

Normal Distribution Practice

NAME:

1. The heights of young men are normally distributed with a mean of 70 inches and a standard deviation of 2.5 inches. Draw a normal density curve with the mean and plus or minus one, two, and three standard deviations marked.

2. On your picture above, label 71 on the horizontal axis and shade the area that represents the percentage of men who are less than 71 inches. Then find the percentage of men who are less than 71 inches. (HINT: You need to find the standard score and look it up in Table B.)

3. In 1999, the scores of students taking the SAT were approximately normally distributed with a mean of 1017 and a standard deviation of 209. Draw a normal density curve with the mean and plus or minus one, two, and three standard deviations marked.

4. On your picture above, label 1200 on the horizontal axis and shade the area that represents the percentage of students who scored **more** than 1200 on their SAT. Find this percentage. (Make sure your answer makes sense considering your drawing of the desired area.)