City of Mount Vernon
Public Works Department

1024 Cleveland Avenue
Post Office Box 809
Mount Vernon, WA 98273

Phone (360) 336-6204
FAX (360) 336-6299
E-Mail mvengineering@mountvernonwa.gov
www.ci.mount-vernon.wa.us

Comments on NPDES Phase II Municipal Stormwater Permit Preliminary Draft.

Thank you for the opportunity to provide comments on the preliminary draft of the NPDES Phase II permit changes. Upon review of the draft language the City of Mount Vernon has prepared the following list of comments. We look forward to these issues being addressed in the next draft of the permit.

Phase II Municipal Stormwater General Permit Preliminary Draft Language

1. **Public Review Process on Draft Language and Technical Manuals**
   Comment: During recent public meetings Ecology staff have identified their intent to run a concurrent public review process for the Draft Permit Language and the Technical Manuals adopted within it (i.e. guidebook for integrating LID into local codes, LID technical guidance manual, Western Washington Hydrologic Model, 2012 Ecology Stormwater Manual etc). A ninety day public review process does not allow the majority of Phase II permittees adequate time to review and comment on these complex documents.
   Recommendation: The public review process for the draft permit language and the technical manuals should be run separately, not concurrently.

2. **Technical/Guidance Manuals Adopted by Reference in Permit**
   Location: Preliminary Draft Permit Language and Appendix 1
   Comment: The revised technical/guidance manuals for stormwater and LID facilities are not available and must contain clear standards for design, inspection and maintenance to be useful and effective. Requiring LID facilities without documented standards is counter-productive and would place too great a burden on permittees. If it is Ecology's position that LID facilities are proven stormwater facilities, then clear standards for design, inspection and maintenance of said facilities should be included in the technical documents adopted by reference within the permit.
   Further, the economic impacts of these manuals should be thoroughly evaluated before they are adopted to fully understand the financial impact to both the public and private sectors.
   Recommendation: Delay issuance of technical manuals until clear standards for design, inspection and maintenance are included and said documents have been evaluated for economic impacts.

3. **Timelines for Code Updates & Technical Manuals**
   Location: Prelim Draft Language Pg. 2 Sect. 4a
   Comment: The draft permit language identifies a deadline of December 31, 2015 for adoption of the updated codes and technical manuals, as well as implementation of inspection and maintenance programs. This timeline only allows 2.5 years from the effective date of the permit to effect these changes, which are significant in nature and will require significant time for policy development and staff training. This timeline is insufficient to address this requirement.
   Recommendation: Extend the timeline for adoption and implementation of codes and technical manuals.

4. **Elimination of One Acre Threshold**
   Location: Several locations in Preliminary Draft Language and Revisions to Appendix 1
   Comment: Elimination of the one acre threshold will place a tremendous financial burden on those "small projects", such as single family construction and small road projects, which are only subject to Minimum Requirements 1-5 in Appendix 1, while offering little to no environmental benefits. Existing BMPs, such as soil amendments, full dispersion and infiltration, identified within the stormwater manuals already meet the goals of LID without specifically requiring rain gardens or pervious paving.
   Recommendation: Retain the one acre threshold within the Phase II Permit or allow greater flexibility for small projects.

5. **Rain Garden and MR5 BMPs**
   Location: Appendix 1 Revisions - Definitions and MR 5, Pgs 22-24
   Comment: The draft language is silent on post construction inspection requirements for rain gardens and other treatment and flow control BMPs identified in MR5
   Recommendation: Clearly identify that rain gardens and other treatment and flow control BMPs identified in MR 5 are BMPs, not facilities and as such do not require annual post construction inspection.

6. **Accessibility of Treatment and Flow Control Facilities for Inspection and Maintenance**
   Location: Appendix 1 Minimum Requirement (MR) 6 & 7, Pgs 25-31
   Comment: Locations for treatment and flow control facilities as described in MR 6 & 7 must be readily accessible (i.e. in common areas or tracts with access from the right-of-way), especially in residential developments, to allow for annual inspection and maintenance. Allowing many small facilities outside of common area tracts, such as backyard bioretention will make inspection, maintenance and enforcement unfeasible.
   Recommendation: Allow permittees to restrict the locations of treatment and flow control facilities to accessible locations.

7. **Feasibility Criteria for Pervious Paving**
   Location: Appendix 1 Revisions, Pg. 36 item B
   Comment: There are still many concerns and unanswered questions related to the broad use of pervious paving techniques in public roads and high travel areas, including, but not limited to: 1) Long term durability, especially at intersections; 2) Spill containment and clean up and resulting traffic impacts; 3) Maintenance, repair and tracking of these assets; and 4) Durability and maintenance when subjected to snow and ice treatments (i.e. sand, gravel, salt brine etc.).
   Recommendation: Provide permittees the flexibility they need to limit the use of pervious paving as described in the following sample language:

   > Pervious paving is considered infeasible in the following areas until further studies and pilot programs have resolved questions of durability, maintenance, spill containment and cleanup:
   > - within travel ways of roads identified as arterials and collectors;
   > - within intersections and within 50 foot approaches of said intersections;
   > - within areas with documented history of recurring spills;
   > - within sport/play courts where it would be unsafe, or the quality of play would be affected, or a standard of development for that type of court set by a recognized organization would not be met
   > - within areas where attaining structural load requirements make the project cost prohibitive
   >
   > [Note: Pervious paving techniques are generally considered feasible in residential areas, parking areas outside of travel paths, sidewalks, and separated bike lanes.]

