

Papahānaumokuākea Marine National Monument
NATIVE HAWAIIAN PRACTICES 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:
NOAA/Inouye Regional Center
NOS/ONMS/PMNM/Attn: Permit Coordinator
1845 Wasp Blvd, Building 176
Honolulu, HI 96818
nwhipermit@noaa.gov
PHONE: (808) 725-5800 FAX: (808) 455-3093

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: Keomailani Case

Affiliation: Nā Kālai Wa‘a

Permit Category: Native Hawaiian Practices

Proposed Activity Dates: June 14 - 29, 2019, Mōhalu to ‘Olekūkahi in Ka‘aona

Proposed Method of Entry (Vessel/Plane): 2 Vessel

Proposed Locations: Mokumanamana

Estimated number of individuals (including Applicant) to be covered under this permit: 26
Estimated number of days in the Monument: 15

Description of proposed activities: (complete these sentences):

a.) The proposed activity would...

Our research would bring light to the main functions of Mokumanamana for Hawaiians historically, presently and potentially through the methodologies and frameworks established by Hawaiians and re-established by the Edith Kanaka‘ole Foundation and Nā Kālai Wa‘a's work. NKW has partnered with EKF, sailing Makali‘i to Mokumanamana bringing two Pwo navigators and their apprentices as a rite of passage for the younger crew.

This will be the first trip to Mokumanamana by Makali‘i and her crew. The Master Navigators of Nā Kālai Wa‘a and their students have over 100 years of accumulated studying of celestial bodies’ movements over the Pacific Ocean. Makali‘i will be voyaging to Nihoa and Mokumanamana as a capstone voyage for NKW’s Project Hanauna Ola: sustaining the generations through voyaging. This project is funded by an Administration of Native Americans SEDS grant. NKW is partnering with EKF (under a separate permit) for this voyage to be able to assist with the study of celestial bodies over Mokumanamana, further enhancing the voyage experience for our training captains and navigators of NKW/ ‘Ohana Makali‘i. The end goal of this voyage partnership is to ensure the legacies of our cultural practices for generations while securing Mokumanamana in our current practitioners universe.

According to the traditions of kupuna of Nā Kālai Wa‘a, navigators were trained at Ko‘a Holomoana, a heiau site with manamana that faces Mokumanamana in Mahukona. These

navigators were tested by being taken to Mokumanamana and needing to return successfully home to Mahukona and heiau Koʻa Holomoana.

This voyage to Mokumanamana allows Makaliʻi to be the cultural vessel to carry the research team to Mokumanamana, while allowing the next generation of captains and navigators the opportunity to continue traditions of voyaging, connecting Koʻa Holomoana with Mokumanamana.

The EKF has been the only native Hawaiian research entity that has continuously studied the manamana sites on Mokumanamana for over 10 years, then subsequently expanded the learning acquired from the Mokumanamana methodologies to the restoration and studies of other sites in the main Hawaiian Islands. The fieldwork on Mokumanamana has allowed the researchers the ability to gain great insight into the profoundly deep knowledge and accuracy of the aliʻi and kāhuna's concept of time, space, geological creation of islands, and Universal relativity. On the previous trips the researchers were able to establish baseline data utilizing the sun's movement between the Ala Polohiwa a Kāne, Piko o Wākea and Ala Polohiwa a Kanaloa. A three-year study of manamana located on Maunaloa has granted the research team the unique opportunity to study the function of manamana for a longer period of time. With the newly acquired skills the EKF would like to further that knowledge into star, planet and Milky Way alignments during the Summer solstice in June 2019. The star expertise that Nā Kālai Waʻa will be bringing will greatly assist the EKF with the star to site alignments. Both the EKF and NKW will be bringing the next generations of Hawaiian practitioners/scholars to assure that the continuance of the great work of rediscovery continues.

b.) To accomplish this activity we would

begin our voyage to Mokumanamana in early June, 2019. Makaliʻi and Alakaʻi will depart from Mahukona making their way using traditional navigation skills and technology to Mokumanamana by Summer Solstice. Their successful arrival to Mokumanamana using the elements and then their successful return will complete one training cycle for the next generation of leaders for Nā Kālai Waʻa, validated in the processes of our ancestors. Navigators need to pull Mokumanamana out of the sea the same way they pull the stars and the sun out every day. This voyage will be the first time that apprentice voyagers will complete the trip from Koʻa Holomoana at Mahukona, Kohala to Mokumanamana in over 200 years.

