

Papahānaumokuākea Marine National Monument
RESEARCH Permit Application

NOTE: *This Permit Application (and associated Instructions) are to propose activities to be conducted in the Papahānaumokuākea Marine National Monument. The Co-Trustees are required to determine that issuing the requested permit is compatible with the findings of Presidential Proclamation 8031. Within this Application, provide all information that you believe will assist the Co-Trustees in determining how your proposed activities are compatible with the conservation and management of the natural, historic, and cultural resources of the Papahānaumokuākea Marine National Monument (Monument).*

ADDITIONAL IMPORTANT INFORMATION:

- Any or all of the information within this application may be posted to the Monument website informing the public on projects proposed to occur in the Monument.
- In addition to the permit application, the Applicant must either download the Monument Compliance Information Sheet from the Monument website OR request a hard copy from the Monument Permit Coordinator (contact information below). The Monument Compliance Information Sheet must be submitted to the Monument Permit Coordinator after initial application consultation.
- Issuance of a Monument permit is dependent upon the completion and review of the application and Compliance Information Sheet.

INCOMPLETE APPLICATIONS WILL NOT BE CONSIDERED

Send Permit Applications to:

Papahānaumokuākea Marine National Monument Permit Coordinator
6600 Kalaniana'ole Hwy. # 300
Honolulu, HI 96825

nwhipermit@noaa.gov

PHONE: (808) 397-2660 FAX: (808) 397-2662

SUBMITTAL VIA ELECTRONIC MAIL IS PREFERRED BUT NOT REQUIRED. FOR ADDITIONAL SUBMITTAL INSTRUCTIONS, SEE THE LAST PAGE.

Papahānaumokuākea Marine National Monument Permit Application Cover Sheet

This Permit Application Cover Sheet is intended to provide summary information and status to the public on permit applications for activities proposed to be conducted in the Papahānaumokuākea Marine National Monument. While a permit application has been received, it has not been fully reviewed nor approved by the Monument Management Board to date. The Monument permit process also ensures that all environmental reviews are conducted prior to the issuance of a Monument permit.

Summary Information

Applicant Name: Andrew B. Johnson

Affiliation: Division of Birds, Museum of Southwestern Biology, Department of Biology, University of New Mexico Albuquerque NM 87131

Permit Category: Research

Proposed Activity Dates: 22-29 March

Proposed Method of Entry (Vessel/Plane): Plane

Proposed Locations: Midway Island

Estimated number of individuals (including Applicant) to be covered under this permit:

One person: Robert W. Dickerman

Estimated number of days in the Monument: 8

Description of proposed activities: (complete these sentences):

a.) The proposed activity would...
Salvage birds found dead and preserve them as museum specimens

b.) To accomplish this activity we would
Simply pick up dead bird and preserve them either by skeletonizing, freezing, or skinning and salting. Tissue samples for genetic work would be saved in buffer.

c.) This activity would help the Monument by ...
Preserving and archiving some of the Midway's avian diversity for future study and research. We are aware of only two other batches of birds that have been saved from Midway since 2000 (University of Alaska Museum and Louisiana State University Museum of Natural Science). Museum specimens have a long useful history with many benefits to bird conservation. We would like to take this opportunity preserve some of the Midway's natural heritage and invest in the future of the island's avifauna.

Other information or background: Dr. Robert (Bob) Dickerman is the most dedicated volunteer in museum ornithology today. Since he retired from Cornell Medical School in the late 1980's, he moved to the Museum of Southwestern Biology and took that collection under his wing, building it from 6,000 to 26,000 specimens over the next 20 years, creating a research and teaching resource that is among the best University-based collections in the United States and giving it a credibility that has allowed the museum to justify hiring a full-time Collection Manager, Andrew Johnson (that's me), and a new faculty-appointed Curator of Birds, Christopher Witt.

I am applying for this salvage permit on Bob's behalf; I hold all of the permits in this collection in my name, and he is a subpermittee. Bob has kindly offered to donate his time and bear the expense of getting to Midway, and I am working on the permit end. Bob is well-traveled but has never been to Hawaii, and is very excited about visiting Midway and the possibility of salvaging some bird specimens while he is there. These specimens will not only fill some taxonomic gaps in our collection, but will also be available for study by any ornithologist interested in Pacific island birds. Our collections database is available online: <http://arctos.database.museum/SpecimenSearch.cfm>, making the data from the specimens he salvages available to anyone who has an internet connection. We are a lending institution and specimens can be borrowed for study by qualified users, or researchers can come and visit the collection here in Albuquerque.

