CREC

Campbell River Environmental Committee

CREC , PO Box 20092 STN. A, Campbell River, B.C.,V9W 7Z5

Regional Manager
Environmental Protection
2080-A Labieux Rd
Nanaimo B.C.
V9T 6J9

June 12, 2014

Comment re the Browns Bay Packing Company Ltd application to amend Waste Permit PE-8124

Dear Sir;

Page 22 of the Browns Bay Packing Company May, 2013 Technical Assessment shows typical daily processing flows of 300m3 although its permit restricts daily flows to 28m3.

The Campbell River Environmental Committee is curious to know why the Browns Bay Packing Company is allowed to operate under these circumstances?

CREC believes that any increase in permit levels must have secondary treatment that meets Best Aquaculture Practices (BAP), such as flocculation, to reduce total suspended solids (TSS) and biological oxygen demand (BOD) at the point of discharge and also ultra violet treatment to reduce viral and disease loads to a 3 log reduction. It is understood that Walcan on Quadra Island and the processing plants at Port Hardy and Tofino all use flocculation and ultra violet treatments to achieve BAP.

CREC would like to know the remedy for, as stated on page ii of the Browns Bay Packing Company May, 2013 Technical Assessment, "the estimated BOD concentration (140 mg/l) is slightly higher than the value in the draft permit (130 mg/l)"?

CREC has concerns with the risk of using a chlorination and dechlorination treatment presently used at the Browns Bay Packing Company, especially when increasing the volume of fish and the volume of waste effluent to be treated. There is always a risk of mechanical or human error that could discharge chlorinated water to the bay. "Due to the relative buoyancy of the effluent in seawater, the rising plume could have an acute impact on finfish or marine mammals in the vicinity above the outfall diffusers...." Source, Brown's Bay May, 2013 Technical Assessment, p.ii

Page 18 of the Browns Bay Packing Company May, 2013 Technical Assessment states, "Typically, diseased fish are not being processed, and the effluent is not chlorinated. In the event that infected fish and bloodwater are being processed in the plant unwittingly, the risk of discharging wastewater that has not been disinfected increases substantially."

In an April 2012 televised interview, former Provincial Veterinarian, Dr. Gary Marty confirmed he found the Piscine Reovirus (PRV) in 60 to 70 percent of BC farm salmon he tested. He said, " We don't know anything about how contagious it is but the fact that it occurs in 60 to 70 percent of the fish suggests that it's quite contagious."

A study published in the April 9, 2012 Veterinary Research Journal titled “Immunohistochemical detection of piscine reovirus (PRV) in hearts of Atlantic salmon coincide with the course of heart and skeletal muscle inflammation (HSMI)”shows the association between PRV and HSMI and strengthens the hypothesis of PRV being the causative agent of HSMI. [http://www.veterinaryresearch.org/content/43/1/27]

A 2010 Public Library of Science publication titled “Heart and Skeletal Muscle Inflammation of Farmed Salmon Is Associated with Infection with a Novel Reovirus” provides evidence that HSMI is associated with infection with piscine reovirus (PRV) and concludes that measures must be taken to control PRV not only because it threatens domestic salmon production but also due to the potential for transmission to wild salmon populations. [http://www.plosone.org/article/info%3Adoi%2F10.1371%2Fjournal.pone.0011487]

That fact that 60 to 70% of farm fish have the picine reovirus is not debated. Even if industry debates the reports that PRV is associated with HSMI, these findings are published by credible organizations and all fish processed should be treated as diseased, based on the precautionary principle.

In discussion of the formation of Disinfection Byproducts (DBP) on page 21 of the Browns Bay Packing Company May, 2013 Technical Assessment it states, "Typically, diseased fish are not being processed, effluent is not chlorinated, and there is no risk of DBP formation." If all fish waste effluent was treated with chlorine, the formation of DBP would be a concern. Ultra Violet treatment to a 3 log reduction would be a better choice.

The Browns Bay Packing Company is seeking a huge increase in their waste effluent proposal. To receive approval, the Browns Bay Packing Company should be required to treat all processed fish waste effluent employing Best Aquaculture Practices of the industry to insure the least risk to our environment.

Yours truly,

Campbell River Environmental Committee

per

Leona Adams,
President

Cc

Lorne Sandberg, h2ops@hotmail.ca