

MCQ Unit-II US05CPHY23

1	for an isochoric process $S_f - S_i(\text{isochoric}) = \underline{\hspace{2cm}}$	
	(a)	$\int_{V_1}^{V_2} \frac{C}{T} dT$
	(b)	$\int_i^f \frac{C_V}{T} dT$
	(c)	$\int_i^f \frac{C_P}{T} dT$
	(d)	$\int_{P_1}^{P_2} \frac{C}{T} dT$
2	for an isobaric process $S_f - S_i(\text{isobaric}) = \underline{\hspace{2cm}}$	
	(a)	$\int_{V_1}^{V_2} \frac{C}{T} dT$
	(b)	$\int_i^f \frac{C_V}{T} dT$
	(c)	$\int_i^f \frac{C_P}{T} dT$
	(d)	$\int_{P_1}^{P_2} \frac{C}{T} dT$
3	An isothermal isobaric vaporization must be a <u> </u>	
	(a)	Ellipse
	(b)	Hyperbola
	(c)	Parabola
	(d)	Straight line
4	The triple point on a U-V-S surface is a <u> </u>	
	(a)	Plane Square
	(b)	Plane Triangle
	(c)	Plane Rectangular
	(d)	Plane Circular
5	A throttling process are <u> </u>	
	(a)	irreversible
	(b)	reversible
	(c)	Path independent
	(d)	None of above
6	In the throttling process	
	(a)	Constant Volume V_i is maintained on the left hand side of the wall and a constant lower Volume V_f is maintained on the right hand side.
	(b)	Constant Temperature T_i is maintained on the left hand side of the wall and a constant lower Temperature T_f is maintained on the right hand side.
	(c)	Constant pressure P_i is maintained on the left hand side of the wall and a constant lower pressure P_f is maintained on the right hand side.
	(d)	None of above

7	The change in enthalpy during an isobaric process is equal to the heat transferred means		
	(a)	$H_f - H_i = Q$	c
	(b)	$H_f - H_i = \int_i^f C_p dT$	
	(c)	(a) and (b) both	
	(d)	None of above	
8	The equation $W = P_f V_f - P_i V_i$ in engineering is known as _____		
	(a)	Random work	d
	(b)	Irreversible work	
	(c)	Absolute work	
	(d)	Flow work	
9	The flow work is also known as		
	(a)	Work necessary to keep gas flowing	a
	(b)	Work necessary for pressure	
	(c)	(a) and (b) both	
	(d)	None of above	
10	In the reversible, isothermal, isobaric process		
	(a)	$dG = 0$	d
	(b)	$G = \text{constant}$	
	(c)	G is very large and cannot be measurable	
	(d)	(a) and (b) both	
11	the equation of the fusion curve is		
	(a)	$g' = g''$	a
	(b)	$g'' = g'''$	
	(c)	$g' = g'''$	
	(d)	$g' = g'' = g'''$	
12	the equation of the vaporization curve is		
	(a)	$g' = g''$	b
	(b)	$g'' = g'''$	
	(c)	$g' = g'''$	
	(d)	$g' = g'' = g'''$	
13	the equation of the sublimation curve is		
	(a)	$g' = g''$	c
	(b)	$g'' = g'''$	
	(c)	$g' = g'''$	
	(d)	$g' = g'' = g'''$	
14	At the triple point two equations hold simultaneously namely		
	(a)	$g' = g''$	d
	(b)	$g'' = g'''$	
	(c)	$g' = g'''$	
	(d)	$g' = g'' = g'''$	

15	Maxwell's equations are __ (in number)	
	(a) 2	c
	(b) 1	
	(c) 4	
	(d) 3	
16	Isenthalpic curve is also known as	
	(a) Same enthalpy	a
	(b) Constant enthalpy	
	(c) Variable enthalpy	
	(d) Large enthalpy	
17	An isenthalpic curve is the locus of all points representing _____ states of the same enthalpy.	
	(a) Non-equilibrium	b
	(b) Equilibrium	
	(c) (a) and (b) both	
	(d) None of above	