Section A - Applicant Information

1. Applicant

Name (last, first, middle initial): Johnson, Andrew B.

Title: Collection Manager, Division of Birds, Museum of Southwestern Biology;
Department of Biology, University of New Mexico Albuquerque NM 87131

1a. Intended field Principal Investigator (See instructions for more information):
Robert W. Dickerman, Ph.D., Curatorial Associate Division of Birds, Museum of
Southwestern Biology; Department of Biology, [REDACTED]
[REDACTED]

2. Mailing address (street/P.O. box, city, state, country, zip):

Division of Birds,
Museum of Southwestern Biology
Department of Biology
[REDACTED]

Phone: [REDACTED]

Fax: [REDACTED]

Email: Andrew Johnson: [REDACTED]

Robert Dickerman: [REDACTED]

For students, major professor's name, telephone and email address:

We are not students, but the Bird Curator is:

[REDACTED]

3. Affiliation (institution/agency/organization directly related to the proposed project):

Division of Birds,
Museum of Southwestern Biology
Department of Biology
University of New Mexico
[REDACTED]

4. Additional persons to be covered by permit. List all personnel roles and names (if known at time of application) here (e.g. John Doe, Research Diver; Jane Doe, Field Technician):

None.

Section B: Project Information

5a. Project location(s):

<input type="checkbox"/> Nihoa Island	<input type="checkbox"/> Land-based	<input type="checkbox"/> Shallow water	<input type="checkbox"/> Deep water
<input type="checkbox"/> Necker Island (Mokumanamana)	<input type="checkbox"/> Land-based	<input type="checkbox"/> Shallow water	<input type="checkbox"/> Deep water
<input type="checkbox"/> French Frigate Shoals	<input type="checkbox"/> Land-based	<input type="checkbox"/> Shallow water	<input type="checkbox"/> Deep water
<input type="checkbox"/> Gardner Pinnacles	<input type="checkbox"/> Land-based	<input type="checkbox"/> Shallow water	<input type="checkbox"/> Deep water
<input type="checkbox"/> Maro Reef			
<input type="checkbox"/> Laysan Island	<input type="checkbox"/> Land-based	<input type="checkbox"/> Shallow water	<input type="checkbox"/> Deep water
<input type="checkbox"/> Lisianski Island, Neva Shoal	<input type="checkbox"/> Land-based	<input type="checkbox"/> Shallow water	<input type="checkbox"/> Deep water
<input type="checkbox"/> Pearl and Hermes Atoll	<input type="checkbox"/> Land-based	<input type="checkbox"/> Shallow water	<input type="checkbox"/> Deep water
<input checked="" type="checkbox"/> Midway Atoll	<input checked="" type="checkbox"/> Land-based	<input type="checkbox"/> Shallow water	<input type="checkbox"/> Deep water
<input type="checkbox"/> Kure Atoll	<input type="checkbox"/> Land-based	<input type="checkbox"/> Shallow water	<input type="checkbox"/> Deep water
<input type="checkbox"/> Other			

Ocean Based

NOTE: There is a fee schedule for people visiting Midway Atoll National Wildlife Refuge via vessel and aircraft.

Location Description:

Dr. Dickerman will be taking a tour of the Midway Atoll via the Oceanic Society Expeditions tour company, and accomodations will be through them.

5b. Check all applicable regulated activities proposed to be conducted in the Monument:

- Removing, moving, taking, harvesting, possessing, injuring, disturbing, or damaging any living or nonliving Monument resource
- Drilling into, dredging, or otherwise altering the submerged lands other than by anchoring a vessel; or constructing, placing, or abandoning any structure, material, or other matter on the submerged lands
- Anchoring a vessel
- Deserting a vessel aground, at anchor, or adrift
- Discharging or depositing any material or matter into the Monument
- Touching coral, living or dead
- Possessing fishing gear except when stowed and not available for immediate use during passage without interruption through the Monument
- Attracting any living Monument resource
- Sustenance fishing (Federal waters only, outside of Special Preservation Areas, Ecological Reserves and Special Management Areas)
- Subsistence fishing (State waters only)
- Swimming, snorkeling, or closed or open circuit SCUBA diving within any Special Preservation Area or Midway Atoll Special Management Area

6 Purpose/Need/Scope *State purpose of proposed activities:*

The purpose of this activity is to salvage dead bird specimens to preserve them as museum specimens for future study. This allows the Reserve an opportunity to have some valuable specimens preserved for perpetuity, and the Bird Division at the Museum of Southwestern Biology fill some taxonomic gaps in its teaching and research collection. All this will be accomplished with no cost to either establishment through the generosity of Robert W. Dickerman.

