DRAFT

FINDING OF NO SIGNIFICANT IMPACT

AVIAN PREDATION DETERRENT PROGRAM
LOWER COLUMBIA AND LOWER SNAKE RIVERS

March 2004

The Corps of Engineers (Corps) proposes to implement an Avian Predation Deterrent (APD) Program at eight of its hydroelectric dams on the lower Columbia and lower Snake Rivers starting in Spring 2004 during the juvenile salmonid outmigration season. These dams comprise part of the Federal Columbia River Power System (FCRPS). The Walla Walla District of the Corps would be responsible for implementing the program at Ice Harbor, Lower Monumental, Little Goose, and Lower Granite dams on the lower Snake River and at McNary Dam on the lower Columbia River. The Portland District of the Corps would be responsible for implementing the program at Bonneville, The Dalles, and John Day dams on the lower Columbia River.

The goal of the deterrent program is to implement the most practical and effective solution for reducing piscivorous (fish-eating) bird usage in areas near the dams where juvenile salmonids are susceptible to predation. The purpose of the program is to implement Reasonable and Prudent Alternative (RPA) action 101 of the National Marine Fisheries Service (NMFS) Final Biological Opinion on the Reinitiation of Consultation on Operation of the Federal Columbia River Power System (FCRPS) (2000). RPA 101 states the Corps shall implement and maintain an effective means of discouraging avian predation at the FCRPS dams where avian predator activity is observed. The Corps has been using various avian deterrent methods at the dams for several years. However, because of RPA 101, the Corps decided to re-evaluate these activities and propose a more formalized program. The proposed program entails implementing and maintaining an effective means of discouraging piscivorous bird predation at all forebay, tailrace, and bypass outfall locations at the Corps' dams on the lower Columbia and lower Snake Rivers.

The Corps proposes to implement the program under the authority of the laws authorizing the construction and operation of the various Federal dams. For McNary, Ice Harbor, Lower Monumental, Little Goose, and Lower Granite dams, the authority is the Flood Control Act of 1945 (Public Law 79-14). For Bonneville Dam, the authority is the Federal Emergency Administration Act of 1933, the River and Harbor Act of 1935, the Bonneville Project Act of 1937, and the Flood Control Act of 1950 (PL 81-516). For The Dalles and John Day Dams, the authority is the Flood Control Act of 1950 (PL 81-516).

The Corps prepared an Environmental Assessment (EA) to evaluate the potential effects of the APD program on environmental resources in and near the project area. The EA was prepared for both Walla Walla and Portland District jurisdictions to provide a comprehensive analysis for the entire program. This EA is tiered off the 1995 Columbia River System Operation Review Environmental Impact Statement (EIS) and the 2002 Lower Snake River Juvenile Salmon Migration Feasibility Report/EIS and these EIS's are incorporated by reference.

The Corps evaluated five alternatives in the EA. These were 1) No Action/No Change (Current Program); 2) Non-Lethal Tools Only; 3) Exhaust all Non-Lethal Tools First; 4) No Corps Program; and 5) Lethal Tools Only. The Corps identified Alternative 1, the No Action/No Change Alternative, as its preferred alternative. This alternative has several components, including:

- Using Animal and Plant Health Inspection Service - Wildlife Service (APHIS-WS) and/or other qualified technical assistance.
- Using all practical and effective non-lethal control methods before using any lethal tools.
- Using limited lethal control methods when persistent individual birds have become conditioned to non-lethal methods.
- Evaluating and using new National Wildlife Research Center and/or other agency approved wildlife damage management tools developed through research.

Visual deterrents, auditory deterrents, exclusion, and shooting are control tools currently in use under the preferred alternative. Tactile, chemosensory, and physiologic deterrents, habitat modification, translocation, contraceptives, egg addling, and avicides are control tools that are available, but not currently used under the preferred alternative. The Corps would use avian deterrents during the juvenile salmonid outmigration season, which is generally between April 1 and August 31 each year.

