

The Water Stewardship Council (the Council) serves as the technical advisory committee to the Okanagan Basin Water Board.

This document reports on last Council's objectives and outlines goals and objectives for the next 18 month term.

Work Plan 7.0

Okanagan Water Stewardship Council

Term 7: November 2016 - April 2018

Draft 1.7

Chair: Brian Guy Vice-chair: Denise Neilsen

“If you want to go fast, go alone. If you want to go far, go together.”
— African proverb

Executive summary

The value and strength of the Council, the technical advisory committee to the Okanagan Basin Water Board (OBWB), is its community roots. The Council provides a unique and important framework to explore and put in practice Okanagan water ideas, perspectives and ideals.

The Council celebrated its 6th 18-month term and 10th year anniversary in 2016. Led by Chair Rob Birtles (Interior Health) and Vice-chair Brian Guy (Canadian Water Resource Association) the Council plays an important role - enabling collaborative dialogue. The Council continues a tradition of building community and fostering strategic and honest communication about important contemporary water issues among Council members and the communities and agencies represented.

This document summarizes the Council's governance (Section 1), reflects on where the Council has come from (Section 2), and lays out a plan for the 7th Council Term (Section 3). The plan was developed with input from Council, obtained through a survey of members, and through a planning session held during the regular Council meeting on November 10, 2016. The contributions provided through these exercises were considered by a small group of Council members, who developed the work plan contained in Section 3 of this document.

Table of contents

Executive summary	1
Message from the Council Chair	4
Message from the Water Stewardship Director	4
I. Context.....	5
Introduction	5
What is the Water Stewardship Council?	5
Board Priorities (2014-19).....	7
Council Member background support documents	8
II. Progress report	9
Progress: a decade of dialogue on shared Okanagan water issues.....	9
A decade of action – description of select Council projects	9
Recent Progress (past 18 month term).....	12
Message from Rob Birtles, Past Chair (2015-16 Term).....	12
Review of 2015-16 Council goals and priorities.....	12
Council Committees (2015-16)	13
Member survey results	14
Identified Council priority initiatives.....	15
Collaborating with Okanagan First Nations	15
Invasive Mussels: Research, education and outreach	15
Environmental Flow Needs	16
Drought Management Planning.....	16
Stormwater Management and Wetlands	17
BC Water Sustainability Act – Advocating for Okanagan needs	18
III. Looking forward: A Plan for Term 7 (2016 – 2018).....	20
Introduction	20
November 10, 2016 Council Planning Workshop	20
Council Term 7 Guiding Themes	20
Council Term 7 Action Plan.....	22
Update the Okanagan Sustainable Water Strategy - Okanagan Sustainable Water Strategy 2.0.....	22
Update the Okanagan Supply and Demand Phase 2 Project.....	23
Input on WSA as regulations; and other legislation	23

Public outreach, extension, and communication 24

Environmental Flow Needs – design a decision-making framework..... 24

Source water protection and wetlands 25

Drought and Flood Planning 25

Irrigation Management..... 25

Council Term 7 Summary..... 26

Appendices..... 27

Appendix 1. Governance Manual Excerpt-Okanagan Basin Water Board..... 28

Appendix 2. Directors and their Alternates (December 2016) 30

Appendix 3. Terms of Reference- Okanagan Water Stewardship Council: Excerpt 31

Appendix 4. OBWB Water Stewardship Council Members..... 32

Appendix 5. Proposed Meeting Schedule 2016-18 (18 month term)..... 34

Appendix 6. Historic Function of Council Committees 35

Appendix 7. Active working committees (2015-2016 term overview) 37

Appendix 8. 2016 Council Member Survey (summary) 41

Appendix 9. Summary of November 10, 2016 Council Planning Workshop..... 46

Appendix 10. Council Committees Terms of References..... 53

Appendix 11. Council Committees Meeting Schedule..... 69

Appendix 12. OWSC Committees and Chairs..... 70

Message from the Council Chair



Water connects everything. With water as a unifying theme, and guided by the vision of the Okanagan Basin Water Board, the Okanagan Water Stewardship Council provides a mechanism for member organizations and their representatives to build bridges between peoples, to strengthen the fabric of communities, to build resilience to climate change, and to protect and restore water quality, water quantity, biodiversity, and ecosystem function in the Okanagan.

I look forward to working with you to accept this responsibility and challenge, and to progress towards the OBWB's vision in this next Council term.

Brian Guy, Ph.D., P.Ge.

Chair

Message from the Water Stewardship Director



The Water Stewardship Director, an OBWB staff member, provides support to the Council and is another important connection to the Board and ongoing OBWB projects. The Council continues to play an important role in supporting a dialogue on water issues and building trust among water actors throughout the Okanagan.

This document describes past Council priorities and provides a narrative developed collaboratively by Council to chart out the next 18 months of Council activities and priorities. The priority action items included in this work plan are mindful of the long-term initiatives of the Council outlined in our Sustainable Water Strategy (2008) and complement the Board's strategic plan (2014-19). This work plan communicates to the public and other government actors the Council's priorities for this Council's 18 month term. Simultaneously, this document supports an internal discussion among committee members and their respective organizations about what we want to accomplish over this 18 month term. Your feedback and consideration is important and we look forward to another action focused term.

Nelson Jatel, M.A., P.Ag.
Water Stewardship Director, OBWB

I. Context

Introduction

This 2016-18 Water Stewardship Council work plan is written in three parts. First, the Context section includes background information for the Council with references to our governance and operating procedures. Continuity and multi-term projects are operational realities for the Council and so the second section in this work plan reflects back on the previous Council's goals and objectives and their progress. Part two looks to summarize where we have come from over the past 18-month Council term and describes previous term activities, of which some may be carried forward to the present term. Many projects that involve the Council are long-term in nature. It is useful to include a degree of continuity, collective memory and organizational context as part of this new term's work plan. Part three of this document is forward looking and will be developed with the active participation of Council members, spotlighting key issues, identifying what Council should focus on next and describing deliverables over the next 18 month term.

What is the Water Stewardship Council?

The Council was established by the Okanagan Basin Water Board as a technical advisory body¹ and communication channel with communities and institutions throughout the Okanagan. Over the past 10 years the Council provided independent advice to the Board, supporting sustainable water management in the Okanagan, using its collective expertise to identify basin-wide issues and developed workable solutions that reflected the best available science, innovative policy, and consensus approaches. The Council recommends only those actions that can be undertaken within the bounds of the OBWB mandate. The Board has referred questions on a range of subject matter to the Council including: drinking water reservoir lot sales, source water protection, groundwater regulations, water allocations and Environmental Flow Needs (EFNs), to name a few. Council recommendations have provided the Board with sober second thought and consideration, with the intention of providing perspective and input to Board decisions. In addition to its role as an advisory council, the Council's monthly meetings contribute to the local knowledge base and provide stewardship tools for the watershed community, as well as providing *ad hoc* technical advice.

The Council is made-up of 28 organizations. Member representatives meet monthly to identify emerging issues relevant to their membership and constituency. The Council uses its collective expertise to identify basin-wide water issues and develop workable solutions that reflect the best available science, innovative policy, and consensus approaches. Please refer to Appendix 3 for detailed information on the Council's mission, funding, and function.

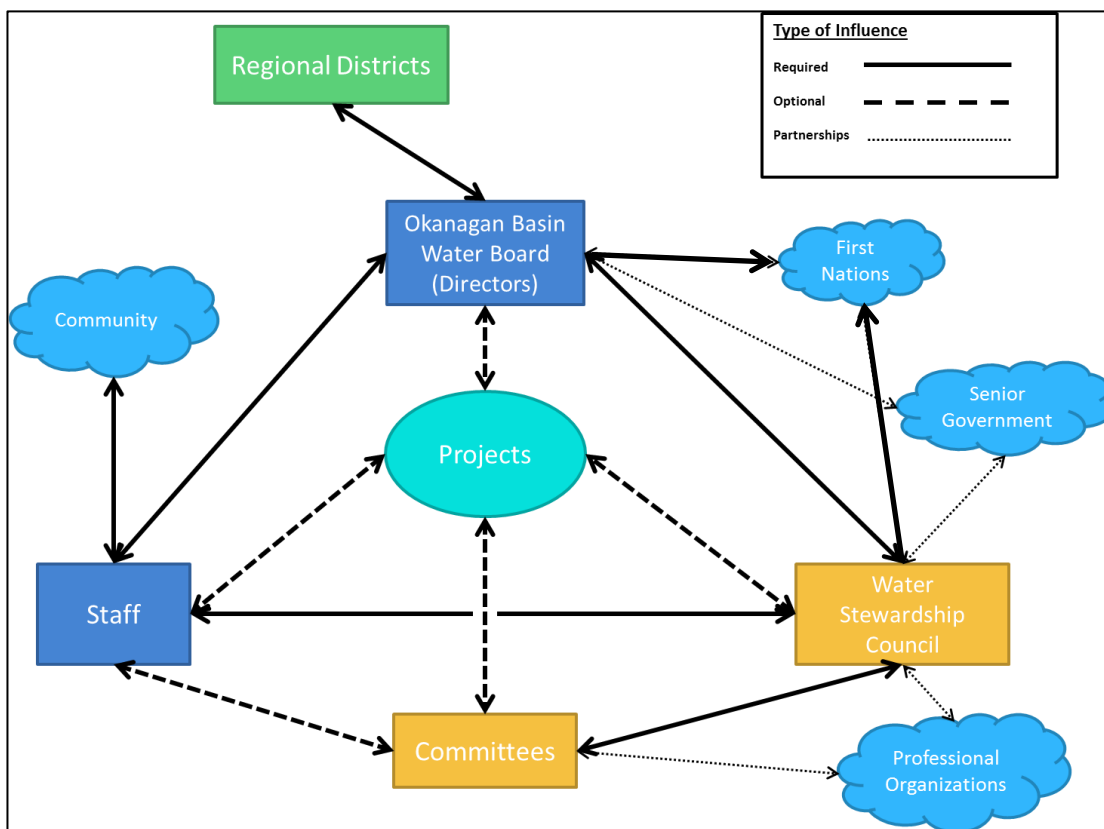
¹ The Council's "liaison committee" role was identified in the 1970 Supplementary Letters Patent but only realized in 2006 with the implementation of the Okanagan Water Management program.

The following activities by the Council are encouraged in order to support the gathering of information, development of policy recommendations, and development of water management tools:

- Define problems and determine factors such as priorities, economic feasibility, responsibilities, necessary support legislation, and required action; and
- Develop and discuss emerging and pro-active water management and governance proposals and make appropriate recommendations to the Board.

One of the Council’s most critical activities has been, and will continue to be, engaging with one another about specific issues of importance for the Okanagan Basin. Although everyone agrees there is an urgent need for better water management in the Okanagan, each Council member represents an organization that has a different perspective on the problem – how the issues should be defined and which issues are most critical to resolve – and on how we should proceed to reach solutions. By systematically discussing the breadth of Okanagan water issues, the Council will be prepared to produce informed and nuanced technical and policy recommendations to the Board. A member’s goal of each discussion should be to share information and highlight potential areas of conflict that need resolution; as well as to identify existing knowledge gaps and feasible actions to move forward. Figure 1 below provides an overview of how the Council is nested within the broader water governance framework of the Okanagan Basin Water Board.

Figure 1: Diagram of OBWB governance framework.



The Council convenes usually nine to ten times during the year. Council meetings are scheduled for the second Thursday of each month from 12:30pm – 4:30pm in the Central Okanagan (locations vary). A meeting schedule is included as *Appendix 5*. A meeting agenda, previous meeting notes, and an information package is prepared and distributed by OBWB staff the Friday of each month preceding the Council meeting.

This work plan outlines the Council's perspective on how to mobilize the collective membership to address important Okanagan water priorities identified by the Board in the coming years. The goal of each discussion should be to share information and highlight potential areas of conflict that need resolution; as well as to identify existing knowledge gaps and feasible actions to move forward.

Board Priorities (2014-19)

In 2014 the Board took a diligent look at priorities and goals for the next five years to practically and intentionally improve the Okanagan's water management and governance (OBWB, Strategic Plan 2014-2019). The following are the identified Board's priority goals for the Okanagan:

Goal 1. Adequate supplies of water for all human and environmental uses

Goal 2. Excellent source water quality – drinkable, swimmable, fishable

Goal 3. Local governments, First Nations, water purveyors and stakeholders have up-to-date coordinated plans and policies to protect water quality and water supply, and prepare for extreme events

Goal 4. OBWB has excellent relationships, a defined role, and clear communications with stakeholders and other levels of government

The complete 2014-19 Strategic Plan, including OBWB's mandate, operating principles, desired outcomes, and strategic priorities are available online at: <http://www.obwb.ca/board-of-directors/governance/>. In 2016 the *BC Water Sustainability Act* came into force with a number of regulations including groundwater regulation have been enacted since. The Council's work plan should supports the mandate and goals set out by the Board and consider the new *BC Water Sustainability Act* and regulations.

Council Member background support documents

Over the past ten years a number of documents have been developed to support and clarify the role, function, and operations of the Council. All Council members are asked to become familiar with the following important documents:

- Council Terms of Reference (2006)
- OBWB Governance Manual (2010)
- Okanagan Basin Water Board Strategic Plan 2014-2019
- Okanagan Sustainable Water Strategy: Action Plan 1.0 (2008) and Progress Report (2010)
- Okanagan Supply & Demand project (2010)

A comprehensive member guide is available online at [Member Guide](#), which includes all of these documents as well as other important member information. Table 1 lists the 12 key principles found in the Okanagan Sustainable Water Strategy.

Table 1. The Okanagan Sustainable Water Strategy is guided by 12 key principles:

1. Recognize the value of water.
2. Control pollution at its source.
3. Protect and enhance ecological stability and biodiversity.
4. Integrate land use planning and water resource management.
5. Clearly allocate water within the Okanagan water budget.
6. Promote a Basin-wide culture of water conservation and efficiency.
7. Ensure water supplies are flexible and resilient.
8. Think and act like a region.
9. Collect and disseminate scientific information.
10. Provide sufficient resources for local water management initiatives.
11. Encourage active community engagement, education, and participation in water management decisions.
12. Practice adaptive management.

II. Progress report

In this section we summarize several projects that were undertaken over the past decade with the support and collaboration of Council members and partners.



