Targeting Your Audience

Tailoring Avocational and Youth-Oriented Public Archaeology Programs for Rural Populations

Marieka Arksey , Marcia Peterson, and Greg Pierce

ABSTRACT

The Office of the Wyoming State Archaeologist has as one of its main objectives to actively engage the population of Wyoming in archaeological stewardship. To achieve this goal, in the past five years, we have launched the youth-oriented Summer Ventures program and the adult-oriented Wyoming Avocational Archaeology Training Program. Both programs were inspired by existing programs in other parts of the country and were launched following research and target audience surveys on how to best adapt them to Wyoming. Despite this preliminary research, our in-field experiences over the past few years have shown some patterns that are causing us to rethink both programs. This article discusses these initial in-field testing years, the issues we have encountered, and the ways we are redesigning both programs to better target the appropriate audiences in light of the different lifestyles of populations, particularly those of youths, in a rural state.

Keywords: public archaeology, education, rural populations, outreach, public programming, avocational, K-12

La Oficina del Arqueólogo del Estado de Wyoming tiene como uno de sus principales objetivos atraer activamente a la población de Wyoming en la administración arqueológica. Para lograr este objetivo, en los últimos cinco años lanzamos el programa Summer Ventures orientado a los jóvenes y el Programa de Entrenamiento de Arqueología Vocacional de Wyoming orientado a los adultos. Los dos programas se inspiraron en los programas existentes en otras partes del país y se lanzaron luego de una investigación y encuestas de público objetivo sobre cómo adaptarlos mejor a Wyoming. A pesar de esta investigación preliminar, nuestras experiencias en el campo en los últimos años han mostrado algunos signos que nos están haciendo repensar ambos programas. Este documento comentar de estos años iniciales de pruebas en el campo, los problemas que hemos encontrado y cómo estamos rediseñando ambos programas para apuntar mejor a las audiencias apropiadas a la luz de los diferentes estilos de vida de las poblaciones, particularmente las de los jóvenes, en un estado rural.

Palabras clave: arqueología pública, educación, poblaciones rurales, divulgación, programación pública, entrenamiento vocacional, K-12

Wyoming is an overwhelmingly rural state that has been described as "one small town with really long streets." Its high percentage of public land, low population density, and agricultural lifestyles have resulted in a community with a long history of outdoor activities such as hunting, hiking, and collecting, and a passionate interest in the history and preservation of the state. With a population of 578,759 in just over 97,000 square miles—48.4% of which is public/ federally owned (Vincent et al. 2017)—Wyoming has the lowest total population and second-lowest overall population density of the continental United States at 5.8 people per square mile (U.S. Census Bureau 2020). It also has one of the highest proportions of rural land (Ratcliffe et al. 2016) at 99.8% of its total land area (U.S. Census Bureau 2020). Of particular significance for this article, the population density of these rural lands is only two people per square mile, giving Wyoming the third-lowest rural population density in the country (U.S. Census Bureau 2020). The sparse population means that archaeological projects tend to be

conducted in very remote locations, requiring a significant amount of travel and a greater reliance on temporary accommodations (such as camping and backpacking gear). They also tend to necessitate a greater physical fitness and overall ability to "rough it" than in other more urbanized states and areas. Additionally, the state has the fourth-highest proportion of "farmers, ranchers, and other agricultural managers," as well as farmworkers and those working with farm, ranch, and agricultural animals per land area in the country (U.S. Bureau of Labor Statistics 2019). The preponderance of the agricultural industry in Wyoming has resulted in a large number of ranching families whose children are expected to regularly help out at home throughout the year, even if it means occasionally missing school or other commitments.

This combination of characteristics has resulted in a large proportion of the population having limited access to the educational and activity-based resources typical of urban areas due to rural

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infrastructure, relying instead on a heavy use of virtual learning environments that do not lend themselves well to typical archaeological activities (Barker and Hall 1994; Brant 2016; Zahn and Buchanan 2002). Virtual experiences include the Wyoming State Museum's virtual tours (State of Wyoming 2020a) or the Buffalo Bill Center of the West's "Skype in the Classroom" program (Buffalo Bill Center of the West 2020). This trend counters studies that have shown that people engage in active learning through direct contact with physical objects (DeMarrais et al. 2004; Malafouris and Renfrew 2010).

