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Museums for America

Sample Application MA-30-17-0400-17
Project Category: Collections Stewardship
Funding Level: $25,001-$500,000

Wesleyan University
Davison Art Center

Amount awarded by IMLS: $120,092
Amount of cost share: $121,091

Attached are the following components excerpted from the original application.

- Abstract
- Narrative
- Schedule of Completion

Please note that the instructions for preparing applications for the FY2018 Museums for America grant program differ from those that guided the preparation of FY2017 applications. This year, the maximum that may be requested from IMLS is $250,000. Be sure to use the instructions in the FY2018 Notice of Funding Opportunity for the grant program and project category to which you are applying.

Digital Imaging at the Davison Art Center, Wesleyan University, for Discovery, Access, and Use

Abstract

The Davison Art Center, Wesleyan University will continue to execute high-quality, rapid digital photography of key parts of its holdings during three summers; will prepare 4,000 new images for collection management and educational access; and contingent on rights, will place as many as possible online for public viewing in DAC Collection Search and downloading as DAC Open Access Images, as well as providing them to aggregators of museum images. This will build upon and advance the DAC's ongoing successes in rapid photography of works on paper, which constitute most of its collection of 25,000 objects used extensively for teaching, study, and exhibition.

As of 2012, we had digital images of only several hundred objects, impeding our ability to serve our mission to properly manage and provide access to the collection. This also had preservation implications, by requiring more physical access to objects than would be needed if images were available. With University-funded imaging in 2013 and a Museums for America grant for digitization in the summers of 2015–2017, we are making significant progress. In the first two years of the current grant, we have created digital images of 3,231 European and American prints, more than doubling the number of objects represented in this way. More than 2,500 of these new images are rights-clear and online, or soon to be, as DAC Open Access Images, more than doubling the number of those images to 4,500 by late fall 2016. The proposed grant will enable us to continue this proven momentum in rapidly digitizing our collection.

In each of the project's three years, we will prepare and implement a six-week period of systematic, rapid photography of works in strategically chosen areas of the collection. A team of six—a temporary project photographer, two temporary project imaging specialists, two student assistants, and the project director (who is full-time staff)—will work together to create and prepare digital images. Before each summer, and with an aim of providing early-career experience for qualified emerging museum professionals whenever possible, the project director will hire the other five team members. He also will convert the DAC gallery into a temporary studio. After each summer, he will make all suitable images available as DAC Open Access Images and as zoomable images in DAC Collection Search, and he will convey them to aggregators such as Artstor for discovery and use alongside images from other museums.

The intended results of the project are another 4,000 accurate images created, prepared, in place for collections stewardship, and (for rights-clear objects) provided as high-resolution DAC Open Access Images and contributed to image aggregators. Measures of success will include counts of objects represented by high-quality images; web analytics from DAC Collection Search; download metrics for DAC Open Access Images; and statistics from image aggregators. These measurable outcomes will gain context and nuance from qualitative information communicated to the DAC by some of the people who use these images in teaching, learning, research, or publication.

The project will have a major impact on our ability to serve strategic goals of the Davison Art Center and Wesleyan University, by enabling more effective educational access to objects and images. It will support stewardship by enhancing our ability to preserve, and provide access to visual documentation of, thousands more objects. It will create positive outcomes for people who teach with and learn from images. And, by creating more DAC Open Access Images, it will enact and promote open content policies that offer access to museum images for all people who can use the web.

Digital Imaging at the Davison Art Center, Wesleyan University,
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Narrative

1. Project Justification

What do you propose to do?

The Davison Art Center, Wesleyan University will continue to execute high-quality, rapid digital photography of key parts of its holdings during the summers of 2018, 2019, and 2020; prepare at least 4,000 new images for collection management and educational access; and contingent on third-party rights, place as many as possible online for public viewing in DAC Collection Search and downloading as DAC Open Access Images, as well as providing them to aggregators of museum images.

This project will build upon and advance the DAC's success in rapid photography of works on paper, which constitute most of its collection of 25,000 objects used extensively for teaching, study, and exhibition. This successful experience began in 2013, with our first six-week rapid imaging project. It is continuing with the support of an IMLS Museums for America grant for imaging each summer in 2015–2017. With two of those three years of capture completed, that project is on track to create more than 4,000 new images of collection objects over its three years. The proposed grant will continue the significant momentum of this digitization work into 2018–2020.

