



**UNITED STATES DEPARTMENT OF COMMERCE
National Oceanic and Atmospheric Administration**

*National Marine Fisheries Service
P.O. Box 21668
Juneau, Alaska 99802-1668*

30 July 2007

Colonel Kevin J. Wilson
District Engineer
U.S. Army Corps of Engineers
P.O. Box 898
Anchorage, Alaska 99506-0898

Re: POA-2007-586-A
Port St. Nicholas

Attn: Robin Leighty

Dear Colonel Wilson:

The National Marine Fisheries Service (NMFS) has reviewed the above referenced application from Mr. Richard Hagan to construct a 4-foot wide by 300-foot long wooden walkway supported by twenty-six 10-inch diameter wood piles, and a 20-foot by 40-foot floating wooden dock supported by two wood or steel piles.

Section 305(b) of the Magnuson-Stevens Fishery Conservation and Management Act (MSA) requires federal agencies to consult with NMFS on all actions that may adversely affect Essential Fish Habitat (EFH). NMFS is required to make EFH Conservation Recommendations, which may include measures to avoid, minimize, mitigate or otherwise offset adverse effects. The Alaska Department of Fish and Game's Anadromous Waters Catalog identifies several anadromous streams draining to Port St. Nicholas. These streams support runs of pink, coho, and chum salmon and steelhead trout. Juvenile salmon use nearshore habitat during spring and early summer for feeding and predator avoidance prior to migration out to sea. The NMFS's Nearshore Fish Atlas indicates that additional MSA species utilize nearshore habitat in the vicinity of Port St. Nicholas. These species include walleye pollock, Pacific sand lance, Pacific cod, juvenile rockfish, Pacific herring, and several species of sculpin. The dock itself as well as the activities associated with its construction could adversely impact these MSA species and their habitat.

In accordance with Section 305(b)(4)(A) of the MSA, NMFS makes the following EFH Conservation Recommendations:

1. No in-water work should be permitted from April 1 through June 15 of any year to protect out-migrating salmon.
2. No docks, ramps, or other structures should be placed in or over eelgrass beds.




3. All pilings should be made of galvanized steel. Piles that are surface or pressure-treated with creosote or treated with pentachlorophenol should be prohibited. Creosote contains numerous constituents that are toxic to aquatic organisms including polycyclic aromatic hydrocarbons (PAHs), phenolic compounds, and nitrogen, sulfur, or oxygenated heterocyclics (Poston, 2001). Leaching of these constituents continues throughout the life of the wood and has been associated with the development of tumors, immune system suppression, decreased fecundity and abnormal embryonic development of fish.
4. Wood that comes in contact with water should be treated with waterborne preservatives approved for use in aquatic and/or marine environments. These include, but are not limited to: Chromated Copper Arsenic (CCA) Type C, Ammoniacal Copper Zinc Arsenate (ACZA), Alkaline Copper Quat (ACQ), Copper Boron Azole (CBA) or Copper Azole (CA). Use wood treated with waterborne preservatives in accordance with Best Management Practices developed by the Western Wood Preservers Institute. Treated wood should be inspected before installation to ensure that no superficial deposits of preservative material remain on the wood. All cutting and boring of treated wood should take place in upland areas; all wood waste materials should be kept out of the aquatic environment and properly disposed of. Any cut wood, wood chips, or sawdust from treated wood that enters the aquatic environment should be collected and promptly disposed of at an acceptable upland site.
5. Drive piles with a vibratory hammer. Pile driving can generate intense underwater sound pressure waves that can injure or kill fish. Vibratory hammers produce less intense sounds than impact hammers (NMFS 2005). Fish have been observed to avoid sounds similar to those produced by vibratory hammers and to remain within the field of harmful sound associated with an impact hammer (Dolat 1997). If an impact hammer is required because of substrate type or the need for seismic stability, piles should be driven as deep as possible with a vibratory hammer before the impact hammer is used.
6. Drive piles during low tide when they are located in intertidal areas. Potentially harmful sound pressure waves are attenuated more rapidly in shallow water than in deep water (Rogers and Cox 1988).

Under section 305(b)(4) of the Magnuson-Stevens Act, the Corps is required to respond to NMFS EFH Conservation Recommendations in writing within 30 days. If the Corps will not make a decision within 30 days of receiving NMFS EFH Conservation Recommendations, the Corps should provide NMFS with a letter within 30 days to that effect, and indicate when a full response will be provided.

If you have any questions regarding our recommendations for this project, please contact Katharine Miller at (907-586-7643) or Katharine.miller@noaa.gov.

Sincerely,

 for D/M
Robert D. Mecum
Acting Administrator, Alaska Region

cc: Applicant
EPA Juneau, Chris Meade*
ADNR, Mark Minnillo*
USFWS Juneau, Richard Enriquez*
ADEC

* e-mail PDF

Literature cited

Dolat, S.W. 1997. Acoustic measurements during the Baldwin Bridge Demolition (final, dated March 14, 1997). Prepared for White Oak Construction by Sonalysts, Inc., Waterford, CT/34 pp + appendices.

National Marine Fisheries Service. 2005. Final Environmental Impact Statement, Essential Fish Habitat Identification and Conservation in Alaska, Vol. 2, Appendix G; National Marine Fisheries Service, Department of Commerce. April, 2005.

Poston, Ted. 2001. *Treated Wood Issues Associated with Overwater Structures in Marine and Freshwater Environments*. White Paper, Washington Department of Fish and Wildlife. <http://wdfw.wa.gov/hab/ahg/overwatr.htm>

Rogers, P.H. and M. Cox. 1988. Underwater sound as a biological stimulus. pp. 131-149. *In* Sensory biology of aquatic animals. Atema, J, R.R. Fay, A.N. Popper, and W.N. Tavolga, eds. Springer-Verlag. New York.