A recent study on the interactions of different audiences with archaeological objects, 3D physical replicas, and virtual models of those objects demonstrated that 3D virtual copies cannot yet reproduce a complete "sense of the innate qualities of objects (i.e., density, weight, etc.)" (Di Giuseppantonio Di Franco 2014:168). In this study, participants who were asked to describe virtual objects without touching them "reproduced stereotypical iconic gestures (i.e., to show how to use the objects) as if they were actually touching the item" (Di Giuseppantonio Di Franco 2014:168). This persistence of data demonstrating that physical interaction with materiality and hands-on learning provides a more complete educational experience is precisely why our office is focused on making hands-on archaeological experiences more accessible to our rural community.

The Office of the Wyoming State Archaeologist (OWSA) has found that one factor that ties the public to archaeologists is an appreciation of objects. We have also learned, however, that a large portion of our public is just as interested in the "how we know what we know" aspect of archaeology. Wyoming citizens want to know what data we collect and use-and why. They ask about the importance of artifacts, sites, and landscapes. They want to know what methods we use, how we make interpretations, with whom we collaborate, and what happens to the data and materials when our jobs are done. It is this interest in the process behind the discipline around which OWSA has developed several public archaeology programs about preserving Wyoming's history. With a focus on developing public and hands-on projects that move beyond the virtual environment to meet the needs and desires of this rural population to participate in the entire archaeological process, our larger public programming goals are to

- Help the citizens of Wyoming develop a more nuanced understanding of all aspects of archaeology and cultural heritage protection.
- (2) Encourage the citizens of Wyoming of all ages and backgrounds to partake in citizen stewardship initiatives.
- (3) Grow our existing community partnerships to foster a stronger relationship between private citizens and government agencies.
- (4) Facilitate hands-on learning experiences for audiences that meet the specific requirements of this state's population demographics, labor statistics, and resulting lifestyles.

BACKGROUND

OWSA was created by statute in 1967. Through this statute, the Wyoming Legislature gave the office seven primary functions: (1) investigate, study, preserve, and record such evidence of

prehistoric and early historic human activity as shall be reported from time to time by citizens of the state; (2) conduct an archaeological survey of the state of Wyoming; (3) engage in systematic intensive archaeological investigations; (4) prepare and publish reports of the archaeological investigations; (5) help Wyoming communities establish local archaeological museums; (6) help protect Wyoming's cultural heritage from vandalism or destruction and investigate, exhume, and consult regarding archaeological human burials pursuant to new Wyoming law; and (7) distribute publications to the public on request (State of Wyoming 2020b [2019] Wyo. Stat. § 36-4-106(d)(i)-(d)(vii) (1967)).

Even as the State of Wyoming recognizes the importance of investigating, recording, and preserving our archaeological resources, however, there are no State of Wyoming historic preservation or environmental protection laws that require an assessment of a project's potential impacts on cultural resources on state or private lands. Consequently, despite more than 50 years of effort, a significant amount of archaeological work in Wyoming remains to be completed on these lands.

The potential to gather information on the cultural resources on state and private lands through community partnerships with private citizens is evident, given that one of the most popular pastimes in the state is searching for projectile points, stone tools, and other historic items. In many cases, the same family has been collecting from the same properties for generations. These collectors have an intimate knowledge of the landscapes and often know more about the location of archaeological sites than professional archaeologists. These activities can result in large, privately held archaeological collections that could undoubtedly add to our understanding of the prehistory and history of the state (Rowe 2019). OWSA frequently gets calls or messages from people throughout the state with photos or descriptions of artifacts they have collected and about which they would like more information. We seldom, however, get provenience information. Furthermore, the photos are often difficult to interpret, and people are generally unsure of what additional data they need to record to get the best information possible from us. Also, Wyoming landowners are wary of archaeologists and government agencies in general. Many mistakenly believe that a state archaeologist can seize their land or their artifact collections if they report the presence of archaeology on their own private property.

OSWA created two programs, Summer Ventures and the Wyoming Avocational Archaeology Training Program, to fulfill our statutory obligations, engage the public in archaeological projects, dispel misconceptions about archaeology on private property, and provide the public with the archaeological knowledge and skills they need to properly identify and record artifacts and sites in the field. The Summer Ventures program is aimed at middle school and high school students, and the Wyoming Avocational Archaeology Training Program is aimed at anyone over the age of 15. These structured field educational programs need to be interactive, participatory, flexible, and open to a wide range of skills, interests, and demographics. They also need to be able to be instituted in different locations throughout the entire state of Wyoming. By integrating different geographic, temporal, and topical foci in any given year, we can encourage repeat participants while ensuring that each new participant will have a similar yet distinct experience each time. Moving the weeklong experiential field sessions each year not only allows for interested

individuals from different parts of Wyoming to participate without having to travel to other states to gain a similar experience but also ensures that we reach as many of the population centers of Wyoming as possible.

To ensure that both the Avocational and Summer Ventures programs meet the needs of rural communities, we work with local organizations, avocational societies, and schools to advertise, identify areas of interest, and solicit feedback for each program. These community partners areessential as OWSA's biennial appropriation from the state doesnot provide any additional funding for outreach programs. Our staff work with local schools to advertise the program during the school year. Online advertising via social media and flyer postings in local businesses are used to reach larger audiences, including people who visit Wyoming as tourists during the summer months. These public interactions have changed from inception to implementation and continue to impact the design of these programs. Below, we outline the pilot iterations of these programs and how they continue to be modified to better suit the rural needs of Wyoming's citizens.

CASE STUDIES

Avocational Archaeology Training Program

OWSA has a long tradition of accepting adult volunteers on many of its previous informal public archaeology projects. Although these sessions allowed participants to engage with the archaeological process, they were limited in their educational impact because the focus of the work was timely completion of the project. The Wyoming Avocational Archaeology Training Program was created to make these field experiences more meaningful to volunteers while maintaining the integrity of the investigation itself. Our primary goal with this program is to train an army of citizen scientists to help us survey and record sites on state and private land across the state. We want to reach as many people as possible by moving the program around the state with the assistance of the nearest active chapter of the Wyoming Archaeological Society (WAS).

To achieve these goals, OWSA based our initial concept for the program on Colorado's Program for Avocational Archaeological Certification (PAAC; History Colorado 2020). Colorado's program is formal and requires a significant amount of classroom education with exams and related fieldwork. We modified the PAAC program for Wyoming audiences, initially called it the Wyoming Avocational Archaeological Certification program, and visited all of the active WAS chapters around the state over the course of one year to present the program concept and solicit feedback. Following the presentations, we handed questionnaires to each participant and asked:

- the duration of membership with their WAS chapter;
- their age;
- which of our activities they have previously participated in;
- whether they have volunteered for other archaeological programs and, if so, what types of programs;
- what training opportunities they were interested in;
- · their optimal class length and subjects of interest;
- whether they would participate in online classes;

- preferred class type (in-person lecture, online lecture, classroom activities, online activities, or field-based training); and
- primary motivation for completing the program.

Several professional archaeologists who are members of WAS also provided verbal feedback about the program.

The 132 WAS members who responded to the questionnaires were mostly over the age of 50 (~73%) and had belonged to their respective WAS chapters for durations ranging from several years to several decades. Of these respondents, 86% expressed interest in hands-on field-based classes where they learned scientific archaeological methods by doing archaeological survey, excavation, or artifact curation alongside professional archaeologists. Only 7% were interested in classroom-based learning through lectures and graded exams. The professional archaeologists who provided verbal feedback during informal conversations in this initial research stage expressed concern about the word "certification" in the title of the program. Following conversations at the 2019 SAA Annual Meeting with the Public Education Committee Network of State and Provincial Archaeological Coordinators, the Public Archaeology Interest Group, the Archaeological-Collector Collaboration Interest Group, and the National Association of State Archaeologists regarding their avocational programs, we became aware that some were having problems with people who completed an avocational archaeology certification program asserting that they were qualified as professional archaeologists to obtain permits to conduct archaeological investigations on federal lands-not fully understanding the distinction. Based on this feedback, we modified Wyoming's program significantly so that it reflected something that our avocational archaeologists would attend. We removed any mention of "certification" and now refer only to "training" so that completing our courses would not be confused with being certified as a professional archaeologist. We also changed the name of the program to the Wyoming Avocational Archaeology Training Program.

