

BCWMC Technical Advisory Group (TAG)

Recommendations for Policy

The TAG has reached consensus on the following recommendations:

FLOOD CONTROL

- 1) The Commission should require 2 feet of elevation between the 100-year flood level of the Creek and the low entry of any new buildings.

(Note: An additional factor of safety to protect against unknowns is appropriate. For example, debris accumulation at culverts and bridge crossings of the creek has caused flood levels higher than the 100-year flood level.

The current requirement is 1 foot.)

GROUNDWATER

- 2) Encourage member cities to implement a wellhead protection program.
- 3) Review all groundwater appropriations permits that the DNR receives and determine the effect on surface waters and groundwater.
- 4) Require detention ponds in sensitive groundwater recharge areas to be lined or engineered to prohibit infiltration.
- 5) Encourage an agency to collect and manage groundwater data.
- 6) Encourage the proper abandonment of wells.

(Note: A majority of the cities in Hennepin County use groundwater for their domestic water supply. Watershed lakes and streams are fed by surficial groundwater. The protection of these groundwater resources is important.)

WATER QUALITY

- 7) The lake classifications should not be lowered. If anything, they should all be elevated to Level I.

(Note: This recommendation was made because some felt that all projects in the watershed be treated equally and, that since some of the water tributary to the lakes would never be treated; it makes sense to achieve the highest level of treatment possible in projects that are implemented.)

- 8) Treat all watershed stormwater to the Level I standard.

(Note: Since the focus of the requirements for Level I lakes is nutrient reduction, and since the focus of requirements for discharge to streams is sediment reduction, a separate requirement for stream discharges is appropriate.)

PUBLIC DITCHES

- 9) The BCWMC will support legislation that would abandon public ditches and allow drainage to be managed by the latest adopted plan.
- 10) The Commission should attempt to go through the Minnesota Board of Water and Soil Resources to help move legislation to abandon public ditches and turn them over to local control in areas where land is not zoned for agricultural purposes.

(Note: The Commission and the cities perform work in public ditches and state law requires they go through the public ditch process. Since this process is cumbersome, it would be appropriate for the Commission to pursue legislation over the next few years to eliminate this requirement.)

FISH & WILDLIFE

- 11) This issue will be addressed indirectly in other sections of the Plan. For example, the Commission will address the control of exotic species through education.

The following issues were brought forth in previous TAG meetings and require further discussion and action:

FLOOD CONTROL

- 12) Remove structures built in the flood plain of Bassett Creek

(Note: There are between 20 and 30 homes partially in the floodplain of the creek. Most of them have walkout basements within 2 feet below the flood level. Past projects in the watershed have demonstrated that some of these homes can be successfully flood-proofed. Some homes cannot be economically flood-proofed. It seems appropriate to have a policy to remove homes from the floodplain if they cannot economically be flood-proofed.)

- 13) Need a policy to reduce impervious surfaces

(Note: Runoff from impervious surfaces increases peak discharges, reduces infiltration and increases runoff volumes. Runoff from impervious surfaces also has more pollutants that impact water quality. An alternative to the policy for reducing impervious surface would be reduction of runoff through stormwater storage, infiltration basins, and BMPs to improve water quality. There are opportunities to reduce impervious surfaces during redevelopment. As areas develop, there are opportunities to reduce the amount of planned impervious surfaces, although the amount of impervious surface will increase as a result of development.

BCWMC water quality policy BMP checklist already lists “reduce area of impervious surfaces” as a BMP for developers to consider/evaluate.

WATER QUALITY—LAKES, STREAMS AND STORMWATER RUNOFF

- 14) The plan should attempt to get people involved. A good way to do this would be to combine the water quality monitoring with the public education.

(Note: The Commission has involved the public in water quality monitoring activities. In addition, the Commission is developing a public involvement plan as part of the new watershed plan.)

- 15) The Commission should require a buffer adjacent to water resources.

