



In  $\Delta APB$  and  $\Delta BQA$

$$\angle 1 = \angle 2 = 90^\circ$$

$$AB = AB$$

$$AP = BQ$$

$\Delta APB \cong \Delta BQA$  by R.H.S. rule

$$BP = AQ \text{ ( C.P.C.T.)}$$

In  $\Delta AOQ$  and  $\Delta BOP$

$$\angle 3 = \angle 4$$

$$\angle 1 = \angle 2 = 90^\circ$$

$$AQ = BP$$

$\Delta AOQ \cong \Delta BOP$  by rule

$$OQ = OP$$