

**SOURCE TO TAP WATERSHED ASSESSMENTS FOR
PEACHLAND CREEK AND TREPANIER CREEK**

Summary Notes for the Stakeholder Meeting

Held October 15, 2009 (3:00 to 5:00 pm)
at the Peachland Community Center, Council Chambers Office, 4450 6th Street, Peachland

Attendees:

Mirjam Glass – District of Peachland (mglass@peachland.ca)
Doug Allin – District of Peachland (dallin@peachland.ca)
Solvej Patschke – Ministry of Environment (Solvej.Patschke@gov.bc.ca)
Rob Dinwoodie – Ministry of Forest and Range (rob.dinwoodie@gov.bc.ca)
Clay Bradley – Ministry of Forest and Range (Clayton.Bradley@gov.bc.ca)
Ralph Backer – Ministry of Forest and Range (ralph.backer@gov.bc.ca)
Margaret Bakelaar – Central Okanagan Regional District (margaret.bakelaar@cord.bc.ca)
Zee Marcolin – Golder Associates Ltd. (zmarcolin@golder.com)
Bryn Lord – Interior Health Authority (Bryn.Lord@interiorhealth.ca)
Grant A. Thompson - Heartland Economics LP. Westbank First Nation (grant.thompson@wfndc.ca)
Mike Jobke - Kamloops Woodlot Education Society & BCTS (mike.jobke@gov.bc.ca)
Ted Chudyk - Silver lake Forestry Camp, lease and water licence holder on Silver Lake (info@silverlakekidscamp.com)
Harold Waters - Tolko Industries Ltd. (harold.waters@tolko.com)
Al Springer - Peachland Sportsmen Association
Georges Guilleminot - Brenda Mines (gguilleminot@xstratacopper.ca)
Jessica + Joe Klein - The Homestead Certified Organic Farm (jjhomestead@telus.net)
Cliff Stowell - License holder on Lacoma Lake (homeandweb@shaw.ca)
Genevieve Dunbar - Okanagan Basin Water Board (genevieve.dunbar@obwb.ca)
Keith Fielding – Mayor District of Peachland (mayor@peachland.ca)
Lloyd Hooper - Trepanier Ditch Water Community (hoopershomestead@shaw.ca)



Agenda

1. Introductions
2. Project background - project overview and objectives
3. Drinking water legislation background and policy direction of Interior Health (Bryn Lord, Interior Health)
4. Current and previous activities identified and risks to water quality
5. Input from stakeholders regarding:
 - a. watershed activities, current and historical,
 - b. natural, biological, physical and chemical hazards,
 - c. concerns and issues of stakeholders in relation to the watershed as a water source, and
 - d. identify changes in land use and forestry operations.

Project Background:

The District of Peachland has retained Golder Associates Ltd. to conduct Watershed Assessments for source protection for Peachland Creek and Trepanier Creek, which supply the majority of the District of Peachland's domestic water requirements. The District is required to complete this assessment as part of their operating permit, issued by the Interior Health Authority.

The Watershed Assessment will complete **Modules 1, 2, 7 and 8** of the Comprehensive Drinking Water Source to Tap Guideline. The following provides an overview of each module within the Guideline:

- Module 1. Delineate and characterize drinking water source(s)
- Module 2. Conduct contaminant source inventory
- Module 3. Assess water system components
- Module 4. Evaluate water system management, operation, and maintenance practices
- Module 5. Audit finished water quality and quantity
- Module 6. Review financial capacity and governance of the water service agency
- Module 7. Characterize drinking water risks from source to tap
- Module 8. Propose a drinking water risk management strategy

The Comprehensive Drinking Water Source to Tap Guideline gives water purveyors a tool in which to assess all risks and threats to their water source and incorporate a multi-barrier approach to the protection of the water supply for both quantity and quality. The basis of this approach is to understand all aspects of delivering a clean, safe and reliable water supply from the source to the consumer's tap. The multi-barrier approach examines risks and threats to the water supply at the source, distribution system, management structure, operator training and the overall maintenance of the system. By understanding the risks, problems can be fixed, preventative measures can be incorporated into policy and long-term planning, effective water treatment methods identified and installed and emergency planning completed.