The Avocational Program is currently a relatively informal program for people 15 and older that includes three courses: Survey, Excavation, and Curation. The research questions and goals of all of these courses are guided entirely by community partner needs and interests. They are all hands-on and do not include classroom lectures or exams. We advertise the programs through Facebook (https://www.facebook.com/search/top/?g=office%20of%20the% 20wyoming%20state%20archaeologist&epa=SEARCH_BOX) and Eventbrite, and people can register for free with no deposit required. We started by capping capacity for the curation course at 12 participants, the survey program at 10 participants, and the excavation program at six participants, but we modify those numbers to suit the specific projects and locations. The costs of our first and second weeklong programs were approximately \$800 for food and \$250 for a vehicle rental. Accommodation and cost of fuel varied by location. Accommodation was \$150 for our first iteration of the Survey Course because we stayed at a public-land campground, and it was free for the first Curation Course because we hosted it in our lab in Laramie. It was \$1,500 per week for our second Survey and Excavation Courses because we rented a house with a kitchen to better serve the expected number of attendees. The small amount of field kit necessities cost us about \$35 per person. Advertising remains free through community partners and social media, and the major equipment is already owned by OWSA.



FIGURE 1. Jill Buck records the location of a lithic scatter using baseline offset mapping with a distometer inside the entrance chamber of the Ice Cave in the Big Horn Mountains. Photograph by Marieka Arksey.

Survey and Excavation Courses. For the Survey and Excavation Courses, all training is conducted in the field at camp, either in the area to be surveyed or at the site to be excavated. All Survey and Excavation Courses follow the same basic format. Participants arrive at camp Sunday night for a welcome dinner and initial project orientation. The morning of the first day is training on survey or excavation procedures followed by a guided field trip to a local, well-known archaeological site. The next three days are completing survey or excavation, and the last night is a banquet dinner at which we hand out branded merchandise and program completion certificates, solicit verbal feedback about the program, and socialize. The final morning, we provide breakfast, and everyone travels home.

In August 2018, we held our first five-day Survey Course at the Ice Cave in the Bighorn Mountains, Wyoming. The Ice Cave is located in a remote area of the Bighorn Mountains approximately two hours from the nearest town. We had organized this program with the Absaroka Chapter of the WAS in Cody, Wyoming, and advertised it during our WAS presentations over the previous year and at the state WAS meeting in May 2018. Tickets for this program sold out online, and the Absaroka Chapter had an additional nine people sign up as its annual field trip. Two of the nine Absaroka Chapter registrants showed, and all but one of the Eventbrite registrants showed. We also ended up with four more participants who did not preregister but were friends and family of our staff. In sum, we had 15 participants from Wyoming and northern Colorado ranging in ages from 25 to 70 along with three of our office staff. We provided camping at the Bald Mountain Forest Service campground, located 33 miles east of Lovell, Wyoming, and about one hour from the Ice Cave. The Bald Mountain campground has pit toilets and potable water but no

additional amenities. We provided and prepared all of the food from Sunday evening to Friday morning, so we needed to be fully outfitted with equipment and provisions to feed 18 people for almost one week at a rural Forest Service campground without having to restock. The preplanning and shopping for this program was both intense and time consuming, and it required the use of an enclosed box trailer for transport and field storage of food and cooking equipment.

On day one, we trained everyone at the campground on feature sketch mapping, mapping with Trimble and Garmin handheld GPS units, field site and artifact photography, basic artifact identification and attribute recording, and Wyoming archaeological survey and site recording procedures. In the afternoon, we took a field trip to the nearby Medicine Wheel and had a guided tour from one of the Bighorn National Forest interpretive rangers. On days two through four, we caravanned one hour each way to the Ice Cave over extremely rugged two-tracks, surveyed the canyon where the Ice Cave is located, sketched a stone circle within the Ice Cave, mapped the cave, and recorded a lithic and historic debris scatter within and immediately outside of the Ice Cave. On the last day, we held a final banquet at which we handed out branded T-shirts, hats, stickers, and program completion certificates; solicited verbal feedback from everyone about the program; and socialized.