7. Answer the Findings below by providing information that you believe will assist the Co-Trustees in determining how your proposed activities are compatible with the conservation and management of the natural, historic, and cultural resources of the Monument:

The Findings are as follows:

a. How can the activity be conducted with adequate safeguards for the cultural, natural and historic resources and ecological integrity of the Monument?

Specimens already dead will be salvaged either by emptying freezers that already have specimens or picking up new already-dead material from the island. We do not believe that these activities will cause any disturbance to the resources or ecological integrity of the Monument.

b. How will the activity be conducted in a manner compatible with the management direction of this proclamation, considering the extent to which the conduct of the activity may diminish or enhance Monument cultural, natural and historic resources, qualities, and ecological integrity, any indirect, secondary, or cumulative effects of the activity, and the duration of such effects? In any area that is open for searching, dead birds will be salvaged. We do not anticipate any indirect, secondary, or cumulative effects by picking up any dead birds that may be found in a week on Midway.

The potential benefit to the avifauna of the Atoll and Pacific islands is tremendous. Museum specimens, especially of seabirds, have been used in other studies to show shifts in food webs that have had detrimental effects on endangered species (e.g., Marbled Murrelets) these studies were possible because historic specimens from before the population decline were available to compare with modern specimens.

c. Is there a practicable alternative to conducting the activity within the Monument? If not, explain why your activities must be conducted in the Monument.

There is no alternative except to not do it, which would, in our eyes, waste an opportunity to salvage some extremely valuable material at no cost to the Monument and potential great benefit to the avian community.

d. How does the end value of the activity outweigh its adverse impacts on Monument cultural, natural and historic resources, qualities, and ecological integrity?

We do not believe that there are any adverse impacts to picking up dead birds on the Atoll and saving them in a museum.

e. Explain how the duration of the activity is no longer than necessary to achieve its stated purpose.

The duration of this activity is not more than 8 days, which is the length of time Dr. Dickerman will be visiting Midway Atoll. This should give him an opportunity to obtain preserve a few interesting specimens through salvage.

f. Provide information demonstrating that you are qualified to conduct and complete the activity and mitigate any potential impacts resulting from its conduct.

Dr. Robert Dickerman has been collecting and preparing bird specimens since just after World War II at which time he enrolled in Cornell University as an undergraduate. He has collected and prepared over 27,000 specimens in the ensuing 50 plus years. He has worked for the following Museums Cornell, University of Arizona, University of Kansas, Bell Museum (University of Minnesota) and held an appointment in the Bird Department at the American Museum of Natural History for 30 plus years. He has been working as a volunteer at the Museum of Southwestern Biology since the late 1980s. We cannot foresee any potential impacts in his salvaging a few already-dead specimens from the atoll and the refuge freezer.

g. Provide information demonstrating that you have adequate financial resources available to conduct and complete the activity and mitigate any potential impacts resulting from its conduct.

Dr. Dickerman has already paid for the cost of his trip to the atoll. He is a benefactor of the Museum of Southwestern Biology and has sufficient funds to cover any expenses incurred on this trip.

h. Explain how your methods and procedures are appropriate to achieve the proposed activity's goals in relation to their impacts to Monument cultural, natural and historic resources, qualities, and ecological integrity.

Salvaging already-dead specimens is both the method and the point of this proposed activity. We do not anticipate any effects on the Monument cultural, natural and historic resources, qualities and ecological integrity.

i. Has your vessel has been outfitted with a mobile transceiver unit approved by OLE and complies with the requirements of Presidential Proclamation 8031?

Not Applicable

j. Demonstrate that there are no other factors that would make the issuance of a permit for the activity inappropriate.

We cannot foresee any factors that would make the issuance of a permit to salvage dead birds on Midway Atoll inappropriate.

8. Procedures/Methods:

Obtain birds either by finding them dead on the island or by emptying the refuge freezer. Specimens will be prepared for removal from the island by either freezing (small to moderate-sized birds) or by skinning and salting larger birds (to save weight and room

in a cooler). Birds to be prepared as skeletons will be roughed out and dried in the field (again, to save weight and space).

