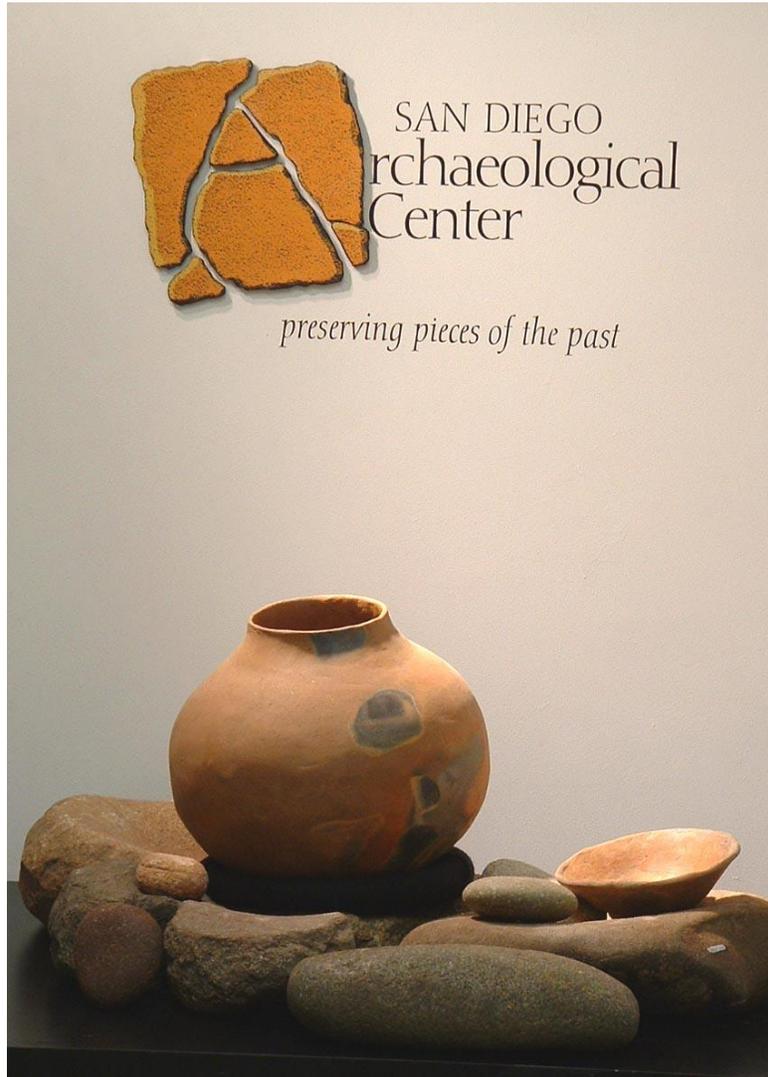


Collection Preparation Guidelines



April 2017

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The San Diego Archaeological Center reserves the right to modify or append this manual without notice.

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CENTER CURATORIAL OBJECTIVES

The mission of the San Diego Archaeological Center is to preserve archaeological collections and promote their educational, scientific and cultural use to benefit a diverse public.

The San Diego Archaeological Center (Center) is committed to the preservation of our archaeological legacy and serves as a curation technology resource to federal, state and local government and private companies. The Center maintains archaeological collections in accordance with:

- The Center's Code of Institutional Ethics;
- The Center's Collections Management Policy;
- The Center's NAGPRA Policy;
- The Center's Emergency Preparedness and Response Plan;
- The Center's long-term curation contracts;
- The Curation of Federally-Owned and Administered Archaeological Collections (36 CFR Part 79);
- The State of California Guidelines for the Curation of Archaeological Collections (1993);
- Native American Graves Protection and Repatriation Act (NAGPRA);
- National Park Service *Museum Handbook*, Part I, Museum Collections;
- American Indian and culturally affiliated group advice; and
- Professional museum and archival practices and any other relevant and appropriate recommendations as to the care of archaeological collections and archives.

A certain degree of standardization in collection preparation, cataloging, packaging and organization is necessary in order to preserve collections, facilitate future research and maintain inventory control. It is not the goal of the San Diego Archaeological Center to dictate research design, field methodology or laboratory procedures to cultural resource management companies, but to work hand-in-hand with procedures already in practice while meeting the above standards.

The main objectives of the collection preparation guidelines are to:

- Preserve artifacts in their original condition;
- Maintain respect for the cultures represented in collections;
- Prevent deterioration of artifacts from human and environmental causes;
- Assure personnel safety;
- Make collections accessible and individual artifacts retrievable;
- Preserve the history of archaeology in our community;
- Encourage the use of collections in the future;
- Justify the expense of archaeological data recovery; and
- Preserve the efforts of archaeologists.

QUALIFIED CURATION FACILITY STATEMENT

The San Diego Archaeological Center is a qualified curatorial facility under the criteria set forth in the Curation of Federally-Owned and Administered Archaeological Collections (36 CFR Part 79) and the State of California Guidelines for the Curation of Archaeological Collections (1993).

RECOMMENDED MINIMUM CURATION STRATEGIES 2008

The San Diego Archaeological Center (Center) is dedicated to fulfilling the intent of the California Environmental Quality Act (CEQA) to preserve examples of the major periods of California history [§21001(c)] and to offset the impact of land development pressures on cultural resources. The Center is committed to the preservation of our archaeological legacy and serves as a curation technology resource to federal, state and local government and private companies.

Over the years, millions of archaeological artifacts have been recovered from public and private lands in California. Very few of these artifacts have been curated in the past. At the present time the collections curated at the Center do not constitute a complete representation of regional history as a whole. Because of the site-specific nature of mitigation carried out under CEQA and NEPA, rather than a regional approach, the Center advocates the curation of complete collections in accordance with the State of California Guidelines for the Curation of Archaeological Collections (1993) and the following minimum curation strategies:

Research Design

A written plan that provides the rationales, goals, and methods for investigations of archeological sites should be incorporated into all Environmental Impact Reports and Mitigated Negative Declarations incorporating mitigation measures for archaeological resources. The research design should be made available for public comment and must accompany the collection presented for curation at a qualified facility. The Center requires that any mitigation requirements mandated by the lead agency accompany the collection to the Center.

