A Practical Guide to Collaborative Documentation in the Digital Age

The *Bracero History Archive* (BHA) <braceroarchive.org> was conceived to fill both a historical gap and a collaborative one. Over the past several years, this nationwide effort, has worked to uncover, record, preserve, and provide access to the history of bracero guest workers. Led by Brown University's Center for the Study of Race and Ethnicity in America, the Institute of Oral History at the University of Texas at El Paso (UTEP), the Smithsonian Institution's National Museum of American History (NMAH) and the Center for History and New Media (CHNM) at George Mason University, the BHA has built strong ties with local institutions and communities around the country and in Mexico, and laid the technological and methodological groundwork for a new model of cooperative documentation. In 2006, the partners sought National Endowment for the Humanities (NEH) support for a two-year project to build upon this strong foundation and to take it in new directions. This ground-breaking phase of the project focused on deploying a standards-based system for collaborative, online archiving; cataloging and making available online the more than 400 oral history interviews, more than 600 scanned documents, and more than 1,700 digital images already collected by project partners; adding new records to the collection through direct outreach and collaborative collecting among diverse local institutions and individuals; providing a guide for teachers of high school U.S. History interested in using the collections with their students; extending the BHA as a national model for collaborative archiving and providing public access to dispersed subject-based collections. This guide represents that effort to extend the BHA as a national model by using our work as a case study and by providing practical guidance for others interested in undertaking similar ventures.

Bracero History Archive

For too long the history of the Bracero Program has been hidden from view. Some of this can be attributed to the neglect of Latino history, in general. But much of it has to do with limited access to source material—the artifacts, experiences, and documents necessary to write good history. The transnational and simultaneously intensely local nature of bracero history has meant that existing collections are dispersed among hundreds of small institutions. In addition, many of the most valuable materials remain in private hands, in the personal collections of bracero families. The wide geographic dispersion of records, the number of small collections, and the varying degrees of technical and archival skills and resources among the local and regional institutions in which the bulk of bracero materials reside has impeded even the most energetic researchers. No large, authoritative collection of this important chapter of American history exists.

A number of discrete collections, like Stanford's Galarza papers, Wayne State's United Farm Worker's archive, Oregon State's Bracero Photo Collection, and the Truman Presidential Library and Museum's records of the Committee on Migratory Labor, provide insight into aspects of the Bracero Program. Yet most of these institutions provide only a finding aid for web users. A few smaller institutions provide access to a selection of their materials online, but provide no finding aid or detailed search feature. Only three institutions

provide significant, searchable collections of bracero history online. Moreover, none provide a broad, synthetic view of this important piece of American history.

Historians researching labor and immigration are often forced to rely on "official" sources, which may record only one aspect of the history. Often with there is no primary record from the participants' perspective. The BHA seeks to correct this problem by virtually linking a diverse group of primary materials and making them available through a single website. Until now, scholars have had to locate and travel to many small but rich collections to piece together the political, agricultural, immigration, and cultural history of the Bracero Program. School children and interested family members have had even more difficulty in finding the primary documents and insightful secondary treatments of the largest U.S. guest worker program.

Some steps toward creating a collaborative archive had already been taken by the BHA partners prior to the start of the current grant project. Researchers collected more than 400 oral history interviews and more than 600 digital records of images and documents—including ID cards, pay stubs, and contracts—shared by former braceros and their families. In addition, NMAH holds over 1,700 digitized images of the bracero experience. These materials have already proved surprising and insightful. In one oral history interview a bracero explains how lonely he was separated from his family. While only having a second grade education, he taught himself to read in order to write to his family in Mexico. In another interview, the son of a bracero explains how the program disrupted the social structure of many villages. The man remembers how he was teased because his father was absent while working in the United States. His mother retreated to a small support group of other women whose husbands were braceros. Similarly, the visual record has opened many doors. While the basic steps of becoming a bracero are known, the small details that make it a human experience are often only revealed through an examination of photographs. One of the most remarkable examples of the importance of the photographic record is a Leonard Nadel image taken at the border station in Hidalgo, Texas. In these photos the braceros are sprayed with DDT without protective measures. The Braceros were forced to strip and were sprayed in their face as well as the genitals. These photos are graphic. They evoke an immediate response. The archival record of letters, pay stubs, and contracts also give scholars new opportunities for examination. Seeing the contracts that were written in English and signed by Spanish speaking workers or pay stubs that show the deductions for assorted sundry goods give a level of understanding to the bracero's experience that has to this point been difficult to capture.

