

Plenum Discussion

EnA-HPC 2010



Panel discussion

- Self optimization
- Integrated approach
- Cost of Science / Green Science

End of Hype



• Is Green IT a hype which will end, or will it become more important?

Panelists

ENA Energy-Aware
High-Performance Computing

- Thomas Ludwig, DKRZ
- Jeffrey Vetter, ORNL
- Florina Ciorba, TUD
- Rafael Mayo Gual, UJI
- Norbert Conrad, HLRS

End of Hype?



Status

- Diverse and successful research on energy efficiency
- Special conferences and workshops

However

- E.g. Germany: no special funding for energy efficiency in HPC despite enormous costs
- E.g. EESI-2 project: lost interest in energy efficiency as a cross-cutting issue
- E.g. Euro-Par: "we do not need a special Green IT workshop because now green is in everything"

Question



If you was an advisor to the European Commission what would you recommend on which aspect of energy efficiency they should offer a funding program?

(or maybe we do not need special funding?)

Recommendations for Funding



- Modelling and prediction
- New hardware architectures
- Foster competition on hardware development
- Budgeting based on kWh
- Energy aware software (libraries, runtimes, ...)
- Integrate all levels of hardware and software
- Examine power and *
- Vendors: open your APIs