Upon arrival to Mokumanamana, the team would assign five groups of three individuals on five separate locations for the purpose of observing the celestial activities in connection to the sites. The research will begin an hour prior to the sunset and will end about two hours after sunrise. Each group will consist of at least a scholar, a practitioner and a star person. Near sunset, the teams will be situated on designated areas and stay in the same location for the entire night recording observations of celestial to terrestrial alignments, compass and GPS fixes, as well as site to site alignments back towards Hawaiʻi (southeast), down south, northwest or beyond. The methods and technologies of observation and recording used over the years of the Mokumanamana studies combined with the newly acquired techniques from our Maunaloa studies will be applied to this research. The team is confident that new data will be acquired that will support our theories about the function of Mokumanamana's sites. The methodologies and

framework used will support that Hawaiians kept track of the time by the celestial movements for geological activities, ceremonial/religious processes, political decisions, and practical benefits. It will also demonstrate that the Hawaiians already had an understanding of the movement of the sun from that point of the world and universe. That's what Mokumanamana is about. Trails of the sun, trails of the stars, these are primary sources of knowledge. The teams will go through 5 vigorous trainings prior to the arrival to be prepared with all of the information gathered from the last 10 years.

c.) This activity would help the Monument by ...

1. Further strengthen the voyaging traditions related to Mokumanamana by modern practitioners,
2. Fill in the missing historical gaps of the function of Mokumanamana,
3. Directly correlate historical native Hawaiian visits to the island,
4. Relate migration chants and Pule 'Aha Lanalana to Mokumanamana,
5. Link Haho, Līloa, 'Umi and other ali'i to Mokumanamana,
6. Re-establish a relationship between modern kāhuna with ancient kāhuna,
7. Pass on the last 10 years of field data to the next generation of researchers, &
8. Complete the process of research and navigation, use of celestial bodies for alignment utilizing a traditional voyaging canoe for this purpose.
9. Share our voyage to Mokumanamana with the general public for educational purposes that support the points above.

Other information or background:

There will be a total of 31 people. This number also includes the necessary crew of 6 for the Searcher and an individual who will be representing the resource monitor if needed. The large numbers of individuals are to allow for a few crew changes during the Makali'i sail legs. Members in the EKF research group will be traveling with the Makali'i, while some Nā Kālai Wa'a crewmembers will be traveling on the Searcher (permitted under EFK's permit). Another escort vessel, Alaka'i, will be following Makali'i for safety purposes. NKW intends on sailing from Hawai'i Island to Mokumanamana and back to Hawai'i Island. The EKF intends on joining NKW on route from O'ahu, with researchers traveling on the Searcher as well as Makali'i canoe, and WILL travel together from there to Mokumanamana. At the arrival of Mokumanamana a crew of 15 individuals will be embarking upon the island while the rest of the crews will be anchored safely offshore. The land crew will stay on the island for 3 nights and will disembark early in the morning to begin the return back to Hawai'i. At this point the individuals on the Searcher will return directly to O'ahu while Nā Kālai Wa'a and its escort vessel will sail back to Hawai'i Island. Weather and other extraneous circumstances may cause Makali'i and Alaka'i to depart Mokumanamana separately from the Searcher and return home on a different time schedule. The

searcher will be on a 10 day contract, but Makali‘i may require a few more days to sail from Mokumanamana to Kaua‘i.

Passengers on Searcher from O‘ahu to Mokumanamana

1. Chadd Paishon - NKW Pwo Master Navigator
2. Keani Kaleimamahu - NKW Trainee
3. Lanihuli Kanahale - NKW Trainee
4. Pomai Bertelmann - NKW Trainee
5. Lehua Ah Sam - NKW Trainee
6. Brandi Beaudet - NKW Trainee
7. Chelsey Dickson - NKW Trainee
8. Kaniela Anakalea-Buckley - NKW Trainee

Crew on Alaka‘i from Kaua‘i to Mokumanamana:

1. Nakoa Prejean - NKW Trainee
2. Kainalu Bertelmann - NKW Trainee
3. Keali‘i Maielua - NKW Trainee
4. ‘Āina Paikai - NKW Documenter

Crew on Makali‘i from Kaua‘i to Mokumanamana:

1. Milton Gervin Bertelmann - Pwo Master Navigator
2. Pualani Mai‘elua Lincoln - NKW Trainee and EKF Researcher
3. Kealaka‘i Kanaka‘ole - NKW Trainee and EKF Researcher
4. Kalā Mossman - NKW Trainee and EKF Researcher
5. Bonnie Kahape‘a - NKW Trainee
6. Patti-Anne Solomon - NKW Trainee
7. Lei Ilae-Kaleimamahu - NKW Trainee
8. Leiohu Santos-Colburn - NKW Trainee
9. Mike Manu - NKW Trainee
10. Ui Malakaua - NKW Trainee
11. Keala Kahuanui - NKW Trainee
12. Ashton Dircks Ah Sam - NKW Trainee
13. Ah Lun Yung - NKW Trainee
14. Jamie Makasobe - NKW Documenter