Collections Must be Curated at a Qualified Repository

A facility such as a museum, archaeological center, laboratory, or storage facility managed by a university; college; museum; other educational or scientific institution; a federal, state, tribal, or local government agency; or private institution (e.g., corporation or association) that can provide professional, systematic, and accountable curatorial services on a permanent basis in accordance with the guidelines provided under "Criteria for Qualified Repositories" in the State of California "Guidelines for the Curation of Archaeological Collections" (1993) and/or 36 CFR 79.

Assembling Collections

The Center recognizes the cumulative effect of excavation and advocates the preservation of all excavated material, unless there is strong scientific, cultural and ethical reason for doing otherwise. The cost of curation alone must not be the determining factor in the elimination of material, as the legal mandate requires mitigation of the adverse impacts of the project to the level of insignificance.

The decision to curate should be based principally upon the value of cultural materials for future research, heritage appreciation, education and interpretation. These values may vary in accordance with:

- The type of prehistoric or historic archeological resource investigated;
- The research goals of the investigation;
- Concerns of culturally affiliated groups;
- The distinctive curatorial goals of the repository;
- Specific regional goals specified in historic preservation plans, and
- Other factors that may be unique to a particular site type or collection.

1. Curation Required

It is the Center's position that the following cultural materials should be curated:*

- Historic, mass-produced items if they are complete or nearly-complete; or have unique identifiers and have interpretive, exhibition or research value—regardless of the quantity of “duplicate” items in the collection. More consideration should be given to the quantity of mass-produced items at particular sites, which can demonstrate the socioeconomic, ethnic or regional history—especially when compared to other sites in the immediate and distant areas.
- Fragmentary objects with diagnostic attributes;
- Material with residues, chemicals, or elements potentially useful for future studies; and
- All pre-historic or pre-contact artifacts.

*Exceptions may be granted after discussion with Center staff, regarding the frequency of a certain artifact class in the Center's collections as a whole.

2. Curation Not Required

It is the Center's position that, following discussions between the project archaeologist and Center staff, curation may not be necessary for the cultural materials if it is agreed that they are:

- Hazards to health and safety;
- Deteriorated beyond its ability to be preserved, importance for scientific research, heritage appreciation, or educational value;
- Too recent to qualify as historical; or
- Meet the requirements for repatriation.

3. Sampling

It is the Center's position that certain bulk artifact/ecofact classes may be sampled before curation. These include bulk shell, bone too fragmentary to be identified by species, historic mortar and certain common building materials, flat glass sherds and rusted metal fragments. Soil samples should be processed prior to curation. An adequately representative sample of the material should be curated and the amount culled documented and recorded, along with its final disposition, in the final records. The Center recommends that deaccessioned artifacts should be placed in a responsible institution or reburied at the original site if possible.

4. Documentation of Non-curated Material

In the event that all recovered materials will not be curated, the deaccessioned or culled material must be adequately documented (including photo documentation) and recorded as deaccessioned and its final disposition must be noted in the permanent records, i.e. catalogue and project report.

5. Associated Documentation

The Center will curate any and all material related to a collection including, but not limited to the following:

- Administrative records, correspondence, newspaper articles, etc.
- Field records, including logs, procedure manuals, forms, maps, etc.
- Laboratory records, procedures, methods of analysis, etc.
- Reports, research hypotheses, professional papers, final reports
- Photographs, slides, negatives, photo logs
- Digital media
- Audio or video media
- Related research material, old site reports, etc., and
- List of field and laboratory staff, consultants and culturally affiliated monitors or consultants.

FEE SCHEDULE

The San Diego Archaeological Center has created a curation fee structure based on a desire to encourage the curation of archaeological collections. No two projects are alike and we have been told that it is difficult to estimate curation fees during the bidding process. Nevertheless, funding for the curation of existing and future archaeological collections must become an integral part of the mitigation or academic archaeological process. Archaeologists, although not trained in curation, must take the responsibility to see that curation occurs. Budgets for development projects or academic research are remiss unless there is a line item for curation. Without curation after excavation, collections are lost. The San Diego Archaeological Center is willing to help you introduce the concept of curation to development agencies and to negotiate funding for curation.

The Center originally adopted a per-box fee structure, which still seems to be the most appropriate mechanism and is the most widely accepted method nationally. In our fee structure we have attempted to take into account the “average” collection and an average distribution of artifacts in a collection.

San Diego Archaeological Center Curation Fees April 2017	
Accessioned collections packaged in accordance with the Center’s Collection Preparation Guidelines	\$800 per regular box* \$175 for quarter-box collections \$170 per oversize object
Curated collections (curated under 5-year, renewable curation contracts)	\$200 per box first year, \$75 per box per year thereafter
Revitalization (bringing collections up to 36 CFR Part 79 standards)	\$250 per box

San Diego Archaeological Center Curation Fees April 2017	
NAGPRA assessment	\$150 per box

*A regular box is a standard 15" x 12" x 10" archival storage box, **30 pound weight limit**

CENTER COLLECTIONS

Collections Curated at the Center

Collections accepted for curation will be placed under one of the following designations:

Accessioned Collections: Accessioned collections are owned by the Center. These collections were excavated during an academic or professional archaeological mitigation project and have become the property of the Center through an Accession Agreement.

Contract Collections: Federal and State agencies retaining ownership to curated collections may enter into a five year renewable Curation Contract with the Center to meet the curation provisions of 36 CFR Part 79 and State of California Guidelines for the Curation of Archaeological Collections. Title of contract collections remains with the contracting agency.

Loans: Title of loaned collections remains with the lender. Any requests for use, repatriation or actions outside of the loan agreement must be in accordance with the Center's Collections Management Policy and cleared by the lender.

Geographic Areas Served

The Center was established to acquire and curate archaeological collections representative of the region's entire history. Collections accepted for curation or accession may include any objects and associated documentation considered to have archaeological significance. The Center Board of Trustees has the right to accept or refuse any collection or object for curation or accession as it sees fit.

Collections Originating from San Diego County: The Center may accept historic and pre-contact period collections excavated from within San Diego County for accession or under curatorial contracts provided that they are in keeping with the mission statement and the provisions of the Center's Collections Management Policy. Acceptance of archaeological collections from within San Diego County has priority over collections originating from outside San Diego County.

