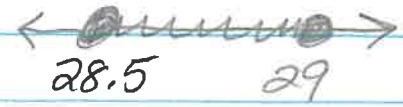
3.6 Part I

3.6 pg. 204 #10-22 even

10) $x \geq 28.5$ and $x \leq 29$

$28.5 \leq x \leq 29$



12) $5 \leq y+2 \leq 11$

$5 \leq y+2$ $\quad$ $y+2 \leq 11$

$-2 \quad -2$ $\quad$ $-2 \quad -2$

$3 \leq y$ $\quad$ $y \leq 9$

$y \geq 3$ and $y \leq 9$

$3 \leq y \leq 9$

14) $15 \leq \frac{20+11+K}{3} \leq 19$

$15 \leq \frac{20+11+K}{3}$ $\quad$ $\frac{20+11+K}{3} \leq 19$

$15 \leq \frac{31+K}{3}$ $\quad$ $\frac{31+K}{3} \leq 19$

$\left(15 \leq \frac{31+K}{3}\right)3$ $\quad$ $3\left(\frac{31+K}{3} \leq 19\right)$

$45 \leq 31+K$ $\quad$ $31+K \leq 51$

$-31 \quad -31$ $\quad$ $-31 \quad -31$

$K \geq 14$ and $K \leq 26$

$14 \leq K \leq 26$

$-3 \leq \frac{6-q}{9} \leq 3$

16) $-3 \leq \frac{6-q}{9}$ $\qquad$ $\frac{6-q}{9} \leq 3$

$9\left(-3 \leq \frac{6-q}{9}\right)$ $\qquad$ $\left(\frac{6-q}{9} \leq 3\right)9$

$-27 \leq 6-q$ $\qquad$ $6-q \leq 27$

$-6 \quad -6$ $\qquad$ $-6 \quad -6$

$-1(-33 \leq -q)$ $\qquad$ $(-q \leq 21)-1$

* FLIP $\qquad$ * FLIP

$33 \geq q$ $\qquad$ $q \geq -21$

$q \geq -21$ and $q \leq 33$

$-21 \leq q \leq 33$

18) $\frac{5+m}{-5} > \frac{4}{-5}$ or $\frac{7m}{7} < \frac{-35}{7}$

$m > -1$ or $m < -5$

20) $\frac{7-c}{-7} < \frac{1}{-7}$ or $\frac{4c}{4} \leq \frac{12}{4}$

$-1(-c < -6)$

* FLIP

$c > 6$ or $c \leq 3$

$c \leq 3$ or $c > 6$

22) $5z - 3 > 7$ or $4z - 6 \leq -10$

$+3 \quad +3$ $\qquad$ $+6 \quad +6$

$\frac{5z}{5} > \frac{10}{5}$ $\qquad$ $\frac{4z}{4} \leq \frac{-4}{4}$

$z > 2$ or $z \leq -1$

$z \leq -1$ or $z > 2$

$-1 \qquad 2$