

Give yourself 15 minutes for this take-home quiz. Notes are not allowed, but calculators or class manipulatives may be used. This quiz will be exchanged and discussed during class.

1. Compute the following. Show at least four steps for computing the expression and give a reason for each step. (2 MP\*)

$$\frac{22 \cdot 3}{77}$$

2. Use the given property or properties to rewrite each expression. (1 MP\* each)

a.  $(1 + 5)2$ , commutative property of multiplication

b.  $6(7 \cdot 42)$ , associative property of multiplication

c.  $3 \cdot 4 + 3 \cdot 5 - 3 \cdot 6$ , commutative property of addition, then distributive property of multiplication and addition