Collections Originating from Outside San Diego County: The Center may accept collections originating from outside of San Diego County provided that governmental agencies and culturally related groups are in agreement that the collections may be curated outside of the county of origin.

Collections Not Accepted for Curation or Accession

- The Center will not accession collection material determined by the Center Director or Collections Manager as hazardous to the health or safety of the staff.
- The Center will not accept contested collections or those without complete provenience information.
- The Center is attempting to locate and curate “orphan collections,” those collections excavated years ago before curation was available. In some cases, the collection owner may be in doubt or difficult to locate. Center staff will work with the CRM firm to establish which party is the appropriate signatory for title. However, the Center cannot and will not accept collections for curation or accession until arrangements have been made to secure title.
- The Center Board of Trustees has the right to accept or refuse any collection or object for curation or accession as it sees fit.

NAGPRA Compliance

The Center is committed to the standards set by the Native American Graves Protection and Repatriation Act (NAGPRA) and promotes the repatriation of human remains, funerary objects, sacred objects or objects of cultural patrimony to the rightful descendant groups. Collections curated at the Center will undergo a thorough examination to confirm that the Center has not retained NAGPRA eligible items. If NAGPRA eligible items are found, the Center will contact the descendants and begin consultation and repatriation procedures.

All collections accepted for curation undergo NAGPRA assessment at the Center. The Center has been guided by Native American Tribes as to what objects will be requested for repatriation. **It is important that the final reports mention inadvertent finds of burials or sites of ceremonial importance so that we can be aware of the possibility that items eligible for repatriation may be in the collection.**

CONVEYANCE PROCEDURES

Required Collection Documentation

The Center has a strict policy when accessioning new collections or entering into curation contracts. New collections delivered to the Center must contain a site report, master catalogue, information about inadvertent discoveries, a list of deaccessioned items with supplementary documentation, and conveyance documents. If items are missing on delivery, the collection will be held pending by the Center for thirty days. If proper documentation is not supplied, the collection will be returned to the CRM firm until all criteria are met.

The San Diego Archaeological Center uses several legal instruments to attain the rights to curate or accession archaeological collections. The CRM firm must provide the required signatures on the appropriate documents. If you are not sure of which document to use, or who should sign, please call the Center for consultation. *(For your convenience, digital templates for the documents listed below are available.)*

Accession Agreement: An Accession Agreement is used when the archaeological collections will become the property of the Center and will be accessioned into the permanent collections. The Accession Agreement documents the transfer of title, project details and collection details and affirms that the collection was prepared in accordance with these guidelines. The CRM Firm cannot sign this document because they do not have the authority to give title of the collection to the Center. The accession fees may be paid directly to the Center by the collection owner, or the fees may be paid by the CRM firm as a pass-through.

Signatory: Collection Owner

Curation Contract: A Curation Contract is used when the collection owner wishes to retain title to collections and contract the Center to provide curatorial services. All Curation Contracts must be negotiated between the Center and the collection owner and must be signed by the collection owner; the CRM firm will usually not be involved. For most collections coming in under a curation agreement, the curation fees must be paid directly to the Center by the collection owner and may not be paid as a pass-through via the CRM firm.

Signatory: Government Contractor

Deed of Gift: The San Diego Archaeological Center may accept individual objects and collections from various sources using a Deed of Gift. The Deed of Gift is usually reserved for objects or collections donated to the Center from private collections for use in the education program. In most cases, these are objects that were not excavated as part of a formal mitigation process.

Signatory: Collection Owner

Transfer Agreement: A Transfer agreement is used when the archaeological collection will be curated at the Center under an existing curation agreement. The CRM firm should call the Center to make sure that a curation agreement exists before attempting to transfer the collection. The Transfer Agreement documents the person, company, or agency that will retain title to the collection, project details and collection details and affirms that the collection was prepared in accordance with these guidelines. The CRM firm is not generally responsible for curation fees in this case, as they would have been negotiated previously with the collection owner.

A Transfer Agreement would most commonly be used for collections excavated from Federal lands during a Federal project. The Center is the designated repository for several Federal agencies and has many existing contracts to provide curatorial services. Recently, there have been several undertakings on Federal lands for non-federal projects. The Federal landowner is still responsible for the long-term curation of any resulting collections, but may opt to require that the developer pay for the first several years of curation. These details should be negotiated in advance by the Federal agency, the developer and the Center.

Signatory: Cultural Resource Management Firm Representative

COLLECTION PREPARATION

Artifact Preparation: Cleaning, Conservation & Bagging

Cleaning

As investigational technology advances, it is prudent to treat artifacts conservatively to avoid loss of evidence of original use. It is recommended that cleaning of artifacts be limited to dry brushing or washing in distilled water when deemed necessary. Artifacts washed in water should be dried in the shade or at room temperature, never heated to dry. If other methods of cleaning are used, the exact material, i.e., formula of cleaning solution, brand name, concentration, etc., and procedures used should be documented in the report or catalogue. If a special cleaning technique is used as part of the research study, this should be carefully documented. If radical methods are to be used which may change the artifacts in any way, they should be documented thoroughly and a representative sample of untreated material preserved.

Conservation

Only the minimal treatment should be performed for objects undergoing conservation. Treatment should not modify the unique nature of the object. In addition, the restoration or conservation process must be reversible, restored areas must be detectable (but not necessarily obvious), evidence of former use, e.g., wear, repair, etc., must not be altered and all restoration must be carefully documented and catalogued with the object. If an artifact must be treated in such a way that it will be permanently altered, a representative sample in untreated condition should be preserved.

Use of Adhesives

Reconstruction of bone, ceramic, lithic or other artifacts requires the use of archival-quality adhesives. Any adhesive used for reassembling objects must be reversible. The Center recommends Paraloid B-72 or HMG. Under no circumstances should tape, white glue, rubber cement, epoxy, glue stick or other non-archival adhesives be used. These products are unstable, not removable and may harm the object.

The following guidelines are offered for the most common types of artifacts found in the San Diego region. More specific information is available upon request at the San Diego Archaeological Center:

Animal Bone: It is recommended that bone should not be washed, as it might crack during the drying process. For the same reason, damp bone should be allowed to dry slowly at room temperature once removed from moist earth. Fragile specimens may be stabilized with Acrysol and packed in padded containers. Animal bone objects too large to be placed in a bag or box should be individually labeled using the guidelines below, taking care not to label bone on articular surfaces, pathologies or in areas with evidence

of butchering. Bone fragments or small items should be bagged, labeled and boxed using the guidelines below.

