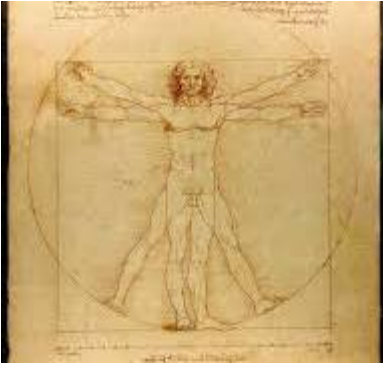# The Vitruvian Man Hypothesis

My Hypothesis: I contend that taller people have a longer arm span, and will demonstrate this using the data collected from the class.
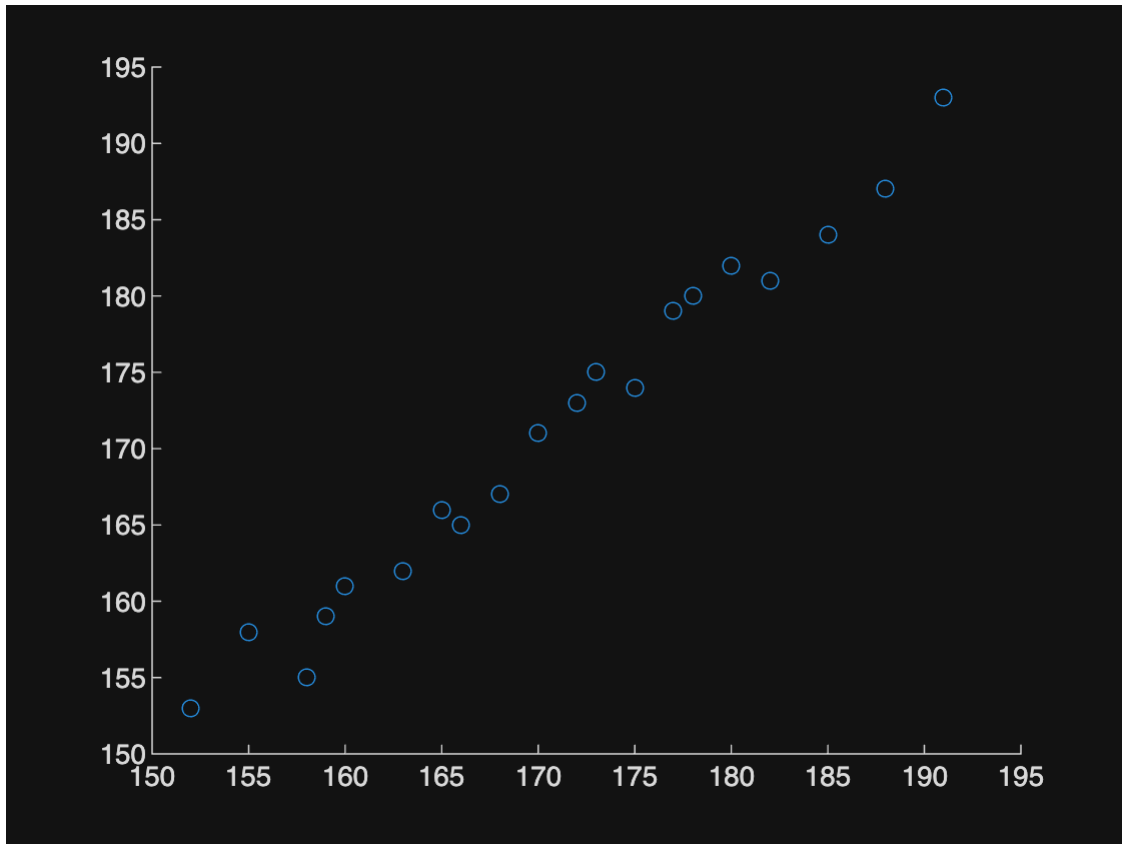
Importing the data

First I import the data to a table named `data`

```
data = readtable("HumanData.csv");
```

Make a scatter diagram

First, I'll make a scatter diagram of `Height_cm` vs `ArmSpan_cm`.

```
scatter(data.Height_cm, data.ArmSpan_cm);
```

Correlation Coefficient

Next, I will calcuate the correlation coefficient between the two values. Numbers range from 0 to 1. 1 is perfect correlation.

```
corrcoef(data.Height_cm, data.ArmSpan_cm)
```

```
ans = 2×2
    1.0000    0.9904
    0.9904    1.0000
```

Claim, Evidence, Reasoning

Claim

Taller people have a longer armspan

Evidence

The correlation between height and armspan was .99 in my data. An almost perfect correlation.

Reasoning

Humans have an armspan that mirrors their height. This is a genetic trait in all humans.