To: Rebecca Chu, U.S. Environmental Protection Agency, Region 10 Cc: Sinang Lee, Khanh Ho, & Community Steering Committee, Public Health – Seattle & King County From: BJ Cummings and Tom Burbacher, University of Washington Superfund Research Program Date: July 17, 2019

RE: UW SRP Comments on EPA ICIAP for Seafood Consumption at the LDW Superfund Site

Thank you for the opportunity to review the Draft Institutional Control Implementation and Assurance Plan (ICIAP) for Seafood Consumption at the Lower Duwamish Waterway (LDW) Site. The UW Superfund Research Group (SRP) is a program of the National Institute of Environmental Health Sciences (NIEHS); our Research Translation and Community Engagement Core (RTC/CEC) is a Resource Member of EPA's Lower Duwamish Roundtable and a participant in EPA's LDW Healthy Seafood Consumption Consortium (HSSC). UW SRP is currently focused on research related to the toxicity of metals in the Duwamish River, Puget Sound, and Washington State lakes, and our RTC/CEC has partnered with EPA, other agencies, and community organizations working on the LDW Superfund Site since 2001.

UW SRP congratulates Public Health – Seattle & King County for developing a comprehensive and ambitious Institutional Control Plan for fishers and seafood consumers using the LDW Superfund Site. The ICIAP was informed by a Community Steering Committee (CSC) representing the directly affected fishing community and members of their families. This commitment to community-based planning in a largely immigrant, low-income and multilingual community demonstrates a deep commitment to environmental justice principles. The approach taken to developing the ICIAP focuses on environmental justice communities as primary stakeholders and designers of the IC goals and strategies, and ensures those directly affected by contamination at the Superfund site have a voice in the local agencies' health risk communication and decision-making processes. The Plan also recognizes that the 15 members of the CSC do not represent all of the LDW's affected communities, and makes allowances for expanding the reach of the program through targeted grants to other ethnic groups and service providers.

UW SRP believes that EPA can strengthen the ICIAP even further, augmenting the work of Public Health-Seattle & King County and its Community Steering Committee, to place this plan on the leading edge of IC planning for fish consumption nationwide. While Pubic Health's process to develop a draft plan was grounded in environmental justice principles and inclusive of the affected community, some limitations in EPA's approach may compromise its impact. In order to maximize the plan's public health protections, the ICIAP should include strategies to limit health risks from consuming PCB-contaminated salmon, as well as resident fish.

While the risks of consuming salmon are lower than for resident fish, the Washington State Department of Health recommends limiting consumption of Puget Sound salmon (including from the Duwamish River) to 2-3 meals per week for most species. The LDW fishing community includes ethnic groups that typically consume more seafood than this, e.g., Asian & Pacific Islanders eat up to 11 oz/day (Washington State Department of Ecology Fish Consumption Rates Technical Support Document, Pub #1-09-050, September 2011). The primary source of PCB-contamination in Puget Sound is past and ongoing contamination of its urban bays, including the LDW. The information on salmon advisories should be included in all educational ICs implemented as part of the ICIAP.

In addition to including the existing salmon advisory, the ICIAP should recognize that salmon are only available part of the year. In order to encourage the (limited) consumption of LDW salmon year round, instead of resident fish and shellfish, EPA should consult with the CSC about the value of adding information about freezing/drying/storing fish for when salmon are out of season.

 EPA's "scope" restrictions place the bulk of the burden squarely on the affected community.
Community-developed strategies that shift a portion of the burden to responsible parties should be moved from ancillary "recommendations" to "strategies" under the formal IC Plan.