Ceramic: It is recommended that ceramics should not be routinely washed, as fugitive evidence of vessel contents may be lost. Dry brushing is preferred, taking care not to remove flaking paint, decoration or spalling clay. If washing is to be done, document the solution and method used in great detail, including the time immersed in solution, method for drying, etc. A representative sample of unwashed ceramic should be preserved with the collection. If ceramics are to be reassembled, use the guidelines below for adhesive recommendations. Ceramic objects too large to be placed comfortably in a bag or box should be individually labeled using the guidelines below. Ceramic fragments or small items should be bagged, labeled and boxed using the guidelines below.

Chronometric Material: Analyzed and unanalyzed archaeomagnetic plaster cubes will be curated. The cubes should be carefully labeled and bagged and stored away from large metal objects, such as metal shelving or machinery. Unanalyzed dendrochronology and radiocarbon samples should not be placed in plastic bags, but placed in tightly closed paper bags or aluminum foil. Thermo luminescent samples with surrounding matrix should be bagged, labeled and boxed, taking care not to expose the sample to excessive heat or light.

Exotic Artifacts: Exotic artifacts such as manufactured historical artifacts, pitch, rubber, entomological specimens, etc., may require specialized preparation. The rule of thumb is to be conservative. Objects should be dry, as free of dust and dirt as possible and packaged in a stabilizing manner. Seek assistance from the San Diego Archaeological Center Collections Manager when questions arise.

Faunal Material: It is recommended that leather, horn, hair, hoof and other faunal material should not be washed. Dry brushing is preferred. Faunal material should be allowed to dry slowly at room temperature, never heated to dry. Oils, leather preparations, consolidants or other preservatives should not be used. Faunal objects too large to be placed comfortably in a bag or box should be individually labeled using the guidelines below. Faunal fragments or small items should be bagged, labeled and boxed using the guidelines below.

Flotation Samples: All processed flotation residues, whether formally analyzed or not, will be curated. Processed flotation samples should be allowed to dry slowly at room temperature. All unprocessed flotation samples from burial contexts, living floors and hearths will be curated. It is recommended that approximately 50 percent of unprocessed flotation samples from unspecialized areas in the site be curated. The remainder may be deaccessioned prior to curation with full documentation made. All curated flotation samples should be bagged, labeled and boxed using the guidelines below. Bags should not be filled over two-thirds full to avoid breakage. Double bagging may be appropriate in some cases.

Human Remains: In cases where Human Remains are discovered in the field or when the collection is in the lab, they should be treated with the utmost respect and procedures subsequent to inadvertent discoveries should be followed. If the collection is going to be accessioned at the Center, the Center will take responsibility for preparing NAGPRA inventories and notification and eventual repatriation. If the collection will be curated at the Center, we can contract with the collection owner for NAPGRA services. In either case, it is essential for the Center to be notified of any possible NAGPRA-related items in a collection prior to or at the time of curation so that they can be properly handled. Please contact the Center for further information or questions.

Metal: It is recommended that metal objects should not be washed, as water will hasten corrosion. In the same vein, acids, chemicals or other cleaning solutions should not be used, as it is unknown what reaction they will have with existing metal oxides and corrosion. Dry brushing is preferred, taking care not to remove fixed corrosion, paint, plating or other surface material. Metal objects too large to be placed comfortably in a bag or box should be individually labeled using the guidelines below. Metal fragments or small items should be bagged, labeled and boxed using the guidelines below. Metal objects with sharp points or edges should be double bagged. Different types of metal should not be bagged together, as this may hasten corrosion. Metal objects should not be placed in aluminum foil.

Pollen Samples: Processed pollen samples will be curated in liquid glycerin preparations with ortho-phenylphenol added to inhibit growth of microorganisms and tightly sealed in glass vials. All unprocessed pollen samples from burial contexts, living floors and hearths will be curated. It is recommended that approximately 50-100 grams of unprocessed soil for pollen samples from unspecialized areas in the site be curated. The remainder could be deaccessioned prior to curation with full documentation made. Unprocessed pollen samples (pollen and soil) should be bagged, labeled and boxed using the guidelines below. Bags should not be filled over two-thirds full to avoid breakage. Double bagging may be appropriate in some cases.

Shell: It is recommended that shell not be washed. Drying brushing is preferred, taking care not to remove any evidence of etching, pitch, lacquer or pigments. Shell fragments or small items should be bagged, labeled and boxed using the guidelines below. It is recommended shell midden be sampled at different levels at any percentage that seems appropriate to the qualified professional.

Soil Samples: Unprocessed soil samples probably have limited research potential over time, especially when they have not been packaged appropriately in the lab. The Center has had to deaccession soil samples from existing collections because of mold and lack of provenance. If soil samples are to be collected and curated unprocessed, it is recommended that sample size be limited to 50-200 grams. The soil should be thoroughly dry before being bagged. All soil samples should be double bagged, with labels applied to both bags. The soil samples should be catalogued on the Master Catalogue with all provenance information.

Stone: Stone artifacts should not be routinely washed, as fugitive evidence of use may be lost. It is recommended that ground stone and mineral specimens not be washed. Dry brushing is preferred, taking care not to remove micro flakes or scratch the object. Concretions not removed by brushing should be left in place. If washing is to be done, document the solution and method used in great detail, including the time immersed in solution, method for drying, etc. A representative sample of unwashed stone should be preserved with the collection. Stone objects too large to be placed comfortably in a bag or box should be individually labeled using the guidelines below. Lithic fragments or small items should be bagged, labeled and boxed using the guidelines below.

