

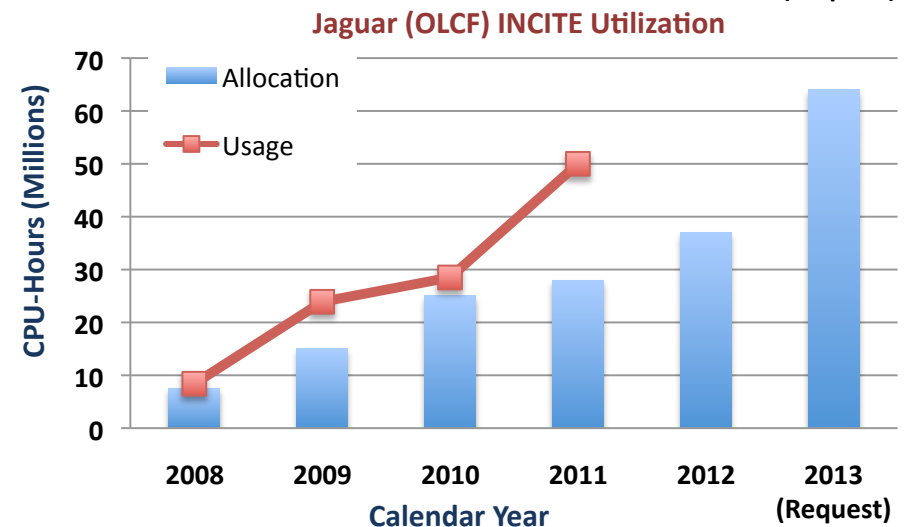
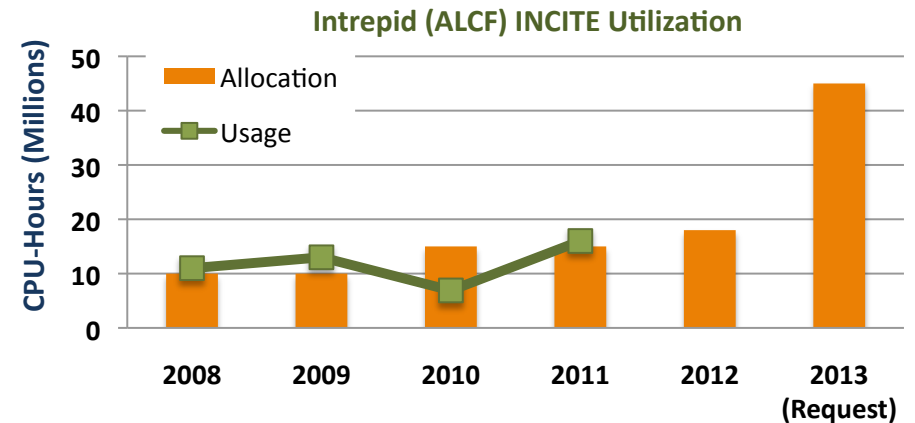
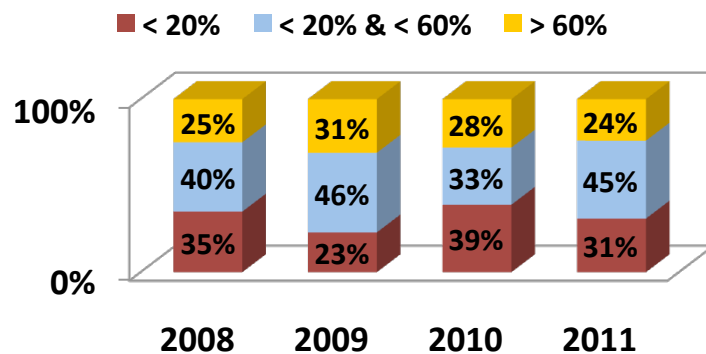
# UNEDF Leadership-class computing

◆ SciDAC collaboration between applied mathematicians, computer scientists, and nuclear physicists leads to efficient utilization of leadership-class computing resources for nuclear physics problems

◆ Significant accomplishments, achieved through leadership-class computing

- Ab-initio calculations of C-12
- Understanding long lifetime of C-14
- Microscopic calculations of select medium-mass nuclei
- Improved energy-density functional UNEDF1

◆ 60% to 80% of computing resources used at leadership-class scale



U.S. DEPARTMENT OF  
**ENERGY**



UNEDF SciDAC Collaboration  
Universal Nuclear Energy Density Functional