

THE FOREST LANDS OF SHIRLEY – JORDAN RIVER COULD BECOME GREATER VICTORIA'S NEW GARBAGE DUMP

The CRD has received an application for re-zoning to allow a composting facility to be operated on Lot 72 of the Private Managed Forest land above Sandcut Beach, a Regional Park. The proposal to build a composting facility in Shirley-Jordan River seems innocent at first glance, but is it a Trojan horse that could affect air quality, ground water, wide patches of forest floor, wild life and property values?

The Juan de Fuca Land Use Committee will make a recommendation to Regional Director Hicks on this application on January 20, 2015. Residents of Shirley-Jordan River have the opportunity and responsibility to become involved in the discussion and process by attending meetings, learning the facts, and questioning and advising decision makers on the community's will.

Background

The CRD has banned all organic matter from the Hartland landfill as of 1 Jan 2015. Hartland serves more than 382,000 people¹ and receives over 131,000 tonnes of municipal solid waste per year.² Of this, approximately 75,000 tonnes of compostable waste are produced per year. This is composed of:

- Food, yard and other organic waste - 30.4% or approximately 40,000 tonnes.
- Paper and paperboard - 16.5% or about 22,000 tonnes. Most of non-recycled paper is food packaging and other soiled items that cannot be recycled but composted.
- Wood and wood products - 9.9% or about 13,000 tonnes. Wood in shredded form is a necessary component in the material mix.
- Plastic - 13.1% or 17,000 tonnes of the mix.³ A considerable percentage of plastic will contaminate the organic waste; for instance plastic food packaging (e.g. coffee cartridges), garbage bags and cups etc.

(Organic waste from Saanich is not included in these numbers. "Saanich has signed a separate five-year deal to compost an estimated eight to 11 thousand tonnes a year of residential kitchen scraps and yard waste at Fisher Road Recycling in Cobble Hill"⁴. The owner of Fisher Road Recycling is Mr. Laing. Nothing would prevent Mr. Laing from processing Saanich garbage in the proposed facility, and it will be probably happen sooner than later because afflicted people in Cobble Hill oppose him: "We really don't want to be turned into an outhouse for Victoria."⁵)

The compostable waste from Saanich and Hartland without the plastic contaminants make a **total of about 86,000 tonnes of organic waste per year**. Mr. Laing and the CRD may say that the application is for a much smaller amount, but this may not be accurate, because the waste problem is growing.

14 Huge Transfer Trucks with Trailer Per Day – Round Trip

“A transfer dump is a standard dump truck pulling a separate trailer . . . [they] typically haul between 26 and 27 short tons”⁶, that is about 24.5 metric tonnes. 86,000 tonnes are over 3,500 truckloads - this is 14 trips of heavy duty trucks with trailers per working day (251).

Organic Waste Is Heavily Contaminated

Collection of organic waste is not organized or monitored by the CRD. The collection modus depends on the municipality.⁷ As in other jurisdictions, the organic matter will be heavily contaminated with non-compostable garbage. Unfortunately, many people seem to consider compost collection as a cost-free alternative to garbage collection and there are no means to prevent this. Nobody knows how many batteries, compact fluorescent lamps, medications, mineral oils and other dangerous pollutants will end up in the “compost”. The finished product will be a mix of organic waste, dangerous plastic products⁸ and other poisonous contaminants like herbicides⁹. Even if some of the non-compostable materials are sorted out, most of it will be shredded in small pieces together with the organic matter.

Leachate is Integrated in the Finished Product

“All leachate from the facility is reused as part of the process”¹⁰ means that it will be sprayed on the composting pile. Water will evaporate over time and the toxins, e.g. nitrate¹¹, will bind to the compost. Mr. Laing explained that facilities located at landfills pump their leachate into the garbage dump, but with his method this is not necessary.

The Contaminated End Product is Spread Out on Forest Land

The contaminated organic matter/ plastic mix will be spread out in the surrounding forest lands. 86,000 tonnes of garbage generate about 50,000 tonnes of compost per year¹², this is about 77,000 cubic yards¹³. Mr. Laing confirmed that there is no market for huge amounts of “compost”. He intends to buy up forest lands, spread out the end product and plant trees. Since Mr. Laing will use the finished product on his own properties, no one will control the garbage content or curing state; “the finished compost isn't regulated by any level of government. In other words, it can smell as wretched as it wants and not much can be done about it”¹⁴ and it can be poisonous and nobody will control it. A “1 inch layer of compost covering 1 acre will require about 134 cubic yards of compost.”¹⁵ If Mr. Laing spreads out the compost 1 ft. deep (which would be excessive), he would cover about 48 acres per year with the polluting product.