EKF Mokumanamana Field Researchers:

1. Kalei Nu‘uhiwa - Covered Under EKF Permit
2. Pualani Lincoln-Mai‘elua - Covered Under Both Permits
3. Huihui Mossman-Kanahale - Covered Under EKF Permit
4. Kalā Mossman - Covered Under Both Permits
5. Kealaka‘i Kanaka‘ole - Covered Under Both Permits
6. Ulalia Woodside - Covered Under EKF Permit
7. Ku‘ulei Kanahale - Covered Under EKF Permit

8. Hi'ilei Kawelo - Covered Under EKF Permit
9. Ulu Keali'iakanaka'ole - Covered Under EKF Permit
10. Makali'i Crew - TBD
11. Makali'i Crew - TBD
12. Makali'i Crew - TBD
13. Makai'i Crew - TBD

The researchers from Makali'i crew will be determined by May 17, 2019.

Passengers on Searcher from Mokumanamana to O'ahu:

1. Kealaka'i Kanaka'ole - NKW Trainee and EKF Researcher
2. Kalā Mossman - NKW Trainee and EKF Researcher
3. Lei Ilae-Kaleimamahu - NKW Trainee
4. Pualani Mai'elua Lincoln - NKW Trainee and EKF Researcher
5. Ui Malakaua - NKW Trainee
6. Ah Lun Yung - NKW Trainee
7. Keala Kahuanui - NKW Trainee

Crew on Alaka'i from Mokumanamana to Kaua'i:

1. Nakoia Prejean - NKW Trainee
2. Kainalu Bertelmann - NKW Trainee
3. Ashton Dircks Ah Sam - NKW Trainee
4. 'Āina Paikai - NKW Documenter

Crew on Makali'i from Mokumanamana to Kaua'i:

1. Milton Gervin Bertelmann - Pwo Master Navigator
2. Keali'i Maielua - NKW Trainee
3. Pomai Bertelmann - NKW Trainee
4. Chadd Paishon - NKW Pwo Master Navigator
5. Lanihuli Kanahale - NKW Trainee
6. Bonnie Kahape'a - NKW Trainee
7. Kaniela Anakalea-Buckley - NKW Trainee
8. Keani Kaleimamahu - NKW Trainee
9. Leiohu Santos-Colburn - NKW Trainee
10. Mike Manu - NKW Trainee
11. Lehua Ah Sam - NKW Trainee
12. Chelsey Dickson - NKW Trainee
13. Brandi Beaudet - NKW Trainee
14. Jamie Makasobe - NKW Documenter

Vessel name: Makali'i

Vessel owner: Nā Kālai Wa'a

Captain's name: Shorty Bertelmann

IMO#:

Vessel ID#: HAZ6237FF495-H

Flag: US

Vessel type: traditional double hulled voyaging canoe

Call sign: WCQ4292

Embarkation port: Kawaihae

Last port vessel will have been at prior to this embarkation: Kawaihae

Length: 54ft

Gross tonnage: 8 tons

Total ballast water capacity volume (m3): n/a

Total number of ballast water tanks on ship: 0

Total fuel capacity: n/a

Total number of fuel tanks on ship: n/a

Marine Sanitation Device: n/a

Type: 5

Vessel name: Alaka'i

Vessel owner: Nā Kālai Wa'a

Captain's name: Shorty Bertelmann

IMO#:

Vessel ID#: RDU280020678

Flag: US

Vessel type: Radon

Call sign:

Embarkation port: Kawaihae

Last port vessel will have been at prior to this embarkation: Kawaihae

Length: 28'

Gross tonnage: 3 tons

Total ballast water capacity volume (m3): n/a

Total number of ballast water tanks on ship: 0

Total fuel capacity: 200 gal

Total number of fuel tanks on ship: 1

Marine Sanitation Device: none

Type: I

Section A - Applicant Information

1. Applicant

Name (last, first, middle initial): Case, W.D. Keomailani

Title: Executive Director, Nā Kālai Wa‘a

1a. Intended field Principal Investigator (See instructions for more information):

Milton Gervin “Shorty” Bertelmann, Master Navigator

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

[REDACTED]

Phone: [REDACTED]

Fax: [REDACTED]

Email: [REDACTED]

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

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

Edith Kanaka‘ole Foundation, Nā Kālai Wa‘a, and Kawehiokalani INC.