(Note: Some cities in the watershed are requiring buffers adjacent to water resources for new development. It has been demonstrated that buffers maintained with natural vegetation reduce impacts of adjacent development on water quality and minimize waterfowl access to waterbodies, which in some cases is a significant source of nutrients. The Commission review of city policies regarding buffers in the watershed and the adoption of a uniform minimum requirement for buffers adjacent to the waterbodies would be consistent with project goals in the Commission's water quality improvement plans.)

- 16) The Commission should promote rainwater gardens and natural swales rather than traditional curb and gutter.

(Note: The current Commission water quality policy requires implementation of water quality treatment measures and encourages implementation of BMPs. The Commission could review its requirements for developments to make sure they reflect the current state-of-the-art. BCWMC BMP checklist includes vegetated swales, infiltration basins, rainwater gardens and infiltration/filtration basins.

For road construction projects the Commission gives examples of permanent BMPs including: infiltration basins, vegetated swales, which could mean no curb and gutter).

- 17) The Commission should write an annual State of the Watershed report that includes water quality test results rather than an Annual Report.

(Note: The Annual Report already includes a summary of the water quality test results. The Commission could issue a separate report of the water quality test results and put this information on web site.)

- 18) The plan should reference options for pervious alternatives for things such as driveways.

- 19) The Commission should consider classifying streams according to the downstream receiving water body.

(Note: Any development in the watershed upstream of a lake is required to implement BMPs consistent with the classification of the lake, regardless of the intervening stream classification. The classification does more than set the treatment standards upstream, its major use is to set recreational use goals/expectations for the stream.)

- 20) The Commission should consider changing its Level I nutrient target from 30 micrograms per liter to 38 micrograms per liter.

(Note: The Commission's 30 µg/L phosphorus goal for Level I lakes is the same as the Minnesota Pollution Control Agency's latest phosphorus criteria for full-support of swimmable use in this ecoregion ("Lake Prioritization for Protecting Swimmable Use," MPCA, 1997). In addition, a Metropolitan Council study (completed for the MPCA) indicates that moderate algae bloom conditions would be expected to occur during approximately 60 percent of the summer with a mean total phosphorus concentration of 38 µg/L, but would only occur 25 percent of the summer with a mean total phosphorus concentration of 30 µg/L ("Assessment of Lake Use-Impairment in the Twin Cities Metropolitan Area," Osgood, 1989). Incremental in-lake total phosphorus concentration reductions below 30 µg/L result in significantly greater

(or accelerating) increases in Secchi disc transparency (Carlson, 1977; Osgood, 1989; MPCA 1997).)

- 21) Twin Lake should be a higher priority water body.

(Note: Twin Lake has excellent water quality, possibly the highest in the metro area. Minneapolis Park and Recreation has land on the south end, so there is some public access. Development in the watershed will lead to degradation in water quality (Lake Watershed Management Plan).

The levels of treatment required for Level I waterbodies is the current state-of-the-art for water quality treatment, excluding chemical treatment. There is more concern about operation and maintenance of chemical treatment facilities than for physical treatment facilities.

The Commission should continue to evaluate its requirement/standards as technology improves.)

- 22) The Commission should focus on the recommended projects that remove the largest percentage of nutrients.

(Note: See note under Comment #21.)

- 23) Rather than setting blanket target nutrient concentrations, the Commission should look at requiring developments to meet or exceed existing downstream water quality.

(Note: If water quality levels of downstream receptors are higher than the water quality that treatment requirements would produce, this change in policy would protect those water quality levels, i.e., Twin Lake.)

- 24) The Commission needs a Level 0 standard of treatment.

(Note: Treatment levels would likely be very high for this standard. Chemical treatment would likely be required in an area developed.)

- 25) If we have to sacrifice water bodies as a result of development, Bassett Creek water quality should be improved since it flows to the Mississippi and therefore becomes part of a much larger scale ecosystem.

- 26) Separate water quality classifications from their required treatment levels.

(Note: See note under Comment #19.)

- 27) A good goal for Wirth Lake is to acquire land for BMPs if it becomes available.

(Note: A lake watershed management plan has been developed for Wirth Lake. During the time prior to implementation of the plan recommendations, the Commission should consider moving ahead with parts of the plan as opportunities arise (e.g., acquire land during redevelopment).

