

**ELECTICITY DEPARTMENT**  
**A & N ADMINISTRATION, PORT BLAIR**

**Response for Claims & Objections of the candidates against the examination held for the recruitment of Junior Engineers (E & M) in June 2023**

Sl. No.	Name of the Candidate / Hall Ticket No. or Roll No.	Q. Set No.	Question & Answer Key	Claims/ Objection	Post Review correct Answer	Remarks
1	Debashish Ray AB0011000JUN23A210021	EL – 1	Q6.R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in series. Total voltage = 20V, Current I, V2 =? a) I = 1.23, V2 = 3.75 b) I = 1.25, V2 = 3.75 <b>c) I = 1.15, V2= 3.73</b> d) I = 1.16, V2 = 3.72 <b>Ans: I = 1.15, V2= 3.73</b>	ELECTRICAL: <b>Question No. 6</b> Paper -1 Correct answer is option - (B)	Alternative b is correct.	<b>Hence the candidates who have selected Option B will get full marks</b>
			29. Transistor is a (A) Current controlled current device. <b>(B) Current controlled voltage device.</b> (C) Voltage controlled current device. (D) Voltage controlled voltage device. Ans: "Current controlled voltage device"	MECHANICAL SECTION: <b>Question No. 29</b> Paper-1 Data incomplete Correct answer is option- ( A)	Alternative a is the only correct alternative	<b>Hence the candidates who have selected Option A will get full marks</b>
2	P. Surya DB0011000JUN23A210093	EL – 1	Q3. If a wire conductor of 0.2 ohm resistance is doubled in length, its resistance becomes (A) 0.4 ohm (B) 0.6 ohm <b>(C) 0.8 ohm</b> (D) 1.0 ohm <b>Ans: "0.8 ohm"</b>	<b>Q.3-</b> Here answer should be .4ohm instead of .8 ohm as in question length is doubled mentioned but if length is <u>stretched</u> to double then 0.8 ohm will come as area too becomes half.	Even when the length is stretched, the total volume of the wire will remain unchanged Therefore when you stretch the wire so that its length becomes two times its original length, the area of cross-section is halved. Therefore the new resistance will be 4X the original resistance, i.e., 4X0.2 = 0.8 Ohms and C is the correct alternative.	<b>Hence the candidates who have selected Option C will get full marks</b>
			6.R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in series. Total voltage = 20V,	<b>Q.6-</b> Answer should be option (b) i.e I= 1.25A and V= 3.75V	Alternative b is correct.	<b>Hence the candidates who</b>

			<p>Current I, V2 =?</p> <p>a) I = 1.23, V2 = 3.75</p> <p>b) I = 1.25, V2 = 3.75</p> <p><b>c) I = 1.15, V2= 3.73</b></p> <p>d) I = 1.16, V2 = 3.72</p> <p><b>Ans: I = 1.15, V2= 3.73</b></p>			<b>have selected Option B will get full marks</b>
3	G Ramesh Kumar Roll No - 352023000494	EL – 1	<p>Q.53. Earthworm is called farmer's friend cause–</p> <p>(A) It fix atmospheric nitrogen</p> <p>(B) It make the soil porous</p> <p>(C) It work as insecticide</p> <p><b>(D) It act as fungicide</b></p> <p><b>Ans: "It act as fungicide"</b></p>	I need a clarity on question number on 53 option i.e. B . IT MAKE THE SOIL POROUS. But other option is marked	Alternative b is correct	<b>Hence the candidates who have selected Option B will get full marks</b>
4	Chaileshwar Ramachandran Dhanalakshmi DB0011000JUN23A210046	EL – 1	<p>Q3. If a wire conductor of 0.2 ohm resistance is doubled in length, its resistance becomes (A) 0.4 ohm</p> <p>(B) 0.6 ohm</p> <p><b>(C) 0.8 ohm</b></p> <p>(D) 1.0 ohm</p> <p><b>Q. Ans: "0.8 ohm"</b></p>	<b>R. No. 03</b> <b>Correct answer is option (A)</b>	Even when the length is stretched, the total volume of the wire will remain unchanged Therefore when you stretch the wire so that its length becomes two times its original length, the area of cross-section is halved. Therefore the new resistance will be 4X the original resistance, i.e., 4X0.2 = 0.8 Ohms and C is the correct alternative	<b>Hence the candidates who have selected Option C will get full marks</b>
			<p>Q6. R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in series. Total voltage = 20V, Current I, V2 =?</p> <p>a) I = 1.23, V2 = 3.75</p> <p>b) I = 1.25, V2 = 3.75</p> <p><b>c) I = 1.15, V2= 3.73</b></p> <p>d) I = 1.16, V2 = 3.72</p> <p><b>Ans: I = 1.15, V2= 3.73</b></p>	<b>Q No. 06</b> <b>Correct answer is option (B)</b>	Alternative b is correct.	<b>Hence the candidates who have selected Option B will get full marks</b>
			<p>Q. 20. The volume of copper required for an ac transmission line is inversely proportional to (A) Current (B) Voltage (C) Power factor (D) Capacitor</p>	<b>Q No. 20</b> <b>Correct answer is both option (B &amp; C)</b>	Alternative b is the only correct alternative	<b>Hence the candidates who have selected Option B will</b>