In June 2019, we organized our second five-day Survey Course and our first five-day Excavation Course in extreme northeastern Wyoming. Both were on private properties in the area at the request of the landowners who had contacted our office, and both were previously unidentified or untested sites. We advertised the programs through Facebook events and Eventbrite and at the May 2019 Annual WAS Meeting. We did not organize these programs



FIGURE 2. WAS members learn how to point plot artifacts the analog way in an excavation unit at the Courchaine Bison Jump. Photograph by Marieka Arksey.

with the closest WAS chapter (Pumpkin Buttes Chapter, Gillette, Wyoming) as field trips, and we did not travel around the state to the various WAS chapters and advertise to those members as we had done when we were first developing the Avocational Archaeology Training program. We provided camping at the Beulah Campground, which is an improved campground with RV hookups, tent sites, showers, and pit toilets. The Excavation Course sold out online, but only seven of the 10 tickets for the Survey Course were claimed. As with the previous year, all of the registrants were from northern Colorado or Wyoming. However, three people who registered online for the Survey Course and one person who registered online for the Excavation Course canceled before the event, and none of the remaining people who registered online for either event through Eventbrite actually showed up, despite our having been in contact with several up until the day before regarding camping facilities and dietary requirements. We tried contacting the no-shows through their e-mail addresses provided to Eventbrite to see why they did not make it, but no one responded. Luckily, we had one paid intern, two paid student employees, several volunteers from the Pumpkin Buttes Chapter of WAS, and numerous local federal agency archaeologists, professional archaeologists on their days off, and members of the general public who found us through our daily social media posts join us to complete the projects.

Upon reflection, we consider the 2018 Ice Cave survey program a success based on the positive verbal feedback that the participants provided. One rated us with five stars on Facebook and said, "I just finished attending their first Avocational Training session at the Ice Cave. The experience was amazing, the instruction professional, and instructors bar-none" (Facebook post/rating August 19, 2018). We have remained in contact with several other Ice Cave survey participants, and some have engaged in several of our subsequent events or volunteer opportunities. We had one minor knee injury in the ice cave that sent one individual home early and one flat tire on the rugged two-track access road that needed to be repaired, but otherwise the program went smoothly. We did not run out of food, no one got sick, and the weather cooperated in a high mountainous area where it can snow in mid-August. The 2019 Survey and Excavation Courses were successful community-based archaeology programs, but we did not meet the specific goals of the Avocational Archaeology Training program. Although none of the people who registered online showed up, we did manage to attract enough local volunteers that we did not have enough work to go around, and we completed the projects' research goals. The lack of registrants attending, however, meant that we unnecessarily spent a lot of our annual budget on a week's worth of food and facilities to accommodate training and the preparing of meals for a large



FIGURE 3. Our youngest volunteer works alongside two OWSA interns to excavate the bone bed at the Courchaine Bison Jump. Photograph by Marieka Arksey.

group of people—as well as time and effort planning the project, educational workshops, and meals.

Curation Courses. All curation training is conducted by the staff of the only federal repository in the state of Wyoming. These training sessions have taken place at the repository, at a Wyoming museum, or at a state park that has requested our assistance in curating its collections. We have had participants come from all over the state, ranging in age from 12 to 76. Our first session was a one-day, seven-hour training, in which we had 12 participants and three supervisors from the repository staff. Activities included

archival research, inventory of artifacts (including object type, material type, find location data, and other relevant curatorial data), cleaning, labeling, bagging/storing, and photography. Because many participants did not have any previous field experience, they found some of the provenience data difficult to reconcile, so we spent quite a bit of time going over the basics of archaeological field methods. Other concepts that needed to be explained included why we keep objects such as debitage and why it is not acceptable to mix contexts. Each situation provided us with the opportunity to explain how archaeologists interpret data to understand the past. We issued formal exit surveys for the first session.



FIGURE 4. A volunteer measures projectile points using digital calipers and records the data during the Curation Course. Photograph by Marieka Arksey.

Although the general feedback was positive, participants felt that trying to cram all of the training into one day was exhausting and the ratio of participants to supervisors (4:1) was too high.

