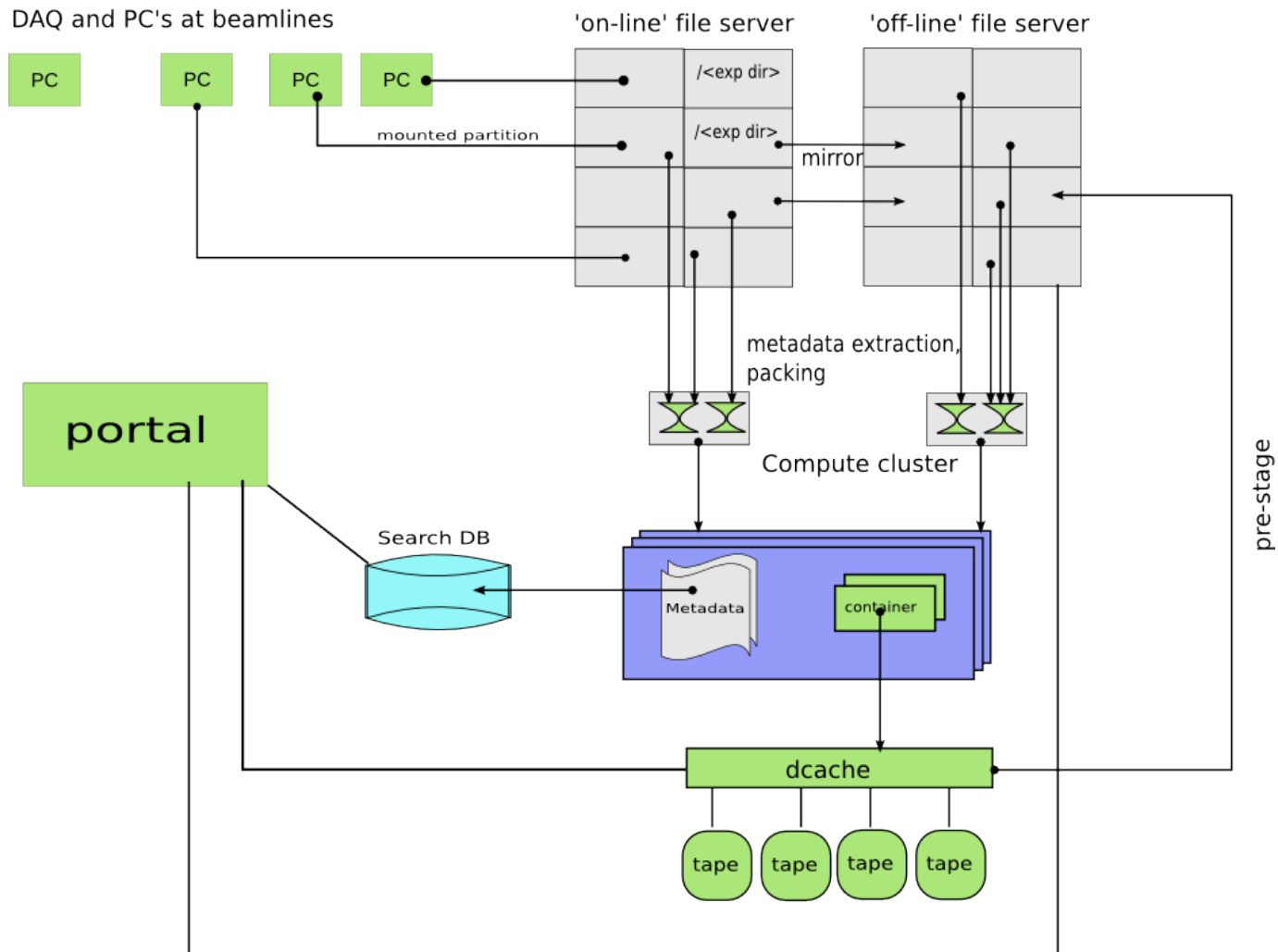# Data management portal

I Agapov

# A typical data management system architecture



HASYLAB STORAGE MODEL

# Use-cases for data management portal

Actors: beamline responsible, project manager, users

• After measurement data migrated into archive and corresponding metadata generated
• Search/browse datasets based on metadata/by proposal
• Download
• Upload
• Project manager controls access to the data collections
• Beamline responsible controls data migration process (start/stop/choose parameters) through a web interface
• If simple common standard analysis jobs can be identified start them thru web interface