Progress: a decade of dialogue on shared Okanagan water issues

In September 2016 the Council celebrated 10 years of community based meetings addressing a range of important Okanagan water issues. Over the past 10 years the Council provided an important venue for dialogue to local governments, academic researchers, and organizations implementing projects aimed at: improving source water quality, protecting ecosystems, improving water use efficiency and allocation, promoting water conservation, and encouraging greater community involvement.

A decade of action – description of select Council projects

The Council has been involved in strategic Okanagan water initiatives showing leadership and levels of collaboration warranted by national recognition. On March 2013, the Council received the inaugural Council of the Federation “Excellence in Water Stewardship Award” recognizing outstanding national achievement, innovative practice and leadership in the area of water stewardship. The Council has been actively engaged in a range of projects including: Hydrologic Connectivity Study, Lake Evaporation Study, and Groundwater Monitoring Projects. The Council’s efforts supported a better

understanding of the Okanagan aquifer conditions, water availability, potential impacts from climate change, and impacts from existing water users. Some additional project highlights are noted below.

Okanagan Sustainable Water Strategy

The Strategy was developed at the request of the OBWB Directors, who asked for a document that would bring together information about Okanagan water issues and make recommendations about how these issues should be addressed. The Council and external reviewers devoted thousands of hours in preparation of the Strategy. Their findings, conclusions, and recommended actions are based on a remarkable degree of consensus among all participants. The Strategy brings together extensive technical information about the Basin and highlights the most important water management issues and how they connect to one another. The Strategy includes recommended actions designed to protect water at its source, share water in times of shortages, manage water demand, and identify the best structure for valley-wide governance.

Okanagan Hydrometric Monitoring

In 2008, the OBWB and BC Ministry of Environment commissioned a study to determine the location of hydrometric monitoring stations essential to long-term water management in the Okanagan Basin. The Council continues to support this initiative by identifying project partners, funding and research opportunities and to ensure long-term maintenance and service of newly established hydrometric stations. The Council continues to explore funding opportunities to re-establish hydrometric stations throughout the region while advocating for senior levels of government to take-on this important data collection exercise, made even more important in the face of climate change and population growth.

BC Water Use Reporting Centre

It is critical for Okanagan water license holders, with a reputation for having one of the highest per-capita water use in Canada, track how much water is used. The Council strongly supports the BC Water Use Reporting Centre (BCWURC), an OBWB developed web-based platform for water license holders to record and report how much water they use each month, evaluate changes from year to year, and look at how their water use compares to other areas. Although specifically designed to serve the needs of the Okanagan region, it can be customized to serve in other parts of the province.

Okanagan Supply and Demand Project

Another remarkable project implemented in collaboration with Council members and partners was the development of the Okanagan Water Supply and Demand Model - the most advanced water balance assessment ever conducted in Canada. This initiative applied the latest science, data, and models to improve the understanding of Okanagan water availability; taking into account climate

change and population growth. The Council continues to work on renewing and upgrading the model to reflect latest science and climate trends.

Endocrine Disruptor Research

As part of the collaborative effort of the Council, the Council explored water research developed at the University of British Columbia and Okanagan College, which included reporting to the Board about potential research opportunities, funding needs, and connecting water research outcomes to industries, partners and government. One such project was the exploration of endocrine disruptors in Okanagan water. The latest research into residual endocrine-disrupting chemicals in water in the Okanagan, largely from wastewater, suggests they are degraded by light and diluted in water.

Okanagan Wetland Strategy

The Okanagan Wetlands Strategy is a three-phase effort to re-establish wetland ecosystems. Wetlands are areas that hold water either temporarily or permanently. Some types of wetlands are sloughs, ponds, marshes, swamps and bogs. They are rare habitats in the dry Okanagan but they are home to diverse plants and animals and are an important source for food, freshwater, flood protection and erosion control.

Okanagan WaterWise

In 2010, Okanagan WaterWise, a public education and outreach program to draw attention to water issues in the valley, was launched. The program has grown each year and today includes a website (www.OkWaterWise.ca) as well as various outreach materials (e.g. the “Slow it. Spread it. Sink it! Homeowner’s Guide”), events, contests, and a social media presence. It was also the launch pad for a valley-wide residential outdoor water conservation campaign www.MakeWaterWork.ca (in response to the Supply & Demand study) and a campaign to raise awareness and prevent invasive mussels - www.DontMoveAMussel.ca. The stated goals of Okanagan WaterWise are:

- To bring residents of the Okanagan valley together with the understanding that they are all connected by water — we all share the same water in the Okanagan;
- To increase awareness among valley residents about water issues in the Okanagan;
- To support Okanagan residents in making positive changes in their water use that will protect the quality and quantity of our valley's water; and
- To share knowledge about what can be done to preserve the unique character of the region, and its social and ecological integrity.

Recent Progress (past 18 month term)

Continuity and multi-term projects and policies are important aspects of the Council. In this section we provide a look back at the previous 18-month term to review where we are coming from as a Council and to help inform where we go next.

Message from Rob Birtles, Past Chair (2015-16 Term)

The Water Stewardship Council serves to build relationships between volunteer council members and various stakeholders in the Okanagan Valley. The council has used an unwritten philosophy that our water interests are diverse and we need to communicate our knowledge and interests in order to ensure that the water we have remains sustainable for future growth and prosperity in this valley we call home.



In the last 18 months there have been many topics that have been discussed by the Council. Notable topics include recommendations on drought management, policy recommendation on the new Water Sustainability Act, water use reporting and invasive species such as the zebra and quagga mussel that threaten our lakes.

The Council has devoted many hours and its expertise in water related matters. As past chair, I would like to thank the council members and staff for their continued attention and devotion to making our valley sustainable.

Review of 2015-16 Council goals and priorities

The priorities determined by Council members at the start of the 2015-16 term were:

- groundwater licencing and monitoring,
- environmental flows,
- new regulations under new Water Sustainability Act,
- wetlands protection,
- better understanding of water supply and demand, and
- regional drought response.

Noteworthy undertakings of this Council's term included:

- Review and extensive dialogue on new Water Sustainability Act and Regulations
- Drought planning and communication
- Environmental Flow Needs in the Okanagan
- Mission Creek groundwater-surface water interaction project

- Okanagan Wetland Strategy
- Improvements to the BC Water Use Reporting Centre

Table 2 provides a summary of the Council's priority initiatives with a status check at the end of the term. Also noted in the first column of Table 2 is the Okanagan Sustainable Water Strategy (2008) reference project numbers – linking the Council's priorities to the broader strategy document.

Table 2: Project Status: 2015-16 Term

SWS Ref. #	Priority Initiative (2015-2016) as voted on by Council	Progress Status				
		None	Fair	Good	Excellent	Complete
3.2	Agriculture Water Reserve		x			
2.3	Source protection strategy for Basin		x			
3.7	Okanagan WUP* for all fish bearing streams	x				
New	Foreshore plan for the Okanagan mainstem lakes				x	
3.17	Expand network of hydrometric/climate stations			x		
3.20	Develop groundwater regulation pilot project	x				
4.2	Collaborate with First Nations - water strategies			x		
4.4	Manage the Okanagan water data			x		
3.1	Irrigation Efficiency in the Okanagan (pos'n paper)					x
2.2	Phase I – Okanagan Wetland Strategy					x
2.2	Phase II – Okanagan Wetland Strategy					x
3.7	Phase II – Environmental Flow Needs Project				x	
2.2	Phase III – Okanagan Wetland Strategy			x		
3.6	Okanagan Drought Response Strategy				x	
4.9	Water Use and Environmental flows database			x		
4.9	Water use reporting centre				x	
4.10	Mission Creek ground / surface water interaction				x	

Council Committees (2015-16)

Previous terms of the Council have rich histories of successful committee work, including: the creation of the Okanagan Sustainable Water Strategy, hydrometric monitoring stations, and groundwater monitoring wells, to name a few. This document provides some background on the Council's committees. It was envisioned at the beginning of the 2015-16 term that each committee will

build on the term Work Plan document to create a specific committee work plan that identifies the scope, range of activities, objectives, and goals of each committee.

Committees played an important role in exploring issues in greater detail than permitted at the larger Council table. Four Council committees were formed last term and met every second month:

- Environmental Flow Needs Committee
- Drought Committee
- Storm Water and Wetlands Committee
- Water Sustainability Act and Groundwater Committee

For more details about the working committees' goals, actions and activities see Appendices 6 and 7.

Member survey results

As part of a broader process to solicit feedback from Council members a web-based survey was circulated to all 2015-16 Council members. Totally 62 invitations to complete the survey were sent to primary and alternative council members, of which 25 responded (17 primary and 8 alternates). A summary of some key findings is included as Appendix 8.

The survey results indicate a general consensus that Council is functioning well and there should not be any wholesale changes to the current meeting structure. There is a significant long-term continuing commitment to Council attendance with over 75% respondents identifying they have been involved for five terms or more. Conflicts in schedules were identified as the primary reason for meeting non-attendance. All respondents indicated their organization was interested to continue participation on the Council for the upcoming term.

Some representative comments from surveyed members include:

- Much of the benefit derived from council is the informal communication that occurs by bringing together this group of actors monthly.
- The drought response last year – even though a knee jerk reaction to the lack of communication coming from the Province was great.
- The last couple of years have seen a small uptick in the awareness by the public of the OBWB and the WSC.
- The drought response sub-committee did good work as did the sub-committee on EFNs.
- Important Council undertakings include: shared priority-setting and activities with Indigenous Peoples, seeking strategic opportunities to support legislative/regulatory development and implementation (e.g. WSA, Fisheries Act), and valuing the services of efficiently operating and well managed ecosystems.

However, the responses also indicate that there is room for improvement. Some of the key survey recommendations include:

- “The studies and work done for the basin could be more widely disseminated, used in high schools and universities, in all our libraries. I could not find them in the ORL system. And, it is hard to find them within the walls of local governments”.
- “I believe we should be more rigorous in keeping the lake evaporation buoys and expanding our hydrometric and climate station network”.
- “Allowing members to bring issues they grappling with in their communities or area of work to the council – for a round table workshop style discussion at the meeting would be helpful”.
- “More discussion about the health regulations and the cost/benefit of compliance in terms of public health and quality of life”.
- “More direct/obvious linkages from the agendas/activities of the OWSC and subcommittees to priorities set during the work planning process”.
- “There is a lack – and I am an example – of dissemination of information on the WSC to all those in the representative organization”.
- “Raise the awareness of the Council to the public in the Basin”.
- “Invite high school and interested relevant university student to both WSC meetings and OBWB AGM, (especially those grads that have water as a learning outcome)”.

This survey provided a very useful tool to solicit advice and feedback from Council members.

Identified Council priority initiatives

Over the past 18-month term the Council identified a number of important priority initiatives. This section highlights these priorities and provides a summary of activities and recommendations for consideration by the next Council’s members.

Collaborating with Okanagan First Nations

The First Nations of the Okanagan hold a unique position in the valley. As right and title holders to Okanagan water and lands, they are senior government partners and the primary stewards of the Okanagan lands and resources. It is essential to seek inputs from traditional knowledge keepers, collaborate with staff where appropriate, address current and emerging water management concerns as seen by the ONA and member bands, and increase an overall awareness about ONA water resource management initiatives.

Invasive Mussels: Research, education and outreach

Understanding the impacts of invasive species, promoting prevention-first approach as well as identifying and reporting them are important steps to making a difference in stopping their spread. “Don’t Move a Mussel” is an on-going initiative of OBWB’s Okanagan WaterWise program, operating with an external committee engaged in public outreach and communication.

Environmental Flow Needs

It is essential to consider environmental needs in water management planning – for legal, ethical and practical reasons. Managing Environmental Flow Needs (EFNs) requires careful inclusion of all potential users, consideration of priorities and potential conflicts. The newly enacted Water Sustainability Act and regulations opened a new era in water governance and management in British Columbia. Requirement to consider environmental flow needs (EFNs) and groundwater licensing posed new challenges both to regulators and water users. Effective decision-making should build on best available scientific information and monitoring data. Continuous monitoring will be needed in order to develop and implement advanced environmental flow measurement methodologies as well as to ensure that EFNs are properly met and augmented. Groundwater monitoring data should be properly collected and integrated into EFNs studies and, consequently, into water licensing process.

In 2015 OBWB and WSC received and communicated the results of EFNs Project Phase I – Establishment of EFNs methodologies for selected 19 streams in the Okanagan. EFNs Project Phase II – Establishing EFNs values for selected fish-bearing streams in the Okanagan, was launched in 2016. During the 2016 season, a number of activities were undertaken as part of Phase II for this project including: site selection, installation of equipment, selection of best and cost-efficient methodologies for collecting data and monitoring. In the current term setting the groundwork for integrating EFNs into licensing and drought management processes will be an important discussion.

The following list was developed by the EFN committee and describes a range of important EFN topics for future discussion and exploration:

- Seek mechanisms to reconcile water use and conservation needs during drought (Plan for EFN Project Phase III)
- Establish rigor in reconciling water licences with actual water use:
 - Increase water metering and reporting (BC WURC)
 - Integrate water use data and conservation requirements into user-friendly database
 - Integrate EFNs and groundwater science into water licensing
 - Integrate EFNs and groundwater science into Drought Management Plans
 - How gaps in groundwater science can affect EFNs? Groundwater licensing and EFNs

Drought Management Planning

The Okanagan is at high risk for future water shortages because of its semi-arid climate and rapid population growth. The region has the lowest per capita water supply in Canada, likely to be aggravated by anticipated impacts from climate change. In the Okanagan water utilities are responsible for developing, implementing and enforcing their drought response measures. Where implemented, Drought Response Plans (DRPs) include information about areas served, water supply sources, classification of drought stages, and information about indicators that trigger drought stages. DRPs also contain description of conservation requirements. Out of 18 major water suppliers in the Okanagan, seven have working DRPs including: Black Mountain Irrigation District, District of Summerland, City of

Kelowna, South East Kelowna Irrigation District, Great Vernon Water Utility, City of Penticton, District of Lake Country. Many water suppliers, however, do not have working DRPs. The situation is further complicated due to the inconsistency of narration describing drought triggers and stages. Drought experience in summer 2015 revealed difficulties communicating drought stages and conservation needs to remote individual water users. Also there was a general reluctance to conserve by urban outdoor water users due to the lack of understanding of what triggered drought stages and how stages differ by sub-basins. Changing public attitude is a long process that can be accomplished through the combination of education and outreach efforts supported by reliable scientific information. Greater effort is needed to compile data for better understanding of triggers on individual sub-basin level. Once compiled, this information can create better cooperation by individual water users. OBWB developed a new Drought Management strategy with the sole purpose to aid local governments and utilities to establish and communicate their drought response plans and actions.

