

DELEGATION REQUEST

Name of person speaking: Jenny Steel

Organization you are representing: Curtis Road Residents Association

Primary purpose of the organization: Community Advocacy

Number of members: 85

Mailing address:

495 Curtis Road

Comox, BC V9M 3W1

Contact name: Jenny Steel

Subject matter: Community concerns re EQ Basin and other issues -- update

Requested meeting date: Sewage Commission - November 5 2019

Audio-visual equipment needed: PowerPoint presentation

CVRD Sewer Services Update to Sewage Commission

Curtis Road Residents Association
November 5, 2019

EQ Basin

- ▶ Much larger surface area than the primary clarifiers and bioreactors combined
- ▶ Will contain diluted primary effluent
- ▶ Staff refused to model the odour impact to the community
- ▶ Two reports gave heads up on potential odour issues
- ▶ What's the plan if it stinks up our homes?



Bioreactor Odours

- ▶ Issue brought to Commission in April 2019 with decisions in May for:
 - Odour Modelling to determine if the 2018 \$2m controls were effective at reducing odours by 80%
 - Updated cost estimates for bioreactor odour controls
- ▶ Decision making targeted for September
- ▶ Decision-making now apparently depends on selecting an odour standard -- even though adherence to the Ontario standard had been used to justify the 2018 upgrades

Was the 2018 investment effective?

- ▶ \$62k for odour sampling and modelling over three days:
 - 15 direct samples of bioreactors
 - Odour dispersion modelling
- ▶ November Staff report shows:
 - Average Odour reduction was 47% not 80% (Staff report Table 2)
 - Bioreactor odours increased by 31% -- from 1502 OU's to 1962 OU's (Staff report Table 1)
- ▶ These results back up community experience and complaints -- that there 's a major odour issue

Sensitive Receptor	2016 OU'S	Sept. 19th OU's	Percent Reduction
SR1	5.45	1.33	76%
SR2	6.8	5.01	26%
SR3	5.9	3.75	36%
SR4	8.5	6.12	28%
SR5	11.1	4.95	55%
SR6	10.6	4.74	55%
SR7	10	4.17	58%
SR8	9.7	2.94	70%
SR9	4.57	3.35	27%
SR10	5.22	3.28	37%
SR11	6.54	2.55	61%
SR12	7.7	6.27	19%
Average	7.67	4.04	47%

One Odour Unit is the point at which 50% humans can detect an odour

Updated Cost Estimates

- ▶ ISL was engaged to provide class C cost estimates – new estimate of \$8.4m
 - Scope included *“to develop more treatment options, if feasible”*
- ▶ Staff report states that none of the plants they surveyed have covered bioreactors however:
 - Eight are located in rural or industrial areas with no need to cover
 - Two have different secondary treatment processes that are not comparable
 - One is located in an urban setting and currently undergoing a \$33m upgrade *“with a focus on odour control”*
 - Mcloughlin Point and North Vancouver completely encloses all open basins including secondary treatment
- ▶ Covering bioreactors and treating the foul air appears to be the accepted way to solve odour problems in residential areas.

Bioreactor Odours

- ▶ Is the Commission prepared to find \$8.4m to solve the odour problem if that's what it takes?
 - 45 year investment
 - \$188k on a \$7m annual operating budget
 - Less than \$5 per user per annum
- ▶ In perspective:
 - \$7.6m to expand composting
 - Approved \$7.1m for EQ Basin
 - \$9m Cumberland Host Community Benefit
- ▶ Savings from EQ Basin project was >\$3m

Odour Standard

- ▶ Selecting an odour standard should be based on avoiding nuisance to neighbours, avoid Bylaw complaints, avoid nuisance law suits and meet EPA legislation
- ▶ We had requested adoption of the Ontario Standard because it was:
 - Agreed to by Sewage Commission in 2017 when staff assured Commission that the 2018 investment would meet that standard
 - Suggested standard in LWMP discussions
- ▶ Staff Survey of twelve BC plants supports the Ontario standard
 - Five of the plants have set “minimally detectable” or no odours at sensitive receptors along with a 5 OU Design Limit* at the property line
 - Kelowna has a 5 OU Design Limit –no complaints were received in 2018 so it can be assumed that its target is minimally detectable or no odours.
 - Five plants are out in the boonies and haven’t set any standards
 - French Creek has no standards but they are planning a \$33m upgrade with a focus on odour control

* OU Design Limits provide a margin to deal with **abnormal** situations such as an equipment or power failure

Mcloughlin Point

- ▶ Five odour units is a “design limit” to provide a margin to deal with abnormal situations:

“Under normal operating conditions, atmospheric odour modelling predicts that the odour at the plant's property line will be approximately two odour units. The performance standard within the contract of up to five odour units provides a margin to deal with an extraordinary event such as an equipment or power failure.” Core Area Wastewater Treatment Project Board – Letter to Mayor of Victoria May 31 2017

- ▶ Two odour units at the property line results in less than 1 OU , the Ontario Standard, at the closest residential sensitive receptors – see next slide



CRD – Odour Control Information Sheet

Conclusion

- ▶ Old and new odour models back up the community's complaints
- ▶ Old and new engineering studies support covering of the bio-reactors
- ▶ Staff's own research supports the Ontario Standard of "minimally detectable" odours (<1 OU) at sensitive receptors

Decide now one way or the other