NOTE: If land or marine archeological activities are involved, contact the Monument Permit Coordinator at the address on the general application form before proceeding, as a customized application will be needed. For more information, contact the Monument office on the first page of this application.

9a. Collection of specimens - collecting activities (would apply to any activity): organisms or objects (List of species, if applicable, attach additional sheets if necessary):

Common name:
Birds

Scientific name:
Class: Aves

& size of specimens:
Dependent on what dead birds are available on the island

Collection location:
Midway Atoll

Whole Organism Partial Organism

9b. What will be done with the specimens after the project has ended?

Specimens will be archived in the Bird Division at the Museum of Southwestern Biology

9c. Will the organisms be kept alive after collection? Yes No

Specimens will already be dead when obtained

• General site/location for collections:
Midway Atoll/Refuge Freezer

• Is it an open or closed system? Open Closed
Not applicable

• Is there an outfall? Yes No
Not applicable

• Will these organisms be housed with other organisms? If so, what are the other organisms?
Not applicable

• Will organisms be released?

No. Already Dead

10. If applicable, how will the collected samples or specimens be transported out of the Monument?

Via plane

11. Describe collaborative activities to share samples, reduce duplicative sampling, or duplicative research:

The Museum of Southwestern Biology is like a library of Biological diversity. We make our holdings available on the web through the Arctos Database:

<http://arctos.database.museum/SpecimenSearch.cfm>

We loan specimens or tissue samples to any qualified researcher who wants to study these taxa. The collection is used as a teaching and research resource by a variety of people from artists to archaeologists to ornithologists studying a variety of topics in avian evolution, conservation, and taxonomy.

12a. List all specialized gear and materials to be used in this activity:

Scalpel, forceps, scissors, Vials to preserve tissue samples, salt to preserve large specimens, needle, thread

12b. List all Hazardous Materials you propose to take to and use within the Monument:

None

13. Describe any fixed installations and instrumentation proposed to be set in the Monument:

None

14. Provide a time line for sample analysis, data analysis, write-up and publication of information:

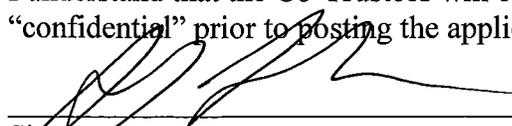
Specimens will be prepared and archived in the collection within a year of their arrival at the Museum of Southwestern Biology. At that time, the specimen data will be published on the web via the Arctos Database.

15. List all Applicants' publications directly related to the proposed project:

This is an opportunity for both the Monument and the Museum of Southwestern Biology Bird Division to have some globally very valuable material saved by a generous volunteer. We are a library of avian diversity - each specimen is analagous to a book, but unlike books printed today, each specimen is a one-off, one-of-a-kind snapshot in time of biological diversity in time and space. We preserve both the phenotype (the physical specimen - skin or skeleton or combination thereof) and the genotype (tissue sample) of the specimen. We cannot necessarily predict how these specimens will be used (they will certainly be used in teaching our Ornithology class and as study specimens for anyone interested in studying low-latitude pacific seabirds). Extending the library analogy, how useful would a library be if it only archived books that had a known immediate user? Books sit on library shelves for years without being used as specimens sit in cases. Eventually though, they get picked up and used by some very appreciative user. Museum

specimens have a clear track record of usefulness in a diversity of avian and ecological studies, which warrants archiving all that we can as long as opportunities and resources allow.

With knowledge of the penalties for false or incomplete statements, as provided by 18 U.S.C. 1001, and for perjury, as provided by 18 U.S.C. 1621, I hereby certify to the best of my abilities under penalty of perjury of that the information I have provided on this application form is true and correct. I agree that the Co-Trustees may post this application in its entirety on the Internet. I understand that the Co-Trustees will consider deleting all information that I have identified as "confidential" prior to posting the application.


Signature

25 FEB 2010
Date

SEND ONE SIGNED APPLICATION VIA MAIL TO THE MONUMENT OFFICE BELOW:

Papahānaumokuākea Marine National Monument Permit Coordinator
6600 Kalaniana'ole Hwy. # 300
Honolulu, HI 96825
FAX: (808) 397-2662

DID YOU INCLUDE THESE?

- Applicant CV/Resume/Biography
- Intended field Principal Investigator CV/Resume/Biography
- Electronic and Hard Copy of Application with Signature
- Statement of information you wish to be kept confidential
- Material Safety Data Sheets for Hazardous Materials