Vegetal Material: It is recommended that vegetal materials not be washed. Dry brushing is preferred, taking care not to break or tear the object. Artifacts should be allowed to dry slowly once removed from the ground, taking care to observe for insect activity. If insect activity is observed, isolate the object and contact a conservator. Preservatives, oil, consolidants or other chemicals should not be applied. Vegetal objects, such as baskets or mats, too large to be placed comfortably in a bag or box should be individually labeled using the guidelines below. Vegetal fragments or small items should be bagged or placed in vials, labeled and boxed using the guidelines below

Preparing the Collection Catalogue

Numbering Artifacts

Every item or group of like items, in a collection must have a unique catalogue number. For example, a biface excavated from site CA-SDI-5496 in 1998 could have the catalogue number CA-SDI-5496-1998-14. A bag of bulk shell can be given one number. However, if the shell in the bag has been speciated or separated in any way, each bag should have an individual number. This can be done by adding a numerical suffix to the catalogue number.

Example: CA-SDI-1234-243.01. Note: When using a suffix to indicate additional items under a catalogue number, remember that if you have 10 or more items you must use a 0 placeholder in the suffix for numbers XX.01 to XX.09. If you enter XX.1 for the first item, it will look like XX.10 on the catalogue! Letters are prohibited as they will not sort correctly in the catalogue.

Note: Individual objects or bags of related objects do not have to be numbered in ordinal order throughout the collection. For example, all lithics need not be catalogued before cataloguing faunal bone, etc.

Master Catalogue Format

The Center utilizes Microsoft Excel to produce catalogues. All Center catalogues consist of 12 fields relating to site or vault location, research potential, or contain valuable information that explains the origin, type, or specific information about a specific artifact. The catalogue should be consistent with the following guidelines:

- Catalogues should contain at least 12 fields
- Text in each of the fields is to be in Times New Roman or Arial 11pt.
- Text and number fields are to be formatted as such.
- Abbreviations or unclear nomenclature should not be used in the fields. Refer to the Collection Catalogue Data sheet.
- All information should be Center justified except the Comments Field which is left justified.
- Each Master Catalogue will contain a header with the full title of the project, site number, year of excavation, and the date the Catalogue was created. For formatting information see the example below.
- Each Master Catalogue will also include a footer that includes the date the Catalogue was printed, page number, number of pages of the entire Catalogue, and the text “Acid-Free Paper.”
- Each Master Catalogue will include three additional pages listing Missing/Deaccessioned Items, NAGPRA related material and oversize objects (as needed).

EXAMPLE OF CATALOGUE FIELD HEADINGS

Site #	Cat #	Recovery Type	Unit #	Level	Material Class	Object	Material	Qty	Wt_g	Box No	Comments
--------	-------	---------------	--------	-------	----------------	--------	----------	-----	------	--------	----------

DESCRIPTION OF FIELD HEADINGS

SITE NUMBER	Listed as SDI-#####, W-###, or P-37-#####
CATALOGUE NUMBER	A unique number for each item or group of like items. The Catalogue numbers are in ascending whole number values. Decimal numbers may only be used when a Catalogue number contains fragments of the same artifact type. (i.e. 1.1, 1.2, 1.3 etc.)
RECOVERY TYPE	This refers to the type of archaeology that was used to locate artifacts. This will be indicated in the reports as Surface, Shovel Test pit (STP), unit 1x1, feature, coordinate, etc.
UNIT # OR LOCATION	The numbered Unit, STP, Feature, etc. recorded in the project report
LEVEL	Depth at which the artifact was located, 0 cm(surface), 0-10 cm, etc.
MATERIAL CLASS	Broad artifact category, e.g., shell, ceramics, chipped stone, etc. (refer to the Collection Catalogue Data Field sheet)
OBJECT NAME	What is it? Button, projectile point, sherd, etc. (refer to the Collection Catalogue Data Field sheet)
MATERIAL	What is it made of, what species, what type: Metal, Tizon, Donax, Unspeciated, etc. (refer to the Collection Catalogue Data Field sheet)
QUANTITY	How many objects are associated with this number?
WEIGHT	Weight of the artifact or artifacts. Weights are written to the tenth of a gram
BOX NUMBER	Which box the artifact will be curated in. Or, if the item is missing, deaccessioned or otherwise not in the collection.
COMMENTS	Special information, such as text, color, modification, etc. usually added by the CRM archaeologist but can be used to explain

changes in the Catalogue

Catalogue Example (w/ Header & Footer):

Created on: 5/19/2008											
Excavations at Pine Tree Estates CA-SDI-6804 Excavated 2006 Master Catalogue											
SITE #	CAT #	Recovery Type	UNIT #	LEVEL cm	MATERIAL CLASS	OBJECT	MATERIAL	Qty	Wt_g	BO X	COMMENT S
SDI-5498	1	Unit	3	Surface	Shell, modified	Bead	Olivella	1	0.5	2	
SDI-5498	2	STP	3	0-10	Shell, unmodified	Fragments	Donax	>100	57	2	
SDI-5498	3	Surface	5	10-20	Ceramics	Sherd	Tizon	13	12	3	
SDI-5498	4	STP	6	20-30	Chipped Stone	Biface	Chert	1	5.4	1	
Printed on: 05/23/2008				Page 1 of 1				Acid-Free Paper			

Missing/Deaccessioned Items Catalogue

All artifacts recovered from an excavation and examined in the lab should be assigned a catalogue number whether they are finally curated or not. **Items that are deaccessioned, missing or otherwise not presenting the collection should be included on the Master Catalogue with all pertinent information.** In addition, a notation should be made in the comments field about why the object is no longer in the collection. For example: Object not artifactual, object removed for radiocarbon testing, etc. Items that are missing should have an “M” in the box field, D for deaccessioned or discarded.

Sort the Master Catalogue and make a new Excel Worksheet with the deaccessioned and missing items sorted by catalogue number.

Missing/Deaccessioned Catalogue Example (w/Header & Footer):

Created on: Date Catalogue was created											
Full Name of the Project CA-SDI-XXX Year Excavated Missing Catalogue											
SITE #	CAT #	Recovery Type	UNIT #	LEVEL cm	MATERIAL CLASS	OBJECT	MATERIAL	Qty	Wt_g	BOX	Comments
SDI-XXXX	24	STP	6	0-10	Historic	Grocery Bag	Plastic	1	1.6	D	Discarded as modern trash
Printed on: 09/01/01				Page 1 of 1				Acid-Free Paper			

Oversized Catalog. Some collections contain items that do not fit in a standard box (10"H x 12"W x 15"D) or exceeds the thirty pound (13.63 kg) capacity of the regular box size. Include all oversize objects in the Master Catalogue and give them a separate “box” number in the Box field. Sort the Master Catalogue and make a new Excel Worksheet with the oversize items sorted by catalogue number.

