

Gas properties

Is the energy required to heat air from 295 to 305 K the same as the energy required to heat it from 345 to 355 K? Assume the pressure remains constant in both cases.

Answer: High temperatures, low pressures & low densities.

Explanation: A gas can be treated as ideal gas when it is at higher temperatures or low pressures relative to its critical temperature and pressure. Because, at high temperatures and low pressures, the density of gas decreases and at low densities real gases behave as ideal gases.