# Software architecture:

storage, user management and beamtime management (workflow) are connected through adaptors
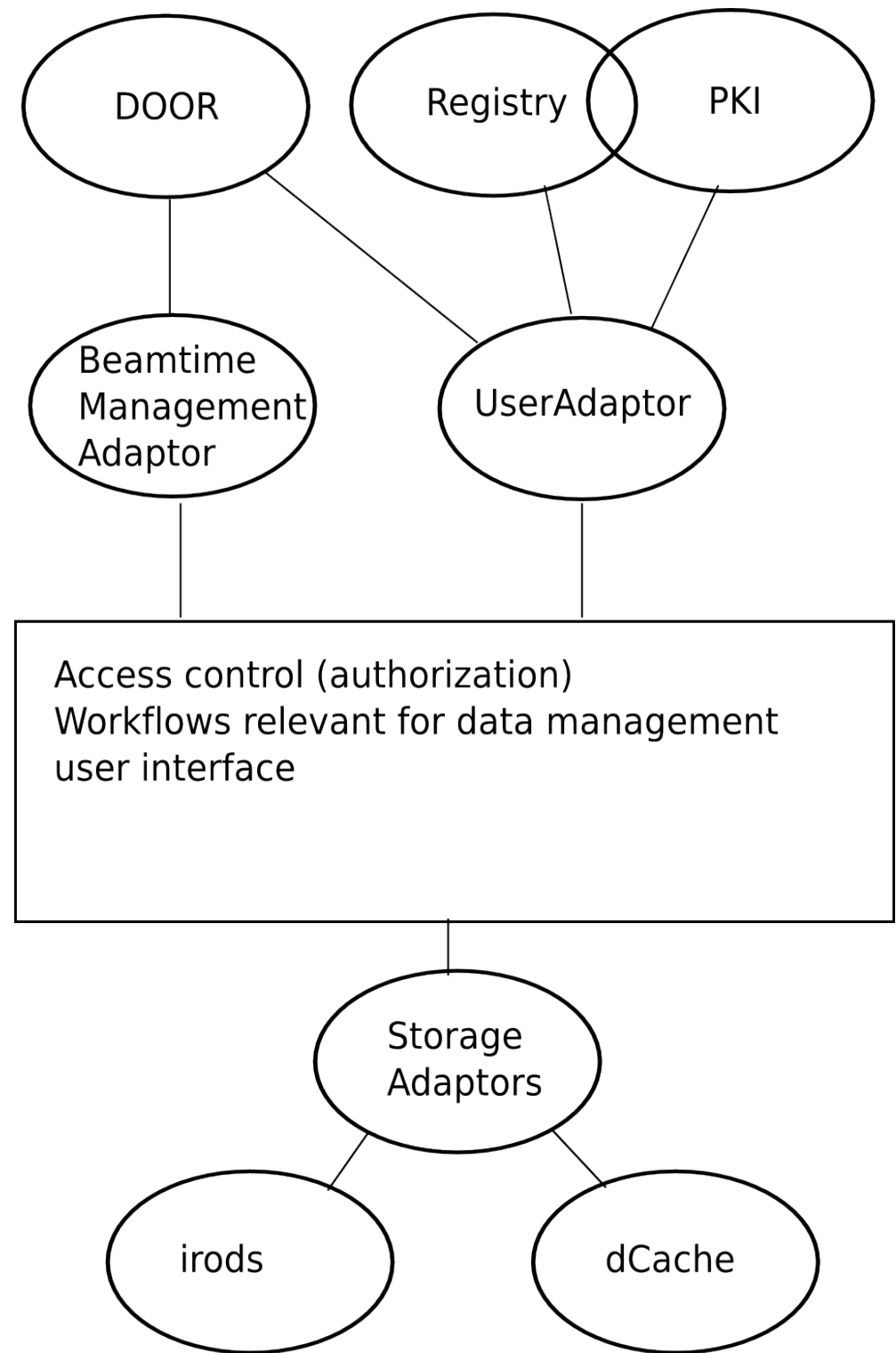
java core classes + servlets + jsp + javascript + ajax

