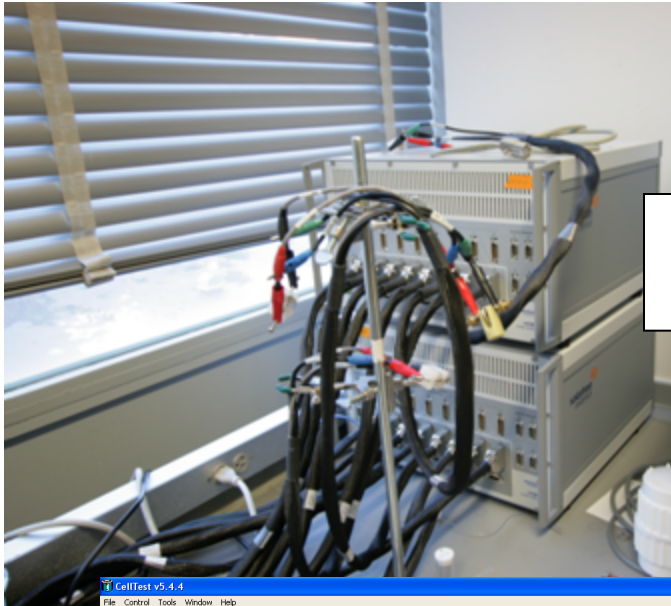


Biomaterials Engineering

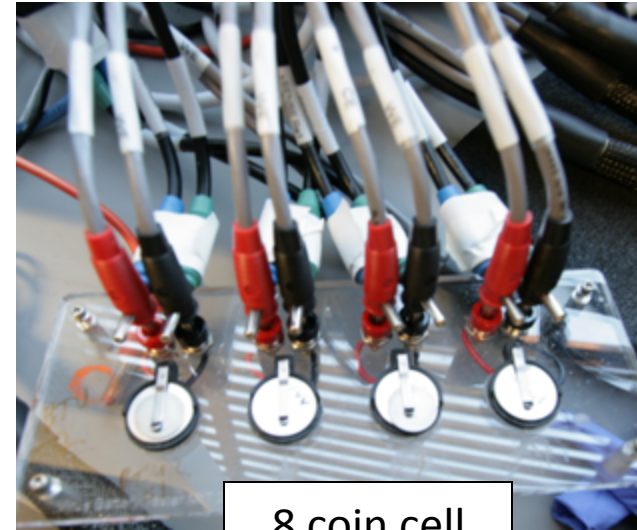
M3D5

12.03.09

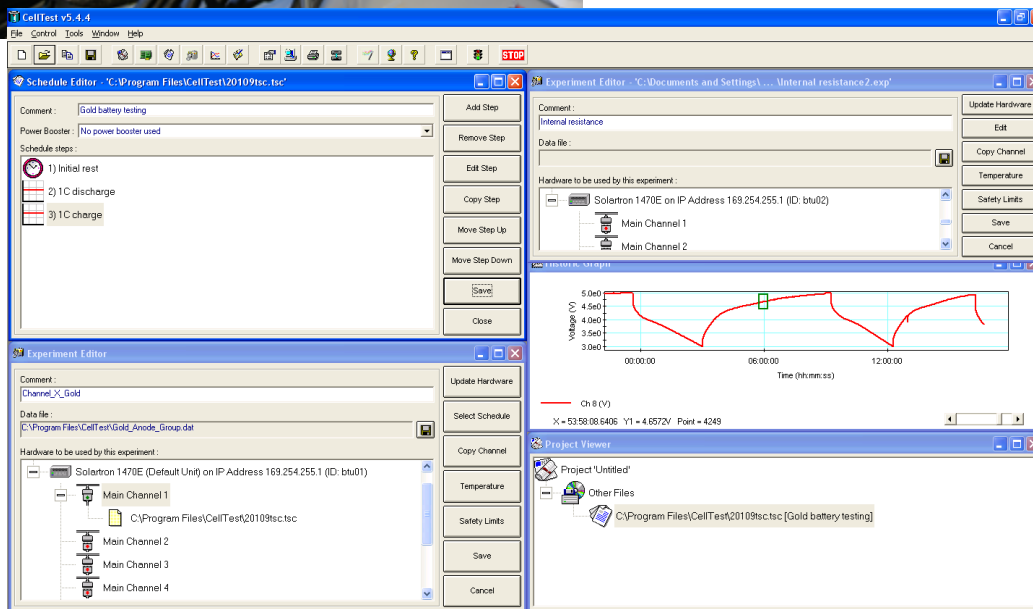
Testing battery on Solartron



16 channels for testing batteries

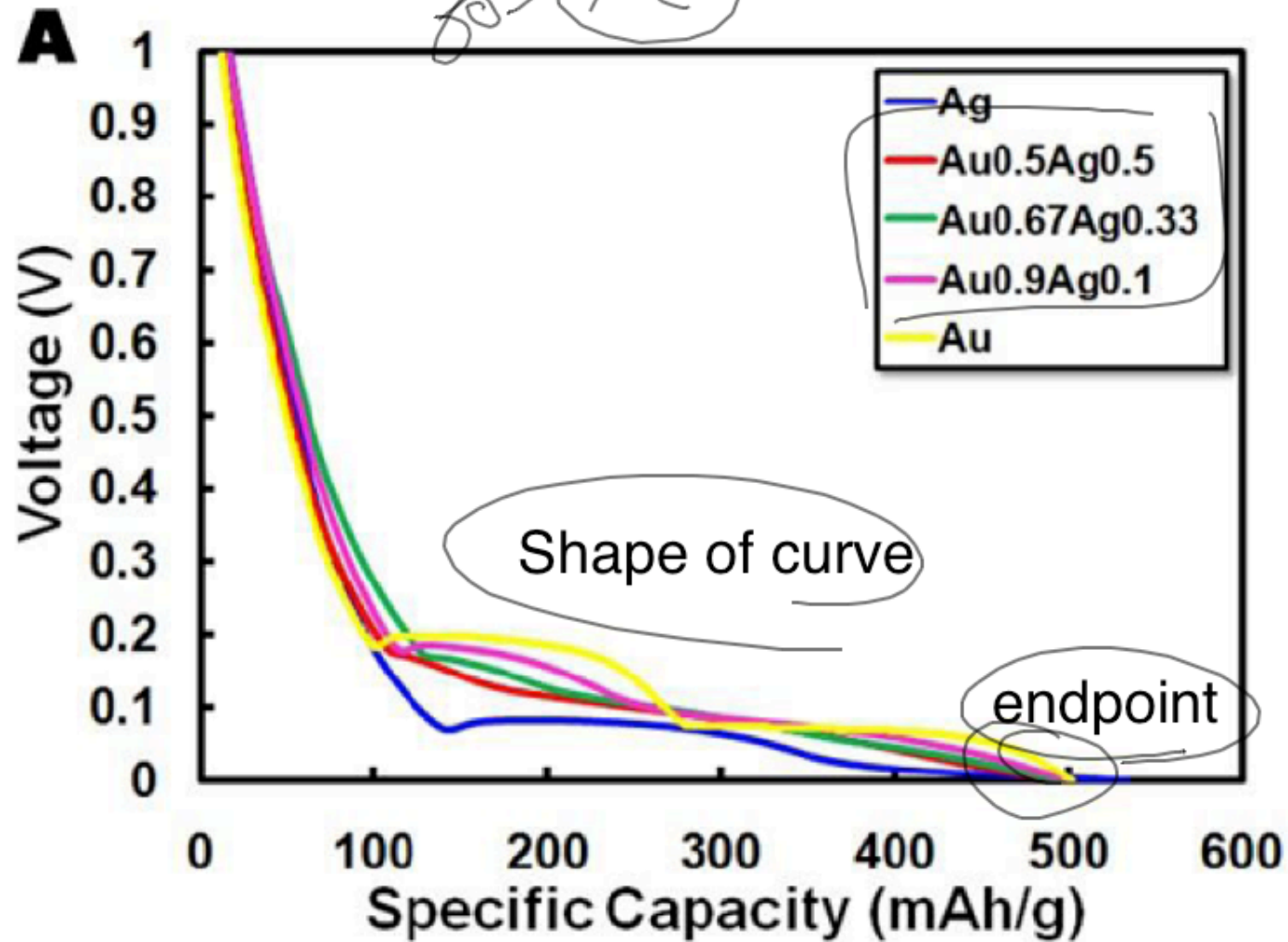


8 coin cell testers



Celltest program for measurement and analysis

Discharge curve



The amount of current you can get out with respect to mass

Theoretical vs actual capacity for Gold NW Anode

Today: calculate current needed to discharge in 10hrs

**Theoretical capacity
is
510 mA*h/g**

Tu/Th	
Pink/Red/Purple	4.00mg
Yellow/Green	1.45mg
Blue/Orange	4.03mg
W/F	
Red/Blue	1.42mg
“W/P”	0.53mg

30% of inactive material from superP and PTFE
+ some inactive material is also from phage itself

Theoretical vs actual capacity for Gold NW Anode

DATA:

1. the negative applied current (mA)
2. the time (hours) of the measurement
3. the mass of active material (g)

Use to calculate actual capacity

104 vs