

Investigation of Remains #1

Skeletal Remains were found in the woods off of a major highway. Using your knowledge in forensic pathology determine the sex and height of this individual.

Determining Sex –

1. Measure the following pelvic regions and record your data in the table below.

Pelvis Width	Sacrum length	Pelvis Opening	Bottom Shape

Table 1.

2. What is the sex of this individual?
3. Explain how you know.

Determining Height –

1. To do this, measure the following humerus lengths:
 Yours
 Your partner
 Your teacher

Bend the subject’s arm at the elbow and feel the tuberosity, or “knot,” on the side of the elbow. This is essentially one of the ends of the humerus. Also, feel at the shoulder a similar “knot,” this should be the top of the humerus. Carefully measure the entire length of this bone. Then measure the subject’s height very carefully. Record this data for each person before you begin the next step.

2. Graph the data with the length of the humerus along the x-axis and the subject’s height along the y-axis. Once all of the data is graphed, draw a straight line along the data points and extend it so that your line intersects with the y-axis. This point will be the y-intercept. Next determine the slope of the line. Finally, determine the equation of your line.
3. Measure the length of the humerus bone and determine height using two methods:
 first, using your graphs to estimate height, and
 second, using your line equations to calculate height.