Reading Preparation for the Final Exam

May 12, 2005

The exam will have three questions:

1. Biasing (“Big Signal Models”)

2. Evaluation of critical (small signal) parameters for all the major amplifier types: Common Emitter (CE), CE with degeneration, cascode, followers and differential pairs

3. Dynamic response: zero/pole estimation and Bode Plots

I didn’t review followers yesterday, but we studied them enough to know them quite well. Remember, these are “buffers” which have very high input impedances and very low output impedances. This facilitates *voltage* amplification.

All the information on these circuits is found in chapter 6 of Sedra and Smith (except for the differential pair coverage) The differential pair coverage is in Sedra and Smith, 7.1, 7.2, 7.3. Chapter 6 has a bunch of stuff on “BiCMOS” and common base, which you are not responsible for (in this class. The only amplifier types you need know about for the final are those mentioned here.