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, Diver):

1. Milton Gervin “Shorty” Bertelmann - Master Navigator and Captain of Makali’i, Crew on Searcher
2. Chadd Paishon - Master Navigator and Captain of Makali’i
3. Pualani Lincoln-Mai‘elua - Apprentice Navigator for Makali’i, EKF Research Team (covered under EKF and NKW permit)
4. Kala Mossman - Crew for Makali’i, Research Team for EKF, Onboard First Responder (covered under EKF and NKW permit)
5. Keala Kanaka‘ole - Crew for Makali’i, Research Team for EKF (covered under EKF and NKW permit)

6. Kaniela Anakalea-Buckley - Crew on Makali'i, Passenger on Searcher
7. Leiohu Colburn-Santos - Crew on Makali'i, Captain in Training on Makali'i
8. Chelsey Dickson - Crew on Makali'i, Passenger on Searcher
9. Ashton Dircks Ah Sam - Crew on Makali'i, Passenger on Searcher
10. Lehua Dircks Ah Sam (aka Kristen Dircks)- Passenger on Searcher, Crew on Makali'i
11. Brandi Beaudet - Crew on Makali'i, Passenger on Searcher
12. Kainalu Bertelmann - Working Crew on Searcher, Crew on Alakai
13. Pomai Bertelmann - Captain in Training, Apprentice Navigator on Makali'i, Passenger on Searcher
14. Lei Ilae-Kaleimamahu - Crew on Makali'i and Passenger on Searcher
15. Bonnie Kahapea - Captain in Training, Apprentice Navigator on Makali'i, Passenger on Searcher
16. Keani Kaleimamahu - Passenger on Searcher and Crew on Makali'i, La'au Healer, Lua Master
17. Keala Kahuanui - Quartermaster in Training on Makali'i Lanihuli Kanahale - Passenger on Searcher and Crew on Makali'i
18. Kealii Maielua - Captain in Training on Makali'i and Crew on Searcher
19. Jamie Makasobe - Documentor on Makali'i
20. Ui Malakaua - Captain in Training on Makali'i
21. Mike Manu - Captain in Training on Makali'i
22. Rosa Motta – crew on Makali'I, passenger on Searcher
23. 'Aina Paikai - Documentor on Searcher
24. Nakoa Prejean - Working Crew on Searcher, Crew on Alakai
25. Patti-Anne Solomon – crew on Makali'i, passenger on Searcher
26. Ah Lun Yung - Captain in Training on Makali'i

Note: A Resource Monitor will be traveling on the Searcher and is shared between this permit and EKF's permit.

Please see Edith Kanaka'ole's permit to reference other crew members aboard the Searcher as a part of our joint venture to voyage to Mokumanamana.

If a Resource Monitor is required, we will be sharing a monitor with the EKF permit. In the case that a Resource Monitor is required, we request that a crew member from Makali'i be trained to fulfill this role. If that is not possible, then we request a member of NOAA or OHA who are also practitioners and trained as monitors to be assigned to us, as they will also be required to participate in cultural protocols.

Section B: Project Information

5a. Project location(s):

- | | | | |
|--|--|---|--|
| | | Ocean Based | |
| <input type="checkbox"/> Nihoa Island | <input type="checkbox"/> Land-based | <input checked="" type="checkbox"/> Shallow water | <input type="checkbox"/> Deep water |
| <input checked="" type="checkbox"/> Necker Island (Mokumanamana) | <input checked="" type="checkbox"/> Land-based | <input checked="" type="checkbox"/> Shallow water | <input checked="" 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 type="checkbox"/> Midway Atoll | <input 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 | | | |

NOTE: Shallow water is defined by water less than 100 meters in depth.

Remaining ashore on any island or atoll (with the exception of Sand Island at Midway Atoll and field camp staff on other islands/atolls) between sunset and sunrise.

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

Location Description:

Mokumanamana is a small, isolated island remnant at the northwestern end of the main Hawaiian Island chain, within what is now called Papahānaumokuākea Marine National Monument (or the Northwestern Hawaiian Islands). Mokumanamana is located 240 km NW of Kaua‘i and have numerous cultural sites that are significant to the Hawaiian identity.

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 trip is to confirm and complete the reconnection of Native Hawaiian cultural practitioners with this important part of Papahānaumokuākea.