Oversize Catalogue Example:

Created on: 8/28/07										
Full Name of the Project CA-SDI-XXX Year Excavated Oversize Catalogue										
SITE #	CAT #	Recovery Type	UNIT #	LEVEL	MATERIAL CLASS	OBJECT	MATERIAL	Qty	Wt_g	OVERSIZE #
SDI-XXX	418	Surface	1	Surface	Groundstone	Netherstone	Granitic	1	3600	12
Printed on: 09/01/07				Page 1 of 1				Acid-Free Paper		

Box Inventories

Box inventories are useful in locating an artifact within a collection's set of boxes. Box inventories are created using the box field in the Master Catalogue. Sort all entries by box number and then by catalogue number using the Excel Sort command. Open a new Excel file and paste all Catalogue entries with the same Box number. Create a new header labeled with the text "Box Inventory," the Material Class of the box, Full name of the Project, Year the site was excavated, SDAC number, and SDI number. Create a new footer and add the Printed on date, Page number, the number of Pages of the entire box inventory, and the text "Acid-Free Paper." (See figure below).

Box Inventory Header/Footer example:

Box Inventory		Full Name of the Project								SDI-#	
Material Class:		Year Excavated									
		SDAC#									
SITE #	CAT #	Recovery Type	UNIT #	LEVEL cm	MATERIAL CLASS	OBJECT	MATERIAL	Qty	Wt_g	BOX	COMMENTS
Printed on: 09/01/01				Page 1 of 1				Acid-Free Paper			

Labeling Collections

Labeling Artifact Bags

- Labels should be applied to the inside of bag at the clear space near the top of the bag for easy reading when holding the bag up by the top. When artifacts are double bagged, a label should be applied to both bags.
- Granular artifacts, e.g., soil samples, pollen samples, etc., or objects small enough to fall out of any holes made in the bag, should be double-bagged. Objects that are dirty, rusty or would leave a deposit on the label should be double-bagged.
- Using Sharpie markers to place additional information on bags is permitted. However, this will fade over time. All artifact information should be placed on the Master Catalogue and the minimum label information printed on the label.

Acceptable Bags Labels

- Acid-free acrylic adhesive
- Size appropriate to the bag
*(Non-adhesive paper labels are not recommended. They often become damaged, lost or hidden in the bag.)

Artifact Bag Label Format

- Standard American style letters and numbers (without cross bars)
- At least 10 pt Arial or Times New Roman Font
- Catalogue number
- Location - unit/feature number, STP number, coordinates, etc.
- Depth/level - surface, centimeter level, etc.
- Artifact class - shell, bone, lithic, etc.
- Object name - biface, fishhook, bead, etc.
- Artifact material - more specific information (e.g., stone type, shell species, etc.)
- Quantity and Weight

Artifact Bag Label Format and Example:

Catalogue Number Recovery Type Unit # Level Artifact Class/Object Name/Material QTY: Wt:	CA-SDI-1234-1999-13 Unit 4 Level: 10-20 cm Groundstone/Mano/Granite Qty: 1 Wt: 240.9g
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Labeling Artifact Surfaces

- Labels should be applied only on non-diagnostic surfaces.
- Labels must be legible and contain site information, year of excavation, and catalogue number.
- Only use material that can be easily removed and is of archival quality. The Center recommends India ink and Paraloid B-72 Opaque (on light surfaces) and Clear (on darks surfaces or when applying as a sealant).

Example: CA-SDI-1234-1999-1
CA-SDI-1234-1999-2

Writing Materials for Artifact Surface Labels

- Extra-fine tip Sharpie markers
- Rapidograph pens and India ink
- Archival-quality black ink markers

Instructions for applying Acryloid/Paraloid B-72

Applying the Base Coat:

The color and shading of an artifact will determine the base coat that is used on the artifacts. For dark artifacts, use the B-72 Opaque Lacquer. Using the brush inside spread a thin amount of B-72 in an inconspicuous place on the artifact. Wait for the lacquer to dry. Using

an ultra fine-tipped Sharpie or archival pen with India ink write the site number and the Catalogue number of the object.

Labeling Friable Objects

Friable objects, such as baskets, hides, vegetal artifacts should be tagged using acid-free paper labels and cotton string. The tag should be marked with archival-quality black ink and attached to a secure part of the artifact in an area that can easily be seen without moving the artifact. If the object is especially friable, more than one label may be attached.

Prohibited Object Labeling Products:

- Adhesive labels, any kind of tape
- Tags with metal rims
- Metal “twist-ties” or wire
- White Out or Liquid Paper products
- Quills
- Clear nail polish, or
- Regular felt tip pens.

Labeling Oversized Artifacts

Oversized objects need two types of labeling: surface and string. Surface labels are directly applied to the surface of the artifact using archival labeling material. Surface labels contain locative information, year of excavation, and the catalog number (i.e. SDI-11103-1999-03). The Center uses Acryloid/Paraloid B-72 Acrylic Resin both opaque and clear varieties to label the artifacts. The chemicals are removable and will not damage the artifacts. The string label is a paper label that provides additional artifact information. The label should either be placed in a plastic protective sheet or is laminated. A hole is punched in the label and secured to the artifact using white cotton string.

A paper label should also be attached to oversized objects. This label will contain more information about the artifact and collection that it is associated with. An oversize object template that includes the Project Title, Site Number, Catalogue number of the object, number of oversized objects, and Artifact Type. This label should be placed in a protective sleeve and attached to the oversize object with a cotton string,

String Label Format and Example:

Project Title	Archaeological Testing at Twelve Prehistoric Sites on the Central San Diego Coast, San Diego County, California
Site Number	CA-SDI-6804
Catalogue Number: # Oversize Object # of #	Catalogue Number: 102 Oversize Object 1 of 2
Artifact Type: Description of Artifact	Artifact Type: Ground Stone (Metate)

Labeling Artifact Boxes. Box Labels contain information about the collection: site, material class of artifacts organized inside, and site location information. Box labels should be placed inside a protective shipping sleeve that is affixed to the front of the box. Box Label information to be included are Project Title, Site Number, Box number, USGS 7.5' Quad, Location, and Collection Number.

