

The safe share project

Highlight report 1

To address the need for research in the UK to use and share sensitive data securely and safely, Jisc and leading UK universities are collaborating to provide higher assurance network connectivity over the Janet network and access management mechanisms between research centres. The safe share project is working with two particular research communities that use sensitive data to pilot the infrastructure:

- Biomedical researchers e.g. through the Farr Institute and the MRC Medical Bioinformatics initiative
- Administrative data researchers e.g. through the Administrative Data Research Network.

The safe share project, running from November 2014 to June 2016, is piloting co-designed solutions with key stakeholders to provide a high volume, encrypted network between research centres across the Janet network. The project is also piloting an Authentication, Authorisation and Accounting Infrastructure (AAAI) to demonstrate how Jisc's access and identity management services can be used to control access to sensitive data to further enhance the UK's research capacity in areas such as medical, clinical, health and the social sciences.

The project is being funded and managed by Jisc, in collaboration with key UK universities, and is working in partnership with the Farr Institute, the MRC Medical Bioinformatics initiative and the Administrative Data Research Network. It will lead to UK researchers undertaking more collaborative, better and faster data science by providing additional controls and safeguards when working with sensitive data, and will test approaches to:

- higher assurance network connectivity across the Janet network
- access management mechanisms between health informatics research centres.

The results will be used to inform decisions on a potential Jisc national infrastructure for secure access to data for researchers across various academic disciplines.

Benefits

- Reduction in duplication of effort as a solution is needed by everyone
- Avoidance of potential competing incompatible solutions in different centres
- Support for RCUK and Government strategies for research with sensitive data
- Co-ordinated partnership to help support UK research into public health
- Improved knowledge and a scalable solution providing benefits for other members of the community

Project Status

The project was initiated in November 2014, a Project Board established and a series of 2015 quarterly board meetings scheduled for February, May, September and December.

Board Members

MEMBER	INSTITUTION
John Ainsworth	University of Manchester (Farr Institute @ HeRC, N8)
John Chapman	Jisc
Bob Day	Jisc
David Fergusson	Francis Crick Institute
Steve Head	University of Southampton
Henry Hughes	Jisc
Stephen Humphries	HSCIC
Michael Lay	University of Oxford
Mark Parsons	University of Edinburgh (Farr Institute @ Scotland)
Jacky Pallas	UCL
Alan Real	University of Leeds (N8)
Justin Riordan-Jones	Department of Health
Jeremy Sharp	Jisc
Malcolm Teague	Jisc
Simon Thompson	Swansea University (Farr Institute @ CIPHER)

The Pilots

Higher Assurance Network	AAAI
Inter-Farr: initial trial between Farr centres at Manchester and Leeds, then extending to other Farr centres (London, Scotland and Swansea)	University of Oxford: to enable researchers to use home institution credentials for authentication to request access to datasets for studies e.g. into Dementia
Intra-Farr – to support the ALSPAC project between Swansea and Bristol	HeRC, N8 HPC – access between facilities using home institution credentials
ADRC / Farr Pod to Data Centre: for connectivity between accredited secure rooms that can be connected to ADRC data centres for remote working (led by University of Southampton)	eMedLab – partners will be able to use a common AAAI to access this new system (for analysis of for instance human genome data, medical images, clinical, psychological and social data)
	Swansea University Health Informatics Group – investigating Assent (Moonshot technology) as an authentication mechanism to allow use of home institution credentials

In future highlight reports it is planned to focus on one pilot per edition.

Achievements

- Built collaboration of interested parties that generated the proposal
- Proposal agreed and funded by Jisc (£960k)
- Project initiated with Project Board governance, pilot projects agreed

- Engaged with Cabinet Office on the approach used
- Project team in place
- Identified the security requirements of the different use cases in the pilots
- Technical architecture and approach agreed

Recent Activities

- Initiating all contacts and finalising participation, and where possible and appropriate, securing technical project resources with participating sites. Alongside this technical kick-off and follow-up meetings have taken place with more scheduled.
- Initial communication resources developed. Communications and marketing plans will be further developed and shared with board members when secure in draft form.
- A safe share community group, <https://community.jisc.ac.uk/groups/safe-share-project>, has been established for the project where information will be made available and discussions can take place.
- The requirement to support some of the links at “official” level emerged and the plans, technical architecture and budget have been reworked with Jisc’s support to encompass this.

Next Steps

- Full development of full project plans against the HAN and the AAI work-streams.
- The sign-off of technical architecture will allow the development and confirmation of a required kit list and ultimate purchase where required.
- Beginning the implementation of HAN kit and the AAI infrastructure.

Timeframes and Milestones

This is a high-level list of key activities until Q2 2016, which will be monitored and reported on by the project manager:

Activities	2015				2016	
	Q1	Q2	Q3	Q4	Q1	Q2
Agreement on requirements and use cases	Complete					
Funding approval	Complete					
Detailed project planning		In progress				
Detailed design and architecture of infrastructure		Complete				
Operational standards, development controls		To start				
Infrastructure deployment, installation and commissioning			To start			
Initial operational and testing			To start			
Customer trials begin				To start		
External certification ISO27001 process					To start	
Recommendations						To start

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