Contaminants will Pollute Highly Vulnerable Aquifers

When it rains and when the compost breaks down, some contaminants will be washed into streams, but most will seep into the ground. Eventually it could poison our ground water. The areas around Sandcut Creek have, according to the new OCP, “highly vulnerable unconfined aquifers . . . and permeable sand and gravel soils. Industrial or commercial uses which have the potential for spills, leaching or produce pollutants should be not be sited in these areas.”¹⁶

Odor Will be Released into the Environment

The proposal promises “state of the art odor control”. Mr. Laing’s other “state of the art”

facility in Cobble Hill is a terrible nuisance to its neighbours. Problems are not solved but are a “sporadic and ongoing thing” as a CVRD director confirmed. Mr. Laing gives the impression that odor would be prevented. This could be misleading as a statement of Juan de Fuca Electoral Area director Mike Hicks proves: “As far as Hartland is concerned, I absolutely, totally disagree 1,000 per cent. We’re only doing it because we own it. We also own tens of thousands [of hectares] of watershed land. We could put it out there where there’s no people and there’s no smell [problem]. We shouldn’t put this next to people,’ Hicks said. Hicks said the closest house to Hartland is only 1,200 metres away. ‘We would have to make the most state-of-the-art compost thing ever built. We couldn’t have a whisper of a smell,’ Hicks said.”¹⁷ There will be a smell problem.

Greenhouse Gases will be Released in the Environment

Organic waste produces nearly all the greenhouse gases that are emitted from landfills. The CRD’s Long-term Landfill Gas Management Plan¹⁸ will become a farce when only existing landfill emissions are captured and greenhouse gases of future waste is released, as composting will not prevent greenhouse gases.¹⁹

Wood Shredding Causes Noise Disturbance

To make aeration possible, organic waste has to be mixed with materials that allow airflow, e.g. wood chips. Large amounts of wood need to be shredded, likely much more than the 13,000 tonnes delivered for composting. This process requires a lot of energy and produces a lot of noise.

Biosolids (Sewage Sludge) could be Disposed of in Shirley – Jordan River

Sewage plants produce large amounts of biosolids and when Victoria’s new sewage plant is finished, there will be even more in Greater Victoria. When Shirley – Jordan River is the dumping ground of Greater Victoria this material might also end up here, as there are no restrictions. Vancouver Island University is already experimenting with the fertilization of forests.²⁰ Biosolids may be good fertilizers, but they are toxic.²¹

Organic Waste could be Imported from Other Jurisdictions

Not only could we become the garbage dump of Greater Victoria, but we would be in danger of waste from other jurisdictions and toxic materials, as are Nanaimo²² and Shawnigan Lake²³. The population of British Columbia is predicted to grow in the next 20 years from about 4.5 Million to about 6 Million²⁴ and all the additional garbage has to go somewhere.

Huge Amounts of Gravel will be Extracted – More Room for Future Dumps

Mr. Laing acknowledges that the long drive of his trucks to Jordan River is seen as a problem for the environment. He therefore intends to fill the empty trucks with gravel for the drive back to Victoria. He has already spoken to the owner of the Jordan River gravel pit. Of course, he could also create his own gravel pits on the parcels he plans to buy for dumping the final product. When exhausted, former gravel pits make great dump sites.

The Golden Nematode could be Introduced to Shirley and Jordan River

The golden nematode is a pest primarily infesting potatoes and tomatoes, as well as a variety of other root crops. 'Golden Nematode Order SOR/80-260' by the federal Minister of Agriculture is "Prohibiting and Restricting the Transportation and Movement of any Plant or Other Matter that is Likely to Result in the Spread of the Golden Nematode . . ."²⁵ As all of the waste collection areas are within the restricted movement area and the proposed property is outside, and an infestation cannot be ruled out, the transport of the waste material would be illegal.

Wildlife will be in Danger of Being harmed by Rat Poison

Mr. Laing confirmed that together with the waste, rats will be transported to the garbage processing site. He intends to solve the rat problem by large scale poisoning. The poisoned rats will be prey for wild animals and harmful to them.²⁶

The Compost Facility will Cost Jobs

Mr. Laing promises 10 new jobs in the area, but in reality there will be a net loss of jobs. No tourists will want to stay near the place where Greater Victoria's waste is processed and dumped. Tourist resorts, B&Bs and restaurants will pay a steep price and employment will be affected.

Shirley – Jordan River will Change from Forestry and Residential to Industrial

The forest lands that were released from the Forest Land Reserve could all be used for a different purpose as soon as they are harvested. After all, the forest companies sell those lands because it generates a larger Return of Investment than to replant. A large number of residential properties are offered already in our area, so more residential subdivisions are, at the present time, unlikely. If in such a situation properties are rezoned for industrial purposes, it will have a radical effect: no developer in his right mind will develop a property located near an offensive industrial operation for residential purposes. Sooner or later the neighbouring properties could also be sold for industrial purposes - a chain reaction that would change the character of Shirley and Jordan River forever.

