COON CREEK WATERSHED DISTRICT
PERMIT REVIEW

MEETING DATE: December 11, 2017
AGENDA NUMBER: 18
FILE NUMBER: 17-217
ITEM: Creekside Village

RECOMMENDATION: Approve with 5 Stipulations

APPLICANT: D&N Management Inc
Attn: Gary Gorham
9298 Central Ave NE
Blaine, MN 55434

PURPOSE: 50 Lots on 10.6 Acres

LOCATION: NW of Fillmore St NE & 109th Ave NE, Ham Lake, MN

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. The lands and waters that have been, or may be covered by the regional flood.
5. High water table, outwash and organic soils
6. 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.

EXHIBITS:

PREVIOUS ACTION TAKEN: This is a new application.

FINDINGS:
**Pre-application Meeting:** The project as submitted has not received a general review during a pre-application meeting.

**Ditches:** There is a public ditch on the property. The public ditch is County Ditch 39 (Sand Creek) according to the public drainage map. The approved elevations through this property are 890.2 ft MSL at the downstream end and 891.6 ft MSL at the upstream end. Existing elevations of the ditch are 890.6 ft MSL at the downstream and 892.1 ft MSL at the upstream and represent a 0.4-1.0 ft variance from the approved elevations. Alternatives to repair and additional drainage have been considered and reviewed. The ditch is a 2nd order stream. The ditch serves the primary role of storm water conveyance. The ditch serves approximately 0 acres of agricultural land. There are flooding concerns upstream and/or downstream. The ditch has been inspected. Existing elevations, slopes and condition of ditch are fair condition. Alternatives to repair and additional drainage have been considered and reviewed. The ditch is not in need of repair.

**Ditch Hydraulics:** A crossing of the ditch is not proposed. However, the project does propose to design an in-line basin on-site. The proposed in-line basin will not adversely impact upstream or downstream properties.

**Erosion and Sediment Control:** Soils affected by the proposal are Isanti and Millerville.

- Stabilizing vegetation is not proposed for disturbed areas within seven (7) days of rough grading.
- Soil stockpiles have not been proposed to be fitted with sediment-trapping measures to prevent soil loss.
- Adjacent properties and stormwater ponds are protected from sediment deposition.
- Construction schedules detailing when sediment trapping measures will occur; stabilization of earthen structures and the general timing of construction phases have not been provided.
- Stormwater runoff does pass through a sediment basin or other sediment trapping BMP with equal or greater storage capacity.
- Stabilization adequate to prevent erosion has been provided at the outlets of all storm sewer pipes.
- All storm sewer inlets are protected from sediment-laden water during construction.
- All work adjacent to water or related resource has taken precautions to contain sediment, and stabilize the work area during construction.
- Provisions have not been made to minimize transport of sediment (mud) by runoff or vehicle racking onto the paved surface.
- Provisions have not been made for cleaning road surfaces where sediment is transported by the end of the day.
- Construction entrance points are clearly located on the erosion and sediment control plan.
• The erosion and sediment control plan does not provide for the repair and maintenance of all temporary and permanent erosion and sediment control practices.

Dewatering: Shallow ground water does exist on site. The project does require dewatering.

Floodplain: There is floodplain on the property according to the District model and FEMA. The District’s floodplain elevation is at 896.5 feet. The project does propose to place fill within the floodplain. The total floodplain impact is 2,659 acre-feet. The proposed impact is within the floodway/flