

CE 1911

Homework 10

1 – Determine the total number of bits in each memory – assume digital values for K, M, G 25pts

a) 256Mb SRAM in a x4 configuration

b) 64GB x 16 NAND Flash

2 – Determine the total number of address lines required for each memory – assume no address line sharing and digital values for K, M, G 25pts

a) 128KB ROM in a x8 configuration

b) 32Gb NOR Flash in a x16 configuration

3 – Assuming a square memory cell, shared address lines for the row and column decoders and a square overall memory footprint, determine the best address bus width – assume digital values for K, M, G 50pts

a) 256Mb SRAM in a x4 configuration