Final

Josh Whitehead ChEn 3853 Page 1

1) a) ka = 0.0246 [= 2.46×10-2]

b.) nizi niznitvik = 1-4 n'ca = n'H2=0

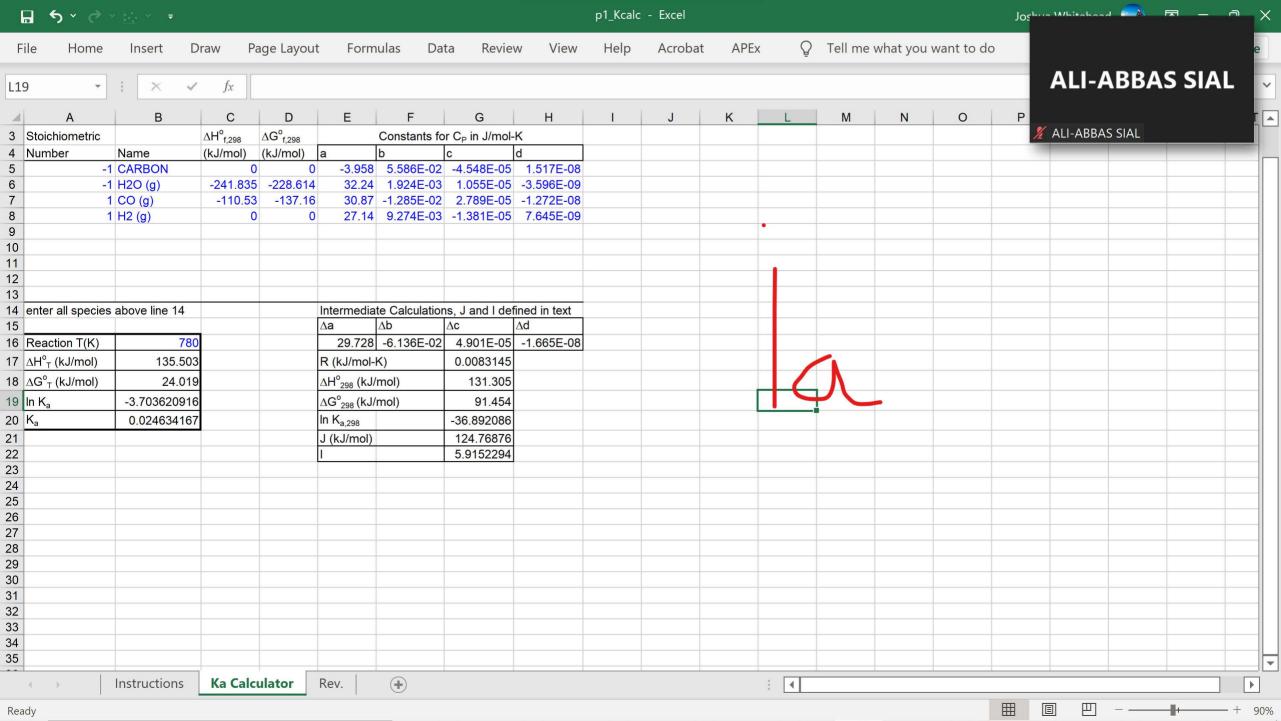
1, 1450 -1 LASO = 1- E n = {

KH2 - 4 

7 9 20.135

n = n'co + Vco & = & = 0.135 n, = 1 - & = 0.865

~ co = 0.135 = 13.5 % Converted



Josh whitehead 2.) a) Y: P= x: 7: P: 5at - Final war dope - 1; & = EXD(x3 H) 82 = exp(x, A) @ orsenpals: K1 = X1 -. 7, -8, Psat A5 - 82 P2 A5 - 82 P2  $\frac{y_1 p_1^{snt}}{R} = \frac{y_2 p_2^{snt}}{R} = \frac{y_1}{2} = \frac{p_2^{snt}}{p_1^{snt}} = \frac{3.17}{5.12}$ exp(x2A) = 3.17 =xp(x2A) = 5.62 A 2 1.74 P.) Stratelore 2 = 6xb (0.43 = 1.44) = 1.35 D.) Stratelore 2 = 6xb (0.63 · 1.44) = 1.35 ALDINO 01 - CABINI 1. 421 = 1.80 D= 5 x18161 = 0.0.1.35.2.2.65 +0.4.1.86.3.1 M'= K'b'sut D' - 0.0.2.05.135 [6:85 Kby

