

### Assignment # 3

A 4-L rigid tank contains 2 kg of saturated liquid–vapor mixture of water at 50°C. The water is now slowly heated until it exists in a single phase. At the final state, will the water be in the liquid phase or the vapor phase? What would your answer be if the volume of the tank were 400 L instead of 4 L?

H <sub>2</sub> O V = 4 L m = 2 kg T = 50°C

***Due on December 17, 2014***