Despite frequent reference to NEJAC guidance, the ICIAP does not satisfy established environmental justice principles. The CSC developed a set of institutional controls that included measures to replace contaminated fish resources with access to healthy fish, a remedy similar to the provision of alternate water supplies, and clearly authorized under CERCLA (Sec. 101(23), 42 U.S.C. 9601(23)). Nevertheless, EPA determined that many of these measures were "out of scope" of the ICIAP, and included them only as recommendations that require voluntary partnerships by third parties, such as those participating in the HSSC. Without these measures, all of the remaining strategies require behavioral changes by the fishers themselves. Indeed, the Draft ICIAP states, "Like NEJAC, Public Health recognizes that informational campaigns alone that focus only on individual behavior change are not effective, sustainable, or fair – they place an undue burden on the communities that face environmental injustice." The document then goes on to describe complementary measures to address social, economic, and environmental barriers that EPA explicitly states are "out of scope." Despite this, the Cambodian CSC group maintained that they still wanted these measures included in

the formal IC Plan, regardless of the source of funding, while the other groups acquiesced to EPA's definition of the ICIAP's "scope."

UW SRP supports the implementation of all of the strategies and recommendations included in the Draft ICIAP, and makes a commitment to partner with Public Health and the CSC to help implement the recommended measures. However, the existing Record of Decision and supporting materials clearly state that some of the excluded measures are, in fact, within EPA's regulatory authority to include in the formal IC Plan. Eligible measures described in EPA's records include those defined as "offsets" in the Response to Comments and EPA's Environmental Justice Analysis for the LDW. EPA defines offsets as "mitigations which consist of the temporary substitution of healthier seafoods or bolstering of healthier seafoods as alternatives to consuming contaminated resident seafood.' These offsets include direct compensation for lost fishing access, enhanced habitat restoration solely as mitigation, *and substitute seafood*" (Responsiveness Summary: 2.32.10; emphasis added). Specific strategies recommended in the ICIAP include subsidizing cleaner sources of seafood (e.g., supermarket coupons), providing fish at local food banks, and transportation to alternate fishing sites.

EPA's Environmental Justice Analysis for the LDW recommends that EPA: "Establish a mechanism to provide offsets in the event of higher short term concentrations in fish tissue in the LDW: fish trading may be most straightforward, but there would be cost savings potentially through a sustainable aquaculture or alternative transportation method." The EJ Analysis explicitly recommended this be a requirement, not a voluntary program. No ICs were directly included in the ROD, as the ICIAP had not yet been developed, but the Responsiveness Summary published by EPA states: "EPA does not agree that it does not have the authority to select offsets (such as fish trading)... EPA intends to work with a community advisory committee, and if this committee recommends offsets, and EPA, the community, Tribes, and other stakeholders can find a workable approach to implementing offsets, EPA will consider selecting them in the future." This conclusion is included in the official record for the site, and should govern unless the administrative record is amended accordingly.

The CSCs recommended measures for healthy fish and transportation "offsets" include suggestions for how to administer an offset program – e.g., via local food banks. The recommended measures are vital to promoting the health of LDW fishers and fish consumers, will help shift the burden of ICs to responsible parties, and will assist in making the ICs enforceable, in accordance with existing EPA guidance. UW SRP therefore urges EPA to adopt the CSC's offset-related recommendations and fully include them as formal strategies under the ICIAP.

3. EPA should expand public review of the ICIAP to the broader fishing community.

EPA guidance on Institutional Controls requires all ICs to be as rigorously evaluated as all other elements of the remedy, and calls for providing appropriate notice and opportunity for public comment. The process followed by EPA to develop this ICIAP is innovative in several positive ways, but should not preclude opportunities for rigorous review and input from the broader affected community, especially Duwamish fishers and fish consumers who are not contracted by Public Health – Seattle & King County to sit on the 15-member CSC. Many of these fishers have suggested strategies that are not included in the ICIAP over the past 15 years of community engagement with fishers – these suggestions should be heard and considered by the CSC, and the reasoning for their adoption or exclusion provided to the affected fishing stakeholders. This would result in a more robust IC Plan with greater community buy-in, strengthening the reach, impact, and public health benefits of the resulting IC program.

Thank you again for the opportunity to review and comment on the draft ICIAP. UW SRP looks forward to continuing to be a resource to EPA and our LDW agency and community partners working to protect the health of the Duwamish River's diverse resident, worker, recreational, and fishing communities.