All of the collected materials were digitized and tagged with detailed metadata, and approximately half of the oral histories have been transcribed. BHA has been providing full public access to these processed holdings at the starting point. The project staff at UTEP has finished the transcription of the oral histories and migrated original and web-accessible audio files, full search transcripts, and associated metadata to the project database. Project staff at NMAH has likewise migrated data and metadata for the remaining documents and digital images. At present, all 2,700 objects in our current holdings are available online. These materials form the initial basis for the BHA's online collection.

But more important than preserving and providing access to collections already held by the main partner institutions is preserving and providing access to collections held by

smaller, less-visible, and potentially less-secure local institutions around the country and in Mexico. Because bracero history is so widely dispersed, the main focus of the BHA is to encourage the self-preservation of locally held collections at smaller institutions and in private hands. Though we will provide access to our existing holdings during the grant period, our primary intention is not to build an archive owned by the grant partners. We are building a collaborative digital archive of bracero history to which we will be only the first contributors.

In the early phases of this project, the principal partners collected materials themselves. In the current phase of the project, we are encouraging local partners to share digitized versions of their holdings with the central Archive. This provides partners with centralized access to their collections and at the same time maintains local control of valuable cultural heritage resources. Providing a set of sophisticated yet easy-to-use technologies will allow those institutions and communities to add their own collections to the Archive. Through a comprehensive program of in-person and online outreach, we expect to provide access to an additional 1,500 digital objects relating to bracero history. In doing this we have two major goals. First, we seek to expand the understanding of the bracero experience by giving agency to the families left behind and the communities in which they worked. Anna Rosa's work interviewing the wives and families of braceros in Mexico is one success in this regard. Examples prove that the bracero program had a significant impact on Mexican social and family structure. In one case, a daughter of a bracero was able to show us material goods (a dress) that her father had sent to the family, exemplifying continued kinship connections and success. In another case, the experience was less positive. The father went to the US and broke all communication and support for his family. Realizing abandomnent and experiencing shame in the village, mother and daughter had to move to another city and reinvent their life. In addition to the economic, labor, and political perspectives that dominate many existing collections, we want to make sure these social, cultural, and familial perspectives are represented in the historical record. We also aspire to represent the perspective of the growers. Thus far, this has been the toughest area to collect but we have met with some success. As we talk to growers, we are finding a wide variety of perspectives on the bracero program and are beginning to realize that they too were often between a rock and a hard place with few opportunities for independent choices. These are just some of the yet undiscovered voices that the BHA brings to light.

The BHA is by its nature a collaborative effort, but not simply because its work is spread among the primary institutional partners. Many projects have divided work among several partners. The BHA is a new kind of collaboration because it approaches the idea of an archive with collaboration in mind—its intention is to see the documentation of the bracero guest worker program as a collection of both physical artifacts and personal stories. Moreover, acquiring the items for the archive is an intensively collective process that relies on forming partnerships with dozens of partners across the country. In short, BHA has been designed as a collaboration between former braceros and their families, historians and other academics, museums, community-based institutions, and others who can play a role in documenting braceros' stories.

Getting Started: A Template for Collaboration

Types of Collaboration

Collaboration has long been seen as cooperative work between institutions. Some collaborative work has merely been labor-sharing arrangements, where institutions pool resources to achieve a result. These have accomplished fine work, but the collaboration has been linear; the sharing or cooperation was merely a logical way of dividing labor.

Other arrangements have relied less on linear collaboration, and crossed boundaries of time. One example of this is the research institution that builds on the results or ideas of a previous generation. This, too, has been a valuable way to increase knowledge and share ideas. But academic collaboration has been famously difficult to manage, because it has been limited essentially to things like co-authored research and conferences. Managing these kinds of projects has always meant coordinating work by mail, by telephone, or by electronic mail—a challenging proposition under the best of circumstances.

A better way to approach the idea of collaboration, especially in the digital age, is to integrate all of the above ideas. The BHA is thus a model of the new collaborative: it certainly did need to rely on the efforts of several institutions to build the project. As well, in both concept and execution, the project builds on both the historical and archival developments of the digital age. And finally, it built a new model of cooperation, relying on and empowering other institutions and individuals to participate in the process of documenting a historical and social event.

