

Dr. Miller

## CPRE 281: Quiz 1

1)  $132_8 \Rightarrow 1^3 + 3^2 + 2^0 \Rightarrow 64 + 24 + 2 = \underline{\underline{90_{10}}}$

2)  $432_{10} \Rightarrow \text{Binary}$

$432/2 = 0$  <sup>R</sup> <sub>LSD</sub>

$216/2 = 0$

$108/2 = 0$

$54/2 = 0$

$27/2 = 1$

$13/2 = 1$

$6/2 = 0$

$3/2 = 1$

$1/2 = 1$  <sub>MSD</sub>

$\Rightarrow \underline{\underline{1110110000_2}}$

3)  $42_7 \Rightarrow 4^1 + 2^0 = 28 + 2 = 30_{10}$

$30/2 = 0$  <sup>R</sup>

$15/2 = 1$

$7/2 = 1 \Rightarrow \underline{\underline{11110_2}}$

$3/2 = 1$

$1/2 = 1$

4)  $ACE_{16} \Rightarrow$  <sup>10</sup> A <sup>12</sup> C <sup>14</sup> E

$\Rightarrow 101011001110$

$5316 \Rightarrow \underline{\underline{15316_8}}$