Utilizing traditional voyaging canoes (Makali‘i) and wayfinding techniques to carry cultural practitioners to Mokumanamana will allow the participants of this voyage to assess the skills of voyage practitioners and contribute to the knowledge of the use of Mokumanamana as a measurement tool for the movements of our Hawaiian universe.

This capstone voyage for Makali‘i will help to ensure another generation of skilled voyagers that have knowledge of the Hawaiian universe from Moku O Keawe (Hawai‘i Island) to our kūpuna islands in the North (Papahānaumokuākea).

Through this experience the researchers hope to confirm techniques and methods learned that are specific to manamana and pahu manamana, which are sites that contain uprights connecting ali‘i/kāhuna to the site, to the upright, and to a celestial entity as a form of binding, essential to both an ali‘inui and kahuna nui's existence. If the ali‘i or kāhuna could not be consistently present, a stone stood in place of the individual as a proxy. The research team will draw upon extensive mo‘olelo (stories), pule (incantations), mele (chants), ‘ōlelo no‘eau (proverbs), mo‘okū‘auhau (genealogies), ko‘ihonua (creation chants), and ‘aha rituals to inform our research. Within the last 3 years, the EKF was contracted by the Volcanoes National Park Service to conduct similar studies of sites called Pahu Manamana o ‘Umi at Pu‘u ‘Alikā on the southeastern slope of Maunaloa. Where Mokumanamana is located near the Ala Polohiwa a Kāne, Pahu Manamana o ‘Umi is oriented towards Nīhoa and Mokumanamana. During the celestial studies of Pahu Manamana o ‘Umi the researchers' observations lead the team to some astonishing facts about the construction, alignment and orientation that particular site on Maunaloa has with particular star constellations, historical ali‘inui, and the Hale Poki found in the ‘Aha Lanalana ceremonies. At Pahu Manamana o ‘Umi, the research team was able to make a direct link to both ali‘inui ‘Umialīlio and Haho. The team is now ready to apply those same skills and techniques to Mokumanamana to finally bring all the loose pieces of information previously acquired to Mokumanamana.

As we continue to access the sites on Mokumanamana, clarity and understanding of the possible functions of the manamana can be ascertained. On this particular trip, celestial navigators and sailors will be joining the research team to provide expertise to the observations and alignments through rhumblines and wayfaring skills, which can be applied to the pānānā to manamana to celestial entities.

There will be one vessel (Searcher) traveling to Mokumanamana and back, a traditional Hawaiian double-hulled canoe (Makali‘i) sailing up and back down, and a radon (Alaka‘i) an escort to assist the canoe. Currently, there are no plans to go to Nīhoa unless it is necessary to take shelter on the lee of the island due to inclement weather, or for ceremonial protocols.

*Considering the purpose of the proposed activities, do you intend to film / photograph federally protected species? Yes No

If so, please list the species you specifically intend to target.
native birds and ocean dwellers

For a list of terrestrial species protected under the Endangered Species Act visit:

<http://www.fws.gov/angered/>

For a list of marine species protected under the Endangered Species Act visit:

<http://www.nmfs.noaa.gov/pr/species/esa/>

For information about species protected under the Marine Mammal Protection Act visit:

<http://www.nmfs.noaa.gov/pr/laws/mmpa/>

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?

All participants will be participating in 3 in-depth orientations, which includes boat safety, vessel procedures, hazardous open water procedures, emergency procedures on the vessels and Mokumanamana, cultural protocols, ceremonies and religious rituals, celestial and terrestrial orientation. Site description and research/study procedures, detailed camera use and on island procedures, traditional Hawaiian measurements, previous documentation of sites, compass use and compass procedures on island, GPS, rhumb lines, other alignment techniques. Also included in the trainings will be biological and ecological resource orientation, egg/chick avoidance, subsistence fishing while underway in the designated approved areas, gear preparation and packing procedures.

The group would like to request that, if a resource monitor is necessary that one or two of our members be designated the resource monitor. Both will be willing to participate in training and other requirements.

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?

This activity is aligned with the management direction of the Monument and with Presidential Proclamation 8031. The proposed activities are designed to enhance educational opportunities and will not be used for commercial purposes. All proposed knowledgeable and respected Native Hawaiian cultural practitioners, pwo navigators, and open ocean voyagers would conduct activities. The information gleaned by this joint venture will benefit the historical and resource study materials for Papahānaumokuākea. None of the proposed activities will deliberately cause harm or disruption to any resources on the island.

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.