There is a need to continuously improve scientific understanding of climate change impacts and incorporate this new data into drought response planning, Action should be taken to increase region's socio-ecological resilience for better preparedness to cope and adapt to climate change impacts in the future.

A list of priority issues for the region developed by the Drought Planning committee include:

- All water suppliers should have a drought response plan
- Include scientific data into drought response planning as climate change impacts unfold and new science become available
- Improve communication strategies - foster communication and education to reconcile consumptive (agricultural and urban water users) and non-consumptive (fish and wildlife, recreational) users.
- Improve water use efficiency
- Intergrade EFNs and groundwater science into drought planning
- Implement more hydrometric and climate monitoring stations
- Investigate advantages and disadvantages of building new storage reservoirs. Consider exploring more efficient usage of existing storage capacity to cope with drought and flood (soft management approaches).

Stormwater Management and Wetlands

Wetlands play an important role as they provide humans and ecosystems with a suite of essential and unique goods and services. Apart from serving as habitats and refuge for aquatic and terrestrial organisms, wetlands help to capture storm and flood water, filter pollutants and recharge aquifers. Biodiversity built on and around healthy wetlands helps enhance carbon sinks and mitigate the human influence on climate.

In the Okanagan there is a growing concern that stormwater is becoming major source of nonpoint source (NPS) pollution. Climate change projections show a potential increase in the frequency and severity of extreme events that will likely result in greater flood incidence and magnitude. Stormwater management is a critical issue both from a flood mitigation and water quality improvement perspective.

The Okanagan Wetland Strategy Phase 3 will build on the results of previous studies to deliver the product that will account for the region's unique needs. It will elaborate on the areas of strategic importance, actions to be taken, legal and regulatory opportunities and constrains. It will also delineate roles and responsibilities and timeline for completion.

Some potential topics identified by the committee for future discussion include:

- Clarity with regard to wetland definition by WSA and regulations
- Continuous assessment of current water quality status in Okanagan lakes and water systems and identification of emerging risks to source water quality
- Establishing more strategic wetlands to improve stormwater quality and aquifer recharge
- Developing shovel-ready stormwater and wetlands projects at the local government level
 - Amount of funding needed
 - How stormwater wetland development initiatives may be streamlined with sustaining stable groundwater and surface water recharge
 - Integration of groundwater and EFN science into Wetland Strategy.
- Develop an OBWB policy protecting wetlands within a larger context of climate change adaptation and source water protection.
- Water Sustainability Act - New Regulations and Groundwater Licensing

BC Water Sustainability Act – Advocating for Okanagan needs

On Feb. 29, 2016, the BC Government implemented the new Water Sustainability Act (2014). The new WSA extends water licensing regulations to groundwater users. Groundwater licensing and the new requirement to consider EFNs for licensing purposes called for a need to substantially increase government's capacity to enforce these requirements. Enforcing these requirements and reconciling water users needs require the availability of reliable scientific data about groundwater supply and use. This data is currently largely unavailable or incomplete, and without this data, decisions are likely to negatively impact water users and the environment.

The Board has submitted a number of letters to the Province advocating for Okanagan water issues to be addressed through the Water Sustainability Act and its Regulations. Not all of the recommendations have been implemented to date.

The committee compiled a list of local regulatory priorities to be addressed by the provincial regulations including:

- Include meaningful consultation with First Nations into water governance and management;
- Provide sufficient funding for water science to support informed governance decisions;
- Streamline the groundwater licensing process;
- Establish a venue for sharing water use information to support decision making across all levels of government;
- Improve legislative support to protect wetlands;
- Assist local government in developing specific groundwater-related policies, practices or guidelines ;
- Include EFN considerations in water licensing decisions;
- Include groundwater data into the water use reporting and licensing database .

III. Looking forward: A Plan for Term 7 (2016 – 2018)

Introduction

This section provides the plan for Term 7. Here the Council identifies key issues and areas of focus. The plan for Term 7 was developed from the following sources:

- OBWB Strategic Plan 2014-2019
- OBWB Governance Manual
- Okanagan Sustainable Water Strategy (Action Plan 1.0 (2008) and Progress Report (2010)
- A report on Term 6 Council objectives, priority actions, and status of activities (contained within Section II of this document), and
- Council members' input on priorities for Term 7 provided during a planning workshop on November 10, 2016

November 10, 2016 Council Planning Workshop

At the beginning of each Council term members are asked to provide input including perspectives from their respective member organizations to help shape the priorities of the Council for the next 18-month term. At the November 10, 2016 Council meeting, the Council spent time setting priorities for the 2016-2018 work term. Members worked in small groups to share the main concerns and priorities of their individual organizations, and think about the key themes and associated projects the Council should focus on during the next 18-month term. After the breakout sessions, each group reported out on their discussions and together the Council identified common themes and top priorities. A summary of the workshop discussions is presented in Appendix 9.

Council Term 7 Guiding Themes

Based on the November 10 workshop and guided by the OBWB Strategic Plan and Council's other governing documents, the OWSC work plan for Term 7 will reflect five over-arching themes:

- Collaboration
- Data, science, and policy
- Conservation and restoration
- Climate
- Knowledge transfer

More information about the grouping of priority actions into these themes during the November 10 planning workshop is included in Appendix 9.

First Nations engagement wraps around all five themes. Canada is now moving intentionally towards building a stronger relationship with the original inhabitants of this land; and all Canadians and organizations can help. Being aware of this context in all of Council's work will promote and support the ongoing effort of the OBWB to strengthen relationships with the Okanagan Nation Alliance and its member Bands.

Collaboration is the great strength of the OWSC. By working together and listening to various perspectives, Council develops stronger and more robust solutions to Okanagan water issues. Although we act locally, our collaborative model has broader relevance. In Term 7 we will continue and even strengthen our collaborative tradition.

Good governance and management relies on good information. The Council has historically advocated for and leveraged its own funding to deliver improved water information in the Okanagan. Several major projects have been completed in the past 10 years, and there is a need to continue the Council's efforts to promote better data, science and modelling to support legislation, policy and decision-making processes.

The human footprint on the landscape has implications for biodiversity, species survival, and ecosystem health and resiliency. It is necessary to preserve and protect key natural areas, and to restore areas where ecosystem function has been impaired or eliminated. The Council can play an influential role in both conservation and restoration.

The climate is relevant to all natural and managed ecosystems, and the built environment. Ongoing climate disruption due to human activities is increasing risks to natural and built environments in the Okanagan and around the world. Not only are air temperatures increasing, but precipitation patterns are changing, the hydrologic regime is changing, and the frequency, magnitude, and duration of extreme weather are increasing. The changes and trends that we have observed in recent years are expected to continue for many decades. The Okanagan must understand its state of preparedness, and increase its resilience in the face of climate change. There is also an opportunity to integrate climate change mitigation solutions into our work, through projects that promote reducing greenhouse gas emissions and/or the sequestration of carbon.

Since the OWSC and OBWB have limited jurisdiction and authority to implement solutions, knowledge transfer to other entities (e.g. local governments and other levels of government) that do have authority is a core role for the OWSC and OBWB. In addition, knowledge transfer moves towards the Council through the expertise of its member organizations, including its representatives of academic institutions. The concept of knowledge transfer is broad, encompassing communication, extension activities, and outreach.

Council Term 7 Action Plan

Using the over-arching themes as a guide, this section describes eight specific areas of focus for OWSC during Term 7.

- Update the Okanagan Sustainable Water Strategy
- Update the Phase 2 Okanagan Supply/Demand Project
- Continue to provide input on the WSA and other regulatory and policy initiatives
- Communication, extension, and outreach
- Develop a decision-making framework for water licensing decisions using EFNs
- Source water protection and wetlands (including consideration of stormwater quality)
- Drought and flood planning
- Irrigation management

Update the Okanagan Sustainable Water Strategy - Okanagan Sustainable Water Strategy 2.0

Version 1.0 of the Okanagan Sustainable Water Strategy was released by the Okanagan Water Stewardship Council in 2008. In that document, the OWSC pulled together all available information to identify and summarize priority water-related issues in the Okanagan Basin. Over the past 8 years, the document has served as a guide to address water management issues identified through collaborative input by multiple organizations and groups of water users. The Strategy has also been used to inform and inspire new studies to identify emerging issues and to develop scientific insights into potential solutions. Newly available information along with significant changes in the regulatory environment call for a need to update the strategy to reflect these changes and newly available scientific knowledge. Among other changes, an updated Strategy should integrate insights on developing policies and capacity to support changes in the water legislation and regulations, and address other issues, such as local government and communities' capacity to withstand impacts from climate change, and regional ecological challenges.

Council discussed the value of three key documents that will meaningfully inform the SWS Update, and can be pursued at the beginning or coincidentally with that work. The first is a status report on SWS Version 1.0. The second is a State of the Basin analysis of water-related conditions in the Okanagan, which will establish baseline conditions for SWS Version 2.0. This need not be a major exercise for the current update, since the three Regional Districts have all undertaken aspects of this work already. Finally, updated SWS should be guided by knowledge of the role and significance of natural capital in providing ecosystem services. Accordingly, it is recommended that currently available natural capital valuations be considered and extended as necessary to provide useful input to the SWS Update. There is good quality, spatially-referenced, land-use data and water information available to support this initiative.

The SWS Update work is of sufficient magnitude and importance that OBWB has allocated a staff member to lead it. A work plan will be created by OBWB staff, and Council members (and others with

relevant expertise) will be engaged to contribute. Council will periodically review progress and will review the draft document before it is finalized.

Update the Okanagan Supply and Demand Phase 2 Project

The Okanagan Water Supply and Demand Project (Phase 2) was a 3-year study completed in 2010 that pulled together basin-wide information on water supply and demand, updating work last completed in the early 1970s. The study also included developing models to simulate water supply and water demand in the basin, and the effects of water use on streamflows. Weaknesses included the way groundwater is treated in the models, and the method adopted for EFN determination. The Phase 2 report made several recommendations for collecting new data, conducting research, and improving the models, much of which has been completed or is underway, and recommended re-examining the work after five years. It is now time to complete a thorough update of the Phase 2 work, making use of the improved information base, and focussing on improving the communication of results to end-users.

The work recommended for the OWSC is to create a document that describes the scope of work of the study in sufficient detail to support applications for funding to conduct the work. The Council could also assist staff in identifying funding opportunities and securing the necessary funding. Once the funding is secured, it is anticipated that the project will be managed by OBWB using internal or external resources.

A Council committee would be created to complete this project. End-users (such as municipalities and water allocation officers) would be represented on the Committee to ensure their needs are considered.

Input on WSA as regulations; and other legislation

Council members and partners have emphasized a need to provide ongoing feedback to senior governments about the potential content of, and about the implications of, new regulations. More specifically, issues to be addressed and actions to be enabled regarding the provincial Water Sustainability Act include: more clarity in the groundwater licencing and allocation procedure; regulations to protect EFNs and wetlands; secure access to water by agricultural communities; mechanisms to reconcile possible conflicts between consumptive uses and critical environmental flows; and source-water protection.

A Policy Committee would be created to proactively seek out opportunities to influence policy that will affect the Okanagan, and to respond to requests for input on policy, legislation, and regulations from senior governments. The above-noted outstanding issues with the new WSA could receive attention by the committee in the near term.

Public outreach, extension, and communication

Council has identified several advantages of placing an emphasis on enhanced communication during the next Council Term. In particular, enhanced communication could include:

- Improved internal communication between Council and its member organizations, particularly on important and urgent issues, such as the imminent threat related to invasive mussels
- Improved communication of member activities amongst Council members
- Improved celebration of successes of Council and Board programs and initiatives
- Enhanced communication of Council and Board roles and activities to key stakeholders throughout the Okanagan
- Stronger outreach to the public and groups that are not traditionally reached by the OBWB.
- Developing a stronger relationship with the local academic community
- Extended efforts to inform and educate First Nations, local municipal Councils and staff, and other parties about OWSC and OBWB projects and products.

A Communication Committee would be formed to lead this initiative. This committee would work closely with the OBWB's Communication Director. The first task would be to develop a Communication Strategy for the OWSC, which would cover both internal and external activities, and which will involve coordination with the role of the OBWB Communication Director. The role of the committee would be both internal and external: it will include strengthening internal communication amongst Council members and between the Council and its member organizations, and working with the OBWB staff Communications team to use the Council to help extend the reach and influence of the Council and Board in the community.

Environmental Flow Needs – design a decision-making framework

Phase 1 of the Okanagan EFN project developed Okanagan-specific technical methods for determining the flow regimes needed to sustain healthy aquatic ecosystems in Okanagan streams. Phase 2, which is ongoing, is using those methods on 19 priority Okanagan stream to determine stream-specific EFNs. The results of this work are intended to be used in the water allocation process, and in the operational process of managing drought. Water allocation is the responsibility of the provincial government. As noted in the Phase 1 EFN report completed in spring 2016, the Water Sustainability Act anticipates that advisory bodies could be created to assist provincial statutory decision-makers with allocation decisions. Due to the complexity of the historic human interaction with natural streamflows in the Okanagan, there are usually competing interests in a water allocation discussion. Accordingly, the Okanagan is a candidate region for establishing such an advisory body.

The Council proposed to maintain the EFN committee, and charge it with development of a water allocation decision-making framework for the Okanagan that incorporates technical EFN recommendations.

Source water protection and wetlands

Historically, Council has placed significant focus on source water protection, and has achieved notable successes. Many water utilities have completed watershed risk assessments, and have source water protection plans in place. However, there is more work to be done to comprehensively understand and manage risks to water quality.

Council proposes to establish a source water protection and wetlands committee to make progress towards the OBWB's goal of excellent water quality throughout the Okanagan. The committee would be tasked with focussing on the source protection sub-goals identified in the OBWB Strategic Plan, and developing specific actions and strategies to make progress on these goals. Issues related to stormwater quality would be included within the scope of this committee. It would also assist OBWB staff to develop policy and programs to combat the threat of invasive mussels, and to further develop an Okanagan wetland strategy.

Drought and Flood Planning

The drought committee in Term 6 was active and successful. The OWSC and OBWB have promoted drought planning by municipalities, and coordination of plan between municipalities. Over the past year OBWB played an influential role in improving coordination between provincial water managers and local water utility managers during summer drought response. OBWB is also leading a project to develop drought response triggers and actions for the mainstem lakes.

