Math 5710 Tuesday, 7/07/20 Quiz 11

1. What is your name?

2. Although we didn't have the benefit of Theorem 05 available to us when we worked with Torialba problem during Meeting 11, write a paragraph that explains why the following upcoming theorem is relevant to problems similar to Torialba's:

   Theorem 05: Independent experiments #1 and #2 with respective finite sample spaces Ω_1 and Ω_2 are conducted $\Rightarrow | \Omega_1 \cap \Omega_2 | = | \Omega_1 | \cdot | \Omega_2 |$

Sample explanation:

Torialba's problems involved combining two different otherwise unrelated experiment. We needed compute $p(A_1 \cap A_1)$ where (A_1 = the event of flipping exactly two tails $\wedge$ A_2 = the event that the red die and green die both display the same number of dots). To compute $p(A_1 \cap A_1)$, we needed to compute $| \Omega_1 \cap \Omega_2 |$.

---

3. Smile.