

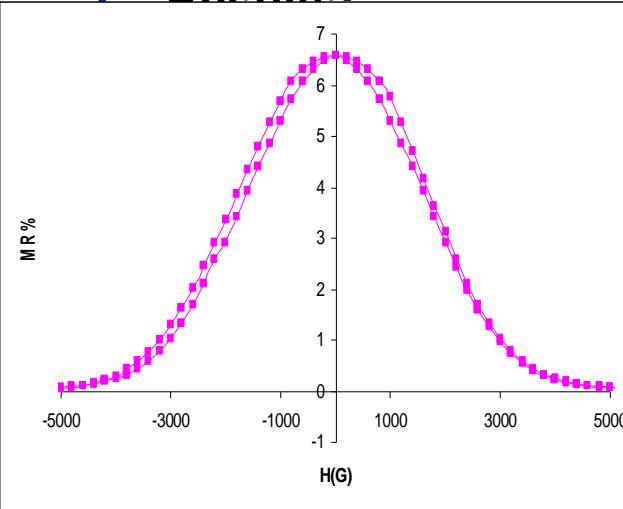
# Electrodeposition of Multilayered Co/Cu Nanowires

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## Motivation: Measure Giant Magnetoresistance in Multilayered Co/Cu Nanowires

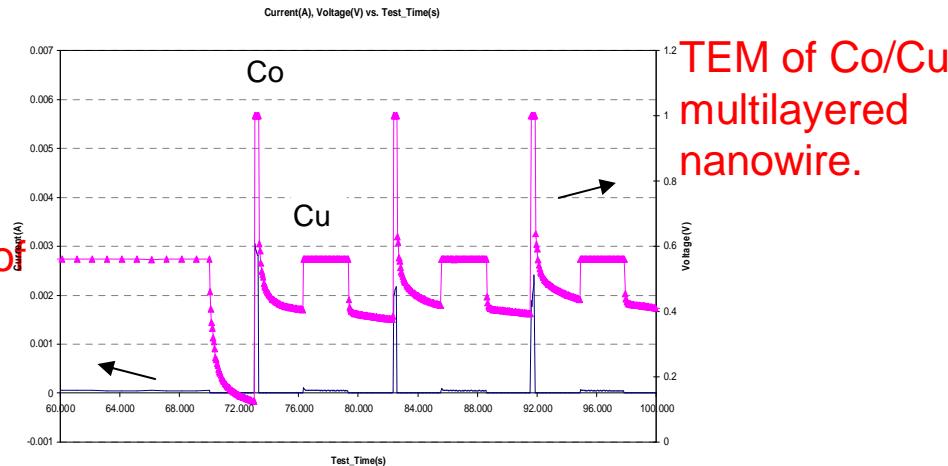
- Fabricate multilayered Co/Cu nanowires on ordered alumina template
- Control the thickness of Co and Cu layers
- Study the temperature and thickness dependence of GMR in multilayered Co/Cu nanowires

## Results:

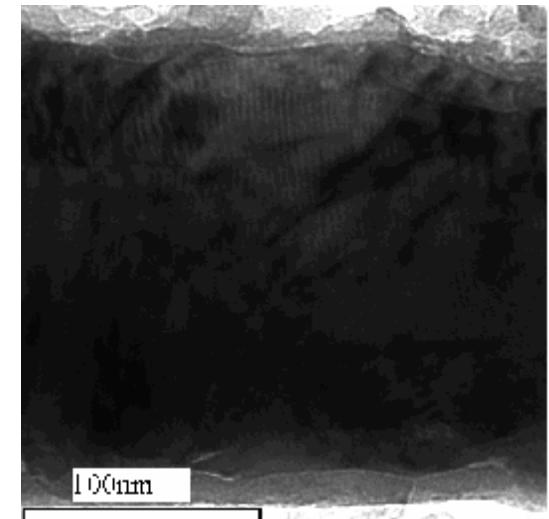


GMR of  
Co(5nm)/Cu(5nm)  
multilayered  
nanowire at room  
temperature

Electrodeposition of  
Co/Cu nanowires.



TEM of Co/Cu  
multilayered  
nanowire.



- P.D. McGary, L.Tan, J.Zou, B.J.H. Stadler, P. Downey, A.Flatau.  
Accepted to Journal of Applied Physics (Sept 2005).
- B.J.H. Stadler, N.h. Kim, L.W. Tan, J. Zou, K. Kelchner, R.K. Cobian (**Invited**) MRS Proceedings I6.3 (2005).