Problem 24 (due Friday, November 19)

For one of the acetone-water binary system the following Wilson Equation values apply:

Acetone(1) V_1=74.05 Λ_{12}= 291.27 Λ_{21}= 1,448.01
Water(2) V_2=18.07

Based on the Wilson equation make the following calculations.

    (a) BUBL P: $t = 60°C$, x_1= 0.3.
    (b) DEW P: $t = 60°C$, y_1= 0.3.
    (c) P,T-flash: $t = 60°C$, $P = (P_{bubble} + P_{dew})$, $z_1 = 0.3$.

    (d) If an azeotrope exists at t = 60°C, find P^{az} and $x_1^{az} = y_1^{az}$.