			<b>Ans: "Voltage</b>			<b>get full marks</b>
			Q. 37. What should be the band gap of the semiconductors to be used as solar cell materials? (A) 0.5 eV (B) 1 eV <b>(C) 1.5 eV</b> (D) 1.9 eV <b>Ans: "1.5 eV"</b>	<b>Q No. 37</b> <b>Correct answer is both option (B &amp; C)</b>	The standard band gap is 1.5 eV and hence alternative c is correct.	<b>Hence the candidates who have selected Option C will get full marks</b>
			Q.38. The current produced in reverse-bias is called as _____ (A) Reverse Current (B) Breakdown Current (C) Negative Current <b>(D) Leakage Current</b> <b>Ans: "Leakage Current"</b>	<b>Q No. 38</b> <b>Correct answer is both option (A &amp; D)</b>	Alternative d is the only correct alternative	<b>Hence the candidates who have selected Option D will get full marks</b>
			Q.53. Earthworm is called farmer's friend cause— (A) It fix atmospheric nitrogen (B) It make the soil porous (C) It work as insecticide <b>(D) It act as fungicide</b> <b>Ans: "It act as fungicide"</b>	<b>Q No. 53</b> <b>Correct answer is option (B)</b>	Alternative b is correct	<b>Hence the candidates who have selected Option B will get full marks</b>
			66. The condition which must be fulfilled by two gear tooth profiles to maintain a constant angular velocity ratio between them is called _____ <b>(A) path of contact</b> (B) interference (C) arc of contact (D) law of gearing <b>Ans: "path of contact"</b>	<b>Q No. 66</b> <b>Correct answer is both option (A &amp; B)</b>	Alternative d is correct.	<b>Hence the candidates who have selected Option D will get full marks</b>

			<p>Q85. The following extinguisher is suitable for cotton or other textile fire (A) Water (B) Soda acid (C) Foam (D) Dry chemicals <b>Ans: "Dry chemicals"</b></p>	<p><b>Q No. 85</b> <b>Correct answer is both option (C &amp; D)</b></p>	<p>Cotton and textiles are classified as CLASS A material therefore alternative a ( Water ) is correct</p>	<p><b>Hence the candidates who have selected Option A will get full marks</b></p>
			<p>86. Buying of the annual requirements of an item during its season is called _____ (A) Seasonal Buying (B) Hand to mouth buying (C) Scheduled Buying (D) Speculative Buying <b>Ans: "Speculative Buying"</b></p>	<p><b>Q No. 86</b> <b>Correct answer is both option (A &amp; D)</b></p>	<p>Alternative d is correct.</p>	<p><b>Hence the candidates who have selected Option D will get full marks</b></p>
5	R. S. Shivadarsh Roll No - 352023001256	EL - 1	<p>Q6.R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in series. Total voltage = 20V, Current I, V2 =? a) I = 1.23, V2 = 3.75 b) I = 1.25, V2 = 3.75 <b>c) I = 1.15, V2= 3.73</b> d) I = 1.16, V2 = 3.72 <b>Ans: I = 1.15, V2= 3.73</b></p>	<p><b>Q. No. 6 :</b> R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in series. Total voltage = 20V, Current I, V2 =? a) I = 1.23, V2 = 3.75 b) I = 1.25, V2 = 3.75 c) I = 1.15, V2= 3.73 d) I = 1.16, V2 = 3.72 Ans: "I = 1.15, V2= 3.73" Actual answer : "I = 1.25 , V2 = 3.75"</p>	<p>Alternative b is correct.</p>	<p><b>Hence the candidates who have selected Option B will get full marks</b></p>
			<p>Q.53. Earthworm is called farmer's friend cause— (A) It fix atmospheric nitrogen (B) It make the soil porous (C) It work as insecticide <b>(D) It act as fungicide</b> <b>Ans: "It act as fungicide"</b></p>	<p><b>Q. No. 53 :</b>Earthworm is called farmer's friend cause— (A) It fix atmospheric nitrogen (B) It make the soil porous (C) It work as insecticide (D) It act as fungicide Ans: "It act as fungicide" Actual answer : "It make the soil porous"</p>	<p>Alternative b is correct</p>	<p><b>Hence the candidates who have selected Option B will get full marks</b></p>

6	Hemant Pratap Singh DB0021000JUN23A210034	EL – 1	Q. 71. A fixed gear having 200 teeth is in mesh with another gear having 50 teeth. The two gears are connected by an arm. The number of turns made by the smaller (A) 2 (B) 3 (C) 4 (D) 5 Ans: “4	The answer for <b>Question No 71</b> related to gear Train is marked as 4 but in many books and internet sites, the solution for same question is given as 5(answer attached). Moreover, I have book that give answer 5 for same question.	Alternative d is correct.	<b>Hence the candidates who have selected Option D will get full marks</b>
7	Avinash Kumar Singh DB0021000JUN23A210013	EL – 1	Q6.R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in series. Total voltage = 20V, Current I, V2 =? a) I = 1.23, V2 = 3.75 b) I = 1.25, V2 = 3.75 c) I = 1.15, V2= 3.73 d) I = 1.16, V2 = 3.72 Ans: I = 1.15, V2= 3.73	<b>Q. No : 06</b> CORRECT ANSWER: option (b) I = 1.25, V2 = 3.75  According to the ohms law calculation. With series connection the Total Resistance in series would be , R= 16ohms, Current in the circuit, I = 1.25 Amps, Total Voltage across the circuit, V = 20V  Formula: V = IR I = V/R I = 20/16 Current, I = 1.25 amps  For V2 =? V2 = I R2 V2 = 1.25 x 3 V2 = 3.75V Result: I = 1.25, V2 = 3.75	Alternative b is correct.	<b>Hence the candidates who have selected Option B will get full marks</b>
8	Abhishek Roy DB0011000JUN23A210117	EL – 1	Q.53. Earthworm is called farmer’s friend cause– (A) It fix atmospheric nitrogen	I have an objection on <b>Question No. 53 and 66</b> of paper-1. Given answer for	Alternative b is correct	<b>Hence the candidates who have selected Option B will</b>

