

() 101

1425/1424

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1425/1/25 :



H = 1, C = 12, N = 14, O = 16, Fe = 56, S = 32, Cu = 63.5 Cl = 35.5 :

$N_A = 6.02 \times 10^{23}$, $R = 0.0821 \text{ atm L mol}^{-1} \text{ K}^{-1} = 8.314 \text{ J mol}^{-1} \text{ K}^{-1}$:

:

:

: (C₂H₆) 10 g (H₂) -1

N_A (10 N_A (3 N_A (2 N_A (

0.3450 g 0.4764 g -2

:

Fe₂O₃ (Fe₂O₂ (Fe₃O₄ (FeO (

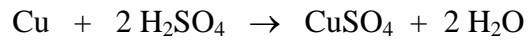
:

-3

kg m² s⁻² (kg m² s² (kg m² s (kg m² s⁻¹ (

CuSO₄ 12 g Cu 6.5 g H₂SO₄ 2.5 mol -4

:



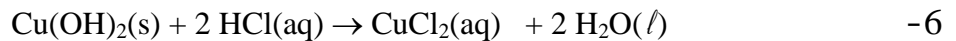
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85.1 (92.5 (64.3 (73.5 (

200 mL (CH₃COOH) -5

0.2 M

4.5 (3.0 (2.4 (3.5 (



: Cu(OH)₂ 20 g 2M HCl

- 0.205 (α 0.290 (0.250 (0.300 (
- 38 mL 0.60 (mL) NaOH -7
: (2) HCl
- 76 ml (38 ml (22.8 ml (127 ml (
- .25°C 300 mL 0.165g -8
: 365 mmHg
- 27.98 (16.02 (14.01 (32.03 (
- : -9
- PV = nRT (PV = K (PV = $\frac{1}{3}mNu^2$ ($\frac{PV}{T} = K$ (
- 60°C 750 torr 250 mL -10
: 850 torr
- 124.6 (104.4 (98.7 (115.5 (
- 308 cm³ 650 mmHg CO₂ -11
: 37°C
- 0.232 (0.198 (0.128 (0.532 (
- : $\frac{PV}{RT}$ -12
((
- ((
- 3.5 atm 25°C 1.5 atm 4.5 L (O₂) -13
: (O₂) (He)
- 0.43 (0.54 (0.51 (0.48 (
- : -14
- 450°C N₂(g) + 3 H₂(g) → 2 NH₃(g)
8.25 m³ (H₂)
: (kg) 2026.5 kPa

31.54 (α 29.85 (24.75 (25.20 (-15

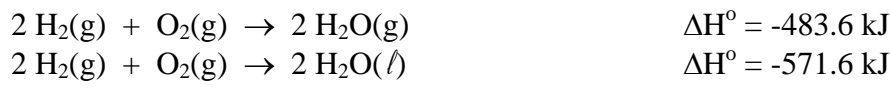
2.6 atm (N₂) (O₂)
 1.57 (1.47 (1.38 (1.21 (-16
 581 J

(J g⁻¹ °C⁻¹) 45°C 25°C 225 g
 0.145 (0.775 (0.805 (0.129 (

(ΔH_f^o =) -17
 Cl₂(g) (O₃(g) (CO₂(g) (H₂O(l) (

Cl₂(g) 0.300 mol H₂(g) 0.200 mol (kJ) -18
 .-92.3 kJ mol⁻¹ HCl(g) ΔH_f^o

36.9 (18.5 (92.3 (27.7 (-19



H₂O(l) → H₂O(g) : (kJ) ΔH^o
 527.6 (329.8 (44.0 (88.0 (

CH₄(l) → CH₄(g) (Al(s) → Al(g) (
 H₂O(l) → H₂O(g) (NH₃(g) → NH₃(s) (