The other side of extreme weather is intense precipitation and resultant flooding. In response to ongoing climate disruption, and recognizing the costs associated with floods and with building flood protection, some local governments are beginning to examine the implications of, and their ability to manage, high streamflows and high stormwater flows.

The OWSC proposes to maintain the existing drought committee, but rename it the Drought and Flood committee, and expand its focus to include flood planning. The committee would continue its work to promote coordinated drought planning throughout the Okanagan, and expand its scope to promote coordinated approaches to examining and improving flood resilience. The stormwater quantity aspects of the Term 6 Wetland and Stormwater Committee would move to the new Drought and Flood committee.

Irrigation Management

In the Okanagan, about 85% of the total water used for human purposes is used for irrigation, and of that total, roughly two-thirds is used for agriculture. Progress has been made in recent years towards improving irrigation system design and installation practices, and to improving application efficiencies.

Council has a role to play in encouraging a continued focus on improving irrigation management, and proposes to establish a committee to develop recommendations to support the goal of improved

irrigation management practices in the Okanagan. The outcome of the work of the Irrigation Management committee will be technical recommendations, memos, and reports that provide useful, practical, implementable guidance for Okanagan irrigators (agricultural and other), that will lead to more efficient water use, and reduced demand for water. This will support aquatic ecosystems, and improve drought resilience in the Okanagan.

Council Term 7 Summary

In summary, OWSC Term 7 will use five general themes to guide its activities. Council will undertake eight major activities during the course of the 18-month term. To accomplish this work will require several committees, as follows:

- SWS Update committee (to be led by OBWB staff with contributions by OWSC members)
- Supply and Demand Project Update Committee
- Policy Committee
- Communication Committee
- EFN Committee
- Source Water Protection Committee
- Drought and Flood Committee
- Irrigation Management Technical Committee

Council may form other committees as required to address individual issues or requests from the OBWB Board.

The roles of each of the above-noted committee are described in the previous section of this document. It is proposed that each committee would determine its own meeting schedule and frequency, rather than the traditional practice of meeting in person each month immediately prior to Council meetings. The number of committees proposed for Term 7 exceeds the number active in Term 6, and Council cannot expect the level of staff support to increase proportionally. Accordingly, some committees will likely have to function without staff support.

In addition to these committees, a Nominating Committee was formed during the last Term of Council to address a request by the OBWB Board of Directors to the Council to examine the merits of slightly expanding the size of Council to include former members who are no longer representing their organizations. This committee has not yet begun its work.

Finally, it is proposed that a Leadership Committee be formed to guide Council during this term. The Leadership Committee would consist of the Chair and Vice Chair, and the chairs of each of the above-noted committees, as well as the Water Stewardship Director. Its function would be to assist in planning the Council meetings and speakers, to encourage communication between committees, and to foster efficient implementation of Council's work plan. It would be chaired by the OWSC Chair, and would meet regularly via short duration conference calls.

Appendices

- Appendix 1. *Governance Manual Excerpt-Okanagan Basin Water Board*
—
- Appendix 2. *Directors and their Alternates (December 2016)*
—
- Appendix 3. *Terms of Reference- Okanagan Water Stewardship Council: Excerpt*
—
- Appendix 4. *OBWB Water Stewardship Council Members*
—
- Appendix 5. *Proposed Meeting Schedule 2016-18 (18 month term)*
—
- Appendix 6. *Formation of Committees*
—
- Appendix 7. *Active working committees (2015-2016 term overview)*
—
- Appendix 8. *OWSC Member Survey - summary*
—
- Appendix 9 *Summary of November 10, 2016 Council Planning Workshop*
—
- Appendix 10. *Council Committees Terms of References*
—
- Appendix 11. *Council Committees Meeting Schedule*
—
- Appendix 12. *OWSC Committees Chairs and Members*

Appendix 1. Governance Manual Excerpt-Okanagan Basin Water Board

OBWB Vision

The Vision of the OBWB is to have a sustainable water system, meeting the needs of residents and agriculture while supporting wildlife and natural areas – now and in the future.²

OBWB Objects and Purpose

The objectives and purpose of the OBWB, summarized below, are set by the SLP and subsequent amendments dated 1970 - 2006.³

To organize or receive proposals from private interests, organizations or agencies and all levels of governments regarding best practices for water use and management;

To define water problems and priorities, economic feasibility of solutions, responsibility, necessary legislation and required action;

To communicate and coordinate between levels of government and their agencies about water use and management;

To present proposals and recommendations to local or senior governments, according to jurisdiction and responsibility;

To participate financially or otherwise, in surveys, investigations or projects on behalf of Okanagan local governments;⁴

To coordinate implementation of the Okanagan Basin Study Plan (1974) – for water management activities that affects the Valley as a whole;

To advise local or senior government agencies when proposed actions, regulations or bylaws are contrary to the Okanagan Basin Study Plan or a recommendation of the OBWB;⁵ and

To participate in an aquatic weed control program for Okanagan lakes.⁶

² OBWB resolution, adopting the “OBWB Strategic Vision” (November 2007).

³ The consolidated SLP are given in Appendix II and online (see: http://www.obwb.ca/structure_governance/).

⁴ SLP Clause 3, Items I through V date from 1970.

⁵ SLP Clause 3, Items VI and VII adopted through amendment in 1975.

⁶ SLP Clause 3, Item VIII adopted through amendment in 1981.

OBWB Mandate

“To provide leadership for sustainable water management to protect and enhance the quality of life and environment in the Okanagan Basin.”⁷

The OBWB promotes best water–management practices by supplying science, information, grants and other incentives. As every resident in the Basin contributes financially to the OBWB, the focus is on projects and programs that benefit the Okanagan watershed as a whole. The OBWB is not a regulatory agency and does not enact or enforce law.

Principles

The Board of Directors is committed to acting in accordance with the following principles:

Transparency: To the greatest extent possible, the actions and decisions of the OBWB, including those of the Board of Directors and Staff, will be transparent and open.

Service: The Board of Directors will act in the best interests of the mandate of the OBWB, which serves the Okanagan Basin region as a whole.

Collaboration: The OBWB seeks collaborative solutions to water resource concerns, bridging the interests of all Okanagan and senior levels of government, as well as water stakeholders and citizens of the region.

Representation: OBWB Directors are appointed to represent the common water interests of Okanagan citizens even though they provide the perspective of their respective regional district or water constituency.

Basin Emphasis: OBWB projects and programs focus on activities with broad geographic scope, benefiting the entire watershed.

Legacy: The OBWB will consider the needs of future generations – our children and grandchildren – as well as those of the present, looking ahead to protect the resource in times of change and uncertainty.

⁷ “OBWB Strategic Vision” adopted November 2007. The mandate summarizes the OBWB objects and purpose.

Appendix 2. Directors and their Alternates (December 2016)

Regional District of Central Okanagan

Role	Name	Organization, Position	Alternate Role	Name	Organization, Position
Chair	Doug Findlater	District of West Kelowna, Mayor	Alternate Director	Patty Hanson	RDCO East Electoral Area, Director
Director	Cindy Fortin	District of Peachland, Mayor	Alternate Director	James Baker	District of Lake Country, Mayor
Director	Tracy Gray	City of Kelowna, Councillor	Alternate Director	Wayne Carson	RDCO Central Okanagan West Electoral Area, Director

Regional District of North Okanagan

Vice-Chair	Juliette Cunningham	City of Vernon, Councillor	Alternate Director	Catherine Lord	City of Vernon, Councillor
Director	Bob Fleming	RDNO Electoral Area 'B', Director	Alternate Director	Rick Fairbairn	RDNO Electoral Area 'D', Director
Director	Doug Dirk	District of Coldstream, Councillor	Alternate Director	Paddy Juniper	RDNO Deputy Corporate Officer
			Alternate Director	Mike Macnabb	RDNO Electoral Area 'C', Director

Regional District of Okanagan-Similkameen

Director	Sue McKortoff	City of Osoyoos, Mayor	Alternate Director	Mark Pendergraft	RDOS Electoral Area 'A', Director
Director	Peter Waterman	District of Summerland, Mayor	Alternate Director	Tom Siddon	RDOS Electoral Area 'D', Director
Director	Ron Hovanes	Town of Oliver, Mayor	Alternate Director	Toni Boot	District of Summerland, Councillor

Water Management Initiative Appointments

Director	Lisa Wilson	Okanagan Nation Alliance	Alternate Director	TBA	Okanagan Nation Alliance
Director	Robert Birtles	Interior Health Authority	Alternate Director	Brian Guy	Canadian Water Resource Association
Director	Toby Pike	Water Supply Association of BC, Chair	Alternate Director	Bob Hrasko	Water Supply Association of BC, Director

Appendix 3. Terms of Reference- Okanagan Water Stewardship Council: Excerpt

Mission

Council's mission is to be a trusted source of expertise and knowledge for sustainable water management in the Okanagan, providing balanced and considered advice to the Okanagan Basin Water Board – and through them to the community at large. The Council will draw upon its member's diverse range of knowledge and experience to develop the recommendations and implement the actions needed to achieve the Vision.

Function of the Okanagan Water Stewardship Council

The Council was established by the Okanagan Basin Water Board as an advisory body and communication channel to water stakeholder communities throughout the Okanagan. The Council provides independent advice supporting sustainable water management in the Okanagan, using its collective expertise to identify basin-wide water issues and develop workable solutions that reflect the best available science, innovative policy, and consensus approaches. The Council recommends only those actions that can be undertaken within the bounds of the OBWB mandate. In addition to its role as an advisory council, the Council will develop programs that contribute to the local knowledge base and provide stewardship tools for the watershed community, as well as providing ad hoc technical advice on Board projects.

Funding and Resources

The Council will be supported by funds allocated under the Okanagan Basin Water Board's Regional Water Management Initiative. The Board will approve an operating budget for the Council, and Board staff will organize Council meetings, produce agendas and record minutes, provide information requested by the Council, and participate in special meetings, events and projects organized by the Council. The Council may recommend projects for funding by Board that promote basin-wide water management.

Appendix 4. OBWB Water Stewardship Council Members

18 Month Term, Starting November 2016

Organization Representing	Confirmed	First Name	Last Name	
Agriculture and Agri-Food Canada	✓	Denise	Neilsen	
Agriculture and Agri-Food Canada	✓	Scott	Smith	alt.
APEGBC	✓	Don	Dobson	
APEGBC	✓	Suzan	Lapp	alt.
APEGBC	✓	Shawn	Badasha	alt.
BC Agriculture Council		Hans	Buchler	
BC Cattlemen's Association		Lee	Hesketh	
BC Cattlemen's Association		Linda	Allison	alt.
BC Fruit Growers Association	✓	Kevin	Day	
BC Fruit Growers Association	✓	Richard	McDonald	alt.
BC Groundwater Association		Marta	Green	
BC Groundwater Association		Remi	Allard	alt.
BC Water Supply Association		Toby	Pike	
BC Water Supply Association		Patti	Meger	alt.
BCWF – Okanagan Region 8	✓	Doug	Flintoft	
BCWF – Okanagan Region 8	✓	Lorne	Davies	alt.
Canadian Water Resources Association	✓	Brian	Guy	
Canadian Water Resources Association		Rod	MacLean	alt.
Canadian Water Resources Association		Dwayne	Meredith	
City of Kelowna	✓	Andrew	Reeder	
City of Kelowna	✓	Jason	Angus	alt.
City of Penticton		Andrew	Martin	
City of Vernon		Ed	Stranks	
City of Vernon		Rob	Miles	alt.
Fisheries and Oceans Canada	✓	Doug	Edwards	
Interior Health	✓	Rob	Birtles	
Interior Health	✓	Judi	Ekkert	alt.
Ministry of Agriculture	✓	Andrew	Petersen	
Ministry of Agriculture	✓	Stephanie	Tam	alt.
FLNRO - Resource Management	✓	Grant	Furness	
FLNRO - Resource Management	✓	Lora	Nield	alt.
FLNRO - Okanagan Shuswap Natural Resource Operations	✓	Robert	Warner	
FLNRO - Okanagan Shuswap Natural Resource Operations	✓	Ray	Crampton	alt.
Okanagan Collaborative Conservation Program (OCCP)	✓	Scott	Boswell	
Okanagan Collaborative Conservation Program (OCCP)	✓	Tanis	Gieselman	alt.
Okanagan College		Allison	MacMillan	

Okanagan College		Rob	St. Onge	alt.
Okanagan Nation Alliance		Zoe	Eyjolfson	
Okanagan Nation Alliance		Elinor	McGrath	alt.
Okanagan Nation Alliance		Natasha	Lukey	alt.
Okanagan Mainline Real Estate Board		David	O'Keefe	
Okanagan Mainline Real Estate Board		Howard	Newfeld	alt.
Regional District of Central Okanagan	✓	Margaret	Bakelaar	
Regional District of Central Okanagan	✓	Chris	Radford	alt.
Regional District of North Okanagan		Renee	Clark	
Regional District of North Okanagan				alt.
Regional District of Okanagan-Similkameen	✓	Zoe	Kirk	
Regional District of Okanagan-Similkameen	✓	Evelyn	Riechert	alt.
Okanagan Forest Sector	✓	Murray	Wilson	
Okanagan Forest Sector	✓	Michael	Bragg	alt.
University of British Columbia – Okanagan	✓	Bernie	Bauer	
University of British Columbia – Okanagan	✓	Carolina	Restrepo-Tamayo	alt.
Kelowna Chamber of Commerce		Caroline	Grover	
Kelowna Chamber of Commerce		Tom	Dyas	alt.
Kelowna Chamber of Commerce		Jeff	Robinson	
Irrigation Council of BC	✓	Ted	Van der Gulik	alt.
Irrigation Council of BC	✓	Bruce	Naka	

Appendix 5. Proposed Meeting Schedule 2016-18 (18 month term)

Date	Time
November 10th	12:30 – 4:30
December 8th	12:30 – 4:30
January	OFF
February 9th	12:30 – 4:30
March 9th	12:30 – 4:30
April 13th	12:30 – 4:30
May 11th	12:30 – 4:30
June 6th (Joint Council/Board)	12:30 – 4:30
July	OFF
August	OFF
September 7th	12:30 – 4:30
October 12th	12:30 – 4:30
November 9th	12:30 – 4:30
December 7th	12:30 – 4:30
January	OFF
February 8th	12:30 – 4:30
March 8th	12:30 – 4:30
April 12th	12:30 – 4:30
May 10th	12:30 – 4:30

Regular meetings occur on the 2nd Thursday of each month with a detailed agenda and meeting package emailed on the previous Friday.