What high-priority collections-related need, problem, or
challenge will your project address and how was it identified?

Founded in 1952, the Davison Art Center exists as a department of Wesleyan University and holds Wesleyan's collection of more than 25,000 works on paper, chiefly prints and photographs. The print collection is among the finest at any U.S. university, with strong representation of European and American prints. Formal and informal learning take place at the DAC. We manage our holdings in the collection management system EmbARK (Gallery Systems), where most objects are represented by item-level records and some in group-level records. Most object records contain only text, and as of 2012, we had digital images of only several hundred objects. These images were of high quality, but the tiny number of objects with images impeded our ability to serve our mission through efficient discovery and targeted access to objects.

Our first, University-funded iteration of rapid imaging in 2013 brought our count of objects represented by images to more than 2,100, or 8% of the collection. Those images became invaluable for discovery, access, and use. This demonstrated both the value of imaging to stewardship and our capacity to execute it at speed and at scale. In the first two years of our Museums for America grant for digitization in the summers of 2015–2017, we have created images of 3,231 European and American prints. This already more than doubles, to 5,326, the number of objects with images. More than 2,500 new images are rights-clear and online, or soon to be, as open access images.

Our long-term aim is to provide online images of all objects in the collection, with some 15,000 of them having higher priority. This is based on utility for teaching and learning, importance, scarcity, rights status, and other factors, along with the need to photograph large groups (entire runs of solander boxes) for efficiency. We plan to image major parts of the collection over about ten years of summer projects.

Continuing this proven momentum for another three years (years 5–7) will be of

immense value to our ability to serve our mission. By working systematically through more of the collection, the project will address needs including improved collection management, more targeted access to objects, and improved discovery of holdings.

Past work has focused on single-sheet, non-oversize, European and American prints. Imaging in 2018 will begin by continuing digitization of hundreds of American prints (count is pending work in 2017). Key areas of the collection poised for capture in 2018–2020 include 578 Japanese prints, of which more than 510 are *ukiyo-e* woodcuts; more than 600 Piranesi prints in bound volumes, modifying our shooting setup to handle bound material, with a conservator's advice; some 200 other prints in bound volumes, including an extra-illustrated Manet volume; and certain 19th-century photographs, including works by Julia Margaret Cameron. This initial foray into our photograph holdings will both produce images and enable us to tune our capabilities with different material surfaces (e.g., regarding cross-polarization). If time allows, we may also prepare for future work by setting up to capture certain oversize objects.

Two factors drive the target of 4,000 objects. First, past summers' counts range from 1,269 (in 2016, due to a challenging factor noted below) to 1,989 (in 2015, when all went smoothly). Those holdings included sets and series, which are faster to shoot, so future counts may be a bit lower; but an average target of 1,400 each summer is realistic for matted prints, including contingency time. Second, work in 2018–2020 will grow to include object types—prints in bound volumes, works with glossy surfaces— which we have not yet shot. These may take more time at first for process tuning.

Who or what will benefit from your project?

Our selection process gives weight to areas of the collection which we know faculty often use for teaching, and supporting that is our first aim. The project will benefit Wesleyan faculty and students, museum staff, visiting researchers, and other teachers, learners, scholars, artists, and diverse web users. By reducing the need for access to objects simply to see what they look like, only to rule them out for some purpose, and by creating a baseline visual document of object condition at the time of this project, it will serve preservation and any conservation that may be considered in the future.

More than 7,000 DAC Open Access Image downloads have been made to date, and we receive publications from some grateful image users—for example, the Terra Foundation for American Art used our open image of Marguerite Gérard's *Au Genie de Franklin* in *Picturing* (ed. R. Z. DeLue, *Terra Foundation Essays* 1, 2016). Another use was of a Delacroix *Faust* image in the project *Display At Your Own Risk,* which critiqued museum image rights policies and ranked the DAC policy in their top category.

In addition to the benefits derived from images themselves, whenever possible the project also offers early-career opportunities to help grow the field. The Specialist position is targeted to emerging cultural heritage professionals when other selection factors are equal. Some recent Specialists have secured longer-term, related positions at institutions including the Corning Museum of Glass and Northwestern University.

We welcome visits by university staff and students from departments planning to launch digitization work with their different types of collections, so they can observe our studio and procedures. Wesleyan's Digital Projects Librarian visited with a student in 2015, and the Archaeological Collections Manager did so with a student in 2016.

