ECE616 Homework #5
Out: Tuesday, November 1, 2011
Due: Tuesday, November 15, 2011

Topics: Dispersion; ultrafast nonlinear optics
Text: Ultrafast Optics
        Chapter 4, Sections 4.2-4.4, 4.6-4.7; Chapter 6, Sections 6.3-6.4

1) Text 4.6 [Note: although you may consider a Brewster angle prism as a special (simpler) case, I would also like you to derive the more general result that does not require the Brewster angle assumption. However, you should assume the prism is used at minimum deviation.]

2) Text 4.8

3) Text 4.11

4) Text 6.3

5) Text 6.4

6) Text 6.5