Location (subject to change): 1430 KLO Rd, Regional Library Administration Building, Kelowna

Appendix 6. Historic Function of Council Committees

Committees were a significant focus of the Council in Term 6 and previous Terms. They have historically been a key forum for discussion on emerging policy and projects. Findings from the committees are presented back to the Council and recommendations are presented to the Board. Typical committee structure and framework are described in this section.

Committees are formed ad hoc as a result of discussions by the Water Stewardship Council; as relevant issues/priorities emerge, the council will decide to form a committee on that subject. Membership of these committees is offered on a volunteer basis to all council members and their colleagues. These committees have no authority over the council, staff, or board. They make recommendations to the council in the form of white papers and policy statements. Additionally, they may identify projects and present them to Council.

Each committee generally has two co-chairs to provide guidance and leadership. Committee members may include external water professionals to support committee efforts. The Water Stewardship Director generally fills an ex-officio role on each Council committee.

Members of the committees are encouraged to speak up and say what is on their minds. The committees are intended to be an environment where “first-draft” ideas are welcome. The committees provide for an opportunity for discovery and acknowledgment of diversity of opinions and backgrounds inherent to the group.

Scope of an Action Plan

The key deliverable for a Committee initiative is an action plan that defines the specific activities required to achieve the goal of the plan. With staff support, committees can develop the following project information for each proposed activity:

- Time-frame for implementation
- Management objectives
- Priority (relative to other action items)
- Who takes the lead role
- Estimated cost and financing strategy

Projects

Projects carried out by the OBWB and OWSC are generated in a number of different ways. A few main ways are as follows:

- Project is initiated by staff based on funding opportunities; this process needs board approval, but does not necessarily require consultation with the Council
- Project is initiated by the Council based on current concerns or opportunities; in the case that resources or collaboration is needed, the Board is approached for ratification or collaborative services

- Project is initiated by a committee of the Council; the committee will speak to the council about the project and if necessary the council will approach the board for ratification or collaborative services
- Project is initiated by the Board

Figure 3 illustrates a typical work flow and project roles for a project initiated by Council.

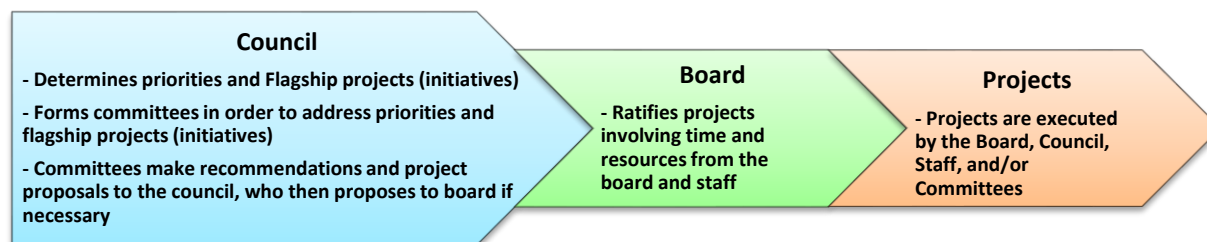


Figure 3- Roles and work flows for a typical project initiated by Council

There are a number of actions that the Council may take, based on the topic and outcome of each discussion. The Council may also choose to not take action following a discussion, and may instead use the information to inform actions on other topics at a later date.

- The Chair may request staff or committees to conduct further research and bring the subject back to the Council in the future.
- The Council may request staff or subcommittees to summarize discussion conclusions so that they may be included in the Sustainable Water Strategy.
- The Council may form a resolution requesting staff or subcommittees to produce recommendations or position statements to share with the OBWB.
- The Council may form a resolution requesting staff, committees or a hired consultant to draft bylaws or other legislation recommended for adoption by local jurisdictions.
- The Council may form a resolution to request that consultants analyze specific issues and develop reports based on this work.
- The Council may form a resolution requesting staff, subcommittees or a hired consultant to develop programs to improve water management.

Appendix 7. Active working committees (2015-2016 term overview)

Committee	Goals	Objectives
<i>Environmental Flow Needs</i>	Improve EFN science and integrate it into water licensing and use	<p>New Water Sustainability Act</p> <ul style="list-style-type: none"> Review and discuss the implications of new WSA regulations on regional water policies, utilities and municipalities; Ensure integration of new WSA regulations into regional water policies; <p>Integrate EFNs into drought response plans</p> <ul style="list-style-type: none"> Improve EFNs and groundwater science; Establish mechanisms for reconciling water licensing and use with EFN requirements; <p>Establish user-friendly water supply and demand database</p> <ul style="list-style-type: none"> Establish region-wide water reporting mechanisms and integrate it with provincial mechanisms; Compile data in Aquarius <p>Supporting local water users in improving water use efficiency by considering the following:</p> <ul style="list-style-type: none"> funding for infrastructure replacement / improvement water use efficiency both in municipal indoor/outdoor and irrigation uses; low cost management improvements; funding for infrastructure replacements; increase the number of hydrometric and climate stations; flow measurement recorders at all reservoir spillways. Increased coverage by water metering for irrigation users; policies that support coordinated water storage by utilities.

Summary:

Committee focused primary on operationalizing EFN Phase I Project 'Methodologies' for application in EFN Project Phase II 'Establishing EFNs for selected priority streams'. Committee together with key project partners from ONA and FLNRO worked on selecting streams and sites for measuring EFNs. Committee carried out numerous discussions in preparing for EFN Project Phase III – social component, where EFNs will be reconciled with consumptive uses needs. Discussions also addressed existing problems by utilities in managing flows, including infrastructure limitations and lack of management choices. Committee considers local governments and utilities needs in seeking funding for infrastructure upgrades and improving their capacity to qualify/compete for funding.

Committee	Goals	Objectives
<i>Drought Management</i>	Manage water allocation and use during scarcity	<p>Improve drought communication mechanisms across scales</p> <ul style="list-style-type: none"> • Include all stakeholders into drought dialogue; • extend communication and education strategies to general public; • communicate water conservation practices <p>Drought response planning</p> <ul style="list-style-type: none"> • ensure that each utility/municipality has drought response plan; • ensure consistency in drought response planning; • ensure each plan specifies drought indicators/triggers; • Integrate EFNs into drought response planning • Ensure the overall consistency of drought response plans with new WSA regulations.
Summary:	<p>In 2015-2016 Drought management committee worked on responding to pressing issues in the region (based on the lessons learned as a result of summer 2015 drought) as well as integration of WSA requirements and regulations into regional drought response initiative. Pressing issues included lack of communication between local and provincial governments; inconsistencies in drought triggers and communication with water users, individual users in particular; difficulties associated with public attitudes. Committee work centered on addressing these issues. Committee’s input helped facilitate organization of drought management workshops in summer 2016.</p>	

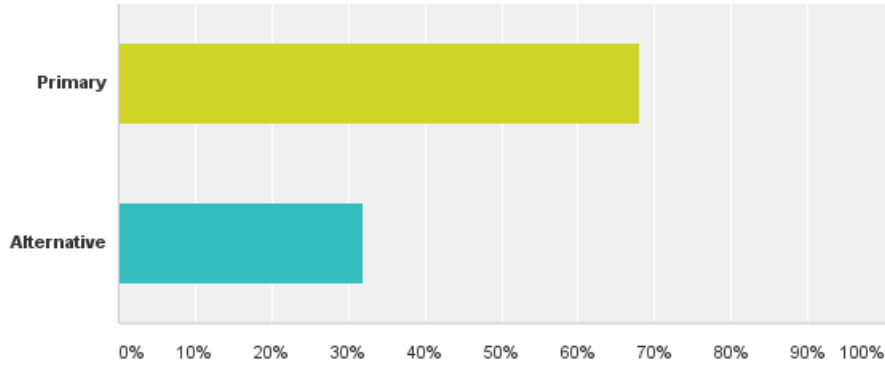
Committee	Goals	Objectives
<i>WSA and Groundwater Licensing</i>	WSA implications and action plan	<p>New WSA</p> <ul style="list-style-type: none"> • Review the implications of new WSA and the consistency of regional water policies with new regulations; • Assess local governments / municipalities / utilities capacity to comply with WSA <p>Groundwater licensing capacity</p> <p>Improve the state of groundwater science to:</p> <ul style="list-style-type: none"> • include groundwater users to the universal water use reporting system; • increase the number of groundwater monitoring stations and its interaction with surface water; • integrate EFNs into groundwater science; <p>Education and outreach</p> <ul style="list-style-type: none"> • public outreach to improve water users literacy with respect to surface / groundwater interaction and its implications on water restrictions during drought.
Summary:		<p>Committee reviewed WSA and regulations and discussed its implications for local governments and region in general. Work was centered on identifying opportunities and issues associated with resourcing by the province of new WSA: provision for user-friendly, easy to share water use reporting tool; and enabling streamlined informed groundwater licensing process (informed by good groundwater science).</p>

Committee	Goals	Objectives
<i>Stormwater management and wetlands</i>	Increase region’s resiliency to climate change impacts	<p>Protect, restore and enhance riparian and stormwater wetlands</p> <ul style="list-style-type: none"> • continue series of Okanagan Wetland Strategy projects and develop regional wetland strategy based on the Okanagan unique climate/topography conditions and needs identified during project earlier stages; • Integrate wetlands protection/construction into stormwater management plans and agricultural non-point source pollution prevention strategies; • implement daylighting pilot projects; • increase public involvement through pilot projects and education; <p>Data management</p> <ul style="list-style-type: none"> • Continuously improve wetland inventory and mapping; <p>Legal framework and mandate</p> <ul style="list-style-type: none"> • establish wetlands mandates; • identify wetland regulations and implications that regional policies/regulations might have on wetlands. • Link wetland strategy to source water protection and flood protection policies
Summary:		<p>Highlights include working on Okanagan Wetland Strategy phase III – finalizing contents and coordinating work by project team; Committee has also undertook a review of identified gaps in the local governments regulatory framework for wetlands protection and came up with OBWB policy recommendations to support local governments.</p>

Appendix 8. 2016 Council Member Survey (summary)

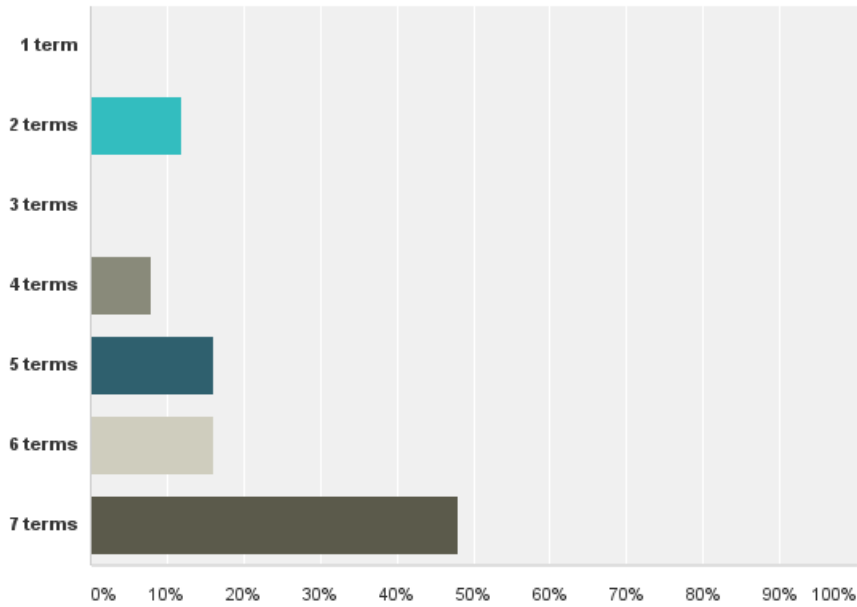
Q3 Representative status:

Answered: 25 Skipped: 0



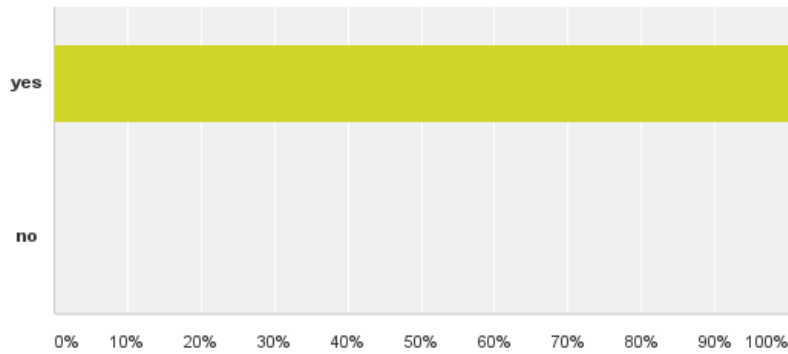
Q4 How long has your organization been a member of the Council:

Answered: 25 Skipped: 0



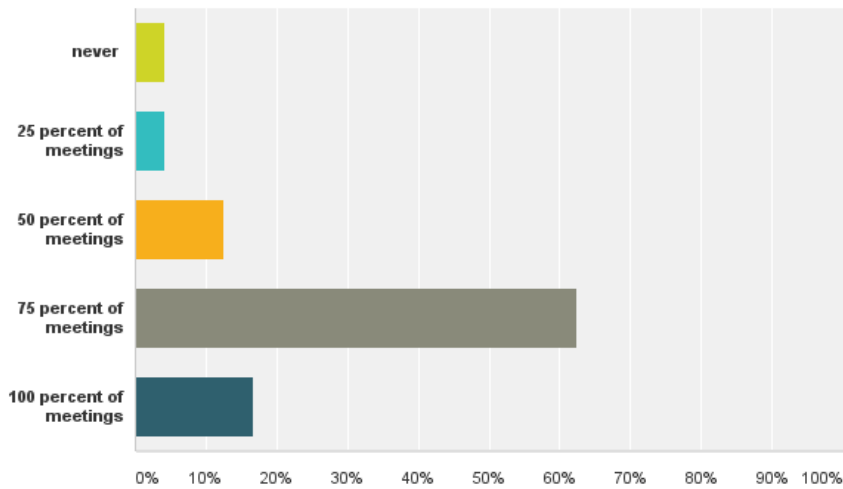
Q5 Is your organization planning to continue membership on the Council next term (2016-2018)?

Answered: 25 Skipped: 0



Q6 In the previous 18-month term (April 2015 to October 2016), how often was your organization represented at Council's meetings?