Mokumanamana is a source of the Hawaiian origins, volcanology and migrational knowledge. It is the only moku of its kind where many original concepts of time, starlore, heiau site construction in relationship to stars and volcanoes exists. For these reasons, it is why Hawaiians must go to reconnect with that knowledge and connect it to Hawai‘i. Hawaiians do not have a lot of places that can be accessed that provides primary information. Sites have been built on Hawai‘i which function similarly, however they are all based on what the ancestors discovered and studied from Mokumanamana. Another primary source of knowledge is Voyaging, which includes navigating, star movement, the northern and southern movement of the sun, etc. Mokumanamana has also traditionally been the testing point for traditional navigation studies conducted at Ko‘a Holomoana, the piko site for Nā Kālai Wa‘a and the ‘ohana Makali‘i in Mahukona, Kohala. Our joint venture is bringing two primary sources of knowledge together to reformulate the Hawaiian universe of erudition.

To become a functioning and prosperous ali‘i nui, the primary sources of knowledge had to be maintained. The hint that maintaining primary sources is the necessity of tracking volcanic movement because the ali‘i nui and kāhuna knew where they had come from and also where they were going. Pele’s migration from the NW islands is a narrative that reminds us that primary sources are memorialized through chants and stories.

Storytellers weave the story to keep the story alive. However, the scientific mind had to put up manamana to get a fix on star locations to actually make the alignments with the volcanoes. Also, in the Polynesian Triangle, Mokumanamana is the only island within our Hawaiian Island chain that sits on the Ala Polohiwa a Kāne, the Tropic of Cancer. As a people who historically used the sun to navigate, make political decisions, and conduct religious ceremonies, Mokumanamana would have been a significant location. It makes sense that the first voyagers and later on kāhuna travelled to Mokumanamana intentionally to build sites upon it to track major celestial and volcanic cycles. Being able to sail to Mokumanamana and back to Hawai‘i utilizing the stars, then utilizing those same stars to track time and conduct special ceremonies is extremely significant. Sailing there with Makali‘i and being able to study the movements and alignments of the stars, planets and Milky Way provides an unprecedented opportunity to align chants, stories and native Hawaiian cultural remnants with one another to gain missing information from native Hawaiian history. Makali‘i’s successful voyage to Mokumanamana and back to Mahukona will also re-engage modern day voyagers with navigational practices that

haven't been successfully conducted for over 200 years. To become navigators, traditions in the Makali'i 'ohana state that the apprentice needed to voyage to and return successfully from Mokumanana leaving from Ko'a Holomoana in Mahukona. It is pertinent that the information acquired from these field visits is then restored and practiced remaining relevant to the youth of today. The solitude, lack of light, distance and human challenge to travel to the inhospitable island allows for potential growth of experience and expertise that is specific to the Hawaiian Islands. On this next site visit, specific stars, planets and Milky Way alignments to the various manamana will be part of the on-island studies conducted by the field team.

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

Adverse impacts are always a possibility, however the field researchers will try to minimize negative impacts. Voyaging activities to Mokumanamana and Nihoa are mainly ocean based and, with the exception of crew that are a part of the selected research team, the rest of the crew will remain onboard the vessels to minimize impact to the island itself. Continuing traditions of Mokumanamana as a place for practitioner testing and ascension of skills is necessary to the cultural relevance of voyaging, wayfinding and tracking of the movements of the skies and the islands themselves.

Within the EKF's 10-year research, the field team has seen significant degradation of the manamana due to bird activity, hurricane/storms, marine debris, and human activity through the changing climate and other movement. There is a sense of urgency to collect as much empirical data as possible before the sites are significantly changed or gone. Shapes of the manamana have changed over the years, which then changes the alignments and information acquired through observation.

It is a privilege to visit Mokumanamana, which to the team is a moku akua, a place for the gods. Humans should not go there often and only on special occasions.

All proposed activities will occur in the later afternoon and mid morning. The landing team plans to stage a base camp in a centralized area that is clear of nesting or burrowing birds. The base camp will be the point where the food and water will be staged. 5 teams of 3 individuals will camp in 5 locations and movement will be very minimal. To minimize impact the teams will stay in the designated locations to conduct the main observations.

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

The three evening time allotment requested for the on-island research in this application is sufficient to complete the activities intended for the duration of the summer solstice. The remaining 7 days of the permit are necessary for travel to and from the island.

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

Nā Kālai Wa'a has been voyaging and training voyagers and community members since 1995. Master Navigator Shorty Bertelmann, president of Nā Kālai Wa'a, was Papa Mau Piailug's first student in navigation and has been navigating since 1976. Master Navigator Chadd Paishon has

been voyaging since the 1980s and was inducted as a Pwo (Master Navigator) with Shorty Bertelmann by Mau Piailug in 2007. Voyagers of Nā Kālai Wa‘a have sailed on Makali‘i and other traditional voyaging canoes to Tahiti, Cook Islands, Micronesia, Japan, Aotearoa, and throughout the state of Hawai‘i.