Beyond campus, in 2016 we contributed digitization metrics to the Digital Library

Federation Day of Data, and we plan to do so again in coming years. Data for museum materials may be especially useful to have in that context. We openly share a growing number of technical documents in the hope that people in other institutions may find them useful as sources of ideas for other projects. These include downloadable PDFs of our File Specifications, File Naming, Open Access Policy, and Technical ReadMe.

How will your project advance your institution's strategic plan?

The project will advance the strategic plan in *Wesleyan 2020* (see Strategic Plan) and the DAC's mission to serve the University. "Energize Wesleyan's distinctive educational experience," the first goal in *Wesleyan 2020,* sets forth "Increase opportunities for using collections in teaching" as one strategy for enhancing "faculty's capacity for mentoring students and for producing research." These opportunities rely on in-person access to objects and online access to information including images. With its deep ramifications for collection stewardship in regard to discovery, access, and the use of objects and images of them, this is the key connection between institutional strategy and this grant. Also, Goal 3 in *Wesleyan 2020* is to "Work within a sustainable economic model while retaining core values." This project will do just that. It will maximize the strategic return on a targeted investment in digitization, done in ways that serve core values.

The Davison Art Center Mission Statement guides all of our work in serving the University's strategic goals. The project will serve all four components of DAC mission:

- To provide the students of Wesleyan University with the opportunity to study art and material culture through the use of primary visual sources….

- To preserve, acquire, interpret, and exhibit works of art and material culture that support the educational mission of the museum, and to observe the highest professional standards….

- To promote academic and public access to its collections….

- To foster scholarly research related to the museum's collections and exhibitions….

How will your project address the goals of the Museums for America
program and the Collections Stewardship project category?

By strengthening our ability to serve our public, or in fact our publics, this project will have institutional impact in regard to the strategic goals above. It will be based on in-depth knowledge of current best practices in the rapid, accurate, and safe imaging of works of art on paper. It is designed to consist of a sequence of logical, interrelated imaging activities that address our key need for accurate digital images of more objects in the collection. It will have demonstrable results, as discussed below. And it is aligned with the Collections Stewardship category's inclusion of projects that address state-of-the-art work in areas including digitization, which is the focus of this project.

2. Project Work Plan

What specific activities, including evaluation and
performance measurements, will you carry out?

In each of the three years, the DAC will prepare for and implement a six-week period of rapid photography of works in strategically chosen areas of the collection. A team of six will create and prepare the images in the ways explained in detail below.

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What are the risks to the project and are they accounted for in the work plan?

The risks to the project are chiefly related to:

• *Scheduling factors with a small museum staff.* Based on three years of experience in managing competing demands on permanent staff during these summer imaging projects, that risk has proven to be manageable through careful advance planning.

• *The lack of a permanent imaging studio.* Each year, we fine-tune how we convert our gallery into a temporary studio. This works well, and we have experience in noticing, diagnosing, and mitigating any odd issues that arise because it is a temporary space.

• *Coordination with other University departments.* We communicate in advance with stakeholders with whom coordination lessens any risk of external factors impeding production. This includes contact with Wesleyan ITS about network load and server space, Physical Plant about nearby facilities work, Human Resources and Public Safety about project staff arrangements, etc. This groundwork is crucial and it works well.

• *The need to execute each year's imaging in a tight six weeks with a temporary team.* A team member may have a life issue that impedes preparation or availability. In 2016, we weathered our first instance of this. A death in the family of that year's photographer understandably led him to arrive much less prepared than planned. There was lost productivity, but we learned that the project can survive that adversity.

• *Digital preservation.* This is addressed below. Its short-term counterpart, robust access to live assets during production, is designed into the project. Capture files are stored on a RAID 1 array, with automated backup to another array; all working files are on at least one array; and by the end of each day, all capture and process files are on at least two such arrays: one with automated network backup and one intentionally offline.

Who will plan, implement, and manage your project?

Staffing consists of five temporary employees and Project Director Rob Lancefield, who is a full-time Wesleyan employee as Manager of Museum Information Services and Registrar of Collections (part of our permanent staff of two full-time and one half-time employees). The Project Director handles all planning; studio configuration; temporary staff searches, training, and supervision; systems administration; art-storage access; troubleshooting; and overall quality assurance. He has substantial experience in collection digitization. Long active in the community of museum imaging professionals, he has excellent access to the best knowledge in that field.