Answered: 24 Skipped: 1



Q9 In your opinion, what were the important issues that were effectively handled by the Council?

Answered: 15 Skipped: 10

Important Environmental Flows Invasive Mussels
Water Sustainability Act First Nations
Drought Response WSA

Q10 In your opinion, what were the important issues that were not effectively handled by the Council?

Answered: 15 Skipped: 10

Drought Quagga Okanagan Point Water
Council

Q11 From your organization's perspective, please list three (or more) most important items that you would like to see on the Council agenda in term 2016-2018.

Answered: 15 Skipped: 10

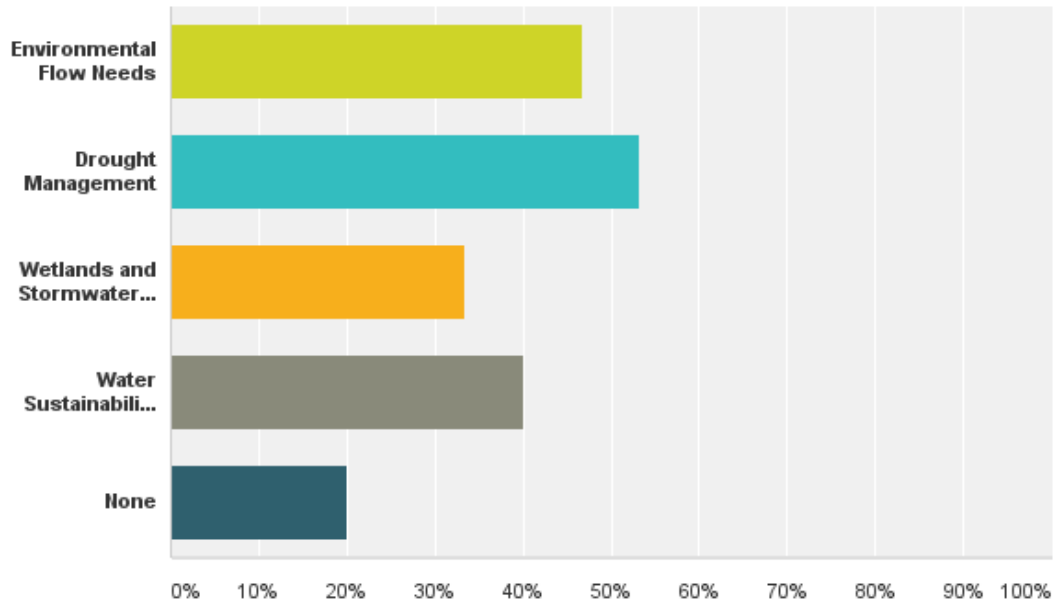
Main Stem Lakes Water Sustainability Plan

Implementation **Project**_{EFN} **Monitoring**_{Support}

Drought Management

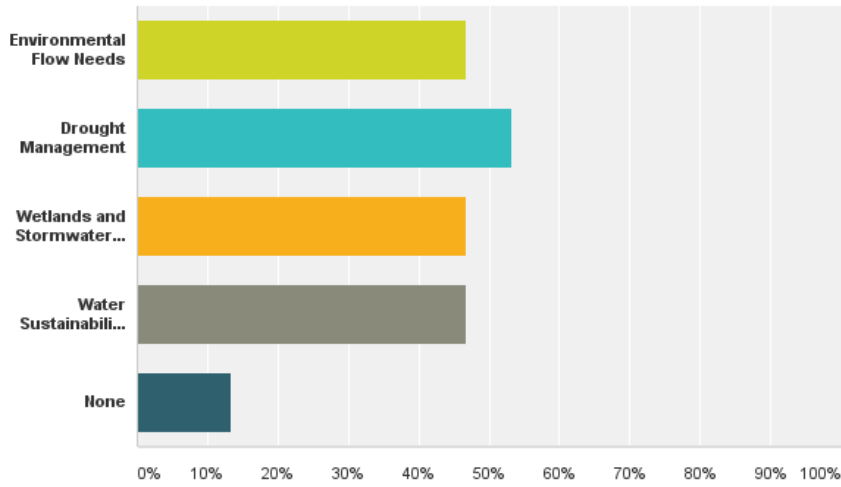
Q14 Did your organization participate in committees work this past term?

Answered: 15 Skipped: 10



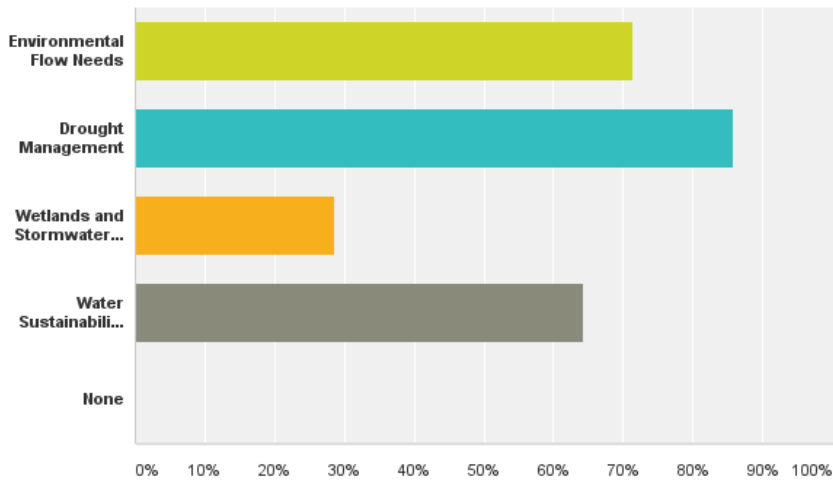
Q15 Which committees' work was the most relevant in addressing the needs of your organization (you can list more than one committee)?

Answered: 15 Skipped: 10



Q16 Which committees' work was the most relevant in addressing the needs of the Okanagan region as a whole? (you can list more than one committee)?

Answered: 14 Skipped: 11



Appendix 9. Summary of November 10, 2016 Council Planning Workshop

At the November 10, 2016 Council meeting, the Council spent time setting priorities for the 2016 - 2018 work term. The planning session was facilitated by Kellie Garcia, OBWB Policy and Planning Specialist. A summary of the workshop discussions is presented below.

Breakout group session

Council members first broke into four small groups to share the main concerns and priorities of their individual organizations, and think about the key themes and associated projects the Council should focus on during the next 18-months. Each group was led by an OBWB staff member, who facilitated the discussion and took notes on flipchart paper. The following Council members and guests participated in the breakout sessions.

Group 1:

OBWB Staff
BC Agriculture Council
BC Ground Water Association
Regional District of North Okanagan
Regional District of Central Okanagan
UBC-O (GUEST)

Nelson Jatel
Hans Buchler
Remi Allard (alt)
Renee Clark
Margaret Bakelaar
Marni Turek



Group 2:

OBWB Staff
BC Wildlife Federation – Region 8
Canadian Water Resources Association
Irrigation Industry Association of BC
Regional District of Okanagan-Similkameen
UBC Okanagan

James Littley
Doug Flintoft
Brian Guy
Bruce Naka (alt)
Zoe Kirk
Carolina Restrepo-Tamayo (alt)



Group 3:

OBWB Staff
BC Wildlife Federation – Region 8
City of Vernon
Ministry of FLNRO. (Resource Mgmt)
OCCP (GUEST)
Okanagan Forest Sector
UBC Okanagan

Corinne Jackson
Lorne Davies
Rob Miles (alt)
Grant Furness
Carol Luttmmer
Murray Wilson
Bernie Bauer



Group 4:

OBWB Staff
APEGBC
Environment and Climate Change Canada
Interior Health Authority
Ministry of Agriculture
UBC-O (GUEST)

Anna Warwick Sears
Shawn Badasha (alt)
Ian Rogalski (alt)
Rob Birtles
Andrew Petersen
Nargiz Rahimova



Summary of breakout group reports to council

After the breakout sessions, each group reported out on their discussions. This provided an opportunity to hear what went on at each table so the Council could start to identify common themes and top priorities.

Group 1 – Nelson Jatel reported out for Group 1. The group identified the following priorities: water sustainability plans (2 years away from having underlying regulations); agriculture water; the need to create groundwater regulation outreach (this is time sensitive with deadlines 3-4 months in terms of the registering of wells); foreshore protection; source water protection; template development (IH needs for an action plan, coordination, surface water support); water reserves; EFN; drought and flood planning; metrics around recreational water; cumulative impacts; and providing a forum for communication-what’s happening within the regions.

Group 2 – Zoe Kirk and James Littlely reported out for Group 2. The group identified the following priorities: adding flood planning into drought planning; communication (increased communication between members; OWSC back to Regional Districts and other member organizations, gap between what happens at the Council level and getting back to board levels); updating documents that have been produced with new information; at a glance – enjoy round table discussions but need something more (like a matrix that is fillable and that members can access and update with their information); source water protection; invasive species; wetland protection/restoration and maintain and monitor those being encroached on; stormwater management; Water Sustainability Act (crop differentiation-might affect licensing); current OWSC priorities (strengthen alliance with ONA and individual Bands; support UBC with research; CWRA policy & data management); groundwater science (some groups can really help with the research and populate the data while others need the documents); supply demand study; state of the Basin.

Group 3 – Carol Luttner reported out for Group 3. The group identified the following priorities: collaborating with First Nations (not specific resources allocated but always project specific basis); great job being done on invasives but wonder if OWSC shouldn't also be looking at what to do if they do arrive in the Okanagan (research and educate local government); continual focus on EFN, drought and storm water; stronger extension work (good data/good knowledge); opportunities to partner/connect with the academic world and students.

Group 4 – Rob Birtles report out for Group 4. The group identified the following priorities: further input on Water Sustainability Act and regulations (there hasn't been a good opportunity for Board/Council to be consulted); piloting approaches for wetlands; climate adaptation (drought/flood/ecosystem services/environmental protection); FN relationship building (sharing and learning); public education outreach (reach out to the public so they are informed and take ownership); advocate for OBWB and show what matters.

Key issues of relevance to member organizations

As identified during the workshop, key issues of relevance to member organizations are listed here:

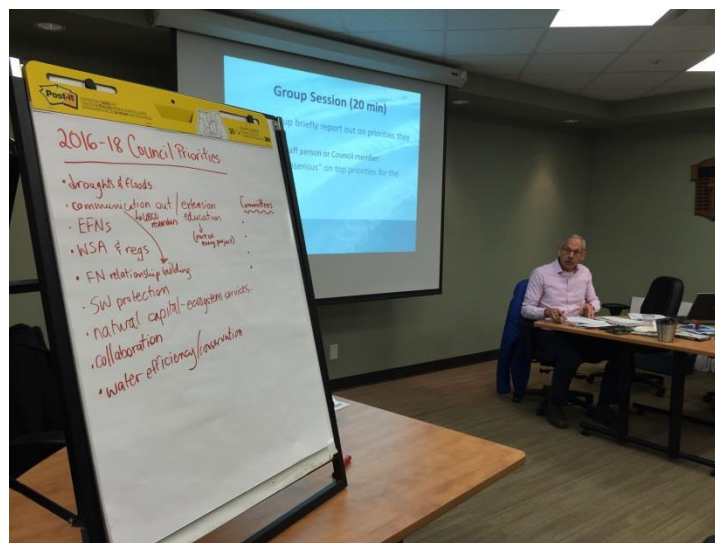
- Influence policy, legislation, and regulations, e.g. support implementation of Water Sustainability Act
- Good data and data management
- Groundwater licensing
- Secure water supply for agriculture; agricultural water reserve (AGR)
- Efficient water use and conservation
- Drought planning
- Climate change adaptation; understanding ecosystem works and impacts from climate change to devise effective mitigation and adaptation strategies
- Science –based decision making
- Promote integrated watershed management (cumulative effects; research by UBCO)
- Promote collaborative management

- Protecting public health and welfare – water planning and engineering
- Better understanding of people motives to promote greater uptake of best practices; improve environment to efficiently adapt to climate change (explore low cost soft management approaches).
- Multi-barrier approach for source water quality protection
- Water conservation within distribution system (metering coverage)
- Green infrastructure
- Improvements to water distribution systems
- Drought and flood control
- Emergency response plans
- Preventing invasive species
- Wetlands protection
- Environmental flows
- Crop-specific water use science
- Education
- Biodiversity conservation

Common themes and priorities

Five key themes emerged from the planning session:

1. Collaboration
2. Data, science, and policy
3. Conservation and restoration
4. Climate
5. Knowledge transfer





Theme 1: Collaboration

This theme focuses on improving communication and information flow and feedback among Council members, between Council members and their organizations, and between WSC and the Board. Communication and collaboration should be extended beyond WSC member organizations to great variety of stakeholders to talk about all work done by the Council and partners and to increase the diversity of stakeholders working on various projects and initiatives. Okanagan First Nations and other partners should be properly engaged in every project or initiative to facilitate a truly collaborative process of social learning and knowledge sharing. Similar approaches should be taken in collaborating with UBCO to explore opportunities to partner/connect with the academic world and the students.

Among projects to be addressed collaboratively, members mentioned establishing a regional forum for communicating on cumulative impact assessments, collaborating with Interior Health and local government on issues related to source water protection, drought and flood control planning, prevention and response to invasive mussels, validating ecosystems goods and services, restoration and conservation, and climate change adaptation.

Theme 2: Data, science, and policy

Continuous input and feedback by the WSC is expected as new *Water Sustainability Act* regulations are being developed to advocate for:

- more clarity in the groundwater licensing and allocation procedure;
- groundwater regulation outreach;
- regulations to protect EFNs and wetlands;
- secure access to water by agricultural communities (Agricultural Water Reserves);
- mechanisms to reconcile conflicts between consumptive uses and critical environmental flows;
- Water Sustainability Plans; and
- source water protection

The Okanagan supply and demand study needs to be updated to be more up-to-date in view of recent regulatory changes; special emphasis should be done on integrating studies about the cumulative impacts from surface and groundwater use.

Piloting approaches for EFNs should be implemented to inform policy writers and regulators about potential advantages and challenges related to integration of EFN science into water allocation decision-making. Similarly, wetlands restoration pilot projects might inform source water protection policies aimed at regulating agricultural runoff and stormwater.

Theme 3: Conservation and restoration

This theme extends to water conservation and riparian/wetland restoration initiatives implemented as part of climate change adaptation, drought and flood/stormwater control, foreshore protection, wetlands restoration for flood control and source-water protection, updates to supply and demand study to better understand water dynamics, and integration of EFN science into conservation communication and implementation initiatives. Conservation and restoration initiatives can be implemented through combination of collaborative approaches including communication and outreach, and research and policy.