			<p>(B) It make the soil porous (C) It work as insecticide <b>(D) It act as fungicide</b> <b>Ans: "It act as fungicide"</b></p>	<p><b>Q.53-</b> option D- It's acts as fungicide</p>		<p><b>get full marks</b></p>
			<p>66. The condition which must be fulfilled by two gear tooth profiles to maintain a constant angular velocity ratio between them is called _____ <b>(A) path of contact</b> (B) interference (C) arc of contact (D) law of gearing <b>Ans: "path of contact"</b></p>	<p><b>Q. 66-</b> option A- path of contact Claim: Q.53- option B- it make the soil porous Q.66- option D- law of gearing</p>	<p>Alternative d is correct.</p>	<p><b>Hence the candidates who have selected Option D will get full marks</b></p>
9	P. Eshwar Rao DB0021JUN23A310042	<del>EL-2</del> EL-3	<p><b>Question No:22.</b> Improving power factor- <b>(A) Reduces current for a given output</b> (B) Increases losses in line (C) Increases the cost of station equipment (D) Reduces the Voltage <b>Ans:A</b></p>	<p>1) Sir according to the answer key of set 2 , <b><u>the question number 22 , the answer shows " Faradays laws "</u></b> , while according to the source of internet (Sanfoundary .com or book )it shows answer of "<b><u>Mutul Induction</u></b> ". coz the concept of mutual induction is the main reason for the interference between telephone lines and the power lines . so please kindly accept the answer Mutul Induction instead of Faradays Laws .</p> <p>2) Sir according to the answer key of set 2 , <b><u>the question number 14 answer shows " Preventing huting "</u></b> , while according to the source of internet ( <b>Testbook .com</b> or</p>	<p>Alternative b is the only correct option.</p> <p>Alternative b is the only correct option.</p>	<p><b>Hence the candidates who have selected Option B will get full marks</b></p> <p><b>Hence the candidates who have selected Option B will get full marks</b></p>

				<p>book )it shows answer of "<b><u>Providing starting torque</u></b>". so please kindly accept the answer Providing starting torque instead of preventing hunting. concern pdf attached .</p> <p>3) Sir according to the answer key of set 2 , <b><u>the question number 76 answer shows " Bernoullis principle "</u></b> , while according to the source of internet ( <b>Testbook .com</b> or book) it shows answer of "<b><u>Newtons third law</u></b>". so please kindly accept the answer Providing <b><u>Newtons third law</u></b> instead of Bernoullis principle . concern document attached.</p> <p>4) Sir according to the answer key of set 2 , <b><u>the question number 83 answer shows " low "</u></b> , while according to the source of internet ( <b>Testbook .com</b> or book) it shows answer of "<b><u>High</u></b>". so please kindly accept the answer Providing High_ instead of Low . concern PDF attached .</p> <p>5) Sir according to the answer</p>	<p>Alternative c is the only correct option.</p> <p>Alternative b is the only correct option.</p>	<p><b>Hence the candidates who have selected Option C will get full marks</b></p> <p><b>Hence the candidates who have selected Option B will get full marks</b></p>
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				key of set 2 , <b>the question number 05</b> " " <b>find the current flowing through 5 ohm resister in the given circuit</b> . While there is no any kind of 5 Ohm resister present or shows in the circuit .so the question should be eliminate .	Requisite circuit diagram not available.	<b>The Question will be deleted/not considered for assessment and hence no marks will be awarded</b>
10	Debobrata Biswas DB0011000JUN23A110071	EL – 2	<p><b>Question No:3.</b> R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in parallel. Total Current = 23(A) Then V, I1 , I2 =?</p> <p><b>(A) 12.26v, 1.725, 2.875</b> (B) 12.23v, 2.875, 1.725 (C) 11.26v, 1.95, 1.74 (D) 11.23v, 1.74, 1.95 <b>Ans:A</b></p>	<p><b>Q. 3</b> - Answer provided by the response sheet is wrong. Right ans is =13.706, but options are not matched. This reason I am not attempt this question. I request to you, please give marks all student.</p>	None of the alternative is correct.	<b>The Question will be deleted/not considered for assessment and hence no marks will be awarded</b>
			<p><b>Question No:48.</b> Writer : Pen : : ? (A) Needle (B) Artist : : Tailor Brush <b>(C) Painter</b> (D) Teacher : Canvas : Class <b>Ans:C</b></p>	<p><b>Q. 48</b> - This question options are providing are not completed.</p>	None of the alternative is correct.	<b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b>

			<p><b>Question No:86.</b> Acceptance sampling is used in (A) control production (B) main production <b>(C) less production</b> (D) Mass production <b>Ans: C</b></p>	<p><b>Q. 86</b> - In this question, answer provided by response sheet is wrong. Right answer is = mass production.</p>	<p>Alternative d is correct.</p>	<p><b>Hence the candidates who have selected Option D will get full marks</b></p>
11	Saravanan DB0011000JUN23A110078	EL – 2	<p><b>Question No:49.</b> Petr walked 8 kms. west and turned right and walked 3 kms. The again he turned right and walked 12 kms. How far is he from the starting point? (A) 7 (B) 8 (C) 4 <b>(D) 8</b> <b>Ans:D</b></p>	<p><b>Q.No. 49.</b> Here the correct answer is 5 kms. But there is no such option</p>	<p>None of the alternative is correct.</p>	<p><b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b></p>
			<p><b>Question No:78.</b> The pressure of supercharger used is _____ (A) 1.0 to 1.3 bar (B) 1.2 to 1.4 bar <b>(C) 1.3 to 1.5 bar</b> (D) 1.3 to 1.9 bar <b>Ans: C</b></p>	<p><b>Q.No. 78.</b> Here option D is most suitable answer. 1.3 to 1.9 bar , if there is no such option , Answer is D</p>	<p>Alternative c is the only correct option.</p>	<p><b>Hence the candidates who have selected Option C will get full marks</b></p>
			<p><b>Question No:48.</b> Writer : Pen : : ? (A) Needle (B) Artist : : Tailor Brush (C) Painter (D) Teacher : Canvas : Class <b>Ans:C</b></p>	<p><b>Q.No. 48.</b> Here all option are collapsed. So impossible to find correct option.</p>	<p>None of the alternative is correct.</p>	<p><b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b></p>