8. **Performance Standards for LID Facilities**
   Location: Appendix 1 Pg. 24 – Low Impact Development Performance Standard
   Comment: Flow regime performance standards identified in Appendix 1 for LID, specifically 8% of the 2-year peak flow to 50% of the 2-year peak flow, are unattainable and will set permittees and developers up for failure.

9. **Definition of Receiving Waters**
   Location: Appendix 1 – Pg.6
   Comment: The revised definition of "Receiving Waters" has been expanded to include infiltration into groundwater, in essence saying soils that can infiltrate are receiving waters. Soils are not receiving waters.

10. **Maximum Extent Practicable (MEP) vs. Maximum Extent Feasible (MEF)**
    Location: Preliminary Draft Permit Language – Pg 3, item iv.(1)
    Comment: This language requires code updates to incorporate LID principles and BMPs to MEP, while language used later in Appendix 1 requires LID to MEF. These are two very different standards and inconsistency in there use will likely cause problems for both the permittees and the state. Further, the Pollution

Control Hearings Board clearly identified that LID be used where feasible, therefore MEF is the appropriate standard.
Recommendation: Make all references to development and implementation of LID principles and BMPs be to MEF within both the revised permit language and Appendix 1.

11. Watershed Planning Requirements

Location: Preliminary Draft Permit Language Pgs. 8-10, item g
Comment: Watershed planning requirements are land use and long range planning requirements, which should be addressed through zoning and comprehensive planning updates.
Recommendation: Watershed planning requirements should be eliminated from permit and addressed through planning updates such as GMA comprehensive plan updates.

12. Encourage LID Rather Than Mandating It

Location: Preliminary Draft Permit Language and Appendix 1
Comment: Mandating LID through permit requirements will be overly financially burdensome to small developments and small public projects given the additional costs of site assessment and soils analysis previously not required on small projects. Further, these additional costs will result in little to no net benefit in comparison to existing flow control BMPs identified in MR 5 of the King County 2009 Surface Water Design Manual. Lastly, mandating these requirements may result in resentment from the development community and an emphasis in finding exemptions within the proposed feasibility criteria.
Recommendation: LID should be encouraged and incentivized rather than required, especially for projects only subject to MR 1-5. The LID code updates should be focused on encouraging the use of LID by emphasizing potential benefits and providing incentives for their use.

13. Feasibility for Selected Low Impact Development (LID) Best Management Practices

Comments: The feasibility for the LID BMPs required by the permit needs to be further evaluated in areas that have *poor infiltration* or *high groundwater*.
The draft language states that rain gardens and bioretention areas are infeasible for smaller drainage areas when a one foot separation to the seasonal high groundwater table cannot be achieved. Previous Department of Ecology guidance suggested a minimum separation distance of 3-feet. This is a more realistic requirement given the fact that the seasonal high ground water level can vary from year to year, and it can often be difficult to determine the level of the seasonal high ground water level accurately if a geotechnical evaluation does not take place during the wettest months of the year. The one foot separation requirement does not leave any room for error if the seasonal high ground water elevation is underestimated, then these facilities will be rendered ineffective with higher groundwater levels.

The draft language also requires bioretention areas and rain gardens to be constructed with an under-drain system in areas with native soils that have a saturated hydraulic conductivity of less than 0.15 inches per hour. In poorly infiltrating soils bioretention areas and rain gardens should be deemed infeasible. In these soils the infiltration and flow control benefits of the facility are minimal when compared to the cost of the facility.

Feasibility of pervious pavements in areas with poorly infiltrating soils also needs to be evaluated. There is currently no feasibility criteria for areas with native soils that have poor hydraulic conductivity. This will require all projects to use costly pervious pavement when the benefits from the pavement is negligible. This can also lead to drainage or erosion problems down slope in areas where the poorly draining soils surface. Permeable pavement should be considered infeasible if the native soil saturated hydraulic conductivity is less than 0.15 inches per hour.

Further feasibility criteria is needed for green roofs. Operation, maintenance, and inspection of green roofs also needs serious consideration. It will be very difficult to ensure that green roofs are being properly maintained.

Again, thank you for allowing the Permittees to review and comment on the preliminary draft. I look forward to continuing to work with the Department of Ecology to create a permit that protects our water quality and allows responsible growth in our community.

Sincerely,

Blaine Chesterfield

Blaine Chesterfield
Engineering Manager
City of Mount Vernon