Theme 4: Climate

Drought and flood planning, water conservation and efficiency and other related projects will become an integral part of the region-wide initiative of building resiliency into social and ecological systems to protect communities and ecosystems from adverse impact from climate change. More research is needed to understand potential impacts in the regional context and plan context and industry-specific adaptation approaches, and roles that government and communities will play in coping with changes as they occur. Identifying opportunities for improving storage and water supply, and solutions to deal with aging infrastructure should be a priority. The Council should participate in identifying scientific gaps for climate change and ecosystem function, and should advocate and encourage more collaboration to restore the environment as part of climate change adaptation.

Theme 5: Knowledge transfer

No initiative or project can be implemented and sustained in the long term unless taken up and supported by local communities and partners. Therefore, each Council project or initiative needs to be accompanied by proper communication, public outreach and education components (valuing ecosystem services being an example of exercise that needs to be performed in collaboration with regulators, scientists and communities of local water users). The WSC should advocate and educate for best land management practices and reduce aquifer pollution from agriculture.

Finally, the *Okanagan Sustainable Water Strategy* needs to be updated to reflect all of the above key themes.

Wrap up and next steps

The Council supported the recommendation from Brian Guy that they form a small committee to look at the notes from the planning workshop and incorporate the input into the 2016-18 Work Plan.

Margaret Bakelaar, Rob Birtles, Zoe Kirk, Carolina Restrepo-Tamayo, and Marni Turek volunteered to be on the committee, which will be led by Brian Guy (Chair), Denise Neilsen (Vice-Chair), and Nelson Jatel.

Appendix 10. Council Committees Terms of References

Communication Committee

This memo outlines a Terms of Reference for the Okanagan Water Stewardship Council Communication Committee.

Background

At its December 2016 meeting, the Okanagan Water Stewardship Council (the Council) approved a work plan for Term 7. Delivery of the plan will largely be accomplished through committee work, and the plan proposed continuing with several committees that were functioning during Council Term 6, and establishing several new committees. One of the new committees is a Communication Committee.

Council has identified several advantages of a greater emphasis on communication. As identified in the Term 7 Council Work Plan, enhanced communication activities could include:

- Improved internal communication between Council and its member organizations, particularly on important and urgent issues, such as the imminent threat related to invasive mussels
- Improved communication of member activities amongst Council members
- Improved celebration of successes of Council and Board programs and initiatives
- Enhanced communication of Council and Board roles and activities to key stakeholders throughout the Okanagan
- Stronger outreach to the public and groups that are not traditionally reached by the OBWB.
- Developing a stronger relationship with the local academic community
- Improved effort to inform First Nations, local municipal Councils and staff, and other parties about OWSC projects and products.

Outcomes

The work of the Communications Committee will lead to a higher visibility in the community, and a greater reach for the Council and the Board. It will lead to improved internal communication and knowledge-sharing (i.e. amongst Council members). It will facilitate collaboration between staff and Council, and leverage the excellent ongoing external communication effort of the OBWB staff. It will lead to strengthened relationships between the Council and its member organizations, and between Council (and Board) and other elements of Okanagan society. It will lead to greater participation of Council members, and encourage community engagement. It will lead to enhanced celebration of Council and Board successes.

Membership

The Chair of the Communications Committee will be appointed by the Council Chair. The committee Chair will work with the Council Chair, Council Vice Chair, Stewardship Director, and Council members to identify members to fill the committee. Membership will not necessarily be limited to Council representatives.

Scope of work

The scope of work of the Communications Committee is:

- Establish a list of members for the Committee, and seek the approval of the Council Chair for the membership list.
- Develop a Strategic Plan describing the long-term vision, mission, and objectives and activities for the Committee, and describing its role (including coordination with the OBWB staff Communications Director), and anticipated budget requirements.
- Develop a Term 7 Operational Plan that describes the work to be accomplished during Council Term 7, and that includes a list of deliverables, a schedule for activities, and a budget if required.
- Provide both the Strategic Plan and the Operational Plan to the Council for review and approval.
- Deliver the Term 7 Implementation Plan during Council Term 7 (ending in May 2018) within the approved schedule and budget.
- Where the committee identifies a need for funding to support its activities, assist with preparation of proposals to external funding bodies to fund such activities.
- Provide periodic progress reports to Council and an end-of-Term summary of activities completed during the Council Term.

Deliverables and schedule

The following table outlines a schedule of activities and deliverables for the Communications Committee during Council Term 7.

Deliverable	Timing
List of members	End-February 2017
Strategic Plan	End-April 2017
Term 7 Operational Plan	End-May 2017
Progress reports	Each Council meeting
Term 7 activities and deliverables	During Term 7
Term 7 summary report	May 2018

Budget

At present no budget has been assigned for the work of the Communications Committee. However, it is possible that some committee activities will require some funding. Such funding would likely be sought from beyond the existing budget of the OBWB Water Management Plan. In these circumstances, the committee would be expected to contribute to proposals for funding to complete committee activities.

Environmental Flow Needs (EFN) Committee

This memo outlines a Terms of Reference for the Okanagan Water Stewardship Council EFN Committee.

Background

At its December 2016 meeting, the Okanagan Water Stewardship Council (the Council) approved a work plan for Term 7. Delivery of the plan will largely be accomplished through committee work, and the plan proposed continuing with several committees that were functioning during Council Term 6, and establishing several new committees. The EFN committee was functioning during Council Term 6. The present document provides a specific Terms of Reference for the EFN Committee for Council Term 7.

The EFN Committee during Term 6 provided support and leadership to a long-term EFN project being led by the Okanagan Basin Water Board and other organizations. The project began with Phase 1 – a technical document that recommended specific methods for determining the streamflows needed to sustain aquatic populations in Okanagan streams. Phase 2 is currently underway – application of those methods to 19 priority Okanagan streams.

The Phase 1 EFN report pointed out that the process of making a water allocation decision by a statutory decision-maker would likely take into account factors in addition to aquatic ecosystem needs. The Phase 1 report referred to a higher level committee or process, envisioned by the Water Sustainability Act, that could be created to assist a statutory decision-maker in obtaining and evaluating all the factors that could be brought to bear on a water allocation decision.

Due to the complexity of the historic human interaction with natural streamflows in the Okanagan, there are usually competing interests in a water allocation discussion, and the Okanagan is thus a candidate region for such a decision-making process. Accordingly, the Council's EFN committee will be charged with establishing such a decision-making process for the Okanagan during Term 7.

Outcomes

The EFN Committee will develop a water allocation decision-making process for the Okanagan, informed by aquatic ecosystem needs and other considerations. It will also identify and promote opportunities to pilot the decision-making framework in some or all of the 19 priority sub-basins that are the subject of Phases 1 and 2 of the ongoing EFN study.

This work will extend the technical work completed in Phases 1 and 2 of the EFN project, to offer senior government well-rounded advice on an effective approach to considering a range of viewpoints when considering water-allocation decisions.

Membership

The Chair of the Committee will be appointed by the Council Chair. The committee Chair will work with the Council Chair, Council Vice Chair, Stewardship Director, and Council members to identify members to fill the committee. Membership will not necessarily be limited to Council representatives.

Scope of work

The scope of work of the EFN Committee is:

- Establish a list of members for the Committee, and seek the approval of the Council Chair for the membership list.
- Review the objectives and accomplishments of the Term 6 EFN Committee and the work completed to date in Phases 1 and 2 of the EFN project.
- Develop a specific Work Plan that will allow the committee to achieve its above-noted objectives during Term 7. The Work Plan will describe specific objectives, tasks, deliverables, schedule and budget (if required).
- Provide the Work Plan to the Council for review and approval.
- Deliver the Work Plan during Council Term 7 (ending in May 2018) within the approved schedule and budget.
- Where the committee identifies a need for funding to support its activities, assist with preparation of proposals to external funding bodies to fund such activities.
- Provide periodic progress reports to Council and an end-of-Term summary of activities completed during the Council Term.

Deliverables and schedule

The following table outlines a schedule of activities and deliverables for the EFN Committee during Council Term 7.

Deliverable	Timing
List of members	End-February 2017
Term 7 Work Plan	End-March 2017
Progress reports	Each Council meeting
Term 7 activities and deliverables	During Term 7
Term 7 summary report	May 2018

Budget

At present no budget has been assigned for the work of the EFN Committee. However, it is possible that some committee activities will require some funding. Such funding would likely be sought from beyond the existing budget of the OBWB Water Management Plan. In these circumstances, the committee would be expected to contribute to proposals for funding to complete committee activities.

Water Supply and Demand Update (WSD Update) Committee

This memo outlines a Terms of Reference for the Okanagan Water Stewardship Council WSD Update Committee.

Background

At its December 2016 meeting, the Okanagan Water Stewardship Council (the Council) approved a work plan for Term 7. Delivery of the plan will largely be accomplished through committee work, and the plan proposed continuing with several committees that were functioning during Council Term 6, and establishing several new committees. The WSD committee is a new committee.

The Okanagan Water Supply and Demand Project (Phase 2) was a 3-year study completed in 2010 that pulled together basin-wide information on water supply and demand, updating work last completed in the early 1970s. The study also included developing models to simulate water supply and water demand in the basin, and the effects of water use on streamflows. Weaknesses included the way groundwater is treated in the models, and the method adopted for EFN determination. The Phase 2 report made several recommendations for collecting new data, conducting research, and improving the models, much of which has been completed or is underway, and recommended re-examining the work after five years. It is now time to complete a thorough update of the Phase 2 work, making use of the improved information base, and focussing on improving the communication of results to end-users.

The work recommended for the OWSC is to create a document that describes the scope of work of the study in sufficient detail to support applications for funding to conduct the work. The Council would also assist staff in identifying funding opportunities and securing the necessary funding.

Once the funding is secured, it is anticipated that the WSD Update project will be managed by OBWB using internal or external resources. A Council committee could be created to oversee the project. End-users (such as municipalities, First Nations, and water allocation officers) would be represented on the Committee to ensure their needs are considered.

Outcomes

The outcome of this committee's work will be a Terms of Reference for an updated Water Supply and Demand project. Funding for the project will subsequently be secured.

Membership

The Chair of the Committee will be appointed by the Council Chair. The committee Chair will work with the Council Chair, Council Vice Chair, Stewardship Director, and Council members to identify members to fill the committee. Membership will not necessarily be limited to Council representatives.

Scope of work

The scope of work for the WSD Update Committee is to develop a Terms of Reference for an updated Phase 2 Water Supply and Demand project with sufficient detail to secure funding for the work. The work will include using existing data and research to develop improved scientific understanding and models.

Specifically, the scope of work of the WSD Update Committee is:

- Establish a list of members for the Committee, and seek the approval of the Council Chair for the membership list.
- Develop the Terms of Reference for the WSD Update Project
- Present a draft Terms of Reference to the Council Chair, and then to Council

Deliverables and schedule

The following table outlines a schedule of activities and deliverables for the EFN Committee during Council Term 7.

Deliverable	Timing
List of members	End-February 2017
WSD Update Project Terms of Reference	End-June 2017

Budget

It is not anticipated that a budget will be required for the work of the WSD Update Committee.

Irrigation Management (IM) Committee

This memo outlines a Terms of Reference for the Okanagan Water Stewardship Council IM Committee.

Background

At its December 2016 meeting, the Okanagan Water Stewardship Council (the Council) approved a work plan for Term 7. Delivery of the plan will largely be accomplished through committee work, and the plan proposed continuing with several committees that were functioning during Council Term 6, and establishing several new committees. The IM Committee is a new committee.

In the Okanagan, about 85% of the total water used for human purposes is used for irrigation, and of that total, roughly two-thirds is used for agriculture. Progress has been made in recent years towards improving irrigation system design and installation practices, and to improving application efficiencies. Council has a role to play in encouraging a continued focus on improving irrigation management.

Council's IM committee will develop recommendations to support the goal of improved irrigation management practices in the Okanagan.

Outcomes

The outcome of the work of the IM committee will be technical recommendations, memos, and reports that provide useful, practical, implementable guidance for Okanagan irrigators (agricultural and other), that will lead to more efficient water use, and reduced demand for water. This will support aquatic ecosystems, and improve drought resilience in the Okanagan.

Membership

The Chair of the Committee will be appointed by the Council Chair. The committee Chair will work with the Council Chair, Council Vice Chair, Stewardship Director, and Council members to identify members to fill the committee. Membership will not necessarily be limited to Council representatives.

Scope of work

The scope of work of the IM Committee is:

- Establish a list of members for the Committee, and seek the approval of the Council Chair for the membership list.
- Develop a Work Plan that will allow the committee to achieve its objectives during Term 7. The Work Plan will describe specific committee objectives, as well as tasks, deliverables, schedule and budget (if required).
- Provide the Work Plan to the Council for review and approval.
- Deliver the Work Plan during Council Term 7 (ending in May 2018) within the approved schedule and budget.
- Where the committee identifies a need for funding to support its activities, assist with preparation of proposals to external funding bodies to fund such activities.
- Provide periodic progress reports to Council and an end-of-Term summary of activities completed during the Council Term.

Deliverables and schedule

The following table outlines a schedule of activities and deliverables for the IM Committee during Council Term 7.

Deliverable	Timing
List of members	End-February 2017
Term 7 Work Plan	End-April 2017
Progress reports	Each Council meeting
Term 7 activities and deliverables	During Term 7
Term 7 summary report	May 2018

Budget

At present no budget has been assigned for the work of the IM Committee. However, it is possible that some committee activities will require some funding. Such funding would likely be sought from beyond the existing budget of the OBWB Water Management Plan. In these circumstances, the committee would be expected to contribute to proposals for funding to complete committee activities.

Strategy for updating the Okanagan Sustainable Water Strategy Version 1.0

Because of the magnitude of the anticipated effort, the SWS 1.0 update work will be led by OBWB staff. Kellie Garcia has been assigned to lead and coordinate this work. This document provides advice from Council to OBWB staff in the execution of that leadership role.

Background

Version 1.0 of the Okanagan Sustainable Water Strategy (SWS) was released by the Okanagan Water Stewardship Council in 2008. In that document, the Council assembled available information to identify and summarize water-related issues in the Okanagan; and since then, the document has served as a guide to addressing water management issues in the Basin. The SWS has also been used to inform and inspire new studies to identify emerging issues and to develop scientific insights into potential solutions. Newly available research and information, along with significant changes in the regulatory environment indicate a need to update the SWS. Among other changes, an updated SWS should incorporate insights on developing policies and capacity to support changes in water legislation and regulations; and address other issues, such as local government and communities' capacity to withstand impacts from climate change, and regional ecological challenges.

