

**Practice A**

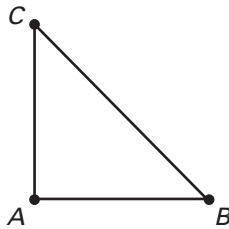
For use with pages 102–107

**Match the statement with the Property of Congruence.**

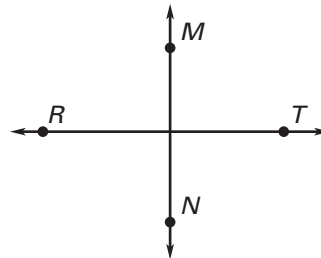
- |  |                        |
|--|------------------------|
| 1. If $\overline{CD} \cong \overline{PM}$ and $\overline{PM} \cong \overline{RV}$ , then $\overline{CD} \cong \overline{RV}$ . | A. Symmetric Property  |
| 2. For any segment $\overline{DS}$ , $\overline{DS} \cong \overline{DS}$ .   | B. Reflexive Property  |
| 3. If $\overline{RA} \cong \overline{DB}$ , then $\overline{DB} \cong \overline{RA}$ .   | C. Transitive Property |

**Mark the diagram with the given information.**

4.  $\overline{AB} \cong \overline{AC}$



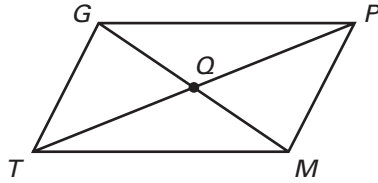
5.  $\overleftrightarrow{TR} \perp \overleftrightarrow{MN}$



6.  $MA = 5, AT = 5$



7.  $GQ = 4, MQ = 4$   
 $TQ = 6, PQ = 6$



8. A is the midpoint of  $\overline{SR}$



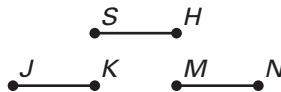
9.  $\overline{BN} \cong \overline{DM}$



**Complete the argument, giving a reason for each step.**

10. Given:  $\overline{JK} \cong \overline{SH}$ ,  $\overline{SH} \cong \overline{MN}$

Prove:  $\overline{JK} \cong \overline{MN}$



**Statements**

1.  $\overline{JK} \cong \overline{SH}$
2.  $\overline{SH} \cong \overline{MN}$
3.  $\overline{JK} \cong \overline{MN}$

**Reasons**

1. ?
2. ?
3. ?

11. Given:  $\overline{ABCD}$

Prove:  $AD = AB + BC + CD$



**Statements**

1.  $\overline{AD}$
2.  $AD = AB + BD$
3.  $BD = BC + CD$
4.  $AD = AB + BC + CD$

**Reasons**

1. Given
2. ?
3. ?
4. ?

12. Write an argument for Exercise 11 in the form of a paragraph proof.