The project initiates this process and starts with identification of risks to water quantity and water quality in the watershed source areas. These include natural and human impacts. After the risks are identified, they are prioritized by a risk assessment process and then the development of strategies to reduce risk is initiated in consultation with a technical committee and stakeholders in the watersheds.

Meeting Purpose:

Peachland Creek and Trepanier Creek are multi-use watersheds and provide a wide variety of values to many different user groups. These include (but not limited to) drinking water, industrial resources, private land and recreational values. The purpose of the stakeholder meeting is to identify potential risks to water quality, water quantity and fish habitat and to initiate a discussion with the stakeholders to safeguard the drinking water supply, either from protection of the source or improvements in areas impacting the source.

The focus on this project is drinking water for Peachland, so the study focus is the watershed areas above the District of Peachland intakes, however, this will also benefit down gradient water users. At this stage of the study we are trying to benchmark where we are now so we can identify areas that need improvement either through mitigation or developing strategies of risk reduction.

Discussion Topics:

Local Water Licensees, Trepanier Ditch Water Users and Residents:

- Expressed concern with water quantity issues on Trepanier Creek and frustrated by requirement to build dam or potentially lose water license allotment.
- Replaced weir in 2006.
- Identified amount of projected and rate of development as a concern for local residents, Trepanier Creek is over licensed as is and increased development will reduce amount of water available to local residents.
- Peachland indicated that development is outside the scope of this study, but Peachland is undertaking a number of studies to examine water use and once meters are installed, Peachland will be able to categorize water uses and identify excesses. This information can be used to better manage the water supply and form policies as required. Currently in BC, domestic irrigation typically doubles water use rates in summer months.
- Pollution reduction in the watersheds is very important.
- Comments that local residents and water users are not consulted sufficiently on watershed activities and development, suggestion to have notification registry for those that want to be notified. CORD commented that there is no standard process for notification and there are also many different ministries that deal with different applications depending on application type and land type, but commented was noted and a good idea.
- Noted some private properties that may be a concern to the water resource (abandoned vehicles, old septic systems, etc.) but concerns that these cannot be accessed and there is nothing that can be done. Also noted that residents offered to assist in identifying these risks years ago but were never contacted. Some discussion on tools available to local governments to compel private property owners to reduce risks to drinking water. Noted that many notification process requirements are to advertise and do not require direct notification – comment that this is inadequate as many times local residents may not see the ad.
- Hikers and fishers are not a problem and help to police area. Explained that as part of the watershed assessment procedure, all risks are identified and then a risk assessment prioritized risks, usually fishers and hikers are not identified as a high priority risk.
- Comment about dogs in the creeks along the Greenway initiative and smokers dropping their cigarette butts along the paths.
- Dead animals in the creek, was a dead deer in Trepanier Creek and no one would take responsibility.

Forestry

- Tenure holders – 95% of Trepanier is in community forest managed by Westbank First Nation (WFN) and Peachland watershed forestry tenure includes Tolko, Woodlot (Kamloops Woodlot Education Society) and BC Timber Sales (BCTS).
- Pesticides not used in community forests for at least 10 years (need to check with Ministry of Highways and Hydro.) Interior watersheds do not have a brush problem like on the coast that use round-up to brush, not that much brush problems in the interior forests. Tolko utilizes manual brushing in community watersheds.
- WFN and Tolko have both completed retention and salvage plans for mountain pine beetle (MPB) and hydrologic assessments of the potential impacts (Tolko is waiting for their report).

- Retention and salvage plans – driver is to salvage MPB impacted wood before it loses its market value. It takes into account where stands are, LRMP, terrain, wildlife and fish habitat, biodiversity, old growth areas, short term recovery impacts, etc. Tolko commented that they leave stream buffers even if trees are highly infested.
- Comment that there was a large clear-cut in Peachland – Tolko explained that the salvage plan does include large cutblocks due to the nature of pine stands, but generally recovery is quick (about eight years for greening an area) and Lodgepole pine is vigorous and comes back quickly in natural areas.
- Comment that forestry needs to work with cattle interests to include natural barriers to stream areas as large cutblocks can provide easy access to streams to cattle.
- WFN commented that urban pressures and increased population has impact their forestry operations.