The temporary staff are the Imaging Project Photographer, who executes a systematic process developed with reference to image quality guidelines known as FADGI (Federal Agencies Digitization Guidelines Initiative) and Metamorfoze; two often early-career Imaging Project Specialists, who process images, embed metadata, add images to our collection system, and make derivatives; and two Imaging Project Assistants, current or just-graduated Wesleyan students we train to perform standard DAC procedures for the tracking and safe handling of art objects for photography.

Our experience in past summers gives us empirical knowledge of how best to execute intensive imaging at the DAC; a demonstrated capability for high-quality execution on time and on budget; and a record of structuring projects in which students and emerging professionals learn and gain experience while working.

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When and in what sequence will your activities occur?

We will carry out an annual cycle of activities in each December–November project year. Having run three such cycles, we know this is realistic and achievable. The early phases of each cycle are hiring project employees (December–March); determining what objects will be photographed and flagging database records for rights issues, conservation concerns, cataloging updates, etc. (March–May); and reconfiguring our gallery into a studio (June). The main period of mid-June to late July includes training project employees; preparing and photographing objects in systematic groups, with a reference target and ID strip in each shot; returning objects to storage; processing images; performing in-process quality control and occasional re-shoots; and adding images to our collection management system. Later phases include decommissioning the studio (July); performing final quality control and vetting of images, metadata, and rights (September); adding rights-clear images to DAC Collection Search and DAC Open Access Images for public discovery, viewing, and download (October); and conveying suitable images and metadata to aggregators (November).

What financial, personnel, and other resources will you need to carry out the activities?

The project's chief cost is personnel. We are able to contribute a primary cost-share of the directly relevant part of the Project Director's salary and benefits for project-specific work (see Budget Justification for detailed calculation), as well as $1,000 each year toward compensation for the photographer. In order to execute this ambitious schedule within the constraints of our facility and commitments to academic-year programming, we need outside funding chiefly to cover compensation for the three temporary employees and two student project assistants each summer.

Beyond personnel, the needed resources include time as mapped out above, facilities (chiefly our gallery as the temporary studio), and equipment. We will need to replace our Nikon camera body, purchased in 2013 and used intensively each summer. We will contribute, outside the formal budget, use of all relevant DAC imaging equipment, from photographic lights and lenses to local hard disk arrays for image storage (well over $10,000 of equipment, mostly purchased in 2013), and significant use of extant, multi-purpose computers, displays, and digital storage. We also claim no direct cost-share for the use of workspaces we dedicate to the project each June and July, and which are maintained at those times to their year-round standards of climate and security, or for the use of Wesleyan IT infrastructure for image transport over the campus network, offsite backup, and online delivery of additional images each year.

How will you track your progress toward achieving your intended results?

We track progress on two time scales. First, we track daily and weekly numbers of objects shot and images, to know how quickly work is going and identify bottlenecks in need of resolution. Second, we track annual and total numbers of objects shot and images made. We contextualize those metrics with reference to the types of objects involved (some being faster or slower to shoot well and safely) and their rights status.

How and with whom will you share your project's results?

We will share results with three main communities: cultural heritage professionals, people who use images for teaching and learning at Wesleyan and beyond, and the wider public. The Project Director participates in three yearly museum conferences:

the Museum Computer Network (MCN) conference, Museums & the Web (MW), and the American Alliance of Museums (AAM) annual meeting. While it is not possible to know this far in advance what information he will share at those events, he will strive to share results at all of them, and in online spaces for cultural heritage professionals.

For the educational community, we will perform campus outreach, post email announcements to relevant lists, and use other forms of electronic communication to share news of significant new groups of images. We will share news of our results with the public via press releases and other means. We will acknowledge IMLS assistance in all publications, presentations, and other products resulting from the project. All such DAC products will reference IMLS and include the associated grant award numbers.

An illustration of results-sharing beyond DAC spaces is an invited guest post by the Project Director on the blog of Simon Tanner (Supporting Document 6). Focused on scale and strategy in providing open content from museums, the post carefully acknowledges the vital role of our current IMLS grant in supporting image creation.

3. Project Results

Referring to your Project Justification, describe your project's intended results
that will address the need, problem, or challenge you have identified.