Thus, these institutions have been able to utilize their strengths, first, to collect the stories of hundreds of former foreign guest workers; second, to construct a stable and accessible archive with which to offer these stories to researchers and the public; third, to offer educational resources to present the historical significance of the bracero program to classroom students; fourth, to train and empower other institutions to collect histories and objects to add to the growing archive.

It was necessary to agree on the purpose and scope of the archive. First, it would serve as a repository for items related to the bracero program. Oral histories, digital objects, documents, and photographs were important documentary evidence that would disappear if not preserved in some way. But because of the possibilities implicit in the digital revolution, an archive of bracero-related items had the potential to be both a new kind of archive—one where users could access many types of historical material—and a model for future work. In short, the principal partners believed they could build a new kind of partnership as well as a new archive.

The first and most basic rule of collaborative work is that the partnerships should be selected on the basis of specific strengths. For example, the success of the BHA is due primarily to the fact that each partner institution has expertise in a certain area. CHNM is renowned for its excellence in designing and implementing technology and new media in the humanities. The Institute of Oral History at UTEP is well-known for its work collecting the oral histories of braceros. Likewise, CSREA, located at Brown University, has placed the understanding of race as a central feature of American history and culture as an essential aspect of teaching and learning. Finally, NMAH has long been respected for its ability to collect objects of historical significance and place them in a historical or cultural context.

One of the innovative aspects of the BHA was its reliance on other kinds of partners. Principal partners aside, it was clear that the goal of opening an archive to widespread contribution could only be achieved by recruiting and empowering other institutions to help collect. Thus, once UTEP completed the first wave of collection, the partners began training other organizations to continue the collecting process. Using input from all the principal partners, we identified perhaps a dozen other institutions (these included historical institutions, museums, and even the sociology department of a university) that had interests or collections that might be of interest to those interested in braceros. We approached those institutions and asked them to be "virtual partners," who would be able to use their own resources and contacts within the bracero community to acquire and add more items to the archive.

Empowering virtual partners, who most often had no specific experience in doing the sort of collecting we needed, meant training them. Thus, we held a number of virtual heritage meetings, where we screened a video tutorial constructed to show virtual partners how to collect oral histories and digital items for the archive, how to add them to the archive, and how to use the archive to build their own exhibits using the MyArchive feature. Additionally, we provided downloadable resources to use in that process, including checklists for photographing items, releases for those who record their story, and other materials to support the collecting process. The tutorials and resources remain available for partner institutions and the public to use <braceroarchive.org/resources/>.

What should you do?
- First, decide what kind of collaboration you wish to have, since that decision informs the rest of the process, from technical to communication considerations. If your partners will merely be commenting on each others' work, you can afford to think more about ways to share files and accommodate the comment process.
- If your partners will each be contributing work to the project, or if there are task-sharing aspects to your project, you must also ensure that partners have the ability to contribute efficiently and that you can hold each other accountable for your contributions.
- Make sure each partner understands exactly what their contributions are, and when those contributions are due. You will use meetings or other communications to manage those deliverables, but it is crucial that all partners are agreeing to the same thing.
- Flexibility is key. No project is able to anticipate all problems or challenges before they occur, but simply acknowledging that challenges may arise, and allowing time and budget for those challenges is helpful. For example, deciding as a partnership that in the event of an unanticipated technical problem, Partner A will take the lead in resolving it, means that you will not lose valuable time assigning that responsibility at a critical moment.

Technical Considerations

Building the Website
First, since the website would serve as a repository for items related to the bracero program, we knew it would include different types of resources, like oral histories, digital objects,

documents, and photographs. Second, the site would need to be accessible for partners adding materials to the repository. Third, the site would require a welcoming 508- compliant public web interface available in Spanish and English for site visitors wishing to share their personal stories and photos and to browse and search through the entire archive.

