Chem	istry	Group: 1st	HSSC(12th)1stAnnual 2024					Roll No:(written b	(written by the candidate only)	
Paper: II			tive (iv)	Code	8	4	8	7	Time: 20 Minutes	Marks: 17
Note: -	You have	four choices for e	ach objective typ	e question a	s A, B,	C and	D. The	Cuttin	which you think is correct; fill the	nat circle in front of will result no mark.

		SECTION	·A SWL	-1-24	
Q.1	Questions	A	В	Č	D
1.	In group V-A elements, the most electronegative is:	N	P	Sb	Bi
2.	Most of the elements of group I A are:	Crystalloids	Metals	Metalloids	Non metals
3.	During nitration of benzene, the active nitrating agent is:	NO <sub>3</sub>	NO <sub>2</sub>	NO <sub>2</sub> <sup>+</sup>	HNO <sub>3</sub>
4.	Vinyl acetylene combines with HCl to form:	Poly acetylene	Benzene	Chloroprene	Divinyl acetylene
5.	Which is the strongest acid?	HCI0	HCIO <sub>2</sub>	HCIO <sub>3</sub>	HCIO <sub>4</sub>
6.	Total number of transition elements are:	10	14	40	58
7.	The state of hybridization of carbon atom in methane is:	Sh	sp <sup>2</sup>	sp	dsp <sup>2</sup>
8.	Which element belongs to group IV A of periodic table?	Barium	lodine	Lead	Oxygen
9.	Which one of the given is not an alkali metal?	Francium	Caesium	Rubidium	Radium
10.	Vegetable oil is:	Un-saturated fatty acid	Glycerides of unsaturated acid	Glycerides of saturated fatty acid	Essential oils obtained from plants
11.	For which crop, ammonium nitrate fertilizer is not used:	Cotton	Wheat	Sugarcane	Paddy rice
12.	Acetic acid is prepared by:	Distillation	Fermentation	Ozonolysis	Esterification
13.	Ketones are prepared by oxidation of:	Primary alcohol	Secondary alcohol	Tertiary alcohol	Ether
14.	Which compound shows the hydrogen bonding?	C <sub>2</sub> H <sub>6</sub>	C <sub>2</sub> H <sub>5</sub> Cl	CH <sub>3</sub> -O- CH <sub>3</sub>	C <sub>2</sub> H <sub>5</sub> OH
15.	The p <sup>H</sup> range of acid rain is:	7- 6.5	6.5 - 6	6 - 5.6	Less than 5
16.	The co-agulant used in raw water to precipitate suspended impurities is:	Caustic soua	Lime water	Alum	Soda ash
17.		Breakage of covalent bond	Formation of carbocation	Transition state	Attack of nucleophile
	During the S <sub>∞</sub> 1 reaction, the fast step involves:	1/2/2 la		311-424-1/	A-14500 ★★★ <b>~</b> <i>O</i>

Chemi	-	Grou			5(12)	h)1 <sup>st</sup> An		<b>U</b> 24	Roll No:		(written by the	
Paper: II	_		2:40 Hou			Subje					· M	<u>`</u>
Note:	Sectio	on B is con	pulsory. <i>I</i>	Attempt an	y 3 quo	estions fro <u>SECTI</u> 0		n C.	SWL	ーノーン		
2. V	Vrite shor	t answers t	any EIGH	T parts.							(8	x 2 = :
i. W	hy the size	e of an anio	n is greate	r than its pa	rent at	om? Give e	xample als	so.				
		_		s are in the ${\mathfrak g}$		,	it. Al+3>M	g+2 > NA	<b>1</b> +1			
				d in breathi		ipments?						
				ster of Paris of the give		Fo (CO)-1	b) K <sub>2</sub> [1	D+ Clal				
				-2 and MnO	100	[ 1.6 (00)2].	. 0) 1/2[1	r coloj.				
				th a suitabl		nla						
				epared from			chloride?					
		naturation o	-	Sec.	moung	and Seriji						
x. De	efine isoe	nzymes.										
				ting and the	rmopla	stic polyme	er. Give exa	ample.				
		u mean by	( <del></del>								40	0
		answers to	-	-							(8)	x 2 = :
		acts with H	_	1.00								
		qua regia c reaker acid		a?								
	-	eons and T							COL			
		tane numb		nocking"?					C			
vi. W	hat is car	bonization	of coal?	_								
				to addition		O4 in I-Bute	ene?				*	٠
				m 2-butyne				W //	OU OU OU )	_CU		6
		the IUPAC	names of t	he given co	mpoun	os: a) (C	C6H5)2CH2	D) (U	CH <sub>3</sub> CH <sub>2</sub> CH <sub>2</sub> )	30П		
			es of recyc	ling of pape	er? (in	two points	)					
		d depositio	50				•					
		•		1		1/						(
latura.	ahaut an	nuero to on	. CIV narta			(4)					(6x2-	12)
		swers to an emistry of b									(0,2	12)
				ted in alum	inium c	ontainers?						
