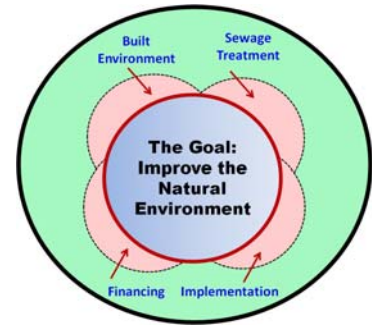


Metro Vancouver Liquid Waste Management Plan Reference Panel



TO: Metro Vancouver Waste Management Committee

CC: Johnny Carline, Chief Administrative Officer, Metro Vancouver

FROM: **LWMP Reference Panel:**

Shaun Carroll, P.Eng.

Garry Cooper

Elaine Golds, PhD

Ken Hall, PhD

Mark Hodgson, P.Eng., MBA

Don Mavinic, PhD., P.Eng., FCSCE, FEIC, FCAE

Simon Poole

Susan Rutherford, LLB

Kim Stephens, M.Eng., P.Eng., Chair

Christianne Wilhelmson, M.Sc., Co-Chair

DATE: November 20, 2009

SUBJECT: INTEGRATED LIQUID WASTE & RESOURCE MANAGEMENT
Reference Panel Assessment of Final Plan dated November 2009

The Reference Panel refers to our July 2009 *Final Report on A Liquid Resource Management Plan for Metro Vancouver*, and thanks the Waste Management Committee for this opportunity to provide our assessment of Metro Vancouver's "Final Plan" titled *Integrated Liquid Waste and Resource Management (November 2009)*.

Our Overall Assessment

We also refer to the consultation document titled *LWMP Reference Panel Recommendations and Metro Vancouver Responses (Attachment 8)*. Key points to note are distilled as follows:

1. Our Final Report is built around **A Recommended Policy Framework for Liquid Resource Management in Metro Vancouver (Table 1)**. This table succinctly captured how the region can continue to transition from the current path and achieve the Sustainable Region Initiative vision. Table 1 comprises nineteen recommendations that inform policy development under five themes:
 - **Natural Environment** – *move from protect to improve*
 - **Built Environment** – *move beyond pilot projects*
 - **Sewage Treatment** – *move from waste to resource*
 - **Financing** – *move to a total system approach*
 - **Implementation** – *move from commitment to action*
2. The comparison table prepared by Metro Vancouver demonstrates that there is alignment and consistency between Table 1 and the Final Plan; and furthermore, the strategies and actions in the Final Plan reflect and/or incorporate our nineteen recommendations.
3. The Final Plan is a solid, well-written document; and most importantly, it is action-oriented. We applaud Metro Vancouver staff for a job well-done in providing clarity and integration.
4. Because the Final Plan is a regulatory document, this limits the extent to which it is able to "tell the story". It therefore needs to be read in tandem with our *July 2009 Final Report* to create a picture of a desired outcome that will inspire people to strive for constant improvement – *this is what we want our region to look like, and this is how we will get there*.

What We Like About the Plan

The Final Plan is an opportunity for Metro Vancouver to “get it right”, by promoting public and municipal leadership to take advantage of this opportunity. The Final Plan provides the means to translate the visionary *Metro Vancouver Sustainability Framework* into tangible **actions** on the ground. We like the Final Plan because:

- a. **Integrated Resource Recovery:** The new way of thinking about liquid discharges and rainwater as resources is evident throughout, starting with the title.
- b. **Connect to the Landscape:** Recognizes the connection of water to the landscape, and that the decisions we make on the built environment have a direct impact on the health of the natural environment.
- c. **Shared Responsibility:** Emphasizes achievable, enforceable actions; and introduces *accountability* and *shared responsibility* as precepts that guide the new business as usual.
- d. **Collaborate and Share:** Lays the groundwork for alignment of local actions with provincial and regional goals via an educationally-based *regional team approach*, one that develops a common understanding and results in consistent expectations region-wide.
- e. **Stewarding Committee:** Establishes the mandate for IUMAC (Integrated Utility Management Advisory Committee) to advise Metro Vancouver on plan implementation, particularly from the perspectives of integrated planning and resource recovery, across utility systems.
- f. **Climate Change:** Introduces the concept of ‘resilient infrastructure’ to address risks and long-term needs associated with climate change; and underscores that a financial investment is necessary to ensure the legacy of a ‘sustainable region’.
- g. **Rational Costs Allocation:** The shift to allocating costs based on wet weather flows rather than dry weather flows means price signals will be rationalized to incent reducing the most significant and costly flows that push our system to its limits. More generally, we support any move toward cost-recovery and accounting that reflects full life-cycle, polluter-pay principles.

