



MARINE MAMMAL COMMISSION

18 November 2010

Mr. P. Michael Payne, Chief
Permits, Conservation, and Education Division
Office of Protected Resources
National Marine Fisheries Service
1315 East-West Highway
Silver Spring, MD 20910

Re: Permit Application No. 14525 (Oleg Lyamin,
University of California at Los Angeles)

Dear Mr. Payne:

The Marine Mammal Commission, in consultation with its Committee of Scientific Advisors on Marine Mammals, has reviewed the above-referenced permit application with regard to the goals, policies, and requirements of the Marine Mammal Protection Act and offers the following recommendations and rationale.

RECOMMENDATION

The Marine Mammal Commission recommends that the National Marine Fisheries Service approve the permit request, provided that the Service—

- consult with the applicant and the previous permit holder to obtain clarification on whether importations of samples under Permit No. 1009-1640 exceeded the number authorized, and
- require that the applicant obtain all necessary permits under the Convention on International Trade in Endangered Species of Wild Fauna and Flora before importing or exporting any marine mammal parts.

RATIONALE

The applicant is requesting authorization to import whole brains and brain tissues from 10 sub-adult male fur seals over a five-year period for studies on the mechanisms of sleep in fur seals. The subject animals would be captured in Russia incidental to a commercial harvest, held in captivity for experimental studies, and euthanized at the termination of the studies to obtain their brains. Samples would be imported from Russia to the applicant for analysis and exported from the United States to South Africa for additional analysis.

The proposed research is a continuation of research conducted under Permit No. 1009-1640 issued to Dr. Jerome Seigel, also at the University of California at Los Angeles. That permit, issued on 30 March 2004 and valid through 31 March 2009, authorized the importation from Russia of up to six brains from northern fur seals. The Commission provided comments on that application (see letter of 7 January 2003, enclosed).

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The Service requested that the applicant provide information on whether brains and/or brain samples were imported under permit No. 1009-1640, and if so, the number of whole brains and samples that were imported. The applicant responded that during the five-year period during which Permit No. 1009-1640 was valid, the permit holder imported eight fur seal brains and 1,844 samples collected from six northern fur seals. Based on this response, it appears that imports under Permit No. 1009-1640 exceeded the number authorized; that is, the number of animals killed exceeded the number authorized under the permit. The original permit holder, this applicant, and the Service have not yet addressed this issue. Therefore, the Marine Mammal Commission recommends that the Service consult with the applicant and the previous permit holder to obtain clarification regarding this issue.

The Commission believes that the activities for which it has recommended approval are consistent with the purposes and policies of the Marine Mammal Protection Act and other applicable laws.

Please contact me if you have any questions concerning this recommendation.

Sincerely,

A handwritten signature in blue ink that reads "Timothy J. Ragen". The signature is written in a cursive style with a large, prominent "T" and "R".

Timothy J. Ragen, Ph.D.
Executive Director

Enclosure

MARINE MAMMAL COMMISSION
4340 EAST-WEST HIGHWAY, ROOM 905
BETHESDA, MD 20814-4447

7 January 2003

Mr. Stephen L. Leathery
Chief, Permits Division
Office of Protected Resources
National Marine Fisheries Service, NOAA
1315 East-West Highway
Silver Spring, MD 20910

Re: Permit Application No. 1009-1640-00
(Dr. Jerome Siegel)

Dear Mr. Leathery:

The Marine Mammal Commission, in consultation with its Committee of Scientific Advisors on Marine Mammals, has reviewed the above-referenced permit application with reference to the goals, policies, and requirements of the Marine Mammal Protection Act.

The applicant is requesting authorization to conduct the following three research projects: (1) to investigate the anatomy and immunohistology of several structures of cetacean brains; (2) to study sleep in northern fur seals; and (3) to determine the hormonal and peptidergic properties of the extended waking behavior in killer whale and bottlenose dolphin mothers and calves. In the first study, which would be conducted over a five-year period, the brains from three bottlenose dolphins, three harbor porpoises, two common dolphins, and two beluga whales would be imported from Russia over a five-year period. The brains would be collected from animals killed during subsistence harvests, those found dead in fishing nets, and dead stranded animals. No animals would be deliberately killed to obtain samples for the project.

The second study would be conducted over a three-year period, and would involve the importation of microdialysis samples and brains from six northern fur seals captured on Bering Island, Russia, by Russian researchers. The animals, would be temporarily held in captivity for study, then euthanized to obtain the microdialysis samples and brains.

The third study, which would be carried out over two years, would involve the collection of blood and urine from up to six U.S. captive killer whale mother/calf pairs and three captive bottlenose dolphin mother/calf pairs for analysis of hormone concentrations (peptides and sex hormones). In addition, four adult female bottlenose dolphins would be collected from the Black Sea in Russia by Russian researchers, held in temporary captivity for up to two months, administered hormones, and blood sampled. Samples would be imported into the U.S. for analysis.

The Marine Mammal Commission recommends approval of the requested authorization for the first and third proposed studies, provided that:

- (1) concerning projects one and three:
 - the Service require that the applicant obtain the necessary permits under the Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES) for importation of marine mammal brains and other samples; and
- (2) with respect to project three --
 - the proposed activities have been reviewed and approved by the permittee's Institutional Animal Care and Use Committees in accordance with § 2.31 of the Animal and Plant Health Inspection Service's Animal Welfare Act regulations;
 - the Service, in consultation with the Animal and Plant Health Inspection Service, ensure that the permittee's facilities and arrangements are adequate to maintain the requested animals;
 - the Service is satisfied that the proposed activities will not interfere with the eventual release of the bottlenose dolphins maintained in temporary captivity in Russia; and
 - the activities be suspended, pending review and authorization to proceed, if an animal is accidentally injured or killed in the course of the studies.

In regard to proposed project number two, the Commission notes that Section 104(c)(3)(B) of the Marine Mammal Protection Act and Section 216.41(b)(2)(i) of the Service's implementing regulations require that, before a permit can be issued for research involving the lethal taking of marine mammals, the applicant must demonstrate that non-lethal methods for conducting the research are not feasible. Based on the information provided in the application, the Commission does not believe that this requirement has been met. The Commission therefore recommends that authorization for this project be deferred pending receipt of additional information from the applicant. Further explanation should be provided as to why nonlethal means of histological verification cannot be used. For example, why would it not be possible to use computerized tomography (CT scan) or magnetic resonance imaging (MRI) to verify the localization of the microdialysis cannula in the brains of the animals? If nonlethal methods are, in fact, not possible, an explanation should be provided as to why healthy animals must be removed from the wild for the proposed study. Could not stranded, unreleasable fur seals or other stranded, unreleasable species of pinnipeds be used?

The Commission believes that the activities for which it has recommended approval are consistent with the purposes and policies of the Marine Mammal Protection Act.

Please contact me if you have any questions concerning this recommendation.

Sincerely,

A handwritten signature in black ink that reads "David Cottingham" with a stylized flourish at the end.

David Cottingham
Executive Director