

# IITG SUNYport: An e-Portfolio system for SUNY Students

## Final Report

Mark Ludwig, SUNY Buffalo  
Andrew Perry, SUNY Oneonta  
Ben Wagner, SUNY Buffalo  
Dean Hendrix, SUNY Buffalo

7/23/2013

## I. Original Plan and expectations

### Background

Our approach to e-portfolios was somewhat different than projects using e-portfolios as part of instruction. We came at it from a Library point of view, with VIVO and DSpace as readily accessible open source components.

Library faculty had perceived a need to educate and inform graduating students about the Open Access Movement with regard to Scholarly Communication. Anecdotal reports from librarians and other faculty indicated a need for permanent online storage and access to student works. UB and SUNY are hosting DSpace Institutional Repositories which are successful in preserving scholarly content and making it accessible online. VIVO open-source researcher profiling software appeared to be extendable for student profiles.

### We proposed an experiment

We believed we could set up and install a combined DSpace Repository and VIVO profile system that would provide basic e-portfolio services. The system would allow SUNY students to submit work to the repository and maintain academic profiles in VIVO. These portfolios would be student driven, not class based, and available continuously after graduation.

We would include online video documentation and instructional web pages.

SUNY branding combined with preservation in the repository would provide a professional showcase for student work.

## II. Promotion and pilots

- We met with various faculty and the concept was well received.
- Participation by various classes, faculty and groups was planned.
- Ben Wagner and Mark Ludwig met with one class to seek participation
- A Facebook page was set up to catch student inquiries.
- UB CURCA sought collaboration for storage of project posters
- UB Career Center interested in repository collaboration with their system

### III. Accomplishments

- Mark Ludwig attended 2012 VIVO Conference
- We held project kickoff meeting for PIs at UB.
- We purchased a production and production backup server.
- We installed 3 VIVO systems, one for test, one for production, one as production backup.
- We upgraded several VIVO release versions.
- Mark Ludwig attended weekly VIVO developer phone conferences.
- Dean Hendrix investigated IRB Requirements.
- We hired a graduate research assistant to enter data, test vivo and develop user documentation.
- We customized and branded VIVO instances.
- We adjusted VIVO for student use.
- We assembled collections in UBIR for student resumes and works.
- We developed a registration procedure and instructions in UBIR Dspace and Google Forms.
- We published textual instructions for students.
- Our student assistant produced and published 3 videos for student users.
- Andrew Perry and Mark Ludwig presented results at 2013 CIT conference

### IV. Challenges and problems

- Frequent VIVO releases, 3 versions in 2 semesters
- Ubuntu Linux upgrade to 12.04 version was problematic
- Production hardware failure caused a long delay in configuring the second semester
- Routine software upgrades to Tomcat and Java crippled VIVO requiring a complete system re-install and re-build. Restored and re-built system was never fully functional.

## V. Findings

- VIVO is not Facebook, it is much less sophisticated.
- VIVO lacks privacy levels and controls.
- VIVO could not easily adapt for students, after faculty specific elements were removed, only basic contact information remained.
- VIVO ontologies raise the bar for customization, making it difficult. VIVO data element customization is possible, but it is better done within the distributed system where ontologies are standardized and sanctioned by the developers. Since VIVO is frequently upgraded and VIVO's internal base ontologies change frequently, it is not productive to build on a changing foundation.
- Students are less interested in portfolios than faculty. In fact, no students volunteered despite faculty recommendations.
- DSpace is good, solid open-source, supported by large user base and a non-profit organization.
- DSpace repository collections are good and appropriate online spaces for preservation of student work.
- VIVO is maturing, currently too volatile for production
- VIVO has a high profile, but a relatively small user base.

## VII. Deliverables

We are left with one dead VIVO system and one broken VIVO system. The broken system contains our demo data but will not allow linkages to user accounts. User data cannot be modified by users. These systems will be left off-line.

Instead of a VIVO/DSpace based system, we have established a DSpace-only application. It is a fully-functional test system. After a pilot test and usability testing and analysis, it could be used for production. UB Career services has expressed an interest in this, so we may proceed with a project in the future.

## VII. Summary and Recommendations

Firstly, VIVO is to be watched as a developing product. Much grant money has been invested and some talented developers are still working on a daily basis. If VIVO continues to mature and stabilizes, it may gather a larger and more supportive user base. Others are interested in adapting VIVO for student use, so this may become more feasible in the future.

With or without VIVO, DSpace repositories can serve as functionally effective platforms for preserving and showcasing student work online. As with any production system, resources are required for ongoing administration. Content submitted from such a large user-base will need mediation and support. As a means of SUNY-wide authentication evolves, this could be employed to assist and possibly reduce the level of mediation and support required.

We recommend that experimentation continue with UB's DSpace repository, UBIR. Additional student content should be hosted. There should be follow-up with the UB Career Center, offering UBIR collections in support of their Bulls-Eye resume system. If this is successful, it might serve as a model for other SUNY institutions and DSpace alone could support similar projects.

## VIII. LINKS

General description and link to UBIR, UB Institutional Repository:

<http://libweb.lib.buffalo.edu/pdp/index.asp?ID=469>

Link to SUNYPORT collections for student portfolio information:

<https://ubir.buffalo.edu/xmlui/handle/10477/13252>

(also includes textual and video instructions for student system use)