Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Date: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Triangle Proofs Homework**

1. Given: , B is the midpoint of .



 Prove: $∠AEB≅∠CBD$

|  |  |
| --- | --- |
| Statements | Reasons |
| 1)  |  |
| 2)  |  |
| 3) B is the midpoint of  |  |
| 4)  |  |
| 5) $∠AEB≅∠CBD$ |  |



1. Given: and bisects 

 Prove: $⊿SXT≅⊿RXT$

|  |  |
| --- | --- |
| **Statements** | **Reasons** |
|  |  |
|  |  |
|  |  |
|  |  |

1. Given: H is the midpoint of and 



 Prove: 

|  |  |
| --- | --- |
| Statements | Reasons |
| 1)  |  |
| 2)  |  |
| 3)  |  |
| 4)  |  |
| 5)  |  |

1. Given: and Hint: Separate the two triangles.



 Prove: 

|  |  |
| --- | --- |
| Statements | Reasons |
| 1)  |  |
| 2)  |  |
| 3)  |  |
| 4)  |  |
| 5)  |  |