Knowing this, we then moved on to choose an appropriate platform for building the website. We recommend platforms that are free and open source, such as Drupal, Joomla, or Omeka. These platforms have different server requirements, but each runs a MySQL database with PHP. Based on CHNM's considerable experience building digital archives and in developing Omeka, the team chose Omeka. Other collaborative collecting and archiving projects were built using Omeka, including the *Hurricane Digital Memory Bank*, *April 16 Digital Archive*, and *Katrina's Jewish Voices*. The online exhibition, *Gulag: Days and Lives*, showed us that Omeka could be used to build a bilingual site. Omeka <omeka.org>is a free and open source collections based web-based publishing platform designed with non-IT specialists in mind, allowing administrative users to focus on content and interpretation rather than programming. It brings Web 2.0 technologies and approaches to academic and cultural websites to foster user interaction and participation, and its robust open-source developer and user communities underwrite Omeka's stability and sustainability. Omeka comes pre-packaged with a set of 508-compliant design themes that are ready to use, or advanced developers and designers may edit them to fit the needs of a specific project.

Omeka's robust database would provide adequate datamodel for the BHA's different file types, and the system's adherence to the Dublin Core Metadata Initiative (DCMI) ensured that all data collected and shared with the archive conforms to archival standards. Using metadata standards ensures the longevity of the project, because the data saved in the archive is interoperable with other archives using this internationally adopted schema. Omeka afforded the BHA a dynamic database structure, flexibility in the design, and user-friendly administrative panels that addressed the project's scope and needs of its users.

BHA also needed to design a public site that was easy to navigate, loaded quickly in a variety of browsers, and made contributors—reading Spanish and English—feel comfortable sharing their personal stories and images. The entire site is available in Spanish and English, including the contribution forms. Experience from other collecting projects told CHNM that without that ease and comfort of use, the number of contributions to the project would be limited. When it was time to commit to a design for the Archive's website, we circulated several designs before a conference call and asked the partners to be ready to comment on the designs. We then discussed the merits of each sample and reached a consensus on the design. Of course, CHNM had unique experience in designing archives, and so was able to advise on the feasibility of suggestions or requests—we knew, for example, what features were possible or impractical to include in the archive.

Consulting with the entire BHA team, CHNM designed a beautiful and accessible website with the above requirements in mind. Next, CHNM developed a bilingual plug-in to create a mirror set of metadata fields that allows project partners to enter translations of metadata and that gives the web designers an easy way to call and display the Spanish language metadata on the Spanish site, and vice versa. Omeka's contribution plug-in provides a customizable form and simple public interface that makes collecting stories and files from all

site visitors possible. A link to the contribution form appears on the BHA homepage to encourage visitors to contribute their bracero-related story when they visit the site.

What should you do?
- Unless your project *is* the development of a specialized system, use an existing platform. Most partnerships do not have the resources to design a completely new data structure. In any case, you don't want a completely proprietary platform that only *you* can fix. Focus on the project, not the technology. Survey the various database products and decide which meets your needs best. They require different levels of technical expertise, and have correspondingly different strengths, but in most cases there is already a system to accommodate your project.
- Likewise, managing the various partners' tasks is hard enough; You do not want the added complication of managing a parallel software development project while you are building your content.

Collecting
Once Omeka was installed, team members could begin building the archive. Omeka allows website administrators to create multiple users and assign them different levels of access to the archive. This empowers meaningful collaboration by giving each collecting partner the ability to contribute according to its particular strength and perspective. To allow institutional partners access to add content to BHA, CHNM gave them specific permission levels that allow them to add items, but only edit and delete the ones they contributed. Using this permission-based access, we can allow collecting partners to add and organize material without the dangers of deleting or destroying important archival information. Thus, Omeka provides the means for maintaining localized control over collections in a collaborative archive. For example, we can set permissions so that a user can add items, but cannot delete items; similarly, we can allow users to edit only items they have added.

With users created, project members were free to access the administrative backend by logging in from their favorite web browser. Using a web-based program like Omeka eliminates the challenges of circulating software and purchasing licenses that will work on every partner's operating system. Adding an item to the archive is as easy as clicking the "Add an Item" button and filling out a form containing fields for Dublin Core metadata, file type-specific information, and tags, plus an interface for uploading files. This interface makes training partners who might be uneasy about their technical skills feel comfortable sharing their collections with BHA. Omeka also offers step-by-step tutorials on working with Omeka, including written documentation and screen cast tutorials.