The Kanaka‘ole family has maintained unbroken through the impact and onslaught of colonization, decades of generational practices of hula, forest management, wa‘a traditions, Pele rituals, kuahu and heiau ceremonies. All of the members from the EKF research team have accessed Mokumanamana four or more times. The applicant group also possesses one hundred and eight years of combined cultural involvement between them. All participants have also been involved in both the Western & Hawaiian philosophies of academia through complex and extensive training & practice conducting ceremonies, research, collection of cultural, scientific, and historical data, translated literature from Hawaiian to English and were specifically chosen for their intelligence, passion, knowledge, physical endurance and ability to coexist while on long distanced and close quarter projects. All of the members of this participant group have been involved with Kaho‘olawe and are aware of the special protocols surrounding extremely sensitive and protected areas. Combined with the expertise and generational knowledge that NKW will bring with them, the potential to learn and collect more data is paramount to Mokumanamana's value to Hawaiians and to the peoples of Polynesia and Oceania.

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.

The EKF has some funding from various projects and donors, Nā Kālai Wa‘a has some funding from the Administration of Native Americans under the US Department of Health and Human Services (the voyage to Mokumanamana is the capstone in the 3 year long grant), and both organizations have started procedures to acquire the remaining funding from the Office of Hawaiian Affairs. Our OHA contacts are Keola Lindsey and Brad Wong.

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

All members of the research team are intimately familiar with various types of cultural sites throughout the Hawaiian Islands, Maupiti & Mo‘orea islands in Tahiti, and Mokumanamana. The research team has studied the uses, functions and positions to the respective environment, horizontally and vertically, and will conduct their studies on the island with the same method of familiarity. Previous visits by the research team to the islands have recorded cultural sites and these records will be used as a study tool to accessing the islands. Compass points will be established, and data will be collected on the rising and setting of the sun, moon and stars and will be measured according to the manamana at the times of the summer solstice. The proposed methods and procedures are in-line with accepted cultural behaviors and scientific methodologies and procedures.

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

The proposed vessels will comply with all regulations and be outfitted with a type-approved Vessel Monitoring System prior to the proposed departure date.

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

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

ADDITIONAL FINDINGS FOR PROPOSED NATIVE HAWAIIAN PRACTICES

k. Explain how the activity is non-commercial and will not involve the sale of any organism or material collected.

This is an educational and Native Hawaiian culture joint venture. The access is strictly for educational purposes. No organisms or natural materials will be collected on this access.

l. Explain how the purpose and intent of the activity is appropriate and deemed necessary by traditional standards in the Native Hawaiian culture (pono), and demonstrate an understanding of, and background in, the traditional practice and its associated values and protocols.

From June 14-23, 2019, the joint venture intends to go to Mokumanamana Island for the purposes of conducting Hawaiian cultural and spiritual practices and to acquire knowledge from the site as was done in its historical past. We seek to improve the quality of the relationship Native Hawaiians have with the environment on the ocean and on Mokumanamana. The team goes to honor Kāne worship, specific to the sun, moon and star movement. The joint venture will sail a traditional double hulled canoe to the island utilizing the stars, the landing party will align the stars to the sites on the island, the researchers will connect those alignments to the various akua, ali'i and kāhuna, and the team hopes to connect all those alignments back to the main Hawaiian Islands. The information gleaned will then be recorded into a document, which will be available for all future visitors to Papahānaumokuākea.

The successful voyage to Mokumanamana and return to Ko'a Holomoana in Mahukona, Kohala will also complete the the process of assessment and evaluation for apprentice captains and navigators for Makali'i. This process has not been conducted from Ko'a Holomoana for over 200 years.

m. Explain how the activity benefits the resources of the Northwestern Hawaiian Islands and the Native Hawaiian community.

As stated previously, making Mokumanamana's value relevant to today's Hawaiians and the peoples of Hawai'i is vital.

n. Explain how the activity supports or advances the perpetuation of traditional knowledge and ancestral connections of Native Hawaiians to the Northwestern Hawaiian Islands.

As stated previously, the information gained will benefit both the Western & Hawaiian philosophies of academia. The research will combine native Hawaiian ceremonies, research, collection of cultural, scientific, and historical data, with translated literature from Hawaiian to English. Combining western study with generational knowledge has the potential to further the learning paramount to Mokumanamana's value to Hawaiians and the peoples of Polynesia and Oceania.

o. Will all Monument resources harvested in the Monument be consumed in the Monument? If not, explain why not.

