Opening Discussion

- What did we talk about last class?
- Do you have any questions about the readings?
Do you have any data that we could look at and do analysis on either with fitting or signal processing?

\[ e^{ix} = \cos(x) + i \sin(x) \]
Technically what Matlab uses is a function called a fast Fourier transform. To keep it fast, the number of elements passed into it needs to be a power of 2.

The fft function will go from a signal series and return a series of the frequencies.

The ifft function does the opposite.

Notice that we don't pass in the time values so the indexes are assumed to be the times. We have to scale that back to whatever range we actually want.
Let's spend the rest of the class working with the fft function and doing some examples.
Assignment #4 is due on Friday.