام ختم کر سکتے ہیں اور B تنہا 20 دنوں میں کام ختم کر سکتے ہیں۔ تو A تنہا کتنے دنوں میں کام ختم کر سکتے ہیں? A. 60                  B. 45                  C. 40                  D. 30
29	What is 5% of 50% of 500? A. 12.5                  B. 25                  C. 1.25                  D. 6.25	500 کا 50% کا 5% کا کیا فیصد ہے? A. 12.5                  B. 25                  C. 1.25                  D. 6.25
30	Ram's salary is increased from Rs 630 to Rs 700. find the increase percent A. 10 1/9 %                  B. 9 1/9 % C. 11 1/9 %                  D. 12 1/9 %	Ram کی تنخواہ 630 روپوں سے 700 روپوں میں بڑھ گئی ہے۔ فیصد میں بڑھوتری کیا ہے? A. 10 1/9 %                  B. 9 1/9 % C. 11 1/9 %                  D. 12 1/9 %