The second session of this course took place at the Wyoming Pioneer Memorial Museum in Douglas. It was modified to be spread over two days, with the first morning including a trip to an active archaeological excavation so that participants could see firsthand how archaeologists collect their data and artifacts, and why such precision is important. Only half of those that registered for the curation course showed up, even after reopening the registration and having new registrants signing up online until the day before. With this smaller group of only six participants, we had a 2:1 participant-to-instructor ratio, and the results of this unplanned low-attendance combined with the modified format were more successful than the first session. Participants found the length of time in the lab enjoyable and the instruction informative as well as fun. It was also less stressful for the supervisors.

Summer Ventures

Summer Ventures is an entirely new style of program for our office, designed to expand our reach to 10- to 15-year-olds—a

demographic with which we have had limited interaction in the past. The program, similar in structure to other K–12 summer day camps, introduces students to archaeology through structured hands-on activities over the course of a week. Each year, we partner with different agencies and community partners to provide a range of learning experiences. Under this format, participants work alongside archaeologists, historians, historic preservation specialists, geologists, and other professionals while learning what archaeology is, how archaeology informs us about the past, and why preserving these resources is important. It also introduces individuals who may be considering archaeology as a career to the discipline.

The costs for our first three-week-long programs were approximately \$300 for food and \$250 for a vehicle rental. The cost of fuel varied depending on location. Camping was free through community or public land partnerships, advertising was free through community partners and social media, and the equipment was already owned by OWSA.

To date, there have been three sessions of the Summer Ventures program. For the first session in 2017, we partnered with the BLM and the Wyoming SHPO to conduct investigations of the Pine Grove Stage Station, a nineteenth-century stagecoach station 30 minutes outside of Rawlins, Wyoming. Participants engaged in pedestrian survey, metal detecting, auger testing, remote sensing surveys, and excavation. The second year, we partnered with Wyoming State Parks to hold the field session at Fort Fetterman, just outside of Douglas. During this field session, students engaged in excavation, mapping, and profile drawing. The 2019 field session was again held at Pine Grove, where students engaged in excavation, mapping, and profile drawing. No formal assessments were conducted at the conclusion of the three Summer Ventures sessions. The attendance rates were low enough that participants and their parents were simply asked if they enjoyed themselves overall, what aspects they enjoyed the most, what aspects they didn't enjoy, whether they felt they learned something new, whether or not they might consider becoming an archaeologist or studying a related field later on in school, and whether or not they would want to join us again if we were working in their area.

In the 2017 session, the three participants got a breadth of experience. In our end-of-session conversation, all said that they had had a good time and enjoyed all activities, but some parts more than others (only one enjoyed the auger testing!). One was considering archaeology in college. The parents responded to our e-mail follow-up with praise for the program and the overall enjoyment and learning experience for their children.

The second summer, we had three participants again who joined us at a local fort managed by the state. One participant was the child of one of our contract employees, one was curious and looking for something to do, and one was considering a career in paleontology and "figured the methods would be about the same" and so joined us to see if the process would be enjoyable. The results this time were more mixed, with one participant finding the program less enjoyable than the other two. Efforts were made to identify different ways to engage this participant, and although some were successful, the participant quickly lost interest in the activities. Furthermore, participants required almost constant supervision to prevent inadvertent destruction of the site. This session reiterated for us that with children, the ratio for supervisors to participants for in-field activities needs to be as



FIGURE 5. SHPO archaeologist Richard Currit supervising the Summer Ventures 2017 crew during excavation at the Pine Grove Stage Station on the Thayer ranch. Photograph by Marieka Arksey.

close to 1:1 as possible. Otherwise, the project runs the risk of being chaotic and ruining the experience for others.

Our third session in 2019 was less successful in terms of the number of participants. We had six signed up, but one had to drop due to illness, and four were unable to attend due to a delayed cattle-branding season. Our one participant (one of our participants from the summer before) got the full attention of the five supervisors who were present for this project and—apart from one really long last day—had a great time again, despite starting to question becoming an archaeologist after all.

Despite low attendance, the overall goals of this project have repeatedly been met: children are participating in active archaeological sites, getting in-depth and hands-on learning experience with real data that would otherwise be out of their reach, enjoying themselves during the process, and—whether or not they want to pursue archaeology beyond their week with us—gaining an appreciation for heritage preservation and why it is beneficial for both them and for archaeologists to protect sites for their information values. The low attendance is a continuing concern for us, however. Given that OWSA runs these programs free of charge, the entirety of the funds for these projects come from an annual budget that has not increased over the years to account for these needs. As with other agencies and institutions working with public funds, we are seeking ways to increase our attendance to justify what we feel is a worthwhile pursuit.

