[12-01-26-A]

Exercises [A–3]

Solve the following equations. Check as directed by your teacher.

1. $\frac{4x}{3} - \frac{1}{6} = x - \frac{1}{2}$

2. $\frac{3x}{2} - \frac{x}{6} = -1$

3. $\frac{x-3}{4} = \frac{x}{5} - 1$

4. $\frac{x-a}{7} + a = x$ (Solve for x.)

5. Solve $A = lw$ for l; for w.

6. Solve $D = \frac{M}{V}$ for M; for V.

7. Solve $A = \frac{1}{2}h(a+b)$ for h; for a; for b.

8. Solve $F = \frac{wa}{g}$ for a; for w; for g.

9. Solve $A = \frac{V_2 - V_1}{t}$ for t; for V_2; for V_1.

10. $\frac{2a+3}{4} = \frac{a-6}{8}$

11. $\frac{5x-1}{4} = \frac{1}{14} - \frac{7x-3}{7}$

12. $\frac{2x}{3} = \frac{3x-1}{4} - \frac{x}{6}$

13. $\frac{2(m-1)}{3} - \frac{3}{4} = \frac{5(m+2)}{2}$

14. $\frac{4h+1}{3} - \frac{2h+1}{5} = \frac{3}{5}$

15. $\frac{3}{a} + \frac{2}{a} = 5$

16. $\frac{r+1}{r} = 4$

17. $\frac{1}{x} - \frac{x-1}{3} = -\frac{1}{3}x$

18. $.3x = .6$

19. $.4x = .2x + 8$

20. $.05x + .6 = .2x + .3$

These answers are correct. The answers on the sheet I gave out in class were all incorrect.

Page 204 (top)

1. -1
2. $-\frac{3}{4}$
3. -5
4. a
5. $\frac{A}{w}$; $\frac{A}{l}$
6. DV; $\frac{M}{D}$
7. $\frac{2A}{a+b}$; $\frac{2A - hb}{h}$; $\frac{2A - ha}{h}$
8. $\frac{Fg}{w}$; $\frac{Fg}{a}$; $\frac{wa}{F}$
9. $\frac{V_2 - V_1}{A}$; $At + V_1$; $V_2 - At$
10. -4
11. $\frac{1}{3}$
12. -3
13. $-\frac{7}{2}$
14. $\frac{1}{2}$
15. 1
16. $\frac{1}{3}$
17. -3
18. 2
19. 40
20. 2