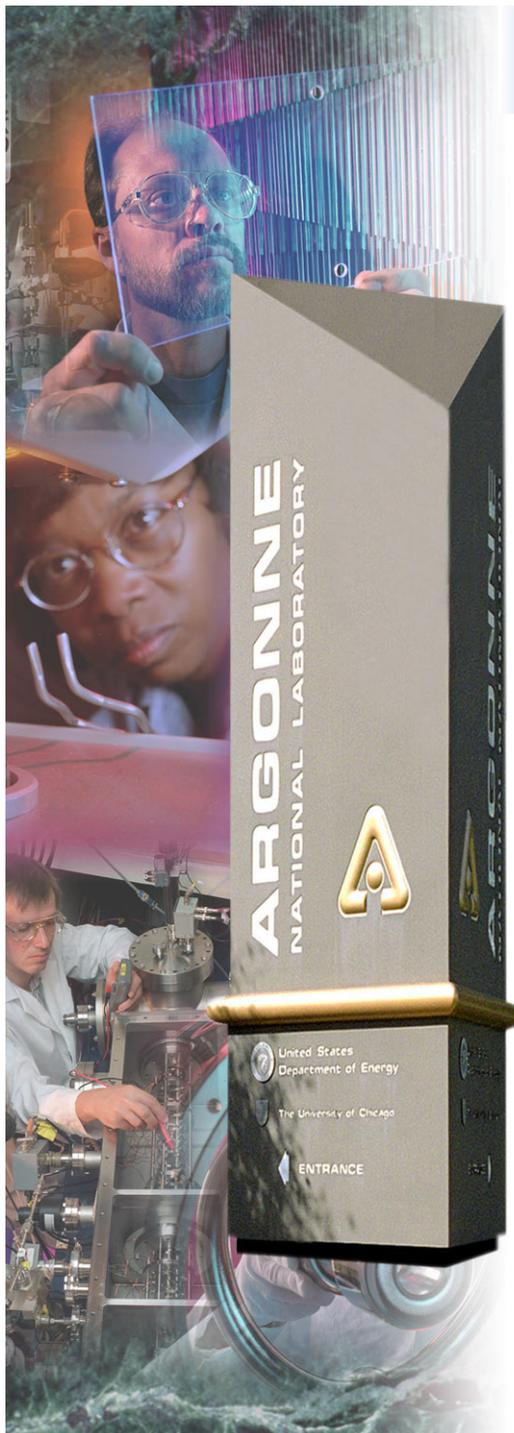


# Proposal Number 241

## MCR UPS Upgrade

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*Argonne National Laboratory is managed by  
The University of Chicago for the U.S. Department of Energy*

**Project: (AOD 241) MCR UPS Upgrade**

**Objective:** To replace 6 existing 18KW single phase UPS's with 3 - 40KW 3 phase UPS's with 7 min battery time @ full load

**Background Information:**

- New Initiative
- Single Year Funding
- High priority

**Justification:**

The existing UPS's are between 5 and 9 years old and are approaching the end of their life span. Maintenance on the UPS's can only be performed after removing power to the loads because of a break before make bypass switch. New UPS's will restart the life span clock and are equipped with bypass switches that allow maintenance without effecting the attached loads. Reduced downtime will be realized. Additionally, system capacity will be increased to handle projected future loads.

**Consequence:**

If this project is not implemented, failures to the UPS will continue and produce extended downtimes

**Requested / Allocated Funds (FY05):**

AIP Requested	AIP Allocated	Equipment Requested	Equipment Allocated	Operating Requested	Operating Allocated	New Hire Requested	New Hire Allocated
\$207.63 K	\$207.42 K						

**FY05 Results: 2 of the 6 UPSs were installed**

**Amount spent: \$211.08K**

**Results accomplished: See next page**

## **Project: (AOD 241) MCR UPS Upgrade**

### **Results accomplished:**

- Scope of work changed drastically from original proposal
- 100% redundancy was requested at the final design review meeting
- UPSs doubled from 40kW to 80kW to accommodate this request
- This change more than doubled the cost of the UPS replacement
- Only 2 of the 6 UPS were replaced (Central UPSs replaced)
- Available power is being taxed
- We were unable to use existing conduit and branch circuits (wasn't a bad thing)
- Conditions under the MCR/Computer Room floor are horrendous and made installation difficult
- A whole new power distribution means had to be devised
- Central UPS replacement project is complete
- Redundancy testing still has to be completed (can be done at any time)
- Power meters for monitoring the UPS output need to be swapped out
- Old UPSs and conduit still need to be demo'd
- Another proposal (AOD 557) has been submitted to replace the remaining 4 UPSs (Controls UPSs)