Wildfire

- Gorman's had a foot or more of soot on-site after the Glenrosa Fire; soot loading to creeks after first large rainfall is a concern to drinking water.
- Discussion around treatment of organic loadings in creeks after a fire and potential impact to treatment plant. With the fires in community watersheds in the past few years, studies are being conducted to examine organic and chemical impacts on water quality and strategies are being developed to assist purveyors to deal with fires in their water source areas.
- Suggestion of completing retention planning to include fire breaks for the protection of property and protection of drinking water resources.
- WFN is in process of completing a Fuel Management Plan for Trepanier Creek, looking at 6,000 to 8,000 hectares, with open house in November. Looking at reducing fire risk and asked consultant to examine all possible solutions, i.e., species, tree density, deciduous trees, access, crowing of trees, etc. Interested in concept of tying in the protection of drinking water sources and fire protection planning into retention and salvage planning
- Comment on stream channels & canyons creating “fire wicks” where fires run of these areas and access higher elevation stands. There is balance between salvage logging for protection of streams (i.e., keeping stream buffers in canyons) and creating fire breaks to reduce fire wicking

Cattle:

- Ministry of Forest and Range (MOFR) is currently developing Best Management Practices (BMPs) for grazing cattle in community watersheds. Hope to have soon so that what has been proven effective is used consistently in all areas.
- Wants project to highlight stream and drainage courses – not all range tenures follow watershed boundaries. Commented on different approaches being done in different watershed areas because different consultants are employed – noted that this may be better dealt with between government agencies.
- MOFR does not have jurisdiction over private land – cattle issues on private land need to be worked out with land owner.
- Natural barriers to creeks are very important to cattle range and creek access points.
- The watershed assessment reports provide MOFR the framework to initiate range use plans in each watershed area. Would be nice if the reports identified funding sources. Range plans also monitor effectiveness.
- MOFR has some sites identified, will send maps to Golder.
- Shorelines on reservoirs can be a problem area for cattle, especially during low water. Need to identify outflow areas.

-
- Landowners must understand legislation – it is their responsibility to keep cattle off their property, not the responsibility of cattle ranchers. If they buy a quarter section, it is their responsibility to fence the property.
 - Studies have shown that although cattle do contribute fecal material to the creeks, wildlife and birds also have significant contribution.

Tussock Moth

- Infestations within the Peachland and Trepanier watersheds - attacks Douglas-Fir, can cause allergies.
- Forestry commented that stands generally have approximately 25% survival from Tussock.

MacDonald Creek

- Identified as potential sediment area.
- Landslide in late 90's, Peachland sportsman's club completed some remediation with funding from Brenda Mines.

Brenda Mines

- Water from mine site is high in molybdenum, but all water is treated before being released.
- A newsletter is produced that provides water quality information.

Okanagan Basin Water Board (OBWB)

- OBWB has provided funding to Peachland and other municipalities to complete source to tap watershed assessments, these projects are high priority for OBWB.
- OBWB is mandated to work with local municipalities to identify water concerns in the Okanagan Basin and provide tools and assist in developing strategies to local governments to deal with concerns identified. As OBWB is funded by taxes from local governments, funding is provided back to local governments to complete projects.
- OBWB does not have a mandate to oversee regulation.

Source to Tap Watershed Assessments:

- Interior Health indicated that District of Peachland is required to complete Modules 1, 2, 7 and 8 of the Comprehensive Drinking Water Source to Tap Assessment Guidelines as a condition on their operating permit.
- The guideline is a multi barrier approach that is fairly standardized in Canada and the US and BC is a little behind.
- Health policy that purveyors must have dual treatment including filtration unless can provide evidence filtration is not needed and then must apply for a filtration deferral.
- Peachland and local water users would not be able to apply for a filtration deferral due to fluctuations in turbidity and fecal counts. Completing this assessment will not eliminate the boil water advisory for local water users as water from BC streams generally has fluctuating turbidity and microbial counts which are especially influenced by high spring runoff flows.

Minutes completed by: Zee Marcolin

Reviewed by: Russ Wong