

## **WE WANT YOU: CONTRIBUTING YOUR EXPERTISE TO A COMMUNITY OF PRACTICE (COP)**

**A.E. HAYS**

*Texas A&M Institute of Renewable Natural Resources  
Texas A&M University, Texas AgriLife Extension  
College Station, Texas*

### **ABSTRACT**

eXtension Communities of Practice (CoP's) are online collaborative networks of subject matter experts. Community of Practice as a method are not new, almost everyone has come across one by now, but you may not have realized what you were looking at was a collaborative effort. CoP's exist on sites like Consumer Reports, in CNET, and many other places where groups of experts work to create the content that populates a website. Communities are self-forming, and for the most part, self-moderated. eXtension Communities of Practice operate on the principles that subject matter that is timely, relevant, and scientifically valid are best organized by specialist who work daily in that subject area. The key to public outreach is to create a jump start to discovery where information can be organized and presented to the public as a single voice. Not all the information is created by eXtension CoP's, as a matter of practice, an abundance of information points outward to individual sites and files. The role of eXtension is to create the portal that accesses the expertise of Land Grant Universities and their partners in order to create an expert voice for Cooperative Extension. The public access point for eXtension is <http://www.extension.org>.

**Keywords:** communities, outreach, education, professional development, eXtension

### **INTRODUCTION**

The eXtension vision was begun in early 2001 when it was recognized that technology would significantly transform the way that Cooperative Extension would deliver its message and fulfill its mission. In 2003 the National Extension Directors and Administrators endorsed eXtension and called for a business plan. Funds were designated to start-up eXtension through 2008. The first prototype was introduced in 2005, and in 2008 there was a full system launch of eXtension (<http://www.extension.org>). As of April 2010, 31 Communities of Practice (CoP)

had launched content, with 23 CoPs in various development and launch stages ([http://about.extension.org/wiki/eXtension\\_Communities\\_of\\_Practice\\_with\\_Brief\\_Description](http://about.extension.org/wiki/eXtension_Communities_of_Practice_with_Brief_Description)). An estimated 10 new CoP's will emerge as part of new and emerging grant programs. There are currently 2,500 Cooperative Extension faculty and staff working actively inside eXtension, and 12,000 users with eXtension IDs.

Who uses eXtension? More than 6.5 million pages were viewed by users through eXtension. Site visits have doubled since 2008. People are coming to eXtension to get critical information that helps them transform their daily lives. They can access more than 32,000 published pages of content and over 40,000 frequently asked questions and answers. From 2008 to 2010, more than 12,000 questions were answered by eXtension experts through the Ask an Expert system.

### **Understanding Communities of Practice**

The term “community of practice” was coined by anthropologist Jean Lave and Etienne Wenger to describe a group of people who share a common interest, hobby, craft, or profession (Lave & Wenger 1991). Groups are self-forming and evolving in relation to the membership. Members collectively share information and experiences with the group and have the opportunity to develop personally and professionally.

eXtension Communities of Practice (CoP) are formed similar to the model of Lave and Wenger. CoPs are formed around a topic area designed to serve a Community of Interest (CoI). The first CoP formed in what can be considered “traditional” areas of commodity agriculture and livestock. However, as eXtension has grown, new CoPs reflect a larger spectrum of topics and interests, as well as CoPs that have been formed to serve very specific CoI. The guidelines to form a CoP do not have specific criteria on how and why a CoP should be formed. Rather, they are formed by faculty and staff throughout the Cooperative Extension system (and their partners) where there is a need identified by the potential members of the CoP.

The biggest challenge – and perhaps the best quality – of CoPs is that they are self-formed and self-managed. The eXtension infrastructure of technology tools and staff expertise provides CoPs with the development and technology to support CoPs but it does not manage or lead CoPs. The eXtension infrastructure creates a collaborative working environment that includes full access to Wiki style file creation and management, support of multimedia files, access to a Moodle development platform, webinar support and hosting, a Frequently Asked Question system, and a real-time Ask an Expert system. In short, the eXtension infrastructure provides all the tools needed to stand-up communities by providing critical technology structure that CoPs can take advantage of to develop one of the most comprehensive outreach and education resource supported by sound, science-based information.

## **Participation in Communities of Practice**

While the eXtension initiative is managed by the Cooperative Extension System(CES), it is not limited in membership to those that are employed through the CES network. The intent of eXtension is to have CoPs that include active members from other agencies, organization, and private industries that can contribute to providing sound science-based information. The public that uses eXtension is looking for the most credible information. Nationally Cooperative Extension at all levels has worked with all types of people who support that mission. Those same partnerships are encouraged inside the CoPs.

## **The Tools of eXtension**

There is a variety of resource tools available through eXtension. The goal of these technology tools is to provide wide and broad outreach. Each of these tools is available for use through CoPs and to eXtension ID holders.

- Events Calendar – events that happen locally, globally, or virtually are placed on a system-wide calendar. Events include location, contact information, and can be linked directly to CoPs (although they do not have to be). The calendar is public and timely events are broadcast to the front page of extension.org, to appropriate communities (as identified by the author) and can be subscribed to via RSS feeds
- Articles – articles are content developed by CoPs. They are usually developed by a CoP and can be cross-populated to other CoPs. Some articles are developed through the Wiki (the backend for content development for CoPs), others give a summary and reference external sources and websites. Articles developed in the Wiki can be updated, expanded, and modified as needed by the CoPs. The goal is to provide timely, accurate, and up-to-date information. Articles can contain text, media such as flash, mp3, YouTube embedded shows, and other linked media.
- News – CoPs can create news articles themselves, or link existing news to their News section. Staff in eXtension also scan land grant and partner institutions for news that can be filtered to CoPs.
- Learning Lessons – there are many methods inside of eXtension for hosting learning modules. These can include webinar series, multi-media presentations, recorded podcasts, and development through Moddle.
- Frequently Asked Questions – CoPs, agents, and specialists with eXtension IDs can create and answer questions that are made available to the public through a FAQ system.
- Ask an Expert – the public, agents, specialists, partners, or any other entity can submit a question to the eXtension network through an Ask the Expert (AaE) system. Questions are assigned to specific “question wranglers” (self-assigned to topics and experts in the topic) who will answer these incoming questions. Answers are sent directly back to the email of the person who submitted them. Additional follow-up is allowed. Suitable

AaE questions can be submitted to the FAQ system and become part of the resource available to the public.

- Campus – courses that are developed through Moodle are hosted in the campus.extension.org site. Any user can sign up for an ID on the system and take the courses developed by CoP experts. Courses can be offered free/at-will, through sign-up, or fee-based structure.
- Professional Development – various opportunities for professional development are offered through Moodle courses, webinars, training sessions, and other methods to meet the professional needs of participants within eXtension. Courses are designed to enhance knowledge about topics, technology, or personal growth for participants of eXtension.
- People - the People tool is used to manage user IDs. It enables users to find colleagues, create and join communities, and get reports on activity.

### **THE SCHOLARSHIP OF eXtension**

For Cooperative Extension employees, faculty and staff of University Systems, and partner institutions, a set of resources exist to capture scholarly efforts through eXtension. The goal of eXtension is to deliver the “best of the best” research-based knowledge from the top minds across the land-grant university system. It provides a space where university content providers can collaborate to gather and produce new educational and information resources on wide-ranging topics while continually interacting with their customers to help solve real-life problems in real time. The works of faculty and other professionals in eXtension are based upon unbiased research and undergo a peer review process prior to publication on the public interface. Some examples of scholarly work conducted through eXtension CoPs: (Lambur 2010)

- Development of science-based content in a specified area occurs within and between Communities of Practice (CoP).
- CoPs are scholarly in design by bringing together inclusively the top minds of a particular content area to work collaboratively to develop the best educational products and programs nationally, thus reducing duplication of efforts across the system.
- CoPs function similar to a professional journal in that information is "published" only after review by peers
- CoP leader(s) function as journal editors by inviting participation and contributions and by facilitating scholarly review
- Author teams are developed in specific content areas to develop the “best of the best” content for public publication
- Faculty content reviewers (minimum of two reviewers per article)
- Journalist review for language, educational design, content design
- Articles accepted for publication
- CoP membership is open to all and is national in scope
- True collaborative effort of top faculty in various disciplines and content areas
- Individual contributions tracked through the technology applications
- Cross pollination of content development due to multidisciplinary teams

- Tracking utilization of public content to help determine scope of outreach
- More information about the Scholarship of eXtension can be found at [http://about.extension.org/wiki/The\\_Scholarship\\_of\\_eXtension](http://about.extension.org/wiki/The_Scholarship_of_eXtension).

## **THE ROAD TO PARTICIPATION**

There are many ways to participate in eXtension. Individuals participate in eXtension in many capacities, and those roles often change over time. For Cooperative Extension employees, there includes documentation and guidelines on capturing participation for the purposes of scholarly activity. To find out more information about the various ways to participate beyond the scope of this paper visit the About eXtension site at <http://about.extension.org>

### **The Use of eXtension in Daily Work**

One of the most widespread uses of eXtension is as a resource for answering client questions and individual professional needs. There have been more than 6 million page visits to eXtension. Visitation has doubled since 2008. The “search” area of the main public site for eXtension (<http://www.extension.org>) allows for general searching across the entire eXtension content areas including events, news, articles, learning lessons, FAQ, and AaE. Keyword search results bring back any information that is available to the public.

The FAQ system presents the opportunity to access questions and responses from across the country that were asked by specialists, agents, faculty, and the public. Answers were provided by experts within the eXtension network. These questions provide a wealth of information and can be searched by topic area or keyword. Access to the FAQ system is open to the public and does not require an eXtension ID (<http://www.extension.org/all/faqs>).

The Calendar of Events (<http://www.extension.org/all/events>) provides access to events that are listed by month and year. They can be sorted by resource area or location. In addition, the calendar can be received as an RSS feed (<http://www.extension.org/feeds/events/>).

Many users come to eXtension to find the latest news in a resource area, or across the land grant university system. News can be found in each resource area, or by full listing at <http://www.extension.org/all/news>.

Modules that are developed at <http://campus.extension.org> are Moodle courses developed by eXtension Communities of Practice, as well as Extension professionals throughout the Cooperative Extension System, for use by the general public. Modules developed at <http://pdc.extension.org> are Moodle courses developed by Extension professionals for internal staff development and training. An eXtension ID is required.

The public side of eXtension has many ways in which anyone can take advantage of the work that CoPs are doing. Utilizing it individually, or promoting the use among clients and to individuals creates more widespread use of this resource.

## **The eXtension ID**

Getting an eXtension ID enables users to begin to interact with CoPs on a more active level. eXtension ID's are currently limited to individuals closely associated with the U.S. Cooperative Extension system (either those working at a Land-Grant Institution, State college or U.S. Government personnel affiliated with Cooperative Extension), or individuals in Extension-related organizations working on projects with Cooperative Extension staff. Once eligibility is determined, users can sign up through <http://people.extension.org>.

During sign up, potential ID holders will be asked their institution, affiliation, or relationship to Cooperative Extension. Upon acceptance, eXtension ID holders will be able to find CoPs, join Institutional Teams, create and participate in social networks, and can create their individual user profiles. eXtension ID holders can indicate if they have an interest in a CoP, have an desire to become a member of a CoP (members of CoP's contribute content or become active in a CoP), or have a desire to join a CoP leadership team. In addition, eXtension ID holders have full access to the create/modify/edit FAQ's, enter events to the calendar, and become a "question wrangler" for the Ask an Expert system. When an eXtension holder identifies an interest in a CoP, they are automatically added to the email communication group (listserv) of that CoP.