			<p><b>Question No:27.</b> The minimum wind speed require to rotate the windmills for generation of electricity is.... (A) 15 m/hr (B) 1 km/h (C) 15 km/h (D) 20 km/h Ans:C</p>	<p><b>Q.No. 27.</b> Here the both answers are suitably correct answers. 15 km/hr and 20 km/hr are correct.</p>	<p>Alternative c is the only correct option. This minimum wind speed is referred to as Cut-in Speed.</p>	<p><b>Hence the candidates who have selected Option C will get full marks</b></p>
			<p><b>Question No:8.</b> Which is the most widely used material in the core of the transformer? <b>(A) cold rolled grain oriented sheet steel</b> (B) cold rolled grain steel (C) soft iron (D) steel Ans:A</p>	<p><b>Q.No. 8.</b> Actually soft iron answer is correct. I have through internet and also refer through book. I have attached the evidence.</p>	<p>Alternative a is the only correct option.</p>	<p><b>Hence the candidates who have selected Option A will get full marks</b></p>
12	Pandimeenal Regn. No. 352023001748	EL – 2	<p><b>Question No:48.</b> Writer : Pen :: ? (A) Needle (B) Artist : : Tailor Brush (C) Painter (D) Teacher : Canvas : Class Ans:C</p>	<p><b>Q. No. 48.</b> Writer : Pen :: ? Options are not properly mentioned. Painter : Canvas may be the answer.</p>	<p>None of the alternative is correct.</p>	<p><b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b></p>
13	P. Anil Kumar DB0021000JUN23A110090	EL – 2	<p><b>Question No:48.</b> Writer : Pen :: ? (A) Needle (B) Artist : : Tailor Brush (C) Painter (D) Teacher : Canvas : Class Ans:C</p>	<p>I would like to inform you that in the paper 2 <b>question number 48</b> options were wrongly printed. The option words where jumbled in between. So I kindly request you to kindly please check once.</p>	<p>None of the alternative is correct.</p>	<p><b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b></p>
14	Anugrah S. Roll No – 352023000413	EL – 2	<p><b>Question No:3.</b> R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in parallel. Total Current = 23(A)</p>	<p><b>Q. 3.</b> R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in parallel. Total Current = 23(A) Then V, I1 , I2 =?</p>	<p>None of the alternative is correct.</p>	<p><b>The Question will be deleted/not considered for</b></p>

		<p>Then V, I<sub>1</sub>, I<sub>2</sub> =?</p> <p><b>(A) 12.26v, 1.725, 2.875</b>  (B) 12.23v, 2.875, 1.725  (C) 11.26v, 1.95, 1.74  (D) 11.23v, 1.74, 1.95  <b>Ans:A</b></p> <p><b>Question No:48.</b>  Writer : Pen : : ?  (A) Needle  (B) Artist : : Tailor Brush  (C) Painter  (D) Teacher : Canvas : Class  <b>Ans:C</b></p> <p><b>Question No:95.</b>  In a reciprocating steam engine, which of the following forms a kinematic link?  (A) cylinder and piston  (B) piston and connecting rod  <b>(C) crankshaft and flywheel</b>  (D) flywheel and engine frame  <b>Ans: C</b></p>	<p>The provided question's options are incorrect since the question specifies that there are four resistors connected in parallel. In such a scenario, all four resistors should be considered when calculating the voltage. Please refer to the attached solution, which provides the accurate answer for the afore mentioned question.</p> <p><b>Q. 48.</b> Writer : Pen : : ?  The given question had options as such  (A) Needle  (B) Artist : : Tailor Brush  (C) Painter  (D) Teacher : Canvas : Class  The above given options are incomplete and not aligned for the analogy, it should have been Painter : Canvas, Where both Writer and his tool Pen must be compared.</p> <p><b>S. 95.</b> In a reciprocating steam engine, which of the following forms a kinematic link?  (A) Cylinder and piston  (B) Piston and connecting rod  (C) Crankshaft and flywheel  (D) Flywheel and engine frame  Apart from Option C "crankshaft and flywheel", Option B is also a right answer as "piston and</p>	<p>None of the alternative is correct.</p> <p>Alternative c is the only correct option.</p>	<p><b>assessment hence no marks will be awarded</b></p> <p><b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b></p> <p><b>Hence the candidates who have selected Option C will get full marks</b></p>
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		<p>Q.87. Which of the following alloying element increase hardness? (A) Silicon <b>(B) Sulphur</b> (C) Nickel (D) Titanium <b>Ans: B</b></p>	<p><b>Q. 87.</b> Which of the following alloying elements increase hardness? (A) Silicon (B) Sulphur (C) Nickel (D) Titanium Since both sulphur and nickel increase hardness, only one option from the given choices cannot be considered. <i>Therefore, I kindly request you to disregard the question.</i></p>	<p>Alternative b is the only correct option</p>	<p><b>Hence the candidates who have selected Option B will get full marks</b></p>

15	Kadambala Naveen DB0021000JUN23A110093	EL – 2	<p><b>Question No:3.</b> R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in parallel. Total Current = 23(A) Then V, I1 , I2 =? <b>(A) 12.26v, 1.725, 2.875</b> (B) 12.23v, 2.875, 1.725 (C) 11.26v, 1.95, 1.74 (D) 11.23v, 1.74, 1.95 <b>Ans:A</b></p>	<p>There are 2 corrections in the answer key in Set 2. The equations are <b>Q3 and Q23</b> Solution for Q3 I have attached. Solution for Q23 I have provided screenshots and links also.</p>	None of the alternative is correct.	<b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b>
16	Solanke Navnath Ankush DB0021000JUN23A110016	EL – 2	<p><b>Question No:48.</b> Writer : Pen : : ? (A) Needle (B) Artist : : Tailor Brush (C) Painter (D) Teacher : Canvas : Class <b>Ans:C</b></p> <p><b>Question No:3.</b> R1 = 1Ω, R2 = 3Ω, R3 = 5Ω and R4 = 7Ω connected in parallel. Total Current = 23(A) Then V, I1 , I2 =? <b>(A) 12.26v, 1.725, 2.875</b> (B) 12.23v, 2.875, 1.725 (C) 11.26v, 1.95, 1.74 (D) 11.23v, 1.74, 1.95 <b>Ans:A</b></p>	<p><b>Question no 48</b> is wrongly mentioned there is typing error so that no one is able to read the question correctly; all options are mixed into one another. Please take appropriate action. The original question should look like this Writer: Pen::? a) Needle : Tailor b) Artist : Brush c) Painter : Canvas d) Teacher : Class But in the question paper all options are messed up. Please look on to this question. <b>Question no 3</b> doesn't have any option which is the solution for the question. There is no option that is correct. All options are incorrect. Please look on to this question and take appropriate action</p>	None of the alternative is correct.  None of the alternative is correct.	<b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b>  <b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b>

17	M. L. N. Phaneendra DB0011000JUN23A310089	EL - 3	<p><b>Question No:5.</b> Find the current flowing through 5Ω resistor in the given circuit. (A) 0.57A (B) 0.64A <b>(C) 0.78A</b> (D) 0.89A <b>Ans:C</b></p>	<p><b>Q.5 )</b> There is <b>no 5 Ohm resistor present</b> In the given circuit diagram but the question is asked about finding current flowing through the 5 Ohm resistor. Mark has to give for all as the question is invalid.</p>	Requisite circuit diagram not available.	<p><b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b></p>
			<p><b>Question No:12.</b> The method which can be used for the speed control of induction motor from stator side is <b>(A) V / f control</b> (B) Current control (C) Capacitance control (D) Voltage control <b>Ans:A</b></p>	<p><b>Q.12 )</b> Both <b>Option - A and option -D</b> are valid answers, that is, <b>V/f control and Voltage control</b> methods are used for speed of control of Induction motor from stator side. Speed control of the Induction motor <b>from the stator side</b> can be done in the following ways. <b>i) Controlling the supply Voltage</b> <b>ii) Controlling the supply frequency</b> <b>iii) V / F control method</b> vi) Changing the Stator poles in case of Squirrel cage Induction Motors v) Pole amplitude modulation method (PAM) All the above methods have separate speed-torque characteristics and <b>these methods are mentioned in several standard textbooks.</b></p>	Alternative a is the only Correct option.	
			<p><b>Question No:14.</b> Damper winding is provided in a polyphaser synchronous motor in order to</p>	<p><b>Q.14 )</b> In a polyphase synchronous motor Damper winding is provided to serve two</p>	Alternative b is the only Correct option	<p><b>Hence the candidates who have selected Option B will</b></p>

			<p>(A) dampen out noise of the machine  <b>(B) prevent hunting</b>  (C) provide starting torque  (D) provide a cylindrical structure to reduce wind friction  <b>Ans:B</b></p> <p><b>Question No:32.</b>  Transistor is a  (A) Current controlled current device.  <b>(B) Current controlled voltage device.</b>  (C) Voltage controlled current device.  (D) Voltage controlled voltage device.  <b>Ans:B</b></p> <p><b>Question No:37.</b>  In FET, the current flow is mainly due to  (A) majority carriers  <b>(B) minority carriers</b>  (C) majority carriers and minority carriers  (D) Holes  <b>Ans:B</b></p>	<p>functions  1. Provide starting torque ( <b>Option C</b> )  2. Prevents hunting ( <b>Option B</b> )  Hence <b>Option C and Option B both are correct answers.</b>  The damper winding consists of short circuited copper bars embedded in rotor poles. <b>These damper windings act like a squirrel cage induction motor and provide starting torque and make itself start.</b></p> <p><b>Q.32)</b> Option A is the correct answer instead of Option B.  Option A - <b>Current controlled Current device</b> is the correct answer.  since <b><math>I_c = \text{Beta} * I_b</math></b>  that is, <b>current between two terminals( emitter and collector) is controlled by the current at the third terminal (Base). Output collector current is a function of base current as given in the above formula.</b></p> <p><b>Q.37)</b> In FET current flow is due to <b>Majority Carriers (Option A) but not due to Minority Carriers.</b>  --&gt;<b>Diode and Thyristors</b> are <b>minority carrier</b> devices  --&gt; <b>FET</b> is <b>majority carrier</b></p>	<p>Alternative A is the only correct option</p> <p>Alternative c is correct</p>	<p><b>get full marks</b></p> <p><b>Hence the candidates who have selected Option A will get full marks</b></p> <p><b>Hence the candidates who have selected Option C will get full marks</b></p>
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				<p>device. This is a well known statement to everyone as it is given in all textbooks.</p> <p>Hence <b>Option B is wrong and Option A is the right answer.</b></p>		
18	S. Karunakaran DB0021000JUN23A310070	EL – 3	<p><b>Question No:93.</b> The maximum temperature in TIG welding is (A) 6700 °C (B) 6500 °C <b>(C) 6000 °C</b> (D) 4000 °C <b>Ans: C</b></p> <p><b>Question No:74.</b> I am using an infinitesimally small element of fluid moving along with the flow as my model. What is the acceleration of this model in x-direction? a) <math>ax=DV^{\sim}Dt</math> b) <math>ax=\partial V^{\sim}\partial t</math> <b>c) <math>ax=DuDt</math></b> d) <math>ax=\partial u\partial t</math> <b>Ans: C</b></p>	<p><b>Question No:93</b> The maximum temperature in TIG welding is (A) 6700 °C (B) 6500 °C (C) 6000 °C (D) 4000 °C Ans: “6000 °C “ Most preferred Answer is option (A) 6700°C TIG welding. (7000°C to 10000°C)</p> <p><b>Question number :74</b> I am using an infinitesimally small element of fluid moving along with the flow as my model. What is the acceleration of this model in x-direction? a) <math>ax=DV^{\sim} Dt</math> b) <math>ax=\partial V^{\sim} \partial t</math> c) <math>ax=DuDt</math> d) <math>ax=\partial u\partial t</math> Ans: “<math>ax=DuDt</math>” Most preferred Answer None. Error in above given option . Kindly delete this question.</p>	<p>Alternative c is the only correct option</p> <p>Alternative c is correct</p>	<p><b>Hence the candidates who have selected Option C will get full marks</b></p> <p><b>Hence the candidates who have selected Option C will get full marks</b></p> <p><b>The Question</b></p>

			<p><b>Question No:85.</b> Which is not a part of 5R's of buying? a. Right Left Quality b. Left Quantity c. Right Quality <b>d. Right Source</b> <b>Ans: D</b></p> <p><b>Question No:18.</b> Which of the following is most suitable fuel for thermal power plant? <b>(A) Bituminous coal</b> (B) Lignite coal (C) Anthracite coal (D) Peat coal <b>Ans:A</b></p> <p><b>Question No:5.</b> Find the current flowing through 5Ω resistor in the given circuit.</p>	<p><b>Mechanical Engineering</b> <b>Question number:85</b> Which is not a part of 5R's of buying? a. Right Left Quality b. Left Quantity c. Right Quality d. Right Source Ans: "Right Source" Most preferred Answer is option (B) LEFT Quantity</p> <p><b>Electrical Engineering</b> <b>Question no :18</b> Which of the following is most suitable fuel for thermal power plant? (A) Bituminous coal (B) Lignite coal (C) Anthracite coal (D) Peat coal Most preferred Answer is option (C) Anthracite coal As per objective Mechanical Engineering book R.K Khurmi , J.K Gupta (S.Chand publication ISBN:978-81-219-0628-9 ) Page number : 228 Anthracite coal calorific value is about 36000kJ/kg and carbon content is about 90% and above as compared to Bituminous coal. Most suitable fuel is Anthracite coal.</p> <p><b>Electrical Engineering</b></p>	<p>None of the alternative is correct.</p> <p>Alternative a is Correct. Practically most of the coal linkages operate with Bituminous coal because of its abundant availability</p> <p>Requisite circuit diagram not available.</p>	<p><b>will be deleted/not considered for assessment hence no marks will be awarded</b></p> <p><b>Hence the candidates who have selected Option A will get full marks</b></p> <p><b>The Question will be</b></p>
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			(A) 0.57A (B) 0.64A <b>(C) 0.78A</b> (D) 0.89A <b>Ans:C</b>	<b>Question No: 5</b> Most preferred Answer: None/incorrect question. In the above question 5ohm data is Missing. Kindly delete the question.		<b>deleted/not considered for assessment hence no marks will be awarded</b>
19	K. Vijay Kumar DB0011000JUN23A310096	EL – 3	<p><b>Question No:95.</b> The example of successfully constrained motion is a a) motion of an S.I engine valve b) motion of the shaft in between a foot-step cylinder c) piston reciprocating outside an engine cylinder <b>d) motion of the shaft between a foot-step bearing</b> <b>Ans: D</b></p> <p><b>Question No:37.</b> In FET, the current flow is mainly due to (A) majority carriers <b>(B) minority carriers</b> (C) majority carriers and minority carriers (D) Holes <b>Ans:B</b></p> <p><b>Question No:12.</b> The method which can be used for the speed control of induction motor from stator side is <b>(A) V / f control</b> (B) Current control (C) Capacitance control</p>	<p><b>Q.95.</b> Option A and Option D both are correct. I am attaching screenshot from "THEORY OF MACHINES" book by "KHURMI". In book it is given "motion of IC engine valve is successfully constrained motion". But In Q95. it is given " motion of SI engine valve". Since SI engine and CI engine both are IC engine only.</p> <p><b>Q.37.</b> Option A is correct answer. I am also attaching screenshot from internet for your reference.</p> <p><b>Q.12.</b> Option A and Option D both are correct. You can refer from "ELECTRICAL MACHINES" book by " DP KOTHARI &amp; IJ NAGRATH. I am also attaching screenshot taken from internet. In Which method 1. By voltage control &amp; method 3.</p>	<p>Alternative D is the only correct option</p> <p>Alternative c is correct</p> <p>Alternative a is the only Correct option.</p>	<p><b>Hence the candidates who have selected Option D will get full marks</b></p> <p><b>Hence the candidates who have selected Option C will get full marks</b></p> <p><b>Hence the candidates who have selected Option A will get full marks</b></p>

