

2. $\overline{EF} \cong \overline{HI}$, $\overline{FG} \cong \overline{IJ}$, $\overline{EG} \cong \overline{HJ}$, $\angle EFG \cong \angle HIJ$,
 $\angle FGE \cong \angle IJH$, $\angle FEG \cong \angle IHJ$

3. 335 ft

4. 128

5. Yes; two pairs of sides and two pairs of \sphericalangle s are marked as \cong ; the third pair of sides are \cong by the Refl. Prop. of \cong , and the third pair of \sphericalangle s are \cong by the Third \sphericalangle Theorem. The third pair of angles are \cong because each has measure $180 - m\angle R - m\angle RTK$.

6. No; there are not three pairs of \cong corresp. sides.

8. a. \overline{NY}

b. $\angle X$

9. a. \overline{RO}

b. $\angle T$

10. a. $\angle A$

b. \overline{KL}

c. $CKLU$

11. a. $\angle M \cong \angle T$

b. 92

13. No; the \triangle could be the same shape but not necessarily the same size.

14. He has not shown that corresp. angles are \cong .

15. C

16. Yes. The diagram shows that $\angle CBD \cong \angle ADB$ and $\angle CDB \cong \angle ABD$. By the Third \sphericalangle Theorem, $\angle C \cong \angle A$. The diagram shows that $\overline{CD} \cong \overline{AB}$ and $\overline{CB} \cong \overline{AD}$. $\overline{BD} \cong \overline{BD}$ by the Refl. Prop. of \cong . So $\triangle BCD \cong \triangle DAB$ by the def. of $\cong \triangle$.

17. $m\angle A = m\angle D = 20$

18. $m\angle B = m\angle E = 12$

19. $BC = EF = 8$

20. $AC = DF = 19$

21. 43

22. $x = 15$, $t = 2$