

## HOMEWORK #2 (even)

### SECTION 1.7

- (22)  $x \in (-\infty, \frac{1}{2}]$   
 (24)  $x \in [-4, \infty)$   
 (40)  $x \in (-\infty, -2) \cup (3, \infty)$   
 (46)  $x \in (-4, 3)$   
 (60)  $x \in [-5, -2] \cup [\frac{4}{3}, \infty)$   
 (66)  $x \in (-\infty, -4] \cup [-3, 4]$   
 (70)  $x \in (-\infty, -1) \cup (4, \infty)$   
 (78)  $x \in (-2, -\frac{5}{3}]$   
 (92)  $x \in (-\frac{7}{2}, \frac{11}{9}) \cup (\frac{8}{3}, \infty)$

### SECTION 2.1

- (16) a)  $3\sqrt{55}$ ; b)  $(2\sqrt{7}, \frac{7\sqrt{3}}{2})$   
 (22) yes  
 (32) 4.85 million & 5.5 million.  
 (64) No

### SECTION 2.2

(50)  $-3a - 8$

### SECTION 2.3

(36)  $w = 1$

(50)  $w = -\frac{4}{3}$

- (68) (c) The time differ by 0.14 min  
 (72) (b)  $-0.0114$  min/yr.