Pollution: think local, think Strait of Juan de Fuca
Victoria bound ships proven polluters of the ocean

Carnival and its Princess Line make marine history with a $40 million plea bargain fine for the dumping of oily waste into the ocean

Four of the five Princess Line ships found to be purposely polluting the oceans were/are port-of-call ships in Victoria. In addition to the $40 million fine for dumping oily waste into the ocean, Carnival's Princess Cruises pleaded guilty to **seven felony charges**, relating to what US officials called **"a campaign of obstruction in an effort to hide the deliberate pollution".**

The Whistleblower, a newly hired engineer, resigned and walked ashore in England and reported the "magic pipe" used in the *Caribbean Princess* to British authorities. The pipe was used to deceive authorities, to bypass 'safeguards' which were to monitor discharges into the ocean. By dumping "bilge water", a mixture of water, oil and other chemicals, in the ocean rather than filtering it and storing it until in port, the cruise-line avoided costs related to storage/recycling/disposal.

US investigators found that four other Princess ships were purposely polluting the ocean: *"in addition to the use of a magic pipe to circumvent the oily water separator and oil content monitor required pollution prevention equipment . . . two other illegal practices . . . on the* ***Caribbean Princess*** *as well as four other Princess ships –* ***Star Princess, Grand Princess, Coral Princess and Golden Princess.*** *One practice was to open a salt water valve when bilge waste was being processed by the oily water separator and oil content monitor . . . to prevent the oil content monitor from otherwise alarming and stopping the overboard discharge . . . . The second practice involved discharges of oily bilge water originating from the overflow of graywater tanks into the machinery space bilges . . . pumped back into the graywater system rather than being processed as oily bilge waste. Neither . . . were truthfully recorded in the oil record book as required. All of the bypassing took place through the graywater system which was discharged when the ship was more than four nautical miles from land."*

These deceptive practices were anticipated, but not proven, during the period that the **James Bay Air Quality Study** was underway; same ships, same players.

During the period with high sulphur dioxide levels in Victoria, the ***Golden Princess*** was considered a dirty ship, perhaps the dirtiest ship. It received 2012 JBNA Dirty Ship of the Year recognition in the team category. It was also in port during the extreme SO_2 measure in 2014.

Although the sulphur dioxide levels are now at acceptable levels, other compounds being emitted are problematic – and are NOT being measured. In 2016, the ***Grand Princess*** emitted dark plumes throughout the many hours it was in port and the majority of emissions complaints occurred while the ***Grand*** was in port.

As Victorians concern themselves with oil tanker traffic, it is valuable to remember that
~ About **1000 cruise-ship pass along the BC coast** during the 6-month season, with half in Strait of Juan de Fuca waters.
~ Cruise-ships are large resorts and carry high volumes of fuel. A comparable ship, the *Costa Concordia*, carried half a million gallons of fuel. The emptying of the Costa Concordia fuel tanks, pumping **2,300 tonnes of diesel fuel** from 15 tanks, took two months.
~ Unlike Alaska which has an Ocean Ranger program charged with monitoring cruise-ship discharges of effluents/emissions, neither BC nor Canada has equivalent watch-dog capability.