

E-science usability workshop

- **40-50 people**
 - women; Americans; Oxford Uni
 - but no-one else from VizNet
- **IJHCS special issue**
 - short (4-6 pages) & long papers (14+ pages)
 - published mid 2007
- **Web blog**
- **Future funding**
 - responsive mode for e-science (EPSRC)
 - JISC -> FEC

Perspectives

- **What type of usability**
 - operational (knowledge transfer)
 - HCI research
- **Types of user**
 - end user; sys admin; developer; “other interested”
- **Workshop themes**
 - case study applications
 - infrastructure/security
 - methodologies

Case study applications

- **Biomedical grid services (Richard Sinnott)**
 - data retrieval:
 - single phrase (“google”) search to retrieve gene info
 - number crunching: alignment analyses (BLAST)
 - lessons
 - use server grid certificate
 - make sure application always works (DB changes)
 - awful presentation of results (no HCI expertise)
- **Virtual tsunamis (Cherri Pancake)**
 - number crunching: run multiple models
 - remove access to physical wave simulator
 - data archive (NSF/UNESCO sponsored)
 - search/visualization web interface
 - make sense to non-scientists too

Case study applications (contd.)

- **Crystallography (Jeremy Frey)**
 - archive data (75% currently lost to science)
 - existing ontology/naming conventions
 - many beneficiaries (industry; academics; publisher)
- **Commercial (Vita Nuova, York)**
 - usable because
 - meets requirements spec.
 - and end user agrees it does
 - early prototype
 - help define requirements
 - deal with surprises

Infrastructure/security

- **“Should infrastructure be invisible?”**
 - not bits that don’t work (sensible error msgs)
 - don’t announce upgrades!
- **Disentangle usability from security**
 - refuse to accept unusable security
 - categories of user

Methodologies

- **“How do we design usable research environments?”**
 - **how do e-scientists want to work**
 - **different from face-to-face? (lessons from CSCW)**
 - **usability isn't static**
 - **clean usability (simplicity)**
 - **anti-usability**
 - **stop you doing things you thought you should be able to ...**
- **Classification of (social) e-Science (Ralph Schroeder)**
 - **discipline; tools; technical infrastructure; collaboration arrangement**
 - **main value-added claims**
 - **stimulate uptake**
 - **virtual communities**

Methodologies (contd.)

- **Requirements road trip**
 - **2 analysts (essential)**
 - **visit 25 groups (8 cities) in month**
 - **1-3 hrs with each group**
 - **sanity check half way (little extra learned in 2nd half)**
 - **short (12 page) readable report**

- **Apply to VizNet?**