Math 084 W2010 Quiz1 Preparation sections 1.1 to 1.4 v02
Dressler

Name_____

Write the English phrase as an algebraic expression. Let the variable x represent the number.

1) four more than a number

2) nine more than a number

3) seven less than a number

4) six less than a number

5) The sum of a number and 40

6) The sum of a number and 91

7) six subtracted from a number

8) nine subtracted from a number

9) four decreased by a number

10) Three times a number, decreased by eleven

11) Two times a number, decreased by nine

12) five less than the product of 12 and a number

13) eight less than the product of 13 and a number

14) the sum of 50 divided by a number and that number divided by 50

15) the sum of 15 divided by a number and that number divided by 15

16) two more than the quotient of a number and 35

17) nine more than the quotient of a number and 20

18) The sum of a number and 86

19) nine less than a number

20) Seven times a number, decreased by thirteen

21) the sum of 45 divided by a number and that number divided by 45

22) the sum of 35 divided by a number and that number divided by 35

Write the sentence as an equation. Let the variable x represent the number.

23) The product of 3 and a number increased by 4 is 18.

24) The product of 3 and a number increased by 5 is 24.

25) The product of 5 and a number increased by 3 is 30.

26) The product of 4 and a number increased by 5 is 40.

Convert the mixed number to an improper fraction.

27) $6\frac{5}{7}$

28) $14\frac{17}{19}$

29) $2\frac{5}{6}$

30) $2\frac{7}{9}$

31) $5\frac{4}{5}$

32) $23\frac{7}{10}$

Convert the improper fraction to a mixed number.

33) $\frac{17}{3}$

34) $\frac{46}{3}$

35) $\frac{21}{5}$

36) $\frac{5}{3}$

37) $\frac{77}{9}$

38) $\frac{265}{4}$

39) $\frac{27}{5}$

40) $\frac{8}{3}$

41) $\frac{82}{11}$

42) $\frac{134}{5}$

Perform the indicated operation. Where possible, reduce the answer to its lowest terms.

43) $\frac{7}{9} + \frac{1}{15}$

44) $\frac{2}{15} + \frac{5}{13}$

45) $\frac{5}{6} - \frac{3}{8}$

46) $\frac{7}{8} - \frac{1}{4}$

47) $\frac{1}{7} - \frac{1}{10}$

48) $\frac{1}{5} - \frac{1}{13}$

49) $\frac{5}{7} - \frac{1}{2}$

50) $\frac{4}{5} - \frac{3}{20}$

51) $\frac{9}{19} - \frac{8}{21}$

52) $\frac{7}{17} - \frac{5}{19}$

53) $\frac{7}{9} - \frac{1}{12}$

54) $15\frac{3}{4} + 6\frac{2}{9}$

55) $16\frac{1}{4} + 13\frac{5}{7}$

56) $9\frac{1}{7} + 7\frac{1}{3}$

57) $20\frac{1}{2} + 20\frac{2}{7}$

58) $\frac{6}{11} + \frac{2}{13}$

59) $\frac{4}{5} - \frac{3}{20}$

60) $\frac{5}{8} - \frac{1}{4}$

61) $\frac{5}{6} - \frac{1}{8}$

62) $\frac{5}{6} - \frac{1}{4}$

List all the elements of B that are elements of the given set.

63) $B = \{20, \sqrt{7}, -22, 0, \frac{0}{1}, \sqrt{9}\}$ Integers

64) $B = \{2, \sqrt{5}, -3, 0, \frac{0}{8}, \sqrt{25}\}$ Integers

65) $B = \{10, \sqrt{6}, -5, 0, \frac{0}{3}, \sqrt{4}\}$ Whole numbers

66) $B = \{15, \sqrt{6}, -21, 0, \frac{0}{9}, \sqrt{9}\}$ Natural numbers

67) $B = \{13, \sqrt{5}, -8, 0, \frac{0}{7}, \sqrt{16}, \frac{-6}{0}\}$ Real numbers

68) $B = \{2, \sqrt{7}, -6, 0, \frac{0}{7}, \sqrt{9}, \frac{-5}{0}, 0.3\}$ Rational numbers

69) $B = \{5, \sqrt{6}, -11, 0, \frac{0}{9}, \sqrt{9}, \frac{-7}{0}, 0.39\}$ Irrational numbers

70) $B = \{14, \sqrt{8}, -8, 0, \frac{0}{1}, \sqrt{25}\}$ Integers

71) $B = \{10, \sqrt{7}, -17, 0, \frac{0}{25}, \sqrt{25}\}$ Natural numbers

72) $B = \{13, \sqrt{5}, -17, 0, \frac{0}{4}, \sqrt{9}, \frac{-6}{0}, 0.71\}$ Rational numbers