The intended results of the project are 4,000 accurate images of collection objects— created, prepared, in place for collections stewardship, and (for rights-clear objects) provided as DAC Open Access Images and contributed to Artstor. We will measure success by means of the object and image counts noted above; analytics from DAC Collection Search; download metrics for DAC Open Access Images; and any available statistics from image aggregators. These measurable outcomes will gain context and nuance from qualitative information communicated to us by some of the people who use these images in teaching, learning, research, and/or publications (from which, for example, we add bibliographic citations to object records in our collection system).

The project will have significant benefits for the Davison Art Center and Wesleyan University. It will support better stewardship by enhancing our ability to preserve, and to provide access to visual documentation of, thousands more collection objects. It will support positive outcomes for people who teach with and learn from images. And it will create many new DAC Open Access Images, enabling all people who have web access, regardless of their own geographical locations, to study and use those images.

Along with the diffusion of knowledge the images will support through use in teaching, learning, research, and publication, the project is structured to enable students and emerging museum professionals to learn and gain experience while executing the work. All other qualifications being equal, we strive to hire project employees who are at an early stage in their careers. This creates two broad types of outcomes: those which come about through the images, and those which come about through the things early-career museum professionals learn while working here.

How will the care, condition, management, access to, or use of the museum
collections and/or records that define the focus of your project improve?

The project will improve the care and management of, as well as access to, DAC collection objects and address high-priority issues through two types of activities

central to the Collections Stewardship category: digitization, as well as enhancing our collections database content to improve collection management. It will improve both discovery and access, as well as having the indirect preservation benefits noted above.

What tangible products…will result from your project?

Our tangible products will be the 4,000 digital images, made available for use in all appropriate ways. These images also will improve existing resources. Object records that have only text will be visually enriched, and more images will be accessible for comparative study with images from other museums that contribute to Artstor.

How will you sustain the benefit(s) of your project?

The project will give us year-over-year opportunities to develop sustainable practices by iteratively tuning workflows, testing results with objective assessments of image accuracy, and building on this in subsequent projects to digitize more DAC holdings. We will sustain these process-oriented benefits through workflow documentation.

We will sustain access to the images themselves by rapidly integrating them into larger in-house resources—our back-end collection of master digital image files, our collection management system, DAC Collection Search online, and DAC Open Access Images—for which we have standard management and backup protocols in place.