Most obviously, the fact that UTEP could collect oral histories more skillfully and efficiently than the other parties meant that they would bear the bulk of that collecting. On the other hand, CSREA's extensive network of contacts was critical in locating former braceros. Typically, team of researchers would travel to a location where they would hold a Bracero Heritage Meeting. Publicized beforehand, the meeting allowed researchers to introduce the project and invite braceros to sit for interviews or allow their photos or documents to be scanned for inclusion in the archive. The face-to-face contact between researchers and braceros was crucial in gaining the confidence of braceros, since many of them had apprehensions about speaking too openly about their experiences. For those who were unwilling or unable to schedule actual interviews, researchers offered the option of toll-free

phone numbers as an alternative to traditional sit-down interviews. Thus, CSREA and UTEP worked together to build a collection of bracero stories.

And to widen the collaborative nature of the project, we allow visitors to the site to contribute to the archive themselves. One of the exciting aspects of Omeka is its contribution feature—this represents the best of both collecting worlds. Users can add items to the archive's collection, but administrators can also moderate the archive in important ways. First, we can make sure that other users know and understand the difference between a professionally collected item and a publicly contributed one (this is important because researchers see those resources in different ways). For example, we currently display a disclaimer with all user-contributed items: "This is a user-contributed resource, and has not been screened or evaluated by scholars or historians."

Inherent in the archive-building process are the issues of curatorial control and authority. A central feature of the archive was the ability for a user to contribute his or her own story to the collection. Unfortunately, that raises questions of dependability in an archive that is intended to serve professional academics who might use documents from the archive for serious research as well as other users who wanted to learn more about a family member's experiences working in America. Thus, while providing people the opportunity to add their own items to the archive, we needed a way to maintain a balance of curatorial authority over these collections. The solution to this dilemma is built into the Bracero History Archive's user and permissions system. By utilizing a privilege-based system, we can allow visitors to add their own stories, but prevent them from modifying or changing anything else in the archive. These contributed materials then go into an administrative holding area where they await publication by project staff. This allows project staff to filter out any unrelated contributions and spam.

What should you do?
- Use a collaborative model as a framework. Your collaboration could be between yourself and your partners, as in a traditional project. Many fine projects have been produced using partnerships across time or geography.
- Or, you could collaborate with your users. In the case of BHA, partners did the initial collecting, but by design the majority of collecting work has shifted to users and the public. This isn't better in the sense that it works more smoothly, but it does offer possibilities that are not available to conventional partnerships.

Communication and Delegation
It is likewise important that partners remain in regular contact, both for purposes of coordination and accountability. We used monthly conference calls to report on the previous month's progress, to assign new tasks, and to encourage the timely completion of existing assignments. In addition, we used the calls to resolve questions or make decisions about the project. Technology was an important aspect of collaboration. Using Skype <skype.com>, a low-cost, internet-based telephone and teleconferencing application, we were able to hold videoconferences between partner institutions. Skype also gave us the option of setting up telephone lines through which braceros and their families could contact partners to set up interviews or ask questions. The phone lines allowed persons to make free long-distance calls to a voice mailbox; callers could either leave a message arranging an interview or oral history, or could simply record their oral history to be retrieved and transcribed later.

In addition to standard electronic communication methods like instant messaging, we also facilitated collaboration by constructing discussion boards to easily exchange information. By establishing discussion forums for curators, for translators, and for graduate students or interns, we made it possible to draw on the collective experience of partners and participants. These discussion forums gave partners the opportunity to post and reply to questions, and allowed the staff to learn from one another throughout the project--to collaborate.

Behind the scenes, the partners used a project management platform to communicate and share resources efficiently. While we used Basecamp <basecamphq.com>, other platforms are available. Any number of commercial services are readily available (gotomeeting.com, Zoho, and Central Desktop are all premium project management resources), but there are also free, or low-cost solutions (iTeamwork, Teamscope, and Taskjuggler are options here). What is important to remember here is that these are management tools, and really only apply to communication between partners and the execution of the project. In other words, collaboration does not happen because a team uses specific software or platforms; rather, those tools simply enable the collaboration.

What should you do?
- Do not assume that by adopting some platform, collaboration will automatically happen, or that instituting a project management service *is* the collaboration. Theses are the methods, not the result. Software or online services can help you track deliverables or schedule meetings, but it will not collaborate for you.
- Decide how often you will check in with each other, and who will run the meetings. You are not establishing a dictatorship, of course, but when one partner takes on the role of setting up and reminding others of important dates and milestones, the other partners are free to focus on their contributions.