The other alternatives were not identified as the preferred alternative because they were not as effective as Alternative 1, they were not as cost-effective, and/or they were not as flexible. Alternative 2, the Non-Lethal Tools Only alternative, would only use non-lethal strategies to resolve piscivorous bird damage situations. Because using only non-lethal tools is not as effective at deterring birds as limited use of lethal tools, this alternative would not be as effective or cost-effective in reducing avian predation on juvenile salmonids as the preferred alternative. Alternative 3, Exhaust All Non-Lethal Tools First alternative, would require that all non-lethal tools be implemented, regardless of practicality, effectiveness, or biological, social, and economic consequences, before any lethal tools are recommended or used. This alternative would not be as effective or cost-effective as the preferred alternative. Alternative 4, the No Corps Program alternative would take no actions to reduce piscivorous bird damage on the lower Columbia and Snake Rivers. This would not respond to RPA 101 and would not address the Corps' responsibility to reduce predation on juvenile salmonids. Alternative 5, the Lethal Tools Only alternative, would require using only lethal methods to deter piscivorous birds from preying on juvenile salmonids and would not use a damage management system. This alternative would not allow the flexibility to use non-lethal tools and could result in the unnecessary killing of birds.

The proposed APD program would have impacts on birds and recreation, although none of them would be considered significant. Most of the impacts would be to individual birds of target and non-target species. These birds would expend additional energy moving away from the dams in response to the deterrents or foraging for food in other locations. Individual birds of target species may be killed, but the overall population of the species would not be adversely affected. Recreation in the form of bird viewing at the dams may be reduced by deterrent efforts, as fewer birds would be seen in the immediate vicinity of the dams.

The Corps prepared a biological assessment (BA) evaluating the effect of the APD program on species listed as threatened or endangered under the Endangered Species Act. The BA evaluated the effects of the APD program on terrestrial species, and anadromous and non-anadromous fish species. In the BA, the Corps determined that the program "may affect, but is not likely to adversely affect" bald eagles or bull trout. The Corps sent this to the U.S. Fish and Wildlife Service for their concurrence and received a concurrence letter from them on April 23, 2003. The Corps determined the APD program "may affect, but is not likely to adversely affect" Snake River spring/summer and fall Chinook salmon, Snake River sockeye salmon, and steelhead; Upper Columbia River spring Chinook salmon and steelhead; Lower Columbia River chum salmon, Chinook salmon, and steelhead; and Middle Columbia River steelhead, and have no effect on other listed species. This determination was coordinated with the National Marine Fisheries Service as outlined in their June 5, 2001 letter regarding consultation procedures for implementing action items required by the 2000 Federal Columbia River Power System (FCRPS) Biological Opinion .

The Corps evaluated the effects of the APD on cultural resources. The Corps determined there was "no potential to cause effects on historic properties" at all of the dams, except McNary, because the project (installing additional bird wires) would occur on structures that were not historic properties, or would not add structures to historic properties. For McNary Dam, the Corps prepared a Cultural Resource Inventory Report and determined the proposed bird exclusion system (bird wires) would not alter the appearance of the structure or characteristics that would make it eligible for the National Register of Historic Places. The Corps coordinated its determinations with the Washington Office of Archeological and Historic Properties (OAHP) and Oregon State Historic Preservation Office. The OAHP provided their concurrence in a letter dated April 7, 2003.

The Corps sent letters to the affected Tribes to initiate informal government-to-government consultation for the APD program. Letters dated March 3, 2003, were sent to the Confederated Tribes of the Umatilla Indian Reservation, Nez Perce Tribe, Confederated Tribes of the Colville Reservation, Confederated Tribes and Bands of the Yakama Indian Nation, and Confederated Tribes of Warm Springs. A letter dated March 25, 2003 was sent to the Cowlitz Indian Tribe. The Corps provided copies of these letters to the Columbia River Intertribal Fish Commission. The Corps did not receive any response to the letters.

The Corps evaluated cumulative impacts as to the incremental impact of the proposed action when added to other past, present, and reasonably foreseeable future actions, regardless of what other agency or person undertakes the other actions. The Corps determined that when taken together with these actions, the proposed program would have no significant environmental impact. The United States Department of Agriculture also made this finding for their piscivorous bird damage management program on a regional (State of Washington) and national level.

The technical and environmental aspects of the proposed APD program were evaluated in the program EA. The project has been coordinated with Federal and state agencies, Tribes affected governments, and the public. Public comment was accepted during a public comment period.

I have taken into consideration the technical aspects of the project, best scientific information available, public comment, and determinations of the EA. Based on this information, I have determined that the overall projected effects of this proposed action are beneficial and, based on the information provided, would not result in significant impacts to the quality of the human environment. Therefore an Environmental Impact Statement is not required for the development of this project.

DATE:_____ _____

Edward J. Kertis, Jr.
Lieutenant Colonel, Corps of Engineers
District Engineer
Walla Walla District

DATE:_____ _____

Charles S. Markham
Lieutenant Colonel, Corps of Engineers
Acting District Engineer
Portland District