For example, DAC Master TIFFs and Use TIFFs (see File Specification for details) will be archived with redundant primary storage on two RAID arrays (one RAID 1 plus one RAID 6), with automated offsite backup via University systems. SHA-2 checksums of TIFFs in the RAID 6 datastore are automatically made and checked with AVPreserve Fixity software; if Fixity were to report an error, we would perform diagnostics on the array and check that file on a different array. Core information about Master TIFFs, with checksums, will be stored in our collection system. That system's data file and the text files of the TIFF checksums all have automated backup (see Digital Product Form).
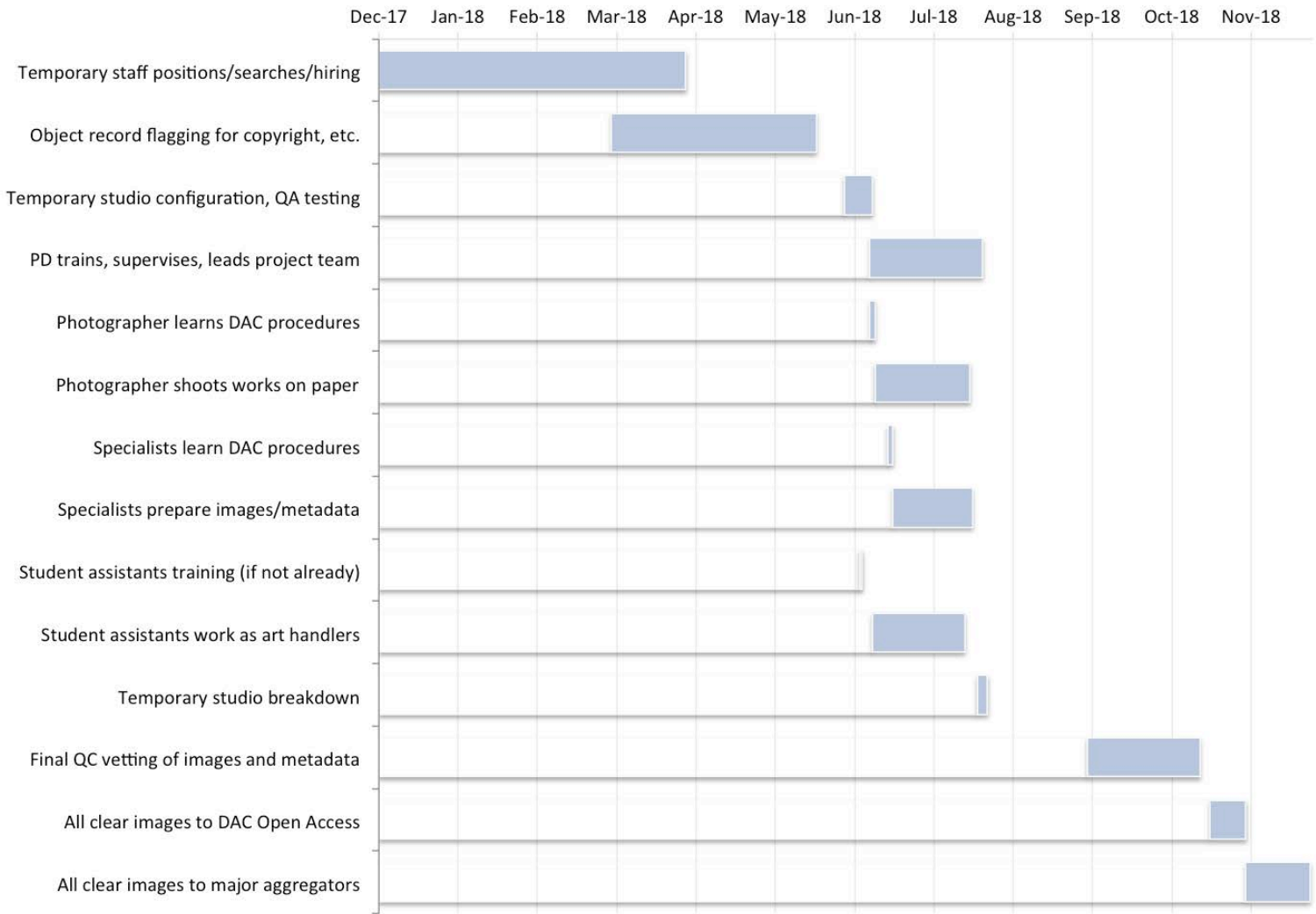
Sustaining the benefits of deliverable (as distinct from preservation) files involves making them usable in new contexts. The specifications with which we prepare and deliver certain derivatives will evolve as technologies do. Because we archive Use TIFFs as production masters, we can automate this. For example, we deliver navigable, high-resolution images on the web using Zoomify. We plan to move at some point to tools based on the International Image Interoperability Framework (IIIF). Also, we make and use thumbnail images with a maximum dimension of 249 pixels, based on a document from the Association of Art Museum Directors. The AAMD has declared that to be a legacy document; so we continue to use those dimensions for consistent integration into DAC Collection Search, but someday we will batch-regenerate somewhat larger thumbnails and integrate them into a future iteration of DAC Collection Search.

In summary, this project will have a major, sustainable impact on our ability to serve our strategic goals by sharing new images for educational use by faculty, students, staff, and image users online. It will improve our collection stewardship by enabling more precisely targeted physical access to the many objects represented by the new images, with the added benefit of documenting their current condition in a basic way. And, by adding materially to the number of DAC Open Access Images we can share with the public, the project will further enact and promote open content policies that offer access to museum images for all Americans, and all people, who use the web.

