Notebook to support Exercise 3.4.10, modeling a cooling potato.

The data, in time/temperature pairs:

```
times = [0, 2, 4, 8, 10, 13, 17, 20, 24, 30];
temps = [204, 193, 184, 169, 162, 156, 149, 143, 138, 130];
```

However, we will operate on the quantities (t, log(u(t)-A)-log(u(0)-A), with u(0)=204 and A = 72.

```
A = 72;
u0 = 204;
logtemps = log(temps-A)-log(u0-A);
```

A plot:

```
plt1 = plot(times,logtemps,'-r');
```

We seek to fit a line y = -k*t to this

```
syms u(t,k);
u(t,k) = -k*t
```

A least-squares function can be formed as

```
syms SS(k)
SS(k) = sum((u(times,k)-logtemps).^2);
```

Now adjust k to minimize this.