FINAL

Ch En

Pa

[H20] 210-14

[H2003] [H1003] = 10-6.35 KHCO3 = [C032-] [H+] = (0-10.33 A=[H+]+[C1-]=6M [H+) = [OH] + [HCO3] +(CO3-).2 # [ Na1+CO3 ] = X [H+) = [H20]10 + [C022-][H+] + 2 (0-\$0.33 [HC03]) 1: P=xih; : (Az (93)) 10-4 = [H20] 10-4 + [H5C05] 10+1.62 + 5[HC03] 10+333 (0-1.47 = (H2CO2) =) [H2CO2) = (0-1.47 . 6.0004 . 1 = 1.36×10-5 [H2C03] ~ 10-6.35 = 1.36 x10-5 - 6.054 x10-5 Next Page

3 cont

[H1]

2.70 X10 mol

x 84 = 2,27x10-29

and and

(2000) a

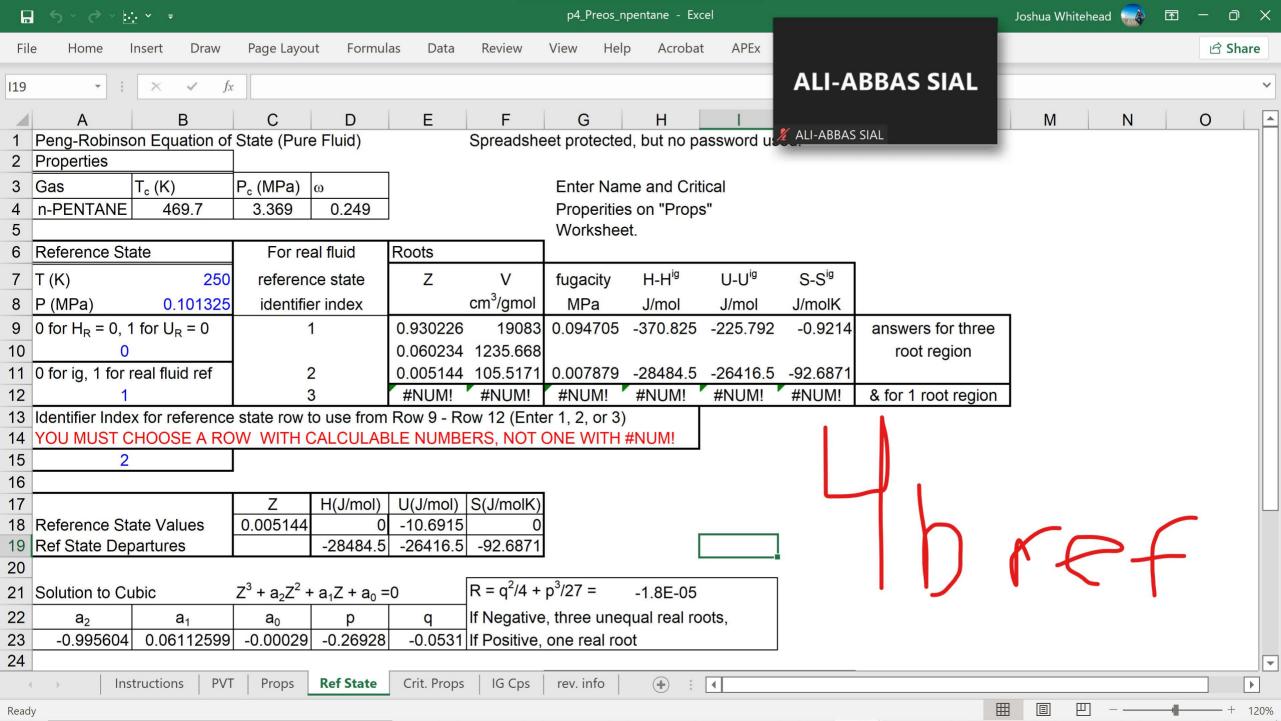
Final

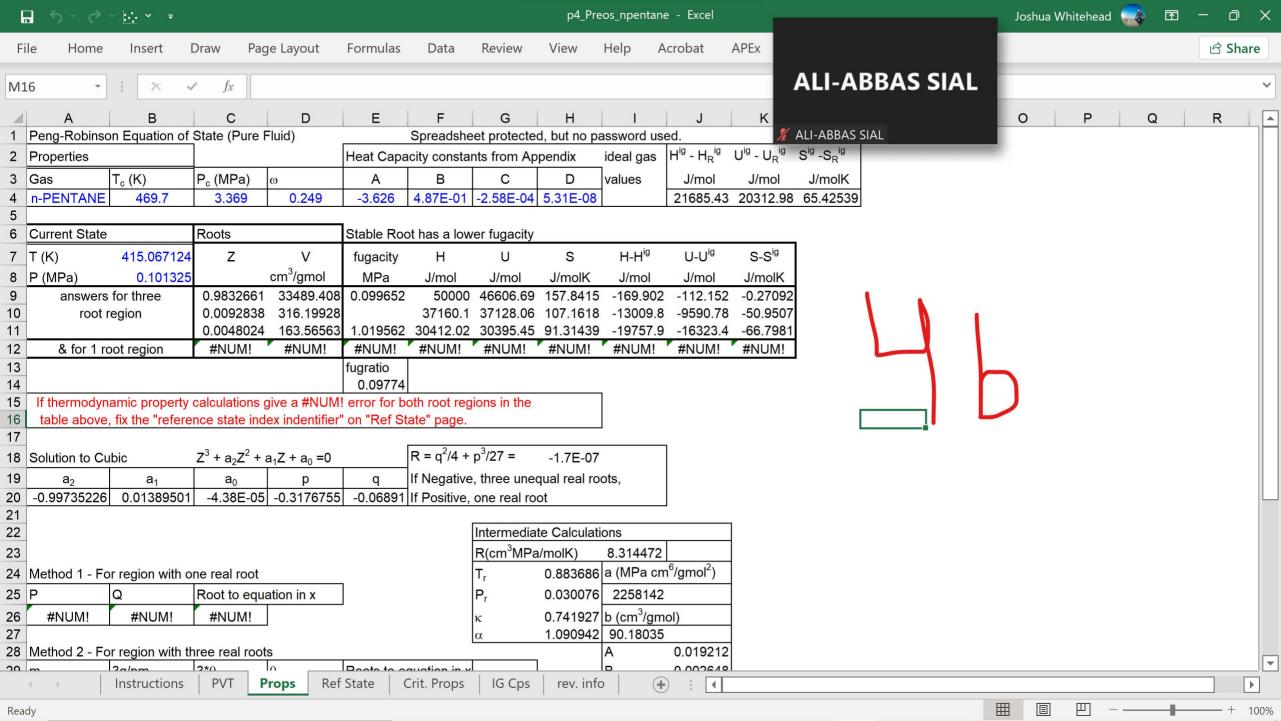
(Iosed

A) DH = hear mars [-50.0 F5]

b. | T = -415. K

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E'val

2022 Myterpart

Crev 3823

Lookell and 10 mbs 1 284' 1 cm3

2022 Myterpart

2008A1 and

2022 Myterpart

2008A1 and

2024 Mod

2024 Myterpart

2025 Myterpart

2025 Myterpart

2026 Myterpart

2026 Myterpart

2027 Myte

P@ 10°C L P@42°C

