Fermilab

Computing

Project Close-Out Report

"WordPress SaaS"

Version 2

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DocDB #5515

PREPARED BY:

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CONCURRENCES:

Jon Bakken	Date	Michael Rosier	Date
Project Sponsor		Head, ESO	

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Project Close-out Report Revision Log

Revision	Description	Effective Date
1	Initial draft	2015-11-05
2	Tech Lead's additions	2016-01-07

Table of Contents

1. Project Abstract

The purpose of this project is to create an enterprise level WordPress Software as a Service (SaaS). It is set up securely to host public and internal sites while protecting the Lab from intrusion and attacks. The objective was also to set up this SaaS to be managed and supported without additional staff.

2. Project Documentation

Project documents are in the `wp-saas` SharePoint site at https://fermipoint.fnal.gov/organization/cs/ccd/eso/wsa/projects/wp-saas/ and in CS DocDB document # 5515, "WordPress Saas Project Documents".

3. Supporting Documentation

Documentation for the service created by this project is in the CS DocDB document # 5589, "Central Web Hosting – WordPress SaaS Documentation" and, for easy access to site owners, embedded into the WordPress "fermilab-basic" theme used by most sties.

4. Reason for Closing the Project

The WordPress SaaS completed its objective and the service is now in production.

5. Project Deliverables

The project had one defined deliverable, "Roll out a centrally managed production service with WordPress as a service." Besides achieving that, the project also produced a WordPress theme for use on public-facing Fermilab-branded web sites. The theme is a very close visual and functional match to the theme used on many of the lab's existing sites.

The acceptance criteria in the project charter were met.

6. Project Schedule

The project was planned to run from December, 2014 though July, 2015. In the early days of the project a June delivery was forecast. The contingency time, and more, was used up by several issues that arose. The most signiificant schedule impacts came from:

- Plugins that were planned for use, but which did unacceptable credential saving

- Problems with php performance—Solving this required upgrading several software components of the total system, and a lot of configuration had to be worked out anew.

- User authentication to hosted sites outside the fnal.gov domain

- Delivery and quality of the initial Fermilab branding theme
- Interactions with NFSv4 during system startup

All issues were resolved,

7. Project Team

Project Sponsor:	Jon Bakken
Project Manager:	Matt Crawford
Technical Lead:	Peter J. Rzeminski II
Service Owner:	Peter J. Rzeminksi II
Project Team:	Andrew Duranceau, Patrick Riehecky, Andy Romero
Steering Committee:	Mark Kaletka (Chair), Maura Barone, Elliott McCrory, Art Lee, Brian Nord, Ruth Pordes, Michael Rosier

8. Budget and Financial Information

Salary, Wages, and Fringe (SWF)	Budget (FTE-yrs)	Actual (FTE-yrs)	% Spent
Fiscal Year 2015	0.525	0.555	106%
* Fiscal Year 2016	0.000	0.001	—
Total	**0.525**	**0.556**	**106%**

Materials & Services (M&S) Obligations	Obligations ($)	Actual ($)	% Spent
† IWP license renewal FY 2015	$300.00	$300.00	100%
Total	**$300.00**	**$300.00**	**100%**

Materials & Services (M&S) Budget	InitialBudget ($)	BAC ($)	EAC ($)
	$300.00	**$300.00**	**$300.00**

*The project delivery was Septempber 30, but the fiscal year for effort reporting ended on September 20.
†In addition, the license for IWP (Infinite WP, the management software) was first purchased in FY 2014, before the start of this project.

9. Outstanding Risks

The WordPress SaaS uses strict access controls at the file system and database levels to prevent a compromised WordPress or Apache service from making any changes due to an unauthenticated attacker's manipulations. If a vulnerability arises in the service, then an authenticated attacker, on the Fermilab network or using the Fermilab VPN could exploit it. The WordPress SaaS is configured for fast and easy patching of the core WordPress software and all plugins and themes, on all hosted sites.

10. Operations and Support

With the September 30 launch of the service, it transitioned to operational status supported by the Web Services Administration group.

11. Next Steps

There are a number of enhancements and feature extensions that will be investigated over the next two years. The big items are as follows:

- Investigate the implementation of the WordPress MultiSite functionality, allowing for separately managed WordPress SaaS sites to exist within a single domain, separated by a directory path within the URL. Examples: orgs.fnal.gov (parent) orgs.fnal.gov/bike (child)

- Give WordPress SaaS the extranet functionality it currently lacks. This will require the activation of two-factor authentication with the SAML host, something we do not have control over.

12. Lessons Learned

See the "*WordPress SaaS – Lessons Learned*" document for Lessons Learned.