73) $B = \{11, \sqrt{6}, -23, 0, \frac{0}{4}, \sqrt{9}\}$ Whole numbers

74) $B = \{6, \sqrt{7}, -13, 0, \frac{0}{9}, \sqrt{9}\}$ Natural numbers

75) $B = \{6, \sqrt{5}, -9, 0, \frac{0}{8}, \sqrt{16}, \frac{-2}{0}\}$ Real numbers

76) $B = \{7, \sqrt{5}, -20, 0, \frac{0}{3}, \sqrt{25}, \frac{-4}{0}, 0.89\}$ Rational numbers

77) $B = \{9, \sqrt{7}, -2, 0, \frac{0}{9}, \sqrt{9}, \frac{-4}{0}, 0.29\}$ Irrational numbers

78) $B = \{6, \sqrt{5}, -18, 0, \frac{0}{6}, \sqrt{4}\}$ Integers

79) $B = \{11, \sqrt{8}, -15, 0, \frac{0}{9}, \sqrt{9}\}$ Natural numbers

80) $B = \{8, \sqrt{6}, -15, 0, \frac{0}{4}, \sqrt{16}, \frac{-8}{0}, 0.37\}$ Rational numbers

1) $x + 4$
2) $x + 9$
3) $x - 7$
4) $x - 6$
5) $x + 40$
6) $x + 91$
7) $x - 6$
8) $x - 9$
9) $4 - x$
10) $3x - 11$
11) $2x - 9$
12) $12x - 5$
13) $13x - 8$
14) $\frac{50}{x} + \frac{x}{50}$
15) $\frac{15}{x} + \frac{x}{15}$
16) $\frac{x}{35} + 2$
17) $\frac{x}{20} + 9$
18) $x + 86$
19) $x - 9$
20) $7x - 13$
21) $\frac{45}{x} + \frac{x}{45}$
22) $\frac{35}{x} + \frac{x}{35}$
23) $3(x + 4) = 18$
24) $3(x + 5) = 24$
25) $5(x + 3) = 30$
26) $4(x + 5) = 40$
27) $\frac{47}{7}$
28) $\frac{283}{19}$
29) $\frac{17}{6}$
30) $\frac{25}{9}$
31) $\frac{29}{5}$
32) $\frac{237}{10}$
33) $5\frac{2}{3}$

34) $15\frac{1}{3}$

35) $4\frac{1}{5}$

36) $1\frac{2}{3}$

37) $8\frac{5}{9}$

38) $66\frac{1}{4}$

39) $5\frac{2}{5}$

40) $2\frac{2}{3}$

41) $7\frac{5}{11}$

42) $26\frac{4}{5}$

43) $\frac{38}{45}$

44) $\frac{101}{195}$

45) $\frac{11}{24}$

46) $\frac{5}{8}$

47) $\frac{3}{70}$

48) $\frac{8}{65}$

49) $\frac{3}{14}$

50) $\frac{13}{20}$

51) $\frac{37}{399}$

52) $\frac{48}{323}$

53) $\frac{25}{36}$

54) $21\frac{35}{36}$

55) $29\frac{27}{28}$

56) $16\frac{10}{21}$

57) $40\frac{11}{14}$

58) $\frac{100}{143}$

59) $\frac{13}{20}$

60) $\frac{3}{8}$

61) $\frac{17}{24}$

62) $\frac{7}{12}$

63) $20, -22, 0, \frac{0}{1}, \sqrt{9}$

64) $2, -3, 0, \frac{0}{8}, \sqrt{25}$

65) $10, 0, \frac{0}{3}, \sqrt{4}$

66) $15, \sqrt{9}$

67) $13, \sqrt{5}, -8, 0, \frac{0}{7}, \sqrt{16}$

68) $2, -6, 0, \frac{0}{7}, \sqrt{9}, 0.3$

69) $\sqrt{6}$

70) $14, -8, 0, \frac{0}{1}, \sqrt{25}$

71) $10, \sqrt{25}$

72) $13, -17, 0, \frac{0}{4}, \sqrt{9}, 0.71$

73) $11, 0, \frac{0}{4}, \sqrt{9}$

74) $6, \sqrt{9}$

75) $6, \sqrt{5}, -9, 0, \frac{0}{8}, \sqrt{16}$

76) $7, -20, 0, \frac{0}{3}, \sqrt{25}, 0.89$

77) $\sqrt{7}$

78) $6, -18, 0, \frac{0}{6}, \sqrt{4}$

79) $11, \sqrt{9}$

80) $8, -15, 0, \frac{0}{4}, \sqrt{16}, 0.37$