

AOSC 433/633 & CHEM 433/633 Atmospheric Chemistry and Climate

Admission Ticket, Lecture 11

Due: Thursday, 7 March 2013 (at start of class)

12 points (4 points each part)

Your name:

A. Gibbs free energy involves both enthalpy and entropy. Briefly describe the relative roles of the change in enthalpy and entropy in affecting the rate of a chemical reaction.

B. Under what conditions will each term tend to dominate the rate of a chemical reaction?

C. Briefly: why is kinetic information needed, in addition to thermodynamic information, to quantify our understanding of atmospheric chemistry?