Before (or coincident with) the SWS update, it will be advisable to produce a status report on SWS Version 1.0, which will inform the update. In addition, to provide a rational and commonly understood basis for the update, and to establish baseline conditions for the SWS update, it will be useful to complete a State of the Basin report on water-related issues throughout the Okanagan. Finally, an updated SWS should be guided by knowledge of the role and significance of natural capital in providing ecosystem services. Accordingly, it is recommended that the value of the natural capital of the Okanagan should be considered in supporting and informing the SWS update.

Outcomes

The evaluation of progress made on SWS Version 1.0 will allow gaps to be identified and inform the prioritization of strategies for the SWS update.

The State of the Basin work will establish a baseline for the status of water resources in the Okanagan, against which future conditions can be compared, and will inform the SWS update.

An evaluation of the Okanagan's natural capital will provide an estimate for the services provided to society by natural and managed land and water in the Okanagan; which will inform the SWS update, will inform future planning by all levels of government, and will provide a basis for more comprehensive asset management than is currently practiced.

Updating the SWS Version 1.0 will create a current guide to water management issues and priorities based on assessments of progress made on SWS Version 1.0, and of current conditions.

Membership

OBWB staff (Kellie Garcia) will seek out individuals with relevant expertise (Council members and others) to contribute in an authorship, editorial, and/or review role. Council will review the document before it is finalized.

Scope of work

Council suggests the following steps be considered in developing the SWS Update:

- Coordinate and maintain communication with the Council Chair and Council committees, all of which are working to address high priority issues previously identified by Council at the beginning of Term 7.
- Develop a Work Plan that will achieve the Outcomes listed in Section 2.0 above, and that describes the work to be accomplished during Council Term 7. The Work Plan should include a list of deliverables and a schedule for activities.
- Provide the Work Plan to the Council Chair for review.
- The final deliverable will be an updated Sustainable Water Strategy in a format and style similar to the Sustainable Water Strategy Version 1.0 that will guide water management for the next several years.
- Deliver the Work Plan and associated deliverables during Council Term 7 (ending in May 2018).
- Provide periodic progress reports to Council and an end-of-Term summary of activities completed during the Council Term.

Drought and Flood Planning Committee

This memo outlines a Terms of Reference for the Okanagan Water Stewardship Council Drought and Flood Planning (DFP) Committee.

Background

At its December 2016 meeting, the Okanagan Water Stewardship Council (the Council) approved a work plan for Term 7. Delivery of the plan will largely be accomplished through committee work, and the plan proposed continuing with several committees that were functioning during Council Term 6, and establishing several new committees. The DFP Committee will continue the work of the Drought Management Planning Committee that operated during Council Term 6, but extend its mandate to include flood (and floodplain) management planning. Stormwater management (a component of flood management) was considered by another Term 6 Committee (the Wetland and Stormwater Committee), and stormwater quantity issues will be considered part of the mandate of the Term 7 DFP Committee. The work of the Term 6 Drought Management Planning Committee and of the Wetland and Stormwater Committee are summarized in the Term 7 Council Work Plan.

Historically the OWSC and OBWB have promoted drought planning by municipalities, and coordination of plans between municipalities. Over the past year OBWB played an influential role in improving coordination between provincial water managers and local water utility managers during summer drought response. OBWB is also leading a project to develop drought response triggers and actions for the mainstem lakes.

The other side of extreme weather is intense precipitation and resultant flooding. In response to ongoing climate disruption, and recognizing the costs associated with floods and with building flood protection, some local governments are beginning to examine the implications of, and their ability to manage, high streamflows and high stormwater flows.

The Term 7 DFP Committee would continue the work of the Term 6 Drought Management Committee to promote coordinated drought planning throughout the Okanagan, and also promote coordinated approaches to examining and improving flood resilience.

Outcomes

The committee's work will result in programs, funding, and recommendations related to drought and flood management planning in the Okanagan. Specifically, outcomes of the work of the committee will include:

- Improved communication on flood and drought issues across levels of government;
- Plans and funding for updated floodplain management;
- Increases in the number of municipalities with drought and flood management plans;
- Increases in the consistency of such plans amongst municipalities.

Membership

The Chair of the Committee will be appointed by the Council Chair. The committee Chair will work with the Council Chair, Council Vice Chair, Stewardship Director, and Council members to identify members to fill the committee. Membership will not necessarily be limited to Council representatives.

Scope of work

The scope of work of the Policy Committee is:

- Establish a list of members for the Committee, and seek the approval of the Council Chair for the membership list.
- Develop a specific Work Plan that will deliver the desired Outcomes during Term 7. The Work Plan will describe specific objectives, tasks, deliverables, schedule and budget (if required).
- In developing the Work Plan, consider the objectives, accomplishments, and deliverables of the Drought Management Planning Committee and the Wetland and Stormwater Committee during Term 6 (summarized in the Term 7 Work Plan).
- Provide the Work Plan to the Council for review and approval.
- Deliver the Work Plan during Council Term 7 (ending in May 2018) within the approved schedule and budget.
- Where the committee identifies a need for funding to support its activities, assist with preparation of proposals to external funding bodies to fund such activities.
- Provide periodic progress reports to Council and an end-of-Term summary of activities completed during the Council Term.

Deliverables and schedule

The following table outlines a schedule of activities and deliverables for the Policy Committee during Council Term 7.

Deliverable	Timing
List of members	End-February 2017
Term 7 Work Plan	End-April 2017
Progress reports	Each Council meeting
Term 7 activities and deliverables	During Term 7
Term 7 summary report	May 2018

Budget

At present no budget has been assigned for the work of this Committee. However, it is possible that some committee activities will require some funding. Such funding would likely be sought from beyond the existing budget of the OBWB Water Management Plan. In these circumstances, the committee would be expected to contribute to proposals for funding to complete committee activities.

Source Protection and Wetlands (SPW) Committee

This memo outlines a Terms of Reference for the Okanagan Water Stewardship Council SPW Committee.

Background

At its December 2016 meeting, the Okanagan Water Stewardship Council (the Council) approved a work plan for Term 7. Delivery of the plan will largely be accomplished through committee work, and the plan proposed continuing with several committees that were functioning during Council Term 6, and establishing several new committees. The SPW Committee is a new committee focussed on source protection and water quality. It incorporates aspects of a Term 6 committee: the Stormwater and Wetlands Committee. Specifically it incorporates strategic aspects related to Wetlands, and water quality aspects of stormwater.

Historically, Council has placed significant focus on source water protection, and has achieved notable successes. Many water utilities have completed watershed risk assessments, and have source water protection plans in place. However, there is more work to be done to comprehensively understand and manage risks to water quality. In addition, OBWB has successfully pursued a long-term project (the Okanagan Wetlands Strategy) to protect and conserve wetlands, and to restore damaged or destroyed wetlands. This work is being managed by OBWB staff using both internal and external resources. However, Council has a role to play in providing strategic direction to this worthwhile effort.

The Source Water Protection and Wetlands (SPW) committee will make progress towards the OBWB's goal of excellent water quality throughout the Okanagan. The committee will be tasked with focussing on the source protection sub-goals identified in the OBWB Strategic Plan, and developing specific actions and strategies to make progress on these goals. It will also assist OBWB staff to develop policy and programs to combat the threat of invasive mussels. Finally, the SPW committee will provide strategic guidance to OBWB staff in developing an Okanagan Wetlands Strategy. Its work will be guided by the work completed during Council Term 6, as summarized in the Term 7 Work Plan.

Outcomes

Outcomes of the work of the SPW committee during Term 7 include:

- Programs and recommendations that significantly advance the Okanagan towards the OBWB's Strategic Goal of "Excellent source water quality – drinkable, swimmable, fishable";
- Assistance to OBWB staff in leading an effort to prevent the arrival of invasive mussels in the Okanagan, and to prepare for their arrival; and,
- Strategic guidance to OBWB staff in developing an Okanagan Wetlands Strategy.

Membership

The Chair of the Committee will be appointed by the Council Chair. The committee Chair will work with the Council Chair, Council Vice Chair, Stewardship Director, and Council members to identify members to fill the committee. Membership will not necessarily be limited to Council representatives.

Scope of work

The scope of work of the SPW Committee is:

- Establish a list of members for the Committee, and seek the approval of the Council Chair for the membership list.
- Develop a specific Work Plan that will deliver the three above-noted Outcomes during Term 7. The Work Plan will describe specific objectives, tasks, deliverables, schedule and budget (if required).
- Provide the Work Plan to the Council for review and approval.
- Deliver the Work Plan during Council Term 7 (ending in May 2018) within the approved schedule and budget.
- Where the committee identifies a need for funding to support its activities, assist with preparation of proposals to external funding bodies to fund such activities.
- Provide periodic progress reports to Council and an end-of-Term summary of activities completed during the Council Term.

Deliverables and schedule

The following table outlines a schedule of activities and deliverables for the SPW Committee during Council Term 7.

Deliverable	Timing
List of members	End-February 2017
Term 7 Work Plan	End-April 2017
Progress reports	Each Council meeting
Term 7 activities and deliverables	During Term 7
Term 7 summary report	May 2018

Budget

At present no budget has been assigned for the work of this Committee. However, it is possible that some committee activities will require some funding. Such funding would likely be sought from beyond the existing budget of the OBWB Water Management Plan. In these circumstances, the committee would be expected to contribute to proposals for funding to complete committee activities.

Policy Committee

This memo outlines a Terms of Reference for the Okanagan Water Stewardship Council Policy Committee.

Background

At its December 2016 meeting, the Okanagan Water Stewardship Council (the Council) approved a work plan for Term 7. Delivery of the plan will largely be accomplished through committee work, and the plan proposed continuing with several committees that were functioning during Council Term 6, and establishing several new committees.

Providing input to higher levels of government on proposed legislation, regulations, and policy has been a core function of Council since its founding. In Term 6 this work was led by a committee known as the Water Sustainability Act and Groundwater Licensing Committee. The focus of this committee was on the relatively new B.C. Water Sustainability Act (WSA), which passed third reading in spring 2014 and became law on February 29, 2016 upon the completion of the first of 6 of the enabling regulations. The work of that Term 6 committee is summarized in the Term 7 Council Work Plan.

The Term 7 Policy Committee will continue to focus on the WSA. Issues to be addressed and actions to be enabled regarding the WSA include a need for more clarity in the groundwater licencing and allocation procedure; regulations to protect EFNs and wetlands; securing access to water by agricultural communities; mechanisms to reconcile possible conflicts between consumptive uses and critical environmental flows; and source-water protection.

The Policy will extend its scope beyond the WSA to consider other provincial and federal legislation relevant to the Okanagan. Finally, the Policy Committee will not only react to requests for input from provincial and federal and other levels of government, but will proactively seek opportunities to influence legislation, regulations, and policy that may affect the Okanagan. The scope of these activities will largely be limited to federal and provincial legislation.

Outcomes

Deliverables of the committee will consist of analyses, recommendations, and advice on strategic and technical issues, provided in the form of memos and/or letters directed to the Council. The Council will consider the advice and take appropriate action.

The work of the committee will strengthen the profile of the Council and OBWB as thoughtful, wise, influential, and trusted contributors to water-related legislation; and will result in legislation that has adequately considered the needs of the Okanagan.

Membership

The Chair of the Committee will be appointed by the Council Chair. The committee Chair will work with the Council Chair, Council Vice Chair, Stewardship Director, and Council members to identify members to fill the committee. Membership will not necessarily be limited to Council representatives.

Scope of work

The scope of work of the Policy Committee is:

- Establish a list of members for the Committee, and seek the approval of the Council Chair for the membership list.
- Develop a specific Work Plan for both proactively and reactively considering relevant legislation (and related regulations and policy), and for providing advice to the Council and Board related to the relevant legislation.
- In developing the Work Plan, consider the objectives, accomplishments, and deliverables of the committee during Term 6 (summarized in the Term 7 Work Plan); and the WSA issues identified by Council (listed in Section 1.0 above).
- Provide the Work Plan to the Council for review and approval.
- Deliver the Work Plan during Council Term 7 (ending in May 2018) within the approved schedule and budget.
- Where the committee identifies a need for funding to support its activities, assist with preparation of proposals to external funding bodies to fund such activities.
- Provide periodic progress reports to Council and an end-of-Term summary of activities completed during the Council Term.

Deliverables and schedule

The following table outlines a schedule of activities and deliverables for the Policy Committee during Council Term 7.

Deliverable	Timing
List of members	End-February 2017
Term 7 Work Plan	End-March 2017
Progress reports	Each Council meeting
Term 7 activities and deliverables	During Term 7
Term 7 summary report	May 2018

Budget

At present no budget has been assigned for the work of this Committee. However, it is possible that some committee activities will require some funding. Such funding would likely be sought from beyond the existing budget of the OBWB Water Management Plan. In these circumstances, the committee would be expected to contribute to proposals for funding to complete committee activities.

Appendix 11. Council Committees Meeting Schedule

	Committee	Feb 9th	Mar 9th	Apr 13th	May 11th	Sep 7th	Oct 12th	Nov 9th	Dec 7th	Feb 8th	Mar 8th	Apr 2nd	May 10th
1	Communication	x		x		x		x		x		x	
2	Environmental Flow Needs – Phase III	x		x		x		x		x		x	
3	Supply and Demand Study Update		x		x		x		x		x		x
4	Irrigation Management		x		x		x		x		x		x
5	Sustainable Water Strategy 2.0												
6	Drought and Flood Planning												
7	Source water protection / Wetlands												
8	Policy												

Appendix 12. OWSC Committees and Chairs

Committee	Chair
Communication	Kirk
Environmental Flow Needs	Edwards
Water Supply and Demand Update	Neilsen
Irrigation Management	Naka
Okanagan SWS 2.0	Garcia (staff)
Drought and Flood Planning	Bakelaar
Source water protection and wetlands	Clark
Policy – Provincial / Federal	Birtles

Concepts:

- Committee Chairs are primary Council members (vs alternate members or non-members)
- The Council Chair and Water Stewardship Director are ex-officio members of each committee
- The Council Chair appoints Committee Chairs
- Council members volunteer for committees at the February 2017 meeting
- Any Council member not volunteering for a committee will be assigned to a committee by the Council Chair