		hile SiO <sub>2</sub> is							ALC: Y			
		Fitting read										
		uring of alco		0								
		nson's synt		in laborato	n/2	·						
				lysis of este								
				r of amino a								
					SECTIO		_			*	(8x3=24	1)
e: Attem	pt any TH	REE questi	ons. Each (	uestion car	ries ElC	SHT (8) mar	ks.				(0,0 1	.,
		•		n the Mende								4
				cture of sod			i method.					4
				iour? (Any f			. 01		ul			4
				ing the prep				ı II-Scr	eening			4
	/			in sp <sup>3</sup> hybrid	dization	with an ex	ample.					4
b) How		yl magnesi					V (45)					4
		CO <sub>2</sub>	ii. CH <sub>3</sub>		iii.	H <sub>2</sub> O	iv.	C <sub>2</sub> H <sub>5</sub>	ЮН			
. ,			-	b's electroly								4
_				NaBH <sub>4</sub> ? Give			action.					+3
				l treatment								4
) Men	ition any t	wo reactioned.	ns of alcoho	ol in which (	- O b	ond is brok	en and any	two rea	actions of al	cohol in whic	hO-H 2	+2

311-424-1A-14500

**Chemistry** Group: 2<sup>nd</sup> HSSC(12th)1stAnnual 2024 Roll No: Paper: II Objective (ii) Code Time: 20 Minutes

You have four choices for each objective type question as A, B, C and D. The choice which you think is correct; fill that circle in front of that question number in your answer book. Use marker or pen to fill the circles. Cutting or filling up two or more circles will result no mark. Note: -

The presence of a double bond in a compound is the sign of:   During nitration of benzene, the reactive nitrating agent is:   Order of a typical S <sub>m</sub> 2 reaction in case of primary alkyl halide is:   Order of a typical S <sub>m</sub> 2 reaction in case of primary alkyl halide is:   As a solvent   As an anti-freezing agent   As a substitute for petrol   For denaturing agent			SECTION	-A ° _S	W/-2-21	1
the sign of:  During nitration of benzene, the reactive nitrating agent is:  Order of a typical S <sub>a</sub> 2 reaction in case of primary alky halide is:  Which of the given compounds will not give lodoform test on treatment with I <sub>2</sub> /NaOH?  Which of the given polymers is a synthetic polymer?  Which of the given polymers is a synthetic polymer?  The nitrogen present in some fertilizers helps plants:  Ecosystem is a smaller unit of———  Butanone  Acetaldehyde  Atetaldehyde  Atetaldehyde  Acetaldehyde  Acetaldehyde  Acetaldeh	Q.1	Questions	A	В	C	D
Septent   Sep	1.	the sign of:	Saturation	Unsaturation	Substitution	None of these
As a solvent   As an anti-freezing agent   As a substitute for petrol   Acetic acid is manufactured by:   Distillation   Fermentation   Ozonolysis   Esterification   Ozonolysis   Esterification   Ozonolysis   O	2.	agent is:	NO <sub>3</sub>	NO <sub>2</sub> <sup>+</sup>	NO <sub>2</sub>	HNO₃
Which of the given compounds will not give lodoform test on treatment with I₂/NaOH?   Acetaldehyde   Acetone   Butanone   3-pentanone	3.	Order of a typical S <sub>N</sub> 2 reaction in case of primary alkyl halide is:	1	2	3	Zero
Which of the given compounds will not give lodoform test on treatment with l₂/NaOH?	4.		As a solvent			For denaturing of ethyl alcohol
Which of the given polymers is a synthetic polymer?   Animal fat   Starch   To produce protein   To undergo photosynthesis		lodoform test on treatment with I <sub>2</sub> /NaOH?				3-pentanone
8. The nitrogen present in some fertilizers helps plants:  9. Ecosystem is a smaller unit of  10. The value of is a direct measure of chemically oxidizable matter in water.  11. In t-butyl alcohol, the tertiary carbon is bonded to chemically oxidizable matter in water.  12. The colour of transition metal complexes, is due to:  13. The anhydride of HCI0₄ is:  14. The brown gas is formed, when metal reduces HNO₃ to:  15. Boric Acid can not be used:  16. Which of the given sulphates is not soluble in water?  17. Na forms						Esterification
9. Ecosystem is a smaller unit of	<u>7.                                    </u>	Which of the given polymers is a synthetic polymer?		Starch	Cellulose	
The value of is a direct measure of chemically oxidizable matter in water.  11. Int-butyl alcohol, the tertiary carbon is bonded to		plants:		To produce fat	To produce protein	To undergo photosynthesis
chemically oxidizable matter in water.  In t-butyl alcohol, the tertiary carbon is bonded to	9.	Ecosystem is a smaller unit of	Biosphere	Atmosphere	Lithosphere	Hydrosphere
The colour of transition metal complexes, is due to:  12. The colour of transition metal complexes, is due to:  13. The anhydride of HCIO4 is:  14. The brown gas is formed, when metal reduces HNO3 to:  15. Boric Acid can not be used:  16. Which of the given sulphates is not soluble in water?  17. Na forms ——oxide:  18. The colour of transition metal complexes, is due ded transition of electrons  19. CIO3 CIO2 CIO5 CI <sub>2</sub> O7  10. No  10.		chemically oxidizable matter in water.	COD	BOD	DO	None of these
The colour of transition metal complexes, is due to:  13. The anhydride of HClO4 is:  14. The brown gas is formed, when metal reduces HNO3 to:  15. Boric Acid can not be used:  16. Which of the given sulphates is not soluble in water?  17. Na forms——oxide:  18. The colour of transition metal complexes, is due electrons  19. ClO3  10. ClO2  10. ClO5  10. ClO5  10. ClO5  10. N2O3  10. N2O3  11. N2O3  11. Na forms—oxide:  12. As antiseptic in medicine  13. Sodium sulphate  14. Potassium sulphate  15. Basic  16. Amphoteric  17. Na forms—oxide:  18. Amphoteric  18. Amphoteric  19. Acidic  19. Super  21. Super  21. Super  21. Super  21. Super  21. Super	11.	hydrogen atom/s.	2	3	1	No
14. The brown gas is formed, when metal reduces HNO₃ to:  15. Boric Acid can not be used:  16. Which of the given sulphates is not soluble in water? Sodium sulphate  17. Na forms		to:		Ionization	Paramagnetic nature	Loss of S-electrons
HNO3 to:   N205   N203   NO2   NO2   NO3			ClO <sub>3</sub>	CIO <sub>2</sub>	CIO <sub>5</sub>	Cl <sub>2</sub> O <sub>7</sub>
16. Which of the given sulphates is not soluble in water? Sodium sulphate Potassium sulphate Zinc sulphate Barium sulphate 17. Na forms	14.	The brown gas is formed, when metal reduces HNO₃ to:		N <sub>2</sub> O <sub>3</sub>	NO <sub>2</sub>	NO
17. Na forms	15.	Boric Acid can not be used:	As antiseptic in medicine	For washing eyes	in soda bottles	For enamels and glazes
312-424-1A-10000 *	16.	Which of the given sulphates is not soluble in water?	Sodium sulphate	Potassium sulphate	Zinc sulphate	Barium sulphate
312-424-1A-10000 *	17.	Na formsoxide:	Basic	Amphoteric	Acidic	Super
	8	White the second	عاد روس عاد روسم میج	ــــــياں۔۔۔۔۔۔۔		

(written by the candidate only)

Marks: 17

i. Why dismond is a non conductor and graphite is a good conductor?  ii. The hydration energy of lons is in the given order, Al-3-Mg*2-Ma-1, give reason.  iii. What is Milk of magnesis and what is its use?  iv. What is Gypsum and how is it converted into Plaster of Parls?  iv. What is Gypsum and how is it converted into Plaster of Parls?  iv. What is Gypsum and how is it converted into Plaster of Parls?  iv. What is the reason for the development of colours in the compound of transition elements?  ivi. What is the reason for the development of colours in the compound of transition elements?  ivi. What is degree of polymerization? Give one example.  iv. What is degree of polymerization? Give one example.  iv. What is degree of polymerization? Give one example.  ivi. What are epoxy resins? Give their important uses.  ivi. Write down essential qualities of a good fertilizer.  ivi. Write down essential qualities of a good fertilizer.  ivi. Why does the phosphorous show more than one valency although it is not a transition element?  iii. Who do the noble gases have low melting and bolling points?  iv. Give two methods to prepare ClO2.  iv. What is catalytic cracking? Give its importance.  ivi. Why alkanes are less reactive than alkenes?  ivi. Why alkanes are less reactive than alkenes?  ivi. Why alkanes are less reactive than alkenes?  ivi. Who are oxides of sulphur produced in environment? Give their harmful effects in human life.  ivii. Who are axides of sulphur produced in environment? Give their harmful effects in human life.  ivii. Who are noides of sulphur produced in environment? Give their harmful effects in human life.  ivii. Who are noides of sulphur produced in environment?  ivii. Who are noides of sulphur produced in environment?  ivii. Who are noides of sulphur produced in environment?  ivii. Who are noides of sulphur produced in environment?  ivii. Who are noides of sulphur produced in environment?  ivii. Who are noides of sulphur produced in environment?  ivii. Who are noides of sulphur produced in en	Che	mistry	Group: 2 <sup>nd</sup> HS:	SC(12 <sup>th</sup> )1 <sup>st</sup> Annual 2024	Roll No:	(written by .
SECTION-B  Write short answers to any EIGHT parts.  Why diamond is a non conductor and graphite is a good conductor?  The hydration energy of lons is in the given order, A1*3-Mig*2 *Na*1, give reason.  What is milk of magness and what Is its use?  What is Gypsum and how is it converted into Plaster of Parls?  What is Gypsum and how is it converted into Plaster of Parls?  What is the reason for the development of colours in the compound of transition element?  What is the reason for the development of colours in the compound of transition elements?  Will. What are the factors which are responsible for the reactivity of alkyl halide?  What is degree of polymerization? Give one example.  Define Homopolymer and Copolymer, give example for each polymer also.  White down essential qualities of a good fertilizer.  Write down essential qualities of a good fertilizer.  Write down essential qualities of a good fertilizer.  Why does the phosphorous show more than one valency although it is not a transition element?  Why does the phosphorous show more than one valency although it is not a transition element?  What is catalytic cracking? Give its importance.  What are Els. and trans isomers? Give example.  What is bodling point of n-butane higher than that of isobutane?  Why alkanes are less reactive than alkenes?  Construction of the bodling point of n-butane higher than that of isobutane?  Why alkanes are less reactive than alkenes?  What down are oxides of sulphur produced in environment? Give their harmful effects in human life.  Define oxidizing and reducing smog.  White down any four uses of aluminium.  Why alwanes are less reactive than alkenes?  What down are oxides of sulphur produced in environment? Give their harmful effects in human life.  Define oxidizing and reducing smog.  Why what are secondary pollutants? Give example.  Whet down any own about chemical graders?  Convert benzene into acetophenone.  White down any own askers on any Six parts.  Whet down any own askers of the since characters of anino acid.  C	Paper	: II	Time: 2:40 Hours	Subjective		<b>Y</b>
2. Write short answers to any EIGHT parts.  i. Why didmond is a non conductor and graphite is a good conductor?  iii. The hydration energy of lons is in the given order, Ai*3-Mg** 2*Na**1, give reason.  iii. What is milk of magnesia and what is its use?  iv. What is gysum and how is it converted into Plaster of Parls?  v. Why melting and boiling points are maximum in the middle of the series of d-block element?  vii. What is the reason for the development of colours in the compound of transition elements?  viii. How alkyl iolide is prepared from alcohol?  viii. What are the factors which are responsible for the reactivity of alkyl halide?  iv. What is degree of polymerization? Give one example.  v. Define Homopolymer and Copolymer, give example for each polymer also.  xii. Write down essential qualities of a good fertilizer.  3. Write short answers to any EIGHT parts.  iii. Why does the phosphorous show more than one valency although it is not a transition element?  iii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Why does the phosphorous show more than one valency although it is not a transition element?  iii. Why does the phosphorous show more than one valency although it is not a transition element?  iii. Why does the phosphorous show more than one valency although it is not a transition element?  iii. Why date to enoble gases have low melting and boiling points?  iv. Give two methods to prepare clico.  v. What are Cis. and trans isomers? Give example.  viii. Why alkanes are less reactive than alkenes?  iv. Give two methods to prepare alkanes from alkyl halides.  v. What are secondary pollutants? Give example.  viii. Who are oxides of sulphur produced in environment? Give their harmful effects in human life.  viii. Who was exides of sulphur produced in environment? Give their harmful effects in human life.  viii. Write down any four estimates of aluminium.  iii. White down any four estimates of aluminium.  iii. Who down any four estimates of aluminium.	Note:	Secti	on B is compulsory. Attempt an		WL-2-34	
iii. What is milk of magnesia and what is its use? iv. What its Gypsum and how is it converted into Plaster of Paris? v. Why melting and boiling points are maximum in the middle of the series of d-block element? vi. What is the reason for the development of colours in the compound of transition elements? vii. How alkyl lodide is prepared from alcohol? viii. What are the factors which are responsible for the reactivity of alkyl halide? b. What is degree of polymerization? Give one example. v. Define Homopolymer and Copolymer, give example for each polymer also. viii. What are epoxy resins? Give their important uses. viii. Write down essential qualities of a good fertilizer. 3. Write short nawers to any EIGHT parts. viii. Why does the phosphorous show more than one valency although it is not a transition element? viii. Who do the noble gases have low melting and boilling points? viiii. Who do the noble gases have low melting and boilling points? viiii. Who do the noble gases have low melting and boilling points? viviiii. Why is the boiling point of n-butane higher than that of isobutane? viiii. Why alkanes are less reactive than alkenes? viiiii. Why alkanes are less reactive than alkenes? viiiiiiiiiiiiiiiiiiiiiiiiiiiiiiiiiiii	2.	Write sho	ort answers to any EIGHT parts.	all and the distribution of the second		(8x2
iii. The hydration energy of lons is in the given order, Al <sup>-3</sup> >Mg <sup>-2</sup> >Na <sup>-1</sup> , give reason.  iii. What is Milk of magnesia and what is its use?  iv. What is Gypsum and how is it converted into Plaster of Paris?  v. Why melting and bolling points are maximum in the middle of the series of d-block element?  vii. How alkyl lodide is prepared from alcohol?  viii. How alkyl lodide is prepared from alcohol?  viii. What are the factors which are responsible for the reactivity of alkyl halide?  ix. What is degree of polymerization? Give one example.  v. Define Homopolymer and Copolymer, give example for each polymer also.  viii. Who are epoxy resins? Give their important uses.  viii. Write down essential qualities of a good fertilizer.  3. Write short answers to any EIGHT parts.  viii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Who does the noble gases have low melting and boilling points?  iv. Give two methods to prepare CiO <sub>2</sub> .  v. What is catalytic cracking? Give its importance.  viii. Why is the boiling point of n-butane higher than that of isobutane?  viii. Why alkanes are less reactive than alkenes?  ix. Give two methods to prepare alkanes from alkyl halides.  x. What are secondary pollutants? Give example.  viii. Why alkanes are less reactive than alkenes?  ix. Give two methods to prepare alkanes from alkyl halides.  x. What down any four uses of aluminium.  ii. What down any four uses of aluminium.  iii. White down an short note on acidic and basic characters of amino acid.  ix. Convert methyl n	i.			phite is a good conductor?		•
iv. What is Gypsum and how is it converted into Plaster of Paris?  v. Why melting and bolling points are maximum in the middle of the series of d-block element?  vi. What is the reason for the development of colours in the compound of transition elements?  vii. How alkyl iodide is prepared from alcohol?  viii. What are the factors which are responsible for the reactivity of alkyl halide?  iv. What is degree of polymerization? Give one example.  v. Define Homopoymer and Copolymer, give example for each polymer also.  vii. What are epoxy resins? Give their important uses.  viii. Write down essential qualities of a good fertilizer.  3. Write short answers to any EIGHT parts.  viii. Why does the phosphorous show more than one valency although it is not a transition element?  viii. Why does the phosphorous show more than one valency although it is not a transition element?  viii. Why does the phosphorous show more than one valency although it is not a transition element?  viii. Why alkanes are less sen have low melting and bolling points?  viii. Why alkanes are less reactive than alkenes?  viii. Why alkones are viii. Viiii. Viiiii. Viiiii. Viiii. Viiiii. Viiiii. Viiiii. Viiiii. Viiiii. Viiiii. Viiiii. Viiiii. Viiiii. V	ii.	The hydrat	ion energy of lons is in the giver	n order, Al+3>Mg+2 >Na+1, give reason.		
w. Why melting and boiling points are maximum in the middle of the series of d-block element? vi. What is the reason for the development of colours in the compound of transition elements? vii. How alkyl lodidle is prepared from alcohol? viii. What are the factors which are responsible for the reactivity of alkyl hallde? ix. What is degree of polymerization? Give one example. x. Define Homopolymer and Copolymer, give example for each polymer also. xi. What own essential qualities of a good fertilizer, 3. Write short answers to any EIGHT parts. i. Draw structure of two oxyacids of nitrogen. iii. Who does the phosphorous show more than one valency although it is not a transition element? iii. Who does the phosphorous show more than one valency although it is not a transition element? iii. Who does the phosphorous show more than one valency although it is not a transition element? iii. Who do the noble gases have low melting and boilling points? iv. Give two methods to prepare CIO <sub>2</sub> . v. What is catalytic cracking? Give its importance. vi. What are Cis. and trans isomers? Give example. viii. Why alkanes are less reactive than alkenes? ix. Give two methods to prepare alkanes from alkyl halides. x. What are secondary pollutants? Give example. viii. Plow are oxides of sulphur produced in environment? Give their harmful effects in human life. viii. Plow are oxides of sulphur produced in environment? Give their harmful effects in human life. viii. Plow are oxides of sulphur produced in environment? Give their harmful effects in human life. viii. What do you know about chemical garden? iii. How down any four uses of aluminium iii. What do you know about chemical garden? iii. How down any four uses of aluminium iii. What down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid. SECTION-C Attempt any THREE questions. Each Question carles EIGHT (8) marks. (8) Cia) Define the term "setting of cemient". Write down the reaction involved in first 24 hours and 1-7 days. (6) Defi	iii.					
vii. What is the reason for the development of colours in the compound of transition elements? viii. How alkyl lodide is prepared from alcohol? viii. What are the factors which are responsible for the reactivity of alkyl halide? ix. What is degree of polymerization? Give one example. x. Define homopolymer and Copolymer, give example for each polymer also. xi. What are epoxy resins? Give their important uses. xii. Write down essential qualities of a good fertilizer. 3. Write short answers to any EIGHT parts. 5. Draw structure of two oxyacids of nitrogen. 1ii. Why does the phosphorous show more than one valency although it is not a transition element? 1iii. Who do the noble gases have low melting and boilling points? 1iv. Give two methods to prepare CIO2. 1v. What is catalytic cracking? Give its importance. 1vi. Why is the boilling point of n-butane higher than that of isobutane? 1viii. Why alkanes are less reactive than alkenes? 1viii. Why alkanes are less reactive than alkenes? 1viii. Why alkanes are less reactive than alkenes? 1viii. What are scondary pollutants? Give example. 1viii. What are secondary pollutants? Give example. 1viiii. Valow are oxides of sulphur produced in environment? Give their harmful effects in human life. 1viii. What do you know about chemical garden? 1viii. What down any four uses of aluminium. 1viii. What do you know about chemical garden? 1viii. What down any four double of the preparation of formaldehyde. 1viii. Witte down any four distinguish between methanol and ethanol? 1vii. Give one industrial method for the preparation of formaldehyde. 1viii. Witte down any four differences of F2 with its group members. 1viii. Define the term 'setting of cenient'. Write down the reactions involved in first 24 hours and 1-7 days. 1viii. Define the term 'setting of cenient'. Write down the reactions involved in first 24 hours and 1-7 days. 1viii. Define the	iv.					
viii. What are the factors which are responsible for the reactivity of alkyl halide?  ix. What is degree of polymerization? Give one example.  x. Define Homopolymer and Copolymer, give example for each polymer also.  xii. Write down essential qualities of a good fertilizer.  3. Write short answers to any EIGHT parts.  ii. Write down essential qualities of a good fertilizer.  3. Write short answers to any EIGHT parts.  iii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Who doe the phosphorous show more than one valency although it is not a transition element?  iii. Who doe the phosphorous show more than one valency although it is not a transition element?  iii. Who doe the phosphorous show more than one valency although it is not a transition element?  iii. Who doe the phosphorous show more than one valency although it is not a transition element?  iii. Who doe the phosphorous show more than one valency although it is not a transition element?  iii. Who doe the phosphorous show more than one valency although it is not a transition element?  iii. Who are methods to prepare Cloz.  v. What is catalytic cracking? Give its importance.  vii. Why alkanes are less reactive than alkenes?  iv. Give two methods to prepare alkanes from alkyl halides.  x. What are secondary pollutants? Give example.  viii. What are avoides of sulphur produced in environment? Give their harmful effects in human life.  viii. Define oxidizing and reducing smog.  4. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does boras serve as west softening agent?  v. Convert benzene into a cetophenone.  v. Write down any four uses of aluminium.  iii. Who down any four uses of aluminium.  iii. Who down any four differences of few of formalidehyde.  write down any four differences of few of formalidehyde.  viii. Who down any four differences of few of formalidehyde.  viii. Who down any four differences of few with my of the preparation of formalidehyde.  (Bit	-		•			
will. What are the factors which are responsible for the reactivity of alkyl halide?  ix. What is degree of polymerization? Give one example.  ix. What are epoxy resins? Give their important uses.  ix. What are epoxy resins? Give their important uses.  ix. Write short answers to any EIGHT parts.  i. Draw structure of two oxyacids of nitrogen.  iii. Why does the phosphorous show more than one valency although it is not a transition element?  iii. Why do the noble gases have low melting and bolling points?  iv. Give two methods to prepare CIO <sub>2</sub> .  v. What is catalytic cracking? Give its importance.  vi. Why is the bolling point of n-butane higher than that of isobutane?  viii. Why alkanes are less reactive than alkenes?  ix. Give two methods to prepare alkanes from alkyl halides.  x. What are secondary pollutants? Give example.  viii. Why alkanes are less reactive than alkenes?  ix. Allow are oxides of sulphur produced in environment? Give their harmful effects in human life.  viii. Define oxidizing and reducing smog.  4. Write short answers to any SIX parts.  i. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid viii. Write down as short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cenient". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.					elements?	
ix. What is degree of polymerization? Give one example.  x. Define Momoplymer and Copolymer, give example for each polymer also.  xii. Write down essential qualities of a good fertilizer.  3. Write short answers to any EIGHT parts.  iii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Who do the noble gases have low melting and bolling points?  iii. Who do the noble gases have low melting and bolling points?  iii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Who are use and trans is somers? Give example.  vi. Why a is catalytic cracking? Give its importance.  vi. What is catalytic cracking? Give its importance.  vi. Why alkanes are less reactive than alkenes?  iii. Why alkanes are less reactive than alkenes?  xi. Allow are oxides of sulphur produced in environment? Give their harmful effects in human life.  xii. Pefine oxidizing and reducing smog.  4. Write short answers to any SIX parts.  i. Write down any four uses of aluminium.  iii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  viii. With down short note on acidica and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cemient". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.						
xi. What are epoxy resins? Give their important uses. xii. Write down essential qualities of a good fertilizer. 3. Write short answers to any EIGHT parts. i. Draw structure of two oxyacids of nitrogen. ii. Why does the phosphorous show more than one valency although it is not a transition element? iii. Who doe the noble gases have low melting and boilling points? iv. Give two methods to prepare Clo2. v. What is catalytic cracking? Give its importance. vi. Why alkanes are less reactive than alkenes? ix. Give two methods to prepare alkanes from alkyl halides. x. What are cls. and trans isomers? Give example. viii. Why alkanes are less reactive than alkenes? ix. Give two methods to prepare alkanes from alkyl halides. x. What are secondary pollutants? Give example. viii. What does do sulphur produced in environment? Give their harmful effects in human life. viii. Define oxidizing and reducing smog. 4. Write short answers to any SIX parts. i. Write down any four uses of aluminium. ii. What do you know about chemical garden? iii. How does borax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down any four uses of aluminium. iii. Who does horax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down ashort note on acidic and basic characters of amino acid. iv. Convert the plinitile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp2-hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.						
xii. Write down essential qualities of a good fertilizer.  3. Write short answers to any EIGHT parts.  i. Draw structure of two oxyacids of nitrogen.  ii. Why does the phosphorous show more than one valency although it is not a transition element?  iii. Who do the noble gases have low melting and bolling points?  iv. Give two methods to prepare CIO <sub>2</sub> .  v. What is catalytic cracking? Give its importance.  vii. Why alkanes and trans isomers? Give example.  viii. Why alkanes are less reactive than alkenes?  iv. Give two methods to prepare alkanes from alkyl halides.  x. What are secondary pollutants? Give example.  viii. Why alkanes are less reactive than alkenes?  iv. Give two methods to prepare alkanes from alkyl halides.  x. What are secondary pollutants? Give example.  viii. Define oxidizing and reducing smog.  4. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid  vi. How will you distinguish between methanol and ethanol?  viii. Give one industrial method for the preparation of formaldehyde.  viii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of Fz with its group members.  (b) Define the term "setting of cemient". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.			_			
xii. Write short answers to any EIGHT parts.  i. Draw structure of two oxyacids of nitrogen. ii. Why does the phosphorous show more than one valency although it is not a transition element? iii. Why does the phosphorous show more than one valency although it is not a transition element? iii. Who do the noble gases have low melting and boiling points? iv. Give two methods to prepare CIO <sub>2</sub> .  What is catalytic cracking? Give its importance. vi. What are Cis. and trans isomers? Give example. viii. Why alkanes are less reactive than alkenes? ix. Give two methods to prepare alkanes from alkyl halides. x. What are secondary pollutants? Give example.  xi. Alow are oxides of sulphur produced in environment? Give their harmful effects in human life. xii. Define oxidizing and reducing smog. 4. Write short answers to any SIX parts. i. Write down any four uses of aluminium. ii. What do you know about chemical garden? iii. How does borax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol? vii. Give one industrial method for the preparation of formaldehyde. viii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cemient". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms. 8. (a) Write down any two methods for the preparation of alkanes.						
3. Write short answers to any EIGHT parts.  i. Draw structure of two oxyacids of nitrogen. ii. Why does the phosphorous show more than one valency although it is not a transition element? iii. Who do the noble gases have low melting and boiling points? iv. Give two methods to prepare CIO2. v. What is catalytic cracking? Give its importance. vi. Why is the boiling point of n-butane higher than that of isobutane? viii. Why is the boiling point of n-butane higher than that of isobutane? viii. Why alkanes are less reactive than alkenes? viii. What are secondary pollutants? Give example.  viii. Viii. Viiii. Viiii are secondary pollutants? Give example.  viii. Define oxidizing and reducing smog. 4. Write short answers to any SIX parts. viii. What do you know about chemical garden? viii. What do you know about chemical garden? viii. What do you know about chemical garden? viii. Convert benzene into acetophenone. v. Write down any four uses of aluminium. viii. Give one industrial method for the preparation of formaldehyde. viii. Wite down a short note on acidic and basic characters of amino acid. vii. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of ceriment". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.						
ii. Why does the phosphorous show more than one valency although it is not a transition element?  iii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Who does the phosphorous show more than one valency although it is not a transition element?  iii. Who the noble gases have low melting and boiling points?  iv. Give two methods to prepare ClO2.  v. What is catalytic cracking? Give its importance.  vi. Why is the boiling point of n-butane higher than that of isobutane?  viii. Why alkanes are less reactive than alkenes?  iv. Why alkanes are less reactive than alkenes?  iv. What are secondary pollutants? Give example.  viii. What are secondary pollutants? Give example.  viii. Define oxidizing and reducing smog.  4. Write down are oxides of sulphur produced in environment? Give their harmful effects in human life.  viii. Define oxidizing and reducing smog.  4. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol?  viii. Give one industrial method for the preparation of formaldehyde.  viiii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cerient". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between Sn1 and Sn2 reaction mechanisms.						(8x
iii. Why does the phosphorous show more than one valency although it is not a transition element?  iii. Who do the noble gases have low melting and boilling points?  iv. Give two methods to prepare CIO2.  v. What is catalytic cracking? Give its importance.  vii. Why alka are Cis. and trans isomers? Give example.  viii. Why alkanes are less reactive than alkenes?  ix. Give two methods to prepare alkanes from alkyl halides.  x. What are secondary pollutants? Give example.  viii. Priow are oxides of sulphur produced in environment? Give their harmful effects in human life.  viii. Define oxidizing and reducing smog.  4. Write short answers to any SIX parts.  i. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid  vi. How will you distinguish between methanol and ethanol?  viii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  (8)  Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with it sgroup members.  (b) Define the term "setting of cemient". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.	_		-	L		(
iii. Who do the noble gases have low melting and bolling points? iv. Give two methods to prepare Clo2. v. What is catalytic cracking? Give its importance. vi. Why is the boiling point of n-butane higher than that of isobutane? viii. Why is the boiling point of n-butane higher than that of isobutane? viii. Why alkanes are less reactive than alkenes? viii. What are secondary pollutants? Give example. viii. What are secondary pollutants? Give example. viii. Poline oxidizing and reducing smog. 4. Write short answers to any SIX parts. i. Write down any four uses of aluminium. ii. What do you know about chemical garden? iii. How does bofax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol? viii. Give one industrial method for the preparation of formaldehyde. viii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. (8) 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.			, ,		sition element?	
iv. Give two methods to prepare CIO <sub>2</sub> .  v. What is catalytic cracking? Give its importance.  vi. What is catalytic cracking? Give its importance.  vii. Why is the boiling point of n-butane higher than that of isobutane?  viii. Why alkanes are less reactive than alkenes?  ix. Give two methods to prepare alkanes from alkyl halides.  x. What are secondary pollutants? Give example.  xii. Priow are oxides of sulphur produced in environment? Give their harmful effects in human life.  xiii. Define oxidizing and reducing smog.  4. Write short answers to any SIX parts.  i. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid  vi. How will you distinguish between methanol and ethanol?  vii. Give one industrial method for the preparation of formaldehyde.  viii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries ElGHT (8) marks.  (8)  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.						
viii. Why alkanes are less reactive than alkenes? ix. Give two methods to prepare alkanes from alkyl halides. x. What are secondary pollutants? Give example.  xi. How are oxides of sulphur produced in environment? Give their harmful effects in human life.  xii. Define oxidizing and reducing smog. 4. Write short answers to any SIX parts. i. Write down any four uses of aluminium. iii. What do you know about chemical garden? iii. How does borax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol? vii. Give one industrial method for the preparation of formaldehyde. viii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms. 8. (a) Write down any two methods for the preparation of alkanes.				•		
viii. Why alkanes are less reactive than alkenes?  ix. Give two methods to prepare alkanes from alkyl halides.  x. What are secondary pollutants? Give example.  xi. How are oxides of sulphur produced in environment? Give their harmful effects in human life.  xii. Define oxidizing and reducing smog.  4. Write short answers to any SIX parts.  i. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid  vi. How will you distinguish between methanol and ethanol?  vii. Give one industrial method for the preparation of formaldehyde.  viii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.	v.	What is ca	talytic cracking? Give its import	ance.		
viii. Why alkanes are less reactive than alkenes?  ix. Give two methods to prepare alkanes from alkyl halides.  x. What are secondary pollutants? Give example.  xi. How are oxides of sulphur produced in environment? Give their harmful effects in human life.  xii. Define oxidizing and reducing smog.  4. Write short answers to any SIX parts.  i. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid  vi. How will you distinguish between methanol and ethanol?  vii. Give one industrial method for the preparation of formaldehyde.  viii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.	vi.	What are 0	is. and trans isomers? Give exa	mple.		
ix. Give two methods to prepare alkanes from alkyl halides. x. What are secondary pollutants? Give example.  Xii. Pow are oxides of sulphur produced in environment? Give their harmful effects in human life.  Xii. Define oxidizing and reducing smog. 4. Write short answers to any SIX parts. i. Write down any four uses of aluminium. ii. What do you know about chemical garden? iii. How does borax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol? viii. Give one industrial method for the preparation of formaldehyde. viiii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F2 with its group members. (b) Define the term "setting of cemient". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp2-hybridization in ethene. (b) Differentiate between Sn1 and Sn2 reaction mechanisms. 8. (a) Write down any two methods for the preparation of alkanes.	vii.			r and it and or loop atomor		
x. What are secondary pollutants? Give example.  xi. Plow are oxides of sulphur produced in environment? Give their harmful effects in human life.  xii. Define oxidizing and reducing smog. 4. Write short answers to any SIX parts. i. Write down any four uses of aluminium. ii. What do you know about chemical garden? iii. How does borax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol? viii. Give one industrial method for the preparation of formaldehyde. viii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cemient". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms. 8. (a) Write down any two methods for the preparation of alkanes.						
xi. Allow are oxides of sulphur produced in environment? Give their harmful effects in human life.  xii. Define oxidizing and reducing smog. 4. Write short answers to any SIX parts. i. Write down any four uses of aluminium. ii. What do you know about chemical garden? iii. How does borax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol? viii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms. 8. (a) Write down any two methods for the preparation of alkanes.						
Xii. Define oxidizing and reducing smog.  4. Write short answers to any SIX parts.  i. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid  vi. How will you distinguish between methanol and ethanol?  viii. Give one industrial method for the preparation of formaldehyde.  viii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.			econdary pollutants? Give exan	nple.		
4. Write short answers to any SIX parts.  i. Write down any four uses of aluminium.  ii. What do you know about chemical garden?  iii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid  vi. How will you distinguish between methanol and ethanol?  viii. Give one industrial method for the preparation of formaldehyde.  viii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.	xi. 🖋	How are oxi	des of sulphur produced in envi	ronment? Give their harmful effects in	human life.	
ii. Write down any four uses of aluminium.  iii. What do you know about chemical garden?  iiii. How does borax serve as water softening agent?  iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid  vi. How will you distinguish between methanol and ethanol?  viii. Give one industrial method for the preparation of formaldehyde.  viiii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  (8:  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F₂ with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.  (b) Differentiate between S₁1 and S₁2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.	√xii.	Define oxid	izing and reducing smog.			
iii. How does borax serve as water softening agent? iii. How does borax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol? viii. Give one industrial method for the preparation of formaldehyde. viiii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms. 8. (a) Write down any two methods for the preparation of alkanes.	4.	Write short	answers to any SIX parts.			(6x2
iii. How does borax serve as water softening agent? iv. Convert benzene into acetophenone. v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol? viii. Give one industrial method for the preparation of formaldehyde. viiii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms. 8. (a) Write down any two methods for the preparation of alkanes.	i.	Write down	any four uses of aluminium.		AL S	
iv. Convert benzene into acetophenone.  v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid  vi. How will you distinguish between methanol and ethanol?  vii. Give one industrial method for the preparation of formaldehyde.  viii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  (8)  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.						
v. Write down structural formulas for: (a) Glycol (b) Carbolic Acid vi. How will you distinguish between methanol and ethanol? vii. Give one industrial method for the preparation of formaldehyde. viii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks. (8: 5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four). 6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days. 7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms. 8. (a) Write down any two methods for the preparation of alkanes.				gent?		
vi. How will you distinguish between methanol and ethanol? vii. Give one industrial method for the preparation of formaldehyde. viii. Write down a short note on acidic and basic characters of amino acid. ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley. (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members. (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene. (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.				41. 41. 0 - I - P - <b>A</b> -2.1		
<ul> <li>vii. Give one industrial method for the preparation of formaldehyde.</li> <li>viii. Write down a short note on acidic and basic characters of amino acid.</li> <li>ix. Convert methyl nitrile into Acetic Acid.</li> <li>SECTION-C</li> <li>Attempt any THREE questions. Each Question carries EIGHT (8) marks.</li> <li>(8)</li> <li>5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.</li> <li>(b) Discuss the trends in chemical properties of alkaline earth metals (any four).</li> <li>6. (a) Write down any four differences of F<sub>2</sub> with its group members.</li> <li>(b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.</li> <li>7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.</li> <li>(b) Differentiate between S<sub>N</sub>1 and S<sub>N</sub>2 reaction mechanisms.</li> <li>8. (a) Write down any two methods for the preparation of alkanes.</li> </ul>						
viii. Write down a short note on acidic and basic characters of amino acid.  ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.						
ix. Convert methyl nitrile into Acetic Acid.  SECTION-C  Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.				and the second s		
Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.				characters of anniho acid.		
Attempt any THREE questions. Each Question carries EIGHT (8) marks.  5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.  (b) Discuss the trends in chemical properties of alkaline earth metals (any four).  6. (a) Write down any four differences of F <sub>2</sub> with its group members.  (b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.  7. (a) What is orbital hybridization? Explain sp <sup>2</sup> -hybridization in ethene.  (b) Differentiate between S <sub>N</sub> 1 and S <sub>N</sub> 2 reaction mechanisms.  8. (a) Write down any two methods for the preparation of alkanes.	IA. 1	Convertine	any mane into Accue Acid.	SECTION-C		
<ul> <li>5. (a) Describe the defects in Mendeleev's periodic table. Give two improvements made in it by Mosley.</li> <li>(b) Discuss the trends in chemical properties of alkaline earth metals (any four).</li> <li>6. (a) Write down any four differences of F<sub>2</sub> with its group members.</li> <li>(b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.</li> <li>7. (a) What is orbital hybridization? Explain sp<sup>2</sup>-hybridization in ethene.</li> <li>(b) Differentiate between S<sub>N</sub>1 and S<sub>N</sub>2 reaction mechanisms.</li> <li>8. (a) Write down any two methods for the preparation of alkanes.</li> </ul>	Attemp	t any THRE	guestions, Each Question carr			(8x3=
<ul> <li>(b) Discuss the trends in chemical properties of alkaline earth metals (any four).</li> <li>6. (a) Write down any four differences of F<sub>2</sub> with its group members.</li> <li>(b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.</li> <li>7. (a) What is orbital hybridization? Explain sp<sup>2</sup>-hybridization in ethene.</li> <li>(b) Differentiate between S<sub>N</sub>1 and S<sub>N</sub>2 reaction mechanisms.</li> <li>8. (a) Write down any two methods for the preparation of alkanes.</li> </ul>	-	-			le in it by Mosley.	•
<ul> <li>6. (a) Write down any four differences of F<sub>2</sub> with its group members.</li> <li>(b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.</li> <li>7. (a) What is orbital hybridization? Explain sp<sup>2</sup>-hybridization in ethene.</li> <li>(b) Differentiate between S<sub>N</sub>1 and S<sub>N</sub>2 reaction mechanisms.</li> <li>8. (a) Write down any two methods for the preparation of alkanes.</li> </ul>					,.	
<ul> <li>(b) Define the term "setting of cement". Write down the reactions involved in first 24 hours and 1-7 days.</li> <li>7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.</li> <li>(b) Differentiate between S<sub>N</sub>1 and S<sub>N</sub>2 reaction mechanisms.</li> <li>8. (a) Write down any two methods for the preparation of alkanes.</li> </ul>						
<ul> <li>7. (a) What is orbital hybridization? Explain sp²-hybridization in ethene.</li> <li>(b) Differentiate between S<sub>N</sub>1 and S<sub>N</sub>2 reaction mechanisms.</li> <li>8. (a) Write down any two methods for the preparation of alkanes.</li> </ul>				- ·	ire and 1.7 days	
<ul> <li>(b) Differentiate between S<sub>N</sub>1 and S<sub>N</sub>2 reaction mechanisms.</li> <li>8. (a) Write down any two methods for the preparation of alkanes.</li> </ul>					iis anu 1-7 uays.	
8. (a) Write down any two methods for the preparation of alkanes.				•		
	(b)	Differentia	te between S <sub>N</sub> 1 and S <sub>N</sub> 2 reactio	n mechanisms.		
(b) Give mechanism for acid catalysed nucleophilic addition reaction of ethanol and propanone with hydroxylamine.	8. (a)	Write down	any two methods for the prepa	ration of alkanes.		
	(b)	Give mecha	nism for acid catalysed nucleoph	rilic addition reaction of ethanol and pro	panone with hydroxylamine.	
9. (a) What is Friedel-crafts acylation? Write down its mechanism for the preparation of acetophenone.	9. (a)					

312-424-1A-10000

(b) Discuss the commercial preparation of methyl alcohol from water gas in detail.