

ECE 733
Midterm
Spring 2003

1. C. $B_n/B_p = 4$, to $W_p:W_n=8$
2. B. $V_{in} = (V_{DD} - 0.5 + 0.5 \cdot 2)/3 = (V_{DD} + 0.5)/3 = 3.8/3 = 1.26 \text{ V}$
3. D. 2 mA
4. B
5. C. $10E-15 \cdot 3.3/2 \cdot 0.6E-3 = 27 \text{ ps}$
6. D
7. C
8. A
9. C
10. C
11. A
12. B
13. C or D