The eXtension ID enables the holder to begin to develop professional materials and connections within the eXtension network. Many people who have eXtension IDs do not have high levels of daily participation in eXtension, but they do have access to peers and information beyond what the public site allows. Getting an eXtension ID identifies a user as a potential contributor to one or many CoPs. In addition, having more participation through active eXtension ID holders strengthens institutional capacities to be able to respond to new and emerging public needs.

All eXtension ID holders are required to agree to documentation that describes the collaborative nature of eXtension and the rights and protection of their intellectual property as an eXtension ID holder.

## **Becoming a Member of CoP**

eXtension ID holders have the option of becoming a "member" of one or more CoPs. Becoming a member alerts the CoP leadership that a user would like to become more involved in a CoP. As a member of a CoP a user can author content (content can be text, media, or other types of outreach a CoP uses), contribute to collaborative content, sign up as a "question wrangler", work on FAQ's, serve as resources such as a peer review editor, create and participate in webinars and special projects. Membership usually indicates that a user wants to activate to some extent with the CoP.

Each CoP defines guidelines on how their CoP is structured and the definition of "member" for each CoP. Activity in each CoP varies. Many members participate as needed, or as available. Others members have found ways to utilize the collaborative tools to enhance their client in projects and on-going needs. There are many different tools available to members of the CoP to enable the

creation of a work environment that is suitable to the unique needs of the members.

### **Becoming a Leader of a CoP**

The self-forming nature of CoP means that they rely on voluntary leadership within the membership. Leadership roles are defined by the CoP but have the basic structure of leader/co-leader, content leader, FAQ leader, AaE leader, and various liaisons and advisors. The leadership revolves differently in each CoP. Leaders generally take on the functional operation of the CoP by helping to promote and market the CoP, assigning tasks and opportunities, helping the internal management of content, and reporting. Leadership teams help advise national eXtension leadership on emerging needs and issues. Leadership terms and expectations are set forth in the CoP guidelines for each community.

### **LEVERAGING eXtension**

The tools and resources of eXtension can be used to support new and existing programs that participants might want to get involved in. One of the ways that eXtension supports national efforts is to provide a place for scientific collaboration. Often times there is not a mutual workspace that scientists can come to and collaborate to create new outreach and education materials. Past obstacles with funding, technology resources, training, and institutional support have been barriers to some collaboration efforts. eXtension provides a platform to build new partnerships and tools. Collaborators can spend more time on content than on maintaining technology tools when they choose to work through eXtension. Some of the most costly items (servers, engineering and technology support, training, and software infrastructure support) are managed by eXtension freeing up valuable time for collaborators.

Many of the latest grants promote the use of eXtension. The tools offered by eXtension including Moodle, support of multi-media, professional development, learning lessons, and social networking are supported through eXtension platforms. In addition, there are methods to incorporate new and emerging technologies into eXtension that are identified by CoPs. The goal of eXtension is to grow and create new ways in which Cooperative Extension can meet emerging public needs.

eXtension ID holders who participate in professional development opportunities including training, webcasts, online seminars, and networking opportunities have the potential to learn about valuable tools and resources their peers are utilizing, as well as new methods for audience engagement. eXtension promotes the exploration of ideas and outreach through experimenting with emerging technologies and analysis of that usage as a potential tools that could be piloted to others.

In addition to the USDA, other agencies and organizations are coming to eXtension to help build new CoPs centered on their agency needs and missions. This growing recognition outside the USDA means that there will be increasing opportunities for professional interaction with scientists across agencies.

eXtension provides stability and support that individual institutions may not be able to provide.

### **SUMMARY**

eXtension provides an opportunity for scientists and professionals to participate in an active, collaborative, and innovative outreach and education opportunity. People from around the world are coming to eXtension to access some of the best minds and information available today. The eXtension model provides a platform for science-based, peer reviewed information that meets the needs of the public. In addition, eXtension provides internal infrastructure and support to help develop new and innovative approaches to learning that have far-reaching impacts on the daily lives of thousands of users. To learn more about how to become part of eXtension, visit <http://about.extension.org>.

### **REFERENCES**

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