metadata DB oracle/mysql

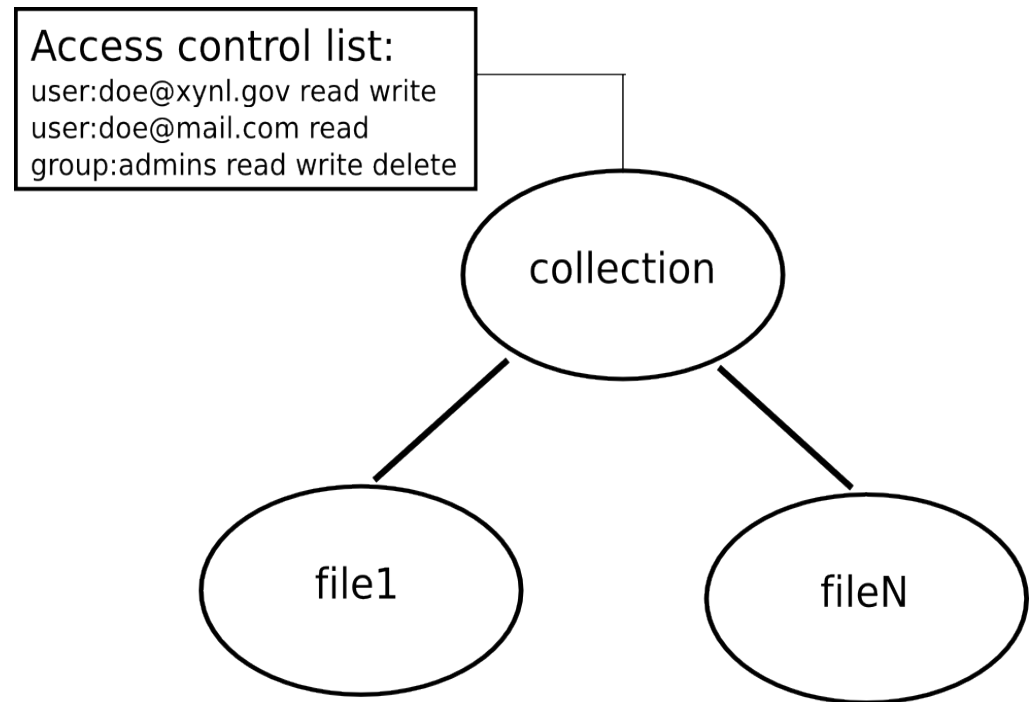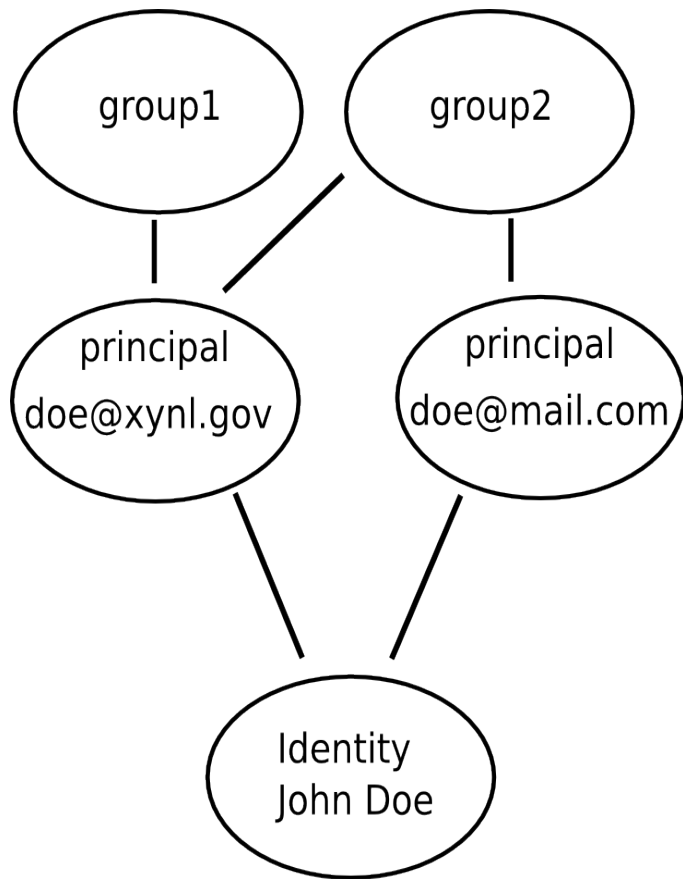jms for communication with migration processes

User adaptors: door, desy kerberos,  x509

Storage adaptors: iRods, dCache (external metadata DB + WebDav + gridftp)

# Security and data management

a person might have several principles; principals belong to groups; access control done per collection

group1   group2

principal
doe@xynl.gov

principal
doe@mail.com

Identity
John Doe

Access control list:
user:doe@xynl.gov read write
user:doe@mail.com read
group:admins read write delete

collection

file1   fileN

# Demo (based on door integration)

# Plans

- Testing
- Improving user interface and understanding usability issues
- Performance improvement (metadata queries and download)
- Implementing prototype analysis workflows
- Further requirements?
- Release for public testing Sep 2010?