COON CREEK WATERSHED DISTRICT
PERMIT REVIEW

MEETING DATE: September 28, 2015
AGENDA NUMBER: 8
FILE NUMBER: 14 - 23
ITEM: CSAH 14 Reconstruction

RECOMMENDATION: Table with 5 Stipulations

APPLICANT: Anoka County Highway Department
c/o Andrew Witter
1440 Bunker Lake Blvd NW
Andover MN 55304

PURPOSE: Reconstruction of Main Street from Hwy 52 to approximately 1,200 feet east of Harpers Street and proposed recreational trail on the south side of Main Street from Hwy 52 to Harpers Street.

LOCATION: Main Street in City of Blaine, MN between Hwy 52 and 1,200 feet east of Harpers Street
APPLICABILITY:
1. Any work within or adjacent to a Public Ditch within the Watershed District.
2. Any work in or adjacent to wetlands, lakes or water courses.
3. One or more cumulative acres of land disturbance.
4. Activities upstream from land that is dependent upon removal of water from the soil profile for their continued use (Drainage Sensitive Uses)
5. Excavation or filling or a combination of excavation and filling of sand or other excavation or fill material including the laying, repairing, replacing or enlarging of a culvert or an underground pipe or facility where it crosses a public ditch or waters of the state.
6. Endangered, Threatened or Special concern species, elements of communities.

EXHIBITS:
1. Plan set by SEH; dated 8/13/2015; received 9/15/2015
2. Narrative Letter by SEH; dated 9/10/2015; received 9/15/2015
3. Existing HydroCAD Report; by SEH; dated 10/23/2014; received 9/15/2015
4. Proposed HydroCAD report; by SEH; dated 10/23/2014; received 9/15/2015
5. Existing and proposed conditions drainage maps; by SEH; dated 10/1/2015; received 9/15/2015
6. Floodplain calculation, culvert sizing calculation, SAFL BAFFLE/sump sizing calculations; by SEH; dated 9/11/2015; received 9/15/2015
7. Groundwater Report by SEH; dated 10/2/2014; received 9/15/2015
8. Wetland Delineation Report by SEH; dated July 2014, received 7/14/14
9. Supplemental Information: Wetland Permit Application by SEH; dated 9/4/15, received 9/15/15

HISTORY & CONSIDERATIONS:
Due to site constraints, the proposed project does not meet rate control for the drainage sensitive use areas. After discussions with the CCWD and Wenck Associates, it was determined that as long as the nearby ditches have < 0.2’ increase from existing HWLs, the project would not have adverse impact on the downstream areas.

The proposed site also does not meet volume management control due to site constraints. However, additional methods were used such as swales and SAFL baffles to treat water quality volume prior to discharging off site into wetlands.

FINDINGS:
Ditches and Drainage: There are public ditches on the property. The ditches are County Ditch 59 and Ditch 41. Ditch 59 was inspected in 2012 and Ditch 41 was inspected in 2010 and is currently being inspected. Ditch 59-4 was privately repaired in 2013-14. The trend in land use for this drainage area is toward open space and residential. There are no flooding concerns downstream. Alternatives to additional drainage considered and reviewed include storage and retention. The District has no immediate plans for repairs.
**Floodplain:** There is floodplain on the property according to FEMA. The District Atlas 14 model predicts the 100-year elevation for the subwatershed ranges from 894.1 to 899.8 feet. The total floodplain impact is 1.88 acre-feet, within the floodway. Compensatory storage is provided and or not needed given the source of the base flood elevation or minimal effect to the overall flood elevation.

**Groundwater:** Ground water is present between 894.8 and 882.1 feet. The site does include groundwater sensitive areas.

**Historic Sites:** The proposed project does not include sites of historic or archeological significance.

**Local Planning & Zoning:** The proposed project is consistent with local planning and zoning. There is an approved local water plan.

**Maintenance:** The proposed project does not include a ditch maintenance easement or utility line crossings. A drainage and utility easement is not provided for the storm water/infiltration ponds shown on the drainage plan.

**Soils & Erosion Control:** Soils affected by the proposal are Lino, Isanti, Rifle and Zimmerman. Stabilizing vegetation is proposed for disturbed areas within two weeks of rough grading. Adjacent properties are protected from sediment deposition. All wetlands, waterbodies, ponds, infiltration basins and water conveyance systems are not protected from erosion and sedimentation. Project site is greater than 1 acre; an NPDES permit is not required.

**Stormwater & Hydraulics:** The applicant is not meeting the volume management requirement equivalent to infiltrating runoff from the first inch of precipitation. Stormwater leaving the site is discharged into a well-defined receiving channel or pipe and routed to a public drainage system. Drainage sensitive uses exist downstream from the proposed site. The rate of post development runoff from the site does exceed predevelopment rates, however, the overall volume increase does not interfere with sensitive downstream land uses.

**Water Quality:** Project does include new impervious drainage areas greater than 1 acre. All discharges into wetlands are pretreated by a sediment basin/water quality pond and are designed correctly. The proposal will not detrimentally affect the existing water quality of the receiving water. The proposal will not cause extreme fluctuations of water levels or temperature changes.

**Wetlands:** Wetlands do exist on-site according to the 1987 Federal manual, NWI, PWI, and Soil Survey. The delineation has been reviewed by the TEP. The WCA/Corps Joint Permit Application is currently being prepared and will be submitted in early November. Wetland impacts are being proposed as part of this project.
**Wildlife:** The proposed project has the threatened Bristle Berry (*Rubus stipulates*). The applicant has contacted the DNR and is working towards coming to agreement for mitigation. The LGU cannot approve the project until an agreement has been met.

**Performance Escrow:** $18,950.00

### ISSUES/CONCERNS:

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<th><strong>Stormwater &amp; Hydraulics:</strong> The project is not meeting rate control and volume control for the entire project. There are several areas, notably subwatersheds 5935 and 5937 that are not being treated or controlled before entering in to the wetland complex to the north of Main Street. The impact is complicated by the fact that there are drainage sensitive uses to the north. However, the District performed analysis in 2014 that indicated that the increase in runoff volume for these areas was going to have no appreciable impact on the overall flooding. It was determined that the exiting wetland system would adequately handle the rate and volume of water from the proposed new impervious. Therefore, volume and rate control is not required for these subwatersheds.</th>
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<td><strong>Soils &amp; Erosion Control:</strong> Proposed ponds basins are not protected from erosion and sedimentation during construction adequately. After initial grading the District requires that ponds and infiltration basins be completely surrounded by erosion control measures.</td>
<td>2. Provide plans showing the storm water ponds in easement.</td>
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<td><strong>Maintenance:</strong> The proposed pond features must be within a maintenance easement which should be shown on the plans.</td>
<td>3. Submit a WCA/Corps Joint Permit Application and receive approval for the proposed impacts.</td>
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<td>Escrows: $2,000 + (33.9 ac * $500/ac) = $18,950.00</td>
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**RECOMMENDATION:** Table with 5 Stipulations

**Stipulations:**
1. Receipt of escrows.
2. After initial grading completely surrounded the proposed pond basins with erosion control measures.
3. Provide plans showing the storm water ponds in easement.
4. Submit a WCA/Corps Joint Permit Application and receive approval for the proposed impacts.
5. Receive documentation from the DNR for mitigation of the threatened Bristle Berry (*Rubus stipulates*).