Only any fish that are caught for sustenance while in the monument will be consumed in the monument.

8. Procedures/Methods:

Open Ocean Wayfinding & Papakū Makawalu

Open Ocean Wayfinding utilizes knowledge of the celestial bodies, and other natural elements to guide voyagers, and allow navigators to pull islands out of the ocean. The concept of navigation is that the navigator is the center of the universe and that the elements move around them.

Navigators practice the magic of elemental relationships to assist in successfully pulling islands out of the ocean. Their ability to commune with marine and bird life, along with the clouds, winds, ocean swells, rain, and celestial bodies allows them to always know where they are in relationship to the world that surrounds them.

Papakū Makawalu is a paradigm that comes from the cosmogonic chant called the Kumulipo that systematically organizes the accumulated knowledge obtained through observations and interactions with the natural world and the natural systems over many generations. All knowledge and understanding of the Hawaiian environment was categorized into three distinct houses of learning: Papahulihonua, Papahulilani and Papanuihānaumoku. Papahulihonua covers all natural earth phenomena and cycles; Papahulilani covers all natural atmospheric phenomena and cycles; and Papanuihānaumoku covers all organisms, and any practices and relationships necessary to their survival. As an analytical methodology, Papakū Makawalu affords the modern Hawaiian researcher the ability to thoroughly investigate any subject or topic of Hawaiian epistemologies from multiple perspectives. As a pedagogy, Papakū Makawalu provides the educator with a holistic approach to teaching any Hawaiian topic, practice, or phenomena, which in turn, offers the learner deeper insight into the meaning of the Hawaiian Universe. Mele, Mo'olelo, Pule, and 'Ōlelo No'eau are deconstructed, analyzed and then reconstructed from each house of learning to examine the multiply faceted and holistic approach to understanding the mind of the ancients. Papakū Makawalu has become the methodology that the research team has been utilizing to understand Mokumanamana and the Pahu Manamana o 'Umi on Maunaloa. We intend to use it again and will be training the new research and crewmembers this methodology for our fieldwork.

Documentation with Kawai Productions will be conducted using DSLR camera, drones, and other equipment. These activities are being covered by a separate Special Ocean Use permit application. Kawai Productions has been contracted by NKW to document Project Hanauna Ola, producing a ten-minute video documenting each year of the project. This third year's video is focused on documenting the capstone voyage to Mokumanamana. Jamie Makasobe and 'Āina Paikai of Kawai Productions have both been to the Monument previously and have both trained as voyagers.

Fishing methods used during this voyage to Mokumanamana could include hand-lines while under sail using traditional and contemporary style of lures, handline while at anchorage, free dive with 3 prong spears and net, and pole fishing. Regulations for fishing will be followed, and only enough fish will be caught for sustenance of crew while in the Monument.

NOTE: If land or marine archeological activities are involved, contact the Monument Permit Coordinator at the address on the general application form before proceeding.

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

Common name:

Scientific name:

Hawaiian name:

& size of specimens:

Collection location:

Whole Organism Partial Organism

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

N/A

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

N/A

- General site/location for collections:
- Is it an open or closed system? Open Closed
- Is there an outfall? Yes No
- Will these organisms be housed with other organisms? If so, what are the other organisms?
- Will organisms be released?

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

N/A

11. Describe any fixed or semi-permanent structures or installations, or cultural offerings you plan to leave in the Monument:

Tarps and bevi bags will be used for temporary structures. ‘Awa will be the only offering that will be left in the ocean and on the land. Cordage offerings will be made far out to sea before reaching the island. This cordage is symbolic of the piko that connects Hawai’i Island with Mokumanamana.

12. List all specialized gear and materials to be used in the proposed activities:

Aside from gps, laser pointers, cameras, compasses, ropes, tarps, and water jugs, there will be no other specialized gear or materials utilized.

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

N/A

14. Describe collaborative activities to share samples, cultural research and/or knowledge gained in the Monument:

The EKF research team will generate a report with the assistance of NKW.

15a. Will you produce any publications, educational materials or other deliverables?

X Yes No

15b. Provide a time line for write-up and publication of information or production of materials:

June 2020.

16. If applicable, list all Applicants' publications directly related to the proposed project:
N/A at this time

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

Date

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

NOAA/Inouye Regional Center
NOS/ONMS/PMNM/Attn: Permit Coordinator
1845 Wasp Blvd, Building 176
Honolulu, HI 96818
FAX: (808) 455-3093

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