			(D) Voltage control Ans:A	By V/F control.		
20	S. Suresh Kumar DB0021000JUN23A310010	<del>EL-4</del> EL- 6		<p><b>Q4.</b> A multiplier? is..... Correct Answer: D) Resistive Explanation: Resistors are used as multipliers for extending the range of instruments.</p> <p><b>Q22.</b> The volume of copper required for and AC transmission line is inversely proportional to Correct answer: Square of Voltage and Power Factor. Or inversely proportional to resistance of conductor material Explanation: File attached</p> <p><b>Q89.</b> What indenter is used for Brinnel Test? Correct Answer: a) Hardened Steel ball Explanation: Diamond indenters are used in Vickers and Rockwell tests</p> <p><b>Q94.</b> which of the following metal transfer method(s) is often limited to flat and Horizontal welding positions Correct Answer: A) Globular and C) spray Explanation: both the methods are limited to flat and Horizontal welding positions.</p>	<p>Alternative c is correct. A multiplier itself is a high resistance. The special condition is it is that it is Non- Inductive</p> <p>Alternative B is correct.</p> <p>Alternative A is correct</p> <p>Both Alternatives a and c are correct.</p>	<p><b>Hence the candidates who have selected Option c will get full marks</b></p> <p><b>Hence the candidates who have selected Option B will get full marks</b></p> <p><b>Hence the candidates who have selected Option A will get full marks</b></p> <p><b>The Question will be deleted/not considered for assessment hence no marks will be awarded</b></p>

			<p><b>Q98.</b> What is the value of Addendum?  Correct Answer: a) 1 module  Explanation: The standard Addendum value= 1 module</p> <p><b>Q56.</b> Ornithologist: Bird :: Archaeologist: ?  Correct Answer: A) Islands  Explanation:  Ornithologists are encouraged to study birds as Archaeologists are encouraged to study Islands. Study of Islands is also one of the research topics in the field of archaeology as birds are research topic in the field of ornithology.  Reference: "The Archeology of Islands" by Paul Rainbird  "Island Archeology" by Helen Dawson</p> <p>If the answer is Archaeology then for ornithologists it should have been Ornithology instead of 'Bird'.</p>	<p>Alternative a is correct.</p> <p>Alternative c is correct.</p>	<p><b>Hence the candidates who have selected Option A will get full marks</b></p> <p><b>Hence the candidates who have selected Option c will get full marks</b></p>
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21	Shubham Kumar DB0021000JUN23A310038	EL - 6	<p><b>Question No:61.</b> Specific speed of reaction turbine is between? a) 5 and 50 <b>b) 10 and 100</b> c) 100 and 150 d) 150 and 300 <b>Ans: B</b></p> <p><b>Question No:76.</b> What does the curl of velocity field give us? a) Moment of Inertial b) Angular velocity c) Angular acceleration d) Moment <b>Ans: B</b></p> <p><b>Question No:91.</b> Which of the following inert gas is used with DC power supply only? a) Argon b) Helium <b>c) CO2</b> d) Nitrogen <b>Ans: C</b></p> <p><b>Question No:98.</b> What is the value of addendum? a) 1 module b) 2 modules c) 3 modules <b>d) 4 modules</b> <b>Ans: D</b></p>	<p><b>Q 61.</b> Specific speed of reaction turbine in between? Ans- 10 and 100 Correct Ans- 150 and 300</p> <p><b>Q 76.</b> What does the curl of velocity field give us? Ans- Angular velocity Correct Ans- voriticity ( this was not in the option)</p> <p><b>Q 91.</b> Which of the following inert gas is used with DC power supply only? Ans- Co2 Correct Ans- Co2 is not the inert gas according to question.</p> <p><b>Q98.</b> What is the value of addendum? Ans- 4 modules Correct Ans- 1 moudle.</p>	<p>Alternative b is correct</p> <p>Alternative b is correct</p> <p>Alternative c is correct .</p> <p>Alternative a is correct.</p>	<p><b>Hence the candidates who have selected Option B will get full marks</b></p> <p><b>Hence the candidates who have selected Option B will get full marks</b></p> <p><b>Hence the candidates who have selected Option C will get full marks</b></p> <p><b>Hence the candidates who have selected Option A will get full marks</b></p>
22	S. Muthu Kumar	<del>EL - 6</del> EL -2		<p><b>Q 86:</b> Acceptance sampling is used in (A)control production (B) main production</p>	<p>Alternative d is correct.</p>	<p><b>Hence the candidates who have selected</b></p>

			<p>(C) less production (D) Mass production Ans: "less production" But the correct answer is (D)Mass Production</p> <p><b>Question No:48.</b> Which enzyme catalyses the hydrolysis of starch into sugars? (A) Invertase <b>(B) Amylase</b> (C) Dehydrogenase (D) Anhydrase <b>Ans:B</b></p>	<p><b>Q48.</b> Found some Typing error on it.</p>	<p>Alternative b is correct. Spelling is also correct</p>	<p><b>Option d will get full marks</b></p> <p><b>Hence the candidates who have selected Option B will get full marks</b></p>
23	C. Ratheesh Kumar DB0021000JUN23A310022	EL – 6	<p><b>Question No:89.</b> What indenter is used for Brinell test? a) Hardened steel ball b) Diamond ball <b>c) Diamond prism</b> d) Steel prism <b>Ans: C</b></p> <p><b>Question No:98.</b> What is the value of addendum? a) 1 module b) 2 modules c) 3 modules <b>d) 4 modules</b> <b>Ans: D</b></p>	<p><b>Q89.</b> Answered as 'Diamond Ball', whereas correct answer has to be 'Hardened Steel Ball'.</p> <p><b>Q98.</b> Answered as ' 4 modules ' whereas correct answer has to be ' 1 Module '.</p>	<p>Alternative a is correct.</p> <p>Alternative a is correct.</p>	<p><b>Hence the candidates who have selected Option A will get full marks</b></p> <p><b>Hence the candidates who have selected Option A will get full marks</b></p>