There are Much Better Options

There are other locations for organic waste processing: "The Malahat First Nation near Mill Bay is offering to take and process all kitchen food scraps collected in the capital region. . . . Victoria Coun. Ben Isitt, who has been championing an in-region composting facility at Hartland, agreed the Malahat offer should be explored."²⁷ But before making any decision we should study how countries with well-developed waste management strategies handle the problem. Germany is probably decades ahead of BC and dumping in whatever form is a long obsolete method.

The Political Process is Questionable

Municipal elections took place on November 15, 2014. On November 20, Mr. Laing introduced his proposal to residents of Jordan River and Shirley. Mr. Laing confirmed that he had been discussing this proposal with Director Hicks for months and that Mr. Hicks had visited his Fisher Road operation numerous times. At the same time, an OCP review committee has been

working on an upgrade of the Shirley-Jordan River OCP for several months, however the possibility of a composting facility was not mentioned until very recently.

¹ Cf. <https://www.crd.bc.ca/docs/default-source/crd-document-library/annual-reports/solid-waste/2013-erm-annualreport-web.pdf?sfvrsn=4>, page 6

² Cf. Ibid., page 30

³ Cf. Ibid., pages 8-9

⁴ <http://www.timescolonist.com/news/local/capital-region-food-scrap-will-be-shipped-to-richmond-1.949555>

⁵ <http://www.cowichanvalleycitizen.com/news/cobble-hill-foes-dump-on-compost-expansion-1.943238>

⁶ http://en.wikipedia.org/wiki/Dump_truck

⁷ Cf. <https://www.crd.bc.ca/docs/default-source/recycling-waste-pdf/-what-is-happening-in-each-municipality.pdf?sfvrsn=0>

⁸ Cf. <http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2873017/>

⁹ Cf. <http://whatcom.wsu.edu/ag/aminopyralid/Factsheet2010.pdf>

¹⁰ Cf. Notice of Information Gathering Meeting

¹¹ Cf. <http://www.cvrld.bc.ca/DocumentCenter/Home/View/9842>

¹² Cf. <https://www.crd.bc.ca/docs/default-source/crd-document-library/annual-reports/solid-waste/2013-erm-annualreport-web.pdf?sfvrsn=4>, page 22

¹³ Cf. http://www.answers.com/Q/How_much_does_1_cubic_yard_of_compost_weigh

¹⁴ <http://www.cowichanvalleycitizen.com/news/noxious-compost-smell-has-industrial-park-tenant-fuming-1.702873>

¹⁵ <http://lawpca.org/CF/usesandapplicationrates.html>

¹⁶ <https://www.crd.bc.ca/docs/default-source/jdf-pdf/shirley-jordan-river-ocp/pps-jdf-2014-09-01-sjr-roughdraft-2.pdf?sfvrsn=2>, page 13

¹⁷ <http://www.timescolonist.com/news/local/capital-region-food-scrap-will-be-shipped-to-richmond-1.949555>

¹⁸ Cf. <https://www.crd.bc.ca/docs/default-source/crd-document-library/committeedocuments/environmentalservicescommittee/20120222/2012-february-22-item-07-erm-12-12-hartland-landfill---long-term-landfill-gas-management-planR.pdf?sfvrsn=0>

¹⁹ Cf. <https://www.agronomy.org/publications/jeq/abstracts/30/2/376>

²⁰ Cf. <https://www2.viu.ca/forestry/documents/FAQsVIUBiosolids.pdf>

²¹ <http://www.planetnatural.com/compost-sewage/>

²² <http://www.nanaimodailynews.com/news/incinerator-backers-won-t-withdraw-proposal-just-yet-1.965288>

²³ <http://www.watershedsentinel.ca/content/shawnigan-lake-residents-picket-environment-ministry-crd-votes-toxic-soil-dump-proposal>

²⁴ Cf. <https://www.crd.bc.ca/docs/default-source/regional-planning-pdf/RGS/crdrgs-final.pdf?sfvrsn=0>, p.8

²⁵ <http://laws-lois.justice.gc.ca/eng/regulations/SOR-80-260/page-1.html#h-1>

²⁶ Cf. <http://blog.nwf.org/2013/01/super-potent-rat-poison-hurt-wildlife-pets-kids/>

²⁷ <http://www.timescolonist.com/news/local/malahat-first-nation-offers-to-take-food-scrap-from-capital-region-1.947819>