- *Project Title* is the full name of the Project that is written on the front of the Report.
- *Site number* pertains to the state, parks, or Museum of Man designated number.
- *Box Number* designates the number of the box in relation to the number of boxes in the collection.
- Site Number should be in ascending order and box number in ascending order in relation to the entire project.
- *Quad* refers to the USGS 7.5' quadrangle map where the site is located.
- *Location* relates to the city or jurisdiction where the site is located.

Box Label Format and Example:

Project Title	Archaeological Testing at Twelve Prehistoric Sites on the Central San Diego Coast, San Diego County, CA
Site Number	CA-SDI-6804
Material Class: Material Class	Material Class: Chipped Stone
Quad: USGS Location: Location	QUAD: Encinitas 7.5' LOCATION: San Diego
Box #: # of #	BOX #: 1 of 7
ACCESSION #	SDAC 0000

Collection Organization and Boxing

Artifact Box Organization

Collections are curated according to the project, site number and material class at the Center. Collections should be organized as follows:

- Only one site per box.
- Similar material classes should be boxed together. If different artifact classes do not fill their own box, place each material class in a separate 2 mil plastic archival bag and label with the contents.
- Bulk items should be separated from single items and diagnostic material.
- Diagnostic or fragile items should be protected from other artifacts using additional packaging material.

Recommended Artifact Boxes

- New Standard size 15" x 12" x 10"
- Detachable lid (hinged lids break off)
- Coroplast corrugated plastic or polyethylene are acceptable containers.

- 4quart polyethylene boxes (~ 4.5"x13"x3.5") are acceptable for smaller collections.

Boxing Artifacts

Bags of artifacts should be placed in the box in a compact manner and distributed evenly. Partitions can be made using acid-free corrugated paper or plastic to prevent sliding. Partitions should be secured using a glue gun. Large heavy objects should be packed separately from smaller fragile pieces. **All boxes must not weigh more than 30 pounds.** Boxes should not be stuffed as this may cause damage to the artifacts. **Boxes must also have a box inventory placed inside to identify the material and catalogued items present.**

Custom Packaging

The vast diversity of archaeological and prehistoric and historic artifacts requires the use of custom packaging on occasion. Custom boxes may be constructed using sheets of acid-free corrugated paper or Coroplast and a hot glue gun. Whenever possible, custom boxes should be in proportion to the standard 15 x 12 x 8-inch box with a removable lid. Fragile items may be padded with the products recommended below. In the case of large ground stone, farming equipment or other large objects, which will be labeled individually, Tyvek, polyethylene sheeting or unbleached muslin cloth may be used as a dust cover. Large objects should not be encased in materials that will rip or tear when the object is moved.

Prohibited Packaging Products

- Laminated artifacts or documents
- Cotton floss or cotton balls
- Waxed paper
- Kleenex, toilet tissue, paper towels
- Polyvinyl chloride plastic
- Polyurethane plastic
- Saran wrap, grocery store plastic wrap, cellophane
- Bubble wrap, unless marked archival
- Construction paper, newsprint
- Buffered paper products (acid-free is much preferable)
- Excelsior (shredded wood)
- Popcorn (organic popped)
- Foam "peanuts"

Oversize Objects

Lithic objects that are larger than a standard box or that weighs over 30 pounds should be delivered to the Center labeled (See **Labeling Oversized Artifacts**) and without packaging. Other objects meeting the aforementioned criteria should be wrapped in a double layer of Ethafoam, or like product.

Other Recommended Packaging Products

- Archival-quality video, CD, audio cassette boxes
- Archival-quality document storage boxes with metal edges
- Oversize archival-quality map/drawing storage boxes
- Acid-free tissue paper (padding, wrapping)

- Acid-free glassine envelopes (photograph sleeves)
- Virgin polyester felt, batting (lining, padding)
- Tyvek (wrapping material, dust covers)
- Glue gun adhesive (custom box construction)
- Ethafoam, Volara, Microfoam (may be carved to make “nests” for objects)
- Poly storage containers with snap-on lids (available in a wide size range)

Associated Documentation Packaging

Document Box

The Center prefers to have all associated documents presented in an archival-quality document box, similar to the Metal Edge brand variety. Documents should fit firmly in the box so that they do not slump, but not so tight as to be difficult to remove. Separate acid-free paper folders should be used to contain loose documents, photograph sleeves or other associated documents. The document box does not need to be labeled, as this will be performed at the Center.

Records on Paper

All records on paper should be submitted on white, smooth finish, acid-free 8-1/2 x 11-inch, at least 20-pound bond. Records may be typed, laser printed or photocopied. Inkjet printing is not permitted, as it will fade over time. Handwritten documents may also be curated, but should be in black ink or black pencil only, as colored inks and pencils tend to fade over time. The use of colored paper, specialty paper, highlighters and color copies is not recommended, as these are not archival-quality and will fade over time. Newspaper articles, pamphlets and other records on non-acid-free paper should be photocopied onto acid-free paper. Oversize documents should be reduced onto 8-1/2 x 11-inch paper if possible to do so and remain legible. Otherwise, oversize acid-free paper may be used. Bound volumes should be of the plastic comb or bar variety with acid-free card stock on the front and back.

Records on paper should be prepared as follows.

- Bound volumes – Place the volume in a polyethylene ziptop bag or acid-free paper folders
- Loose pages – Place loose sheets in a polyethylene zip top bag or acid-free paper folders
- Unusual items – Field notebooks, Munsell soil smears, etc., should be bagged separately in appropriately sized polyethylene bags or page protectors.

Audio or Video Media

Audio or video recordings may be archived as compact discs, standard size audio magnetic tape cassette or VHS standard one-half inch video magnetic tape cassette.

Audio or video recordings should be prepared as follows.

- **Videocassettes** – Apply an adhesive label on the plastic housing of each cassette listing the project name, contents, date created and format. Cassettes should be placed in an appropriately-sized polypropylene container.
- **Compact discs (Audio)** – List the project name, site number, contents, date created and file format on the front of the CD. Place the CD in a Jewel Case or CD Envelope and apply an adhesive label on the front listing the project name, site number, date created, and file format.