In addition, we wish to draw your attention to these three specifics to illustrate how change happens:

- **Sewage Treatment:** Alignment with the *Canada-wide Strategy for the Management of Municipal Wastewater Effluent* sets baseline wastewater management criteria, timelines and prioritization methodologies, and formalizes processes to assess environmental risk.
- **Inflow & Infiltration:** The I&I issue produced a defining moment during Plan development, thereby demonstrating what can happen when there is the will to “just do it”. A fundamental shift in thinking on the part of Metro Vancouver and the municipalities has resulted in a solid demonstration of leadership with the commitment to reduce the volume of rainwater and groundwater entering the sewer system through defects in public pipes and private laterals.
- **Connect to the Landscape:** Now that the I&I experience has established a precedent for a fundamental shift in thinking, we look for the same type of leadership and commitment from the municipalities to implement Recommendation #5: “*Refocus Integrated RAINwater/Stormwater Management Plans on watershed targets and outcomes so that there are clear linkages with the land use planning and development approval process.*”

What Could Have Been Better

The Final Plan is a good plan. Yet there are issues that we believe need to be highlighted so that their significance will be recognized. For the record, we wish to draw your attention to these four items:

- **Timelines for Treatment Plant Replacements:** Ensuring the health of Burrard Inlet, the Fraser River and the Georgia Strait is important to our quality of life, and to our social and economic health. To achieve the Plan's vision, Metro Vancouver members accept the need for replacement of both the Lions Gate and Iona treatment plants, and are looking to senior governments to demonstrate their shared responsibility and commitment by providing fair and equitable cost-sharing so that both can be replaced sooner rather than later, and preferably no later than 2020. Otherwise, the region is looking at nearly 20 years (as a latest date) for replacing the Iona plant which treats nearly 50% of the region's sewage. In our view, implementation of the **Canada-wide Strategy** creates an obligation on the part of the senior governments to step up to the plate and fulfil their social and environmental responsibilities.
- **Treatment Terminology:** With the passage of time, the terms *primary*, *secondary* and *tertiary* treatment reflect a simplistic and increasingly outdated way of describing treatment processes. Going forward, we believe Metro Vancouver should be incorporating the new language that more accurately reflects where treatment practice is headed - in particular, 'advanced treatment' and 'best available technology' capture the 'waste to resources' vision of the Final Plan.
- **Cumulative Effects Monitoring of Multiple Contaminants:** While monitoring activities are referenced in the Final Plan, the Panel would have preferred to see some specific priority mention given to the challenge of monitoring *cumulative and cross-effects* of toxins on species, and their relationship to liquid waste streams. This remains a critical challenge for ocean health in this region.
- **Fats-Oils-Grease:** FOG waste discharges from commercial establishments have significant impacts on the capacity and condition of the sanitary sewer collection system, and therefore have substantial cost implications over time. Accordingly, and looking ahead to the implementation phase, we believe it is important that Metro Vancouver raise awareness of the FOG issue and draw attention to the opportunities for recycling and energy generation.

What Next

Looking ahead, and reflecting on the Reference Panel process and the outcome, we believe it is essential that:

1. The Reference Panel Final Report (July 2009) and the Final Plan (November 2009) go forward as a combined package because our Final Report provides necessary context for the Final Plan.
2. The Reference Panel meet with IUMAC when it is established (as the "keeper of the vision") to tell our story and share the vision that guided Plan development.

To assist the transition process, we have prepared Attachment 1. This is a synthesis of what we believe made the Reference Panel process successful. This will help IUMAC.

Attachment 1 - The LWMP Reference Panel Process, and Why It Worked

Success Factors	Explanation
1 Trust and Respect	Trust and respect is the foundation of a successful process. There was trust and respect among the Panel members; there was trust and respect between the Panel and Metro Vancouver.
2 Spirit of Collaboration	The group as a whole had good chemistry – the process brought together the right people at the right time. There was a commitment to be inclusive and do what is in the best interests of the region.
3 Shared Vision	The collaborative process worked because Metro Vancouver was already moving in the right direction. Everyone was motivated by the common good and passionate about the legacy and the quality of life that we leave for our children and their children.
4 Time	The unforeseen delays due to circumstances proved to be a blessing in disguise because the additional time enabled the Panel and Metro Vancouver to think through the details. The result is a better Plan. This was key.
5 Two-Track Approach	The practice of alternating “planning” sessions (i.e. process -oriented) and “working” sessions (i.e. product -oriented) crystallized as an effective way for the Panel to do its due diligence
6 Structured Flexibility	The way we structured the planning and working sessions enabled and facilitated conversations and a ‘baring of the soul’ that encouraged sharing and resulted in ‘Ah-Ha’ moments for all.
7 Outcome-Oriented	We were committed to achieving specific outcomes in our planning and working sessions. This enabled us to provide Metro Vancouver with clear feedback and/or suggestions so that they could then evolve/refine the Plan.
8 Listen, Listen, Listen	The Panel and Metro Vancouver actively listened to each other. Each time we met, this allowed us to build on a theme and build on each other’s ‘Ah-Ha’ moments. Metro Vancouver was receptive to new ideas. This is a key message.
9 Relationship with the WMC	Our ability to communicate directly with the Waste Management Committee was crucial. Our monthly meetings during May through July provided us with the platform to say: <i>“We are not staff, we are not hired guns.....we live here, we are passionate about our region....and we will tell it like it is so that you we can help you make the decisions that need to be made.”</i>
10 Diverse Expertise, Interests and Contexts	The Panel represented a diverse range of expertise, interests and professional contexts. Combined with the expertise of Metro Vancouver staff, we were able to tackle many subjects, and cross-pollinate to identify obstacles and cut through to potential solutions. The dialogue among diverse backgrounds strengthened the advice the Panel was able to provide to the Waste Management Committee.