DISCUSSION

Based on feedback, we will probably not modify the educational format of the programs themselves because the format seems to

work for our rural audiences. We do, however, need to choose enticing locations for the Avocational Program, such as the Ice Cave, to ensure that we draw in a large enough audience to warrant the cost given our limited budget. For the 2020 Avocational Program and Summer Ventures sessions, the biggest plan we have is to modify our advertising and registration strategies by selecting the ones that proved successful for the 2018 Ice Cave survey. Specifically, we will

- (1) increase face-to-face advertising at local WAS chapters;
- (2) begin advertising earlier in the year (especially if we are to increase our in-person communications);
- (3) increase targeted advertising in nearby communities, such as in newspapers and with flyers;
- (4) invite double the number of individuals we hope to attract;
- (5) select projects and sites that are more enticing to a general audience;
- (6) continue with this past summer's strategy of social media blasts to encourage spontaneous attendees; and
- (7) require a deposit for registering, which will be returned on the first day if the registrant shows up.

In general, our programs are still in their early stages, and we are still heavily modifying them after each session. We hope to continue them in the long term and to update our results and guidelines in the future. However, we have already learned several lessons that apply to developing and maintaining public programming, specifically in rural communities:

 Know your audience and its goals (and know that you will not get it right the first few times regardless of your research).



FIGURE 6. Summer Ventures participants at Fort Fetterman mapping in their first find: one of the large sandstone blocks making up the foundation of one of the old barracks buildings.Photograph by Marieka Arksey.

- (2) Talk to other neighboring areas or those with similar demographics for advice.
- (3) Be self-reflexive, flexible, and prepared to make massive adjustments along the way—especially because many rural populations' work and family needs are tied to unpredictable seasonality.
- (4) Never underestimate the power of in-person communication and promotion because making that effort leaves a lasting impression on any audience and allows you to stay informed of people's seasonal obligations.
- (5) Open communication, mutual respect, and lasting relationships with private individuals, organizations, foundations, state and government agencies, and local resource centers can make or break your program.
- (6) Recognize and accept that some institutions or facilities will not have the resources to support or help recruit for your program; try not to rely on them but perhaps return to them at a later date when they are able to devote more time.
- (7) If people have to make a significant amount of effort to join you, your offering some clear rewards, high-value outcomes, or an exciting site will make it worth their while.

(8) Although you may need impressive numbers to justify your programs to your funding bodies or board, a great experience for a few individuals can have a greater overall impact than a mediocre experience for a large crowd.

CONCLUSION

Wyoming's passion for history, archaeology, collecting, and preservation provides us with an audience eager to learn more about the archaeological process and acquire the skills they need to properly identify and record artifacts and sites in the field as citizen scientists. The rural, agricultural community that makes up the overwhelming majority of the state, however, has provided the Office of the Wyoming State Archaeologist with some challenges when it comes to successfully developing and modifying proven programs from out of state that meet the needs and desires of this community. Over the past three years, we have tried to bring hands-on learning experiences in various aspects of archaeology to a diverse demographic to encourage a tactile experience that is more conducive to learning the archaeological process than other virtual experiences can provide. Constant feedback and a willingness to be self-reflexive and modify our programs to suit each unique combination of session location, local community, and learning experience have meant that despite some very obvious setbacks, our programs are gaining followers around the state, and we are fielding expressions of interest via phone, e-mail, and social media as early as January of each year. One of the most important takeaways from our experience is that the older, more traditional means of communication (face-to-face, flyers, local newspapers and radio) are not only still valid but just as essential in rural communities as more modern means of communication (social media. websites, e-mail). We will continue to evaluate our programs based on the feedback we get, and we are hopeful that they will continue to meet our shared goal of preserving Wyoming's history.

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Data Availability Statement

Formal paper-based surveys were conducted during the preparation of these programs. Data were gathered and analyzed in Microsoft Excel. The data have not been published other than as summaries in this article.