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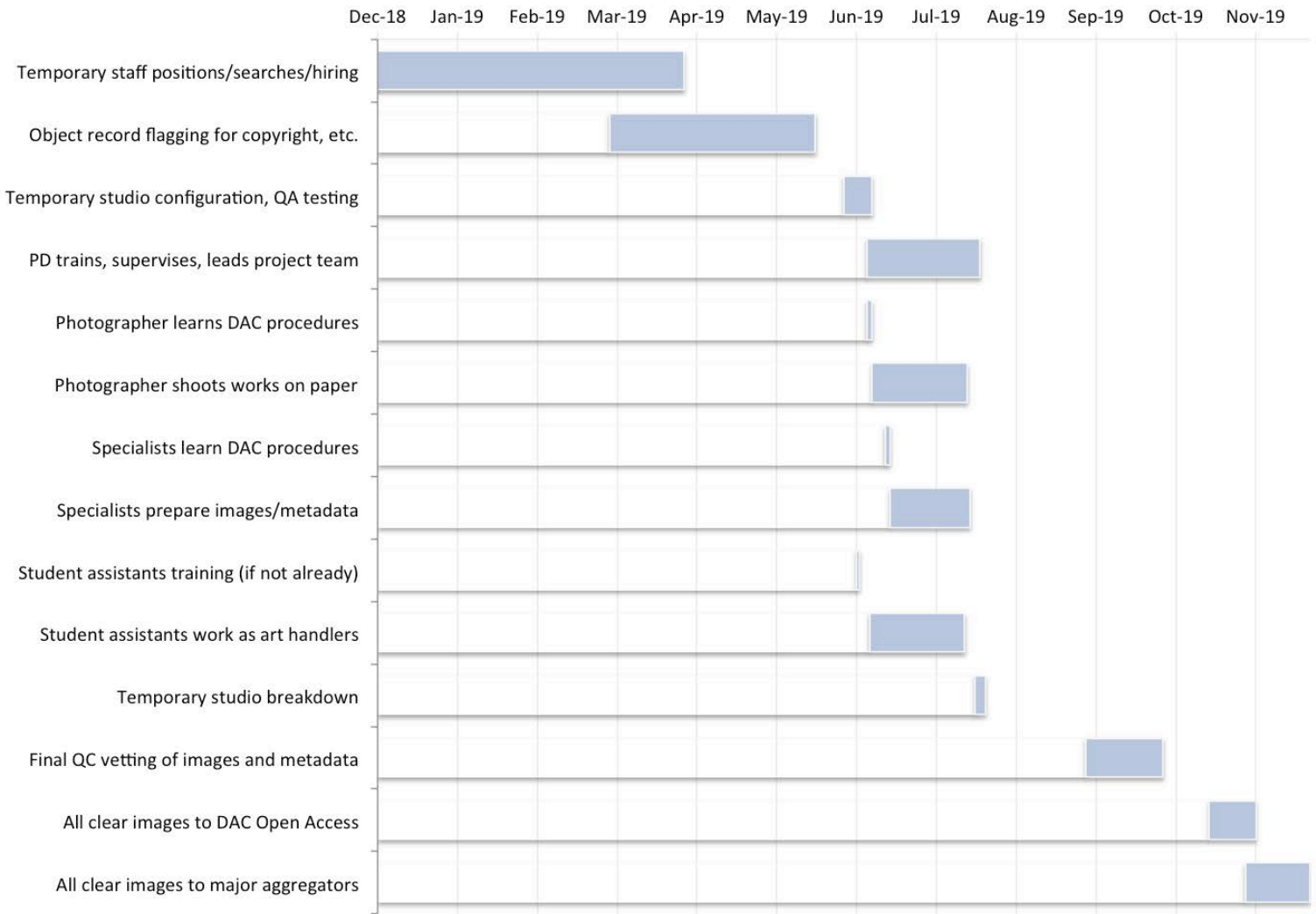
Schedule of Completion, Year 1 of 3

Digital Imaging at the Davison Art Center, Wesleyan University,
for Discovery, Access, and Use: Year 1 Schedule

	Dec-17	Jan-18	Feb-18	Mar-18	Apr-18	May-18	Jun-18	Jul-18	Aug-18	Sep-18	Oct-18	Nov-18
Temporary staff positions/searches/hiring	████	████	████	██								
Object record flagging for copyright, etc.				███	████							
Temporary studio configuration, QA testing							█					
PD trains, supervises, leads project team								████				
Photographer learns DAC procedures								▏				
Photographer shoots works on paper								███				
Specialists learn DAC procedures							▏					
Specialists prepare images/metadata								███				
Student assistants training (if not already)							▏					
Student assistants work as art handlers								███				
Temporary studio breakdown									▏			
Final QC vetting of images and metadata											████	
All clear images to DAC Open Access												██
All clear images to major aggregators												██

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Schedule of Completion, Year 2 of 3

Digital Imaging at the Davison Art Center, Wesleyan University,
for Discovery, Access, and Use: Year 2 Schedule

Digital Imaging at the Davison Art Center, Wesleyan University,
for Discovery, Access, and Use

Schedule of Completion, Year 3 of 3

Digital Imaging at the Davison Art Center, Wesleyan University,
for Discovery, Access, and Use: Year 3 Schedule