



Math Olympiad and Problem Solving Programs

F120 - Intermediate Problem Solving
Problem Set 16.2 - Arithmetic Operators

Name:

Date:

- $(1 + 2 + 3 + 4) \div 5 = 10 \div 5 = 2$
- $1 \times (2 + 3) \times 4 \times 5 = 5 \times 4 \times 5 = 100$
- $(5 \times 5)(5 - (5 \div 5)) \times (5 \div 5) \times (5 \div 5) = 25 \times (5 - 1) \times 1 \times 1 = 25 \times 4 = 100$
 $(5 + 5 + 5 + 5) \times 5 \times (5 \div 5) \times (5 \div 5) = 20 \times 5 \times 1 \times 1 = 100$
- $(1 + 2) \times 3 - 4 + 5 = 3 \times 3 + 1 = 10$
 $(1 + 2 + 3 - 4) \times 5 = (6 - 4) \times 5 = 2 \times 5 = 10$
 $(1 + 2) \div 3 + 4 + 5 = 3 \div 3 + 9 = 1 + 9 = 10$
- $8 \cdot 8 \cdot 8 \cdot 8 \cdot 8 \div (8 + 8) - 8 \cdot (8 - (8 \div 8) - (8 \div 8) - (8 \div 8))$
 $= 32768 \div 16 - 8 \cdot (8 - 1 - 1 - 1) = 2048 - 8 \cdot (5)$
 $= 2048 - 40 = 2008$
 $[8 \cdot 8 + 8 \cdot 8 - (8 \div 8 + 8 \div 8 + 8 \div 8)] \cdot 8 \div 8 \cdot (8 + 8) + 8$
 $= [64 + 64 - (1 + 1 + 1)] \cdot 16 + 8 = 125 \cdot 16 + 8 = 2000 + 8 = 2008$
- $[(7 \times 9) + 12] \div 3 - 2 = (63 + 12) \div 3 - 2 = 75 \div 3 - 2 = 25 - 2 = 23$
- $888 + 88 + 8 + 8 + 8$
 $(8 \cdot 8 \cdot 8 - 8) \cdot [(8 + 8) \div 8] - 8 = 504 \cdot 2 - 8 = 1008 - 8 = 1000$
- Free point.
- $1 + [(2 + 3 - 4 + 5 - 6) \cdot 7 \cdot 8] = 1 + (0 \cdot 7 \cdot 8) = 1 + 0 = 1$
 $(1 + 2 + 3 + 4) \div (5 + 6 + 7 - 8) = 10 \div 10 = 1$
- $9 \cdot 8 \cdot 7 + 6 + 5 + 4 - 3 \cdot (2 - 1) = 504 + 15 - 3 = 516$