- 28) Determine the treatment levels for incoming stormwater on an individual basis.

(Note: Commission's lake watershed management plans determined the treatment levels needed for incoming stormwater to the lake and to reach a desired water quality. The plans recommended the most cost-effective means of achieving the goal, which meant some inflows would be treated to a higher phosphorous-removal standard than other inflows.

29) Include the most recent water quality data in the Plan.

(Note: A summary of water quality data is planned to be included in a plan appendix.)

30) We should set goals for the maximum attainable use for each of the water bodies.

(Note: Commission-set water body classifications based on a variety of factors, such as the intended recreational uses of the water body, rather than the maximum attainable use.)

ADMINISTRATION

31) The Commission should discuss the financial implications of each proposed Water Quality Management Plan.

(Note: At their August 16, 2001 meeting, a Commission workshop was scheduled for November 13, 2001 at which the Commission will evaluate proposed water quality management plans and prepare a draft 5-year capital improvement plan.)

32) The Commission should itemize out solutions that can be attained through prevention and other non-structural methods.

(Note: The plan will evaluate existing regulatory programs and note deficiencies and recommend action for regulatory programs where needed.)

33) The Commission should attempt to use their authority to make comments to make ordinances from the different member cities very similar.

34) The plan should identify which issues are not currently being regulated

35) The Commission should emphasize enforcement of its policies (such as improperly installed silt fence).

(Note: Currently an inspection program is conducted of active projects and deficient erosion control plans are reported to the cities. Cities are expected to enforce the erosion control requirements. Some communities require bonds. The Commission could review the enforcement policies of the communities and develop minimum requirements.)

36) Policies need to be rewritten with an emphasis on redevelopment.

GROUNDWATER

37) There needs to be an agency that monitors groundwater to ensure that the water supply is not depleted.

WETLANDS

38) The Commission should have a policy encouraging communities to do a wetland inventory.

39) The Commission should set standards for functional assessments so all wetland inventories look similar.

40) The Commission should get involved in requiring setbacks and buffer zones for wetlands.

41) The Commission should attempt to make wetland setback requirements similar across all member cities.

PUBLIC DITCHES

- 42) The BCWMC support any legislation that would abandon the public ditches and allow all drainage to be managed by the latest adopted plan.

(Note: See note under Comment #10.)

STREAM RESTORATION SITES

- 43) The plan should include a guide to help prioritize erosion problems that require attention.

(Note: The Commission has requested that the cities inventory the creek through their community so that sufficient information is available to prioritize erosion problems.)

- 44) The overall plan should give directive to the member cities to look for problems in the tributaries to the creek and to estimate sediment loads from the creek.

(Note: A monitoring program could be established by the Commission which would monitor sediment loads from parts of the watershed to determine if problems are being resolved appropriately.)

- 45) The Commission should inventory the worst erosion problems in the watershed and create an annual budget for these specific projects.

(Note: The Commission will be developing a draft capital improvement plan in October 2001. The Commission will consider options for completing erosion control projects at that time.

FISH AND WILDLIFE

- 46) The Commission should take a position to react to recommendations from other agencies on this issue.

- 47) The plan should encourage bigger buffers to reduce goose habitat.

MISCELLANEOUS

- 48) Make Bassett Creek canoeable from Medicine Lake to the intake.

(Note: A long-term goal of removing obstructions and acquiring easements along the creek would be consistent with the Commission's goals of improving the recreational suitability of watershed lakes.)

- 49) The top three major issues are erosion and sediment control, wetlands and funding.

- 50) The Commission should use culverts that would simulate the natural channel of the creek, with a wide flat bottom that would expand wider at the top.

(Note: The only structure that would meet the requirement of wide natural bottoms and expanding width at the top would be a bridge. Bridges are more costly to construct and require more maintenance than culverts. In some cases, culverts have been installed to limit the amount of flow than can pass through a crossing to minimize downstream damage. Where bridges are not possible because of excessive cost or where the flow needs to be restricted and the culvert is small, provisions need to be considered for pedestrian passage.)

- 51) The Commission should expand the list of pollutants it monitors to include chlorides from road salt.

