

# ECE471 INDUSTRIAL POWER SYSTEMS

## Assignment # 6 Hints & Answers

7.2 (a) for 1000 A, 1.5 3.5 seconds.

7.4 13 kA.

7.5 125 A.

7.6 500 A.

a)  $CTR_1 = 100 : 5$  (150 : 5 is OK)  $CTR_2 = 400 : 5$   $CTR_3 = 600 : 5$  (800 : 5 is OK)

b)  $CTS_1 = 6 \text{ A}$  (4 A)  $CTS_2 = 5 \text{ A}$   $CTS_3 = 6 \text{ A}$  (5 A)

c)  $TDS_1 = \frac{1}{2}$   $TDS_2 = 1$   $TDS_3 = 1\frac{1}{2}$