24	Tariq Hameed DB0011000JUN23A310108	EL – 6	<p><b>Question No:4.</b> A multiplier is _____ (A) non-capacitive (B) capacitive (C) non-inductive (D) resistive <b>Ans:A</b></p>	<p><b>Q. No. 4.</b> A multiplier is _____ Answer to the question is <b>Option (C) Non Inductive.</b></p>	<p>Alternative c is correct. A multiplier itself is a high resistance. The special condition is it is that it is Non- Inductive</p>	<p><b>Hence the candidates who have selected Option C will get full marks</b></p>
			<p><b>Question No:18</b> What is the source of tidal energy? (A) Movement of seawater (B) Movement of tide (C) Sunlight (D) Wind <b>Ans:B</b></p>	<p><b>Q. No. 18.</b> What is the source of tidal energy? Answer to the question is <b>Option (A) Movement of seawater.</b></p>	<p>Alternative b is the only correct option. "Movement of sea water" is a generic term and it may be associated with under surface water currents also in sea / ocean.</p>	<p><b>Hence the candidates who have selected Option B will get full marks</b></p>
			<p><b>Question No:52.</b> If '+' denotes '-' and '-' denotes 'x' and 'x' denotes '÷' and '÷' denotes '+' then what will be the numeric value of <math>60 \times 10 \div 40 + 6 - 5</math> (A) 200 (B) 16 (C) 144 (D) 3 <b>Ans:A</b></p>	<p><b>Q. No. 52.</b> If '+' denotes '-' and '-' denotes 'x' and 'x' denotes '÷' and '÷' denotes '+' then what will be the numeric value of <math>60 \times 10 \div 40 + 6 - 5</math> Solution: <math>60/10 + 40 - 6 \times 5</math> <math>= (60/10) + 40 - (6 \times 5)</math> By solving according to Bodmas Rule, we get <math>= 6 + 40 - 30</math> <math>= 16</math> Hence, the answer to the question is <b>Option (B) 16.</b></p>	<p>Alternative b is correct</p>	<p><b>Hence the candidates who have selected Option B will get full marks</b></p>
<p><b>Question No:69.</b> Which of the following methods of</p>	<p><b>Q. No. 69.</b> Which of the following methods of disinfection is usually adopted in swimming pools? Solution: The most commonly used method for disinfection</p>	<p>Alternative d is the correct option</p>	<p><b>Hence the candidates who</b></p>			

			<p>disinfection is usually adopted in swimming pools?  a) Excess lime treatment  b) Iodine – Bromine method  c) Pottasium permanganate method  <b>d) Ultraviolet rays method</b>  <b>Ans: D</b></p> <p><b>Question No:78.</b>  The knock limit is dependent upon _____  a) Machine fuel tank  b) machine shaft  c) spark ratio  <b>d) design feature of the engine.</b>  <b>Ans: D</b></p>	<p>adopted in swimming pools is Chlorination because chlorine is cheap, readily available and easy to handle.  Apart from chlorine, iodine and bromine are also used for disinfection. Besides, non-chemical processes such as ultra violet, X rays, ultrasound etc are also used in disinfection.</p> <p>Now, since chlorination was not provided in the options, <b>Option (B) Iodine – Bromine method</b> and <b>Option (D) Ultraviolet rays method</b> are both the answers to the question.</p> <p><b>Q. No. 78.</b> The knock limit is dependent upon _____  Solution: The knock limit is dependent upon <b>Option (C) spark ratio</b>, as spark ratio refers to the strength or intensity of the spark produced by the spark plug. The spark should be strong enough to ignite the A/F mixture consistently and efficiently. If the spark is too weak, it may result in incomplete combustion or misfires. If the spark is too strong, it can cause A/F mixture to ignite prematurely, leading to knocking. Hence, the answer to the question is <b>Option (C) spark ratio.</b></p>	<p>Alternative d is correct</p>	<p><b>have selected Option D will get full marks</b></p> <p><b>Hence the candidates who have selected Option D will get full marks</b></p>
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			<p><b>Question No:89.</b> What indenter is used for Brinell test? a) Hardened steel ball b) Diamond ball <b>c) Diamond prism</b> d) Steel prism <b>Ans: C</b></p>	<p><b>Q. No. 89.</b> What indenter is used for Brinell test? The Answer to the question is <b>Option (A) Hardened steel ball.</b></p>	<p>Alternative a is correct.</p>	<p><b>Hence the candidates who have selected Option A will get full marks</b></p>
25	Sharmila Roy DB0011000JUN23A310025	EL- 6		<p><u>ELECTRICAL:</u> <b>Question No. 9 Paper 4</b> <b>Correct answer is (Brushes)</b> <b>which is not given</b></p> <p><u>MECHANICAL :</u> <b>Question No. 64 Paper 4</b> <b>Correct answer is options b &amp; c</b></p>	<p>Alternative a is correct. The candidate has to choose the right one from the given options.</p> <p>Alternative c is correct option. The properties of gasoline and petrol are different.</p>	<p><b>Hence the candidates who have selected Option A will get full marks</b></p> <p><b>Hence the candidates who have selected Option C will get full marks</b></p>