- **Digital Versatile Disc (Video)** - List the project name, site number, contents, date created, and file format on the front of the DVD. Place the DVD in a Jewel Case or CD Envelope and apply an adhesive label on the front listing the project name, site number, date created, and file format.
- **Audiotapes** – Apply an adhesive label on the plastic housing of each cassette listing the project name, contents, and date created. Cassettes should be placed in an appropriately-sized polypropylene container.

Maps

Hardcopy- Maps created on high-quality paper with pencil or black ink will be curated. The use of colored inks or pencils is discouraged, as color fades and does not photocopy well. Maps may be any size, but should be produced on one single piece of paper if possible; if maps are pieced together use only acid-free paper tape or archival-quality adhesive to join the separate elements. Maps pieced together with masking tape or cellophane tape will not stay together over time.

Required information on all maps:

- Project Name
- Site number
- Contractor name
- Scale used
- Legend to all symbols used
- Directional arrows (true and magnetic north)
- Date the map was created
- Reference to published USGS map if used (name, series, publication date)
- Datum, either site datum or reference to well-known datum.

Maps should be packaged flat in acid-free archive boxes if size permits. Large maps may be rolled and placed inside acid-free paper or polyethylene tubes.

Photographic Images and Media

Photographic images are an important media to document and reconstruct the past. The Center curates images taken during field projects and laboratory documentation as well as historic images acquired legally through archival research and donation. The Center curates daguerreotypes, photographic prints on glass plates and contact paper, slides, negatives, Developed Advanced Photo System (APS) cartridges, digital photographs, and high resolution scanned images. The Center does not curate undeveloped film.

Curation considerations for each photographic image type:

- **Photographs** – Write the unique number on the reverse lower left-hand corner of each print or contact sheet with an archival-quality marking pen or pencil. Archival-quality labels may be used as well. Prints and contact sheets should be placed *individually* into archival-quality slotted photographic protectors or page protectors.
- **Slides** – Write the unique number on the lower left-hand corner (front or back) of each slide frame with an archival-quality marking pen or pencil. Archival-quality slide labels may be

used as well. Slides should be placed *individually* into archival-quality slotted slide protectors or page protectors.

- **Negatives** – Write the unique number with a Rapidograph pen and India ink on the non-emulsion (shiny) side. Do not cut negatives apart into individual frames, but leave them in strips, which may be placed flat in archival protectors. Rolled negatives should be cut into strips to fit into archival-quality slotted slide protectors or page protectors.
- **APS Cartridges** – Apply a label indicating the photo inventory numbers of the photos contained on the cartridge and place it in a small polyethylene bag.
- **Scanned and Printed Photographs** - Another option for curating photographs and other images is to scan them at 600 DPI or higher and print them out using a laser printer on archival-quality paper. Scanned photographs may then be curated as other records on paper. Scanned images may be saved on a compact disc. The CD label should include the software program and version used to view the images and correct file extension (e.g., jpg, html, etc.)

Digital Data

Standards for digital data are set by the current configuration at the Center. The Center uses Personal Computers (PC) with Windows XP and the Microsoft Office 2003 Suite. All digital files being submitted to the Center should be in PC format and be compatible with Microsoft Office 2003. Digital Catalogues must be submitted in either MS Access or MS Excel, while Digital Reports should be submitted in MS Word or Portable Document Formation (PDF).

Digital files should be prepared as follows:

- **Magnetic Media** - To comply with new digital standards in the curatorial field, the Center will no longer accept magnetic media (i.e. 5.25 3.25 of 3.25HD Floppy Disks, Jazz or Zip Disks, etc...). Please replace all outdated storage media to Compact Disc or call the Center's Collection Manager to setup alternate methods of transfer.
- **Compact Disk (Digital Files)** - The Center accepts writeable compact discs (CD-R and DVD-R) format only. Place the CD or DVD in a Jewel Case or CD Envelope. Include the name of the project and site numbers on the CD and place. List all file names contained on the CD or DVD on a separate sheet of paper and submit with the collection.
- **Digital Photographs** - Photographs that have been taken using a digital camera or that have been scanned at a resolution of 200 DPI or greater in JPG, BMP, GIF, TIFF, or RAW formats may be submitted on a CD-R or DVD-R. All survey or excavation photographs must be named according to site and unit number. Artifact photographs must be named using the site number and catalogue number. An inventory must also be submitted. The inventory should include the file name, picture format, provenience information, and other comments.
- **Digital Maps** - Digital maps created using imaging or mapping software as well as scanned hardcopy maps may be submitted on a CD or DVD in TIFF or JPEG file formats. All digital maps must include information listed in the "Maps" section above.
- **GPS Coordinates/GIS Shapefiles** - GPS data is becoming increasingly important in the archaeological field for spatial analysis and research. Due to the Center's ability to provide this type of data to qualified researchers, it is now mandatory that GPS data is submitted during curation procedures if the project included this type of data recovery. GPS data can be submitted two ways depending on the depth of analysis used. Coordinates gathered by a GPS unit marking site location, boundaries, features, units, etc..., may be downloaded into

an MS Access or MS Excel spreadsheet. All GPS Data must be marked with the X and Y Axis, project name, site number, date created, and GPS unit used. All X and Y Coordinates must be in positive values. If GIS (i.e. ArcGIS) was used during the project, GIS Shapefiles and accompanying datasets must be submitted to the Center in lieu of GPS data. All GIS data must include the projection, site location, and boundaries. If using ArcCatalog, export all data files to CD through the program to ensure all files are included in the dataset.

COLLECTION DELIVERY

When a collection is ready to be delivered to the Center, please call the Center Director or Collections Manager to setup an appointment. **All artifacts associated with the collection, associated documents, accession fee (if applicable) and conveyance documentation must accompany the collection unless other arrangements have been made in advance.**

If mailing the collections, use USPS, UPS, FedEx, or other private postal service with certification of delivery. Pack the collections carefully and add multiple layers of Ethafoam, or similar product, between the artifacts. Include all associated documents in a separate envelope.

Notice of Deficiencies

All collections will be inspected at the Center when they arrive. Collections that do not meet the minimum curation standards will be held in a temporary status at the Center and a Notice of Deficiencies letter will be issued to the owner of the collections or the culture resource manager company. Deficient collections will be returned to the owner or delivering company if deficiencies are not resolved within thirty days.