# USDA-ARS/ U.S. Wheat and Barley Scab Initiative FY13 Final Performance Report July 15, 2014

# **Cover Page**

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Fiscal Year:	FY13	
<b>USDA-ARS Agreement ID:</b>	NA	
USDA-ARS Agreement	Maintain and Improve the U.S. Wheat & Barley Scab Initiative's	
Title:	Website.	
FY13 USDA-ARS Award	\$ 45.500	
Amount:	\$ 45,500	

**USWBSI Individual Project(s)** 

USWBSI Research		
Category*	Project Title	ARS Award Amount
EC-HQ	US Wheat & Barley Scab Initiative's Networking & Facilitation Office and Website.	\$ 45,500
	FY13 Total ARS Award Amount	\$ 45,500

Principal Investigator	Date

<sup>\*</sup> MGMT – FHB Management

FSTU - Food Safety, Toxicology, & Utilization of Mycotoxin-contaminated Grain

GDER – Gene Discovery & Engineering Resistance

PBG – Pathogen Biology & Genetics

BAR-CP – Barley Coordinated Project

DUR-CP – Durum Coordinated Project

HWW-CP - Hard Winter Wheat Coordinated Project

VDHR - Variety Development & Uniform Nurseries - Sub categories are below:

SPR – Spring Wheat Region

NWW – Northern Soft Winter Wheat Region

SWW - Southern Soft Red Winter Wheat Region

FY13 (approx. May 13 – May 14)

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USDA-ARS Agreement #: NA

**Project 1:** US Wheat & Barley Scab Initiative's Networking & Facilitation Office and Website.

1. What major problem or issue is being resolved relevant to Fusarium head blight (scab) and how are you resolving it?

Information sharing and access are key to the success of the Scab community. The U.S. Wheat & Barley Scab Initiative provides a publicly accessible server that hosts a comprehensive suite of services and applications to facilitate data access and dissemination. These applications and services are provided by server programs that are created by the project's webmaster and programmer. Several open source and commercial applications are also used and heavily customized to meet the goals of the U.S. Wheat & Barley Scab Initiative.

The driving factors during the development of applications and services is ease of use for all users, increasing data access, and providing faster distribution of the latest scab related information. Services available to the public that allow for this include features such as mass mailing lists, image libraries, discussion boards, blogs, and access to the USWBSI database, just to name a few. The centralized nature of these services also provides for easier public access and rapid feature development.

2. List the most important accomplishments and their impact (i.e. how are they being used) to minimize the threat of Fusarium Head Blight or to reduce mycotoxins. Complete both sections; repeat sections for each major accomplishment:

# **Accomplishment (1):**

A new content management system (CMS) was deployed as the main portal to the scabusa.org suite of web applications. The site was previously using the Xoops CMS and has now moved to the Drupal platform.

## **Impact:**

The new CMS offers a host of improvements over the old system. Key among them are improved security, faster deployment of new services, a wider selection of services and web applications, a vastly improved content creation interface, and a more stable hosting environment. Taken together these improvements will allow for the faster dissemination of information to the community while lowering the total overhead required to keep the system stable and secure. Additionally the site was made 100% compatible with mobile devices. Now users can view the site in a format that is customized, in real time, to the size of the device they are using for access.

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# **Accomplishment (2):**

To better incorporate current web applications and scripts into the new CMS many of them had to be partially rewritten.

#### **Impact:**

Incorporating the older web applications into the new CMS makes the web applications much more secure. It also provides a unified user interface that improves the user experience while browsing data.

Include below a list of the publications, presentations, peer-reviewed articles, and non-peer reviewed articles written about your work that resulted from all of the projects included in the FY13 grant. Please reference each item using an accepted journal format. If you need more space, continue the list on the next page.

# **Forum Proceedings:**

Canty, S., A. Clark, A. Salat, Y., and D. Van Sanford (Eds.). 2013. Proceedings from the 2013 National Fusarium Head Blight Forum, Milwaukee, WI; December 3-5. East Lansing, MI/Lexington, KY: U.S. Wheat & Barley Scab Initiative.

Complete Proceedings are available in PDF format on the USWBSI's Website at: <a href="http://scabusa.org/fhb-forum#forum13">http://scabusa.org/fhb-forum#forum13</a>

#### Abstracts:

De Wolf, E., P. Paul, S. Crawford, D. Hane, S. Canty, D. Van Sanford, P. Knight and D. Miller. 2012. "Impact of Prediction Tools for Fusarium Head Blight in the US, 2009-2013." In: S. Canty, A. Clark, Y. Salat, and D. Van Sanford (Eds.), *Proceedings of the 2013 National Fusarium Head Blight Forum*. East Lansing, MI/Lexington, KY: U.S. Wheat & Barley Scab Initiative. p. 106.

## **On-Line Article:**

Lilleboe, D. 2014, March. *Initiative Aids Progress in Development of Barley Varieties with Improved Scab Resistance*. U.S. Wheat & Barley Scab Initiative. Website: <a href="http://scabusa.org/pdfs/USWBSI-Article\_Barley-Success\_3-31-14.pdf">http://scabusa.org/pdfs/USWBSI-Article\_Barley-Success\_3-31-14.pdf</a>.

Lilleboe, D. 2014, January. *Scab Initiative's Support Key to HRS Wheat Variety Development*. U.S. Wheat & Barley Scab Initiative. Website: <a href="http://scabusa.org/pdfs/USWBSI-Article\_HRS-Success\_1-6-14.pdf">http://scabusa.org/pdfs/USWBSI-Article\_HRS-Success\_1-6-14.pdf</a>.

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Lilleboe, D. 2013, September. *FHB in 2013: From Benign to Serious*. U.S. Wheat & Barley Scab Initiative. Website: <a href="http://scabusa.org/pdfs/USWBSI-Article-2013-Update-11-11-13.pdf">http://scabusa.org/pdfs/USWBSI-Article-2013-Update-11-11-13.pdf</a>.

All Web-based articles are available in PDF format on the USWBSI's Website (http://scabusa.org/publications#pubs\_articles).

# **USWBSI Newsletters:**

Lilleboe, D., S. Canty, and D. Van Sanford (Eds.). Winter 2014. Fusarium Focus. U.S. Wheat & Barley Scab Initiative. Volume 14, Issue 1.

All Newsletters are available in PDF format on the USWBSI's Website (<a href="http://scabusa.org/news#newsletters">http://scabusa.org/news#newsletters</a>).

## **Press Release:**

<u>2-28-14 News Release</u>: Producers' Input Key in Scab Management Survey

<u>1-6-14 News Release</u>: Scab Initiative's Support Key to HRS Wheat Variety Development.

7-16-13 News Release: Early 2013 Scab Reports: Southern States.

4-23-13 News Release: Scab Initiative Challenges Funding Elimination.

All Press Releases are available in PDF format on the USWBSI's Website (<a href="http://scabusa.org/news#press\_rel">http://scabusa.org/news#press\_rel</a>).