Formal paper-based exit surveys were conducted after two of the programs in this article. Data were gathered and analyzed in Microsoft Excel. The data summaries are being published in this article for the first time.

REFERENCES CITED

Barker, Bruce O., and Robert F. Hall

1994 Distance Education in Rural Schools: Technologies and Practice. Journal of Research in Rural Education 10(2):126–128.

Brant, Lachelle

2016 Three Ways That Rural States Can Become the Hotbeds for School Edtech Innovation. EdSurge: Personal Learning Networks. Electronic document, https://www.edsurge.com/news/2016-08-29-three-ways-thatrural-states-can-become-the-hotbeds-for-school-edtech-innovation, accessed January 22, 2020.

Buffalo Bill Center of the West

2020 Skype in the Classroom. Electronic document, https://centerofthewest. org/learn/school-programs/skype/, accessed January 22, 2020.

DeMarrais, Elizabeth, Chris Gosden, and Colin Renfrew 2004 Rethinking Materiality: The Engagement of Mind with the Material World. McDonald Institute for Archaeological Research, Cambridge.

Di Giuseppantonio Di Franco, Paola

2014 Rethinking Materiality: The Engagement of Mind with the Material World. PhD dissertation, World Cultures Department, University of California, Merced. Available from UC Merced Electronic Theses and Dissertations, https://escholarship.org/uc/item/931833px.

History Colorado

2020 Program for Avocational Archaeological Certification (PAAC). Electronic document, https://www.historycolorado.org/paac, accessed January 22, 2020.

Malafouris, Lambros, and Colin Renfrew

2010 The Cognitive Life of Things: Recasting the Boundaries of the Mind. McDonald Institute for Archaeological Research, Cambridge, England.

Ratcliffe, Michael, Charlynn Burd, Kelly Holder, and Alison Fields 2016 Defining Rural at the U.S. Census Bureau: American Community Survey and Geography Brief 1(8):1–8. U.S. Census Bureau, Washington DC. Electronic document, https://www2.census.gov/geo/pdfs/reference/ua/ Defining_Rural.pdf, accessed August 12, 2020.

Rowe, Christopher M.

2019 With Landowner's Permission: An Examination of Archaeological Trends between Public and Private Land in Crook County, Wyoming. Master's thesis, Anthropology Department, University of Wyoming, Laramie. Available from Dissertations & Theses, University of Wyoming.

State of Wyoming

2020a School Programs. Electronic document, http://wyomuseum.state.wy.us/ Learn/Programs.aspx, accessed January 22, 2020.

2020b [2019] Wyoming Statutes: Title 36, 2019. Electronic document, https:// www.wyoleg.gov/StateStatutes/StatutesDownload, accessed January 24, 2020.

U.S. Bureau of Labor Statistics

2019 May 2018 State Occupational Employment and Wage Estimates: Wyoming. U.S. Bureau of Labor Statistics, Washington, DC. Electronic document, https:// www.bls.gov/oes/current/oes_wy.htm, accessed January 22, 2020.

U.S. Census Bureau

2020 2010 Census Urban and Rural Classification and Urban Area Criteria, List of Population, Land Area, and Percent Urban and Rural in 2010 and Changes from 2000 to 2010, Table: Percent Urban and Rural in 2010 by State. U.S. Census Bureau, Washington, DC. Electronic document, https:// www.census.gov/programs-surveys/geography/guidance/geo-areas/ urban-rural/2010-urban-rural.html, accessed January 22, 2020.

Vincent, Carol Hardy, Laura A. Hanson, and Carla N. Argueta

2017 Federal Land Ownership: Overview and Data. Congressional Research Service, Washington, DC.

Zahn, Gail, and Michelle Buchanan

2002 Supporting Teachers of Children with Autism Using Distance Education and Video Portfolios. *Rural Special Education Quarterly* 21:21–25.

AUTHOR INFORMATION

Marieka Arksey and Greg Pierce Jefferson Patterson Park and Museum, 10515 Mackall Road, St. Leonard, MD 20685, USA (marieka.arksey@maryland. gov, corresponding author; greg.pierce@maryland.gov)

Marcia Peterson Office of the Wyoming State Archaeologist, 1000 E. University Drive, Laramie, WY 82071, USA (marcia.peterson@wyo.gov)