"Is there anybody out there:" Audience and Presentation

Promotion and Publicity
Promotion of BHA happened in two phases. The first phase of publicity was a critical step in recruiting potential interviewees for the oral history component of the archive. To hold these Bracero Heritage Meetings, partners typically used contacts to identify sites in the United States and Mexico where a sufficient population of braceros existed to justify a collecting trip. These sites were primarily in the western United States, and partners from Brown University were especially useful at finding these locations. We then used a community organizer to help publicize the collecting trip and schedule potential interviewees. Here, too, community members became part of the process. In California, for example, interviewers trained people locally to perform oral history interviews.

On the other hand, we knew that building an archive would serve little purpose if no one knew it was available. The next wave of publicity, then, served to launch the site and allow scholars and other users access to the resources. This effort was done conventionally, through the use of postcard mailers, but also coincided with the launch of the Smithsonian Museum of American History's traveling exhibit, *Bittersweet Harvest: The Bracero Program 1942-1964,* and so benefited from the publicity generated by that event. Additionally, partners from both NMAH and UTEP used academic and association conferences to highlight the

wonderful stories we were hearing from braceros as well as the innovative things we were doing to collect and archive those stories.

What should you do?
- Use standard outlets for publicity. Postcards are usually cost-effective. Conferences are often a good way to reach to others with similar interests.
- Take advantage of new media. Message boards, Discussion forums, and other non-traditional outlets can reach many interested people, and they cost nothing. Many projects have been able to reach even more people using social networking methods like Facebook and Twitter.
- Try to think creatively, as well. Can your project launch be timed to coincide with a related event or project? Can you apply for awards? Presenting your project for award consideration can mean extra publicity, especially if it is recognized in some way.

Teaching and Learning
One of the best ways to encourage the use of a digital archive is to carefully design teaching modules that educators can easily adapt for use in their classrooms. Also fundamental to both the Archive and the collaborative process is the inclusion of teaching materials in the Archive. Far from being an afterthought, the lesson plans and activities were intended from the beginning to be as collaborative as the rest of the process. In the first place, while they were written by an educational specialist at NMAH, the other partners provided input along the way. Thus, they reflect many perspectives: historical, ethnic or racial, and labor, to name but a few. Too, the presentation of the materials utilizes much of the Internet's potential. Instead of simply mounting downloadable files that could just as easily be copied and distributed to classrooms, BHA teaching materials require a different sort of collaboration. They are cross-disciplinary, on one hand, in that they ask analytical skills in history, anthropology, and other perspectives. In addition, they require students to use objects, documents, or images from the archive to make historical judgments or conclusions. In effect, students will collaborate with braceros to learn more about the program and its impact on braceros, their families, and the United States.

What should you do?
- The first step here is determining the objectives of your activities. Effective classroom activities highlight critical thinking skills as they teach specific information. You should reference the learning standards for your state or locality to ensure you are addressing the specific concepts or ideas students should be learning. A fully searchable database of the standards of learning for each state is located at the *National History Education Clearinghouse* (NHEC) <http://teachinghistory.org/teaching-materials/state-standards>. A guide for more generalized national history standards can be found at the *National Center for History in the Schools* (NCHS) <http://nchs.ucla.edu/standards/>. Your materials are much more likely to be used in a classroom if they focus on concepts that are required.
- Similarly, you should consider the specific historical thinking skills that you wish to teach with your materials. Good introductions to the teaching and learning of historical thinking skills can be found at the *National History Education Clearinghouse* <http://teachinghistory.org/> and *Historical Thinking Matters* <http://historicalthinkingmatters.org/>. Finally, the *Object of History* project has an

excellent "Guide to Doing History with Objects"
<http://objectofhistory.org>./guide/>

Conclusion

So while the archive itself has tremendous value for researchers, scholars, and families, the BHA may be even more useful as a model for new collaboration. The partners that set out to build the archive used some of the same methods and efforts that have been used for many years, but we also used innovative techniques by sharing responsibilities in new ways, by communicating with each other in new ways, and by cultivating communities to help us build and collect. We also built collaboration into our system by utilizing a technological platform that encourages and enables public contribution. From teaching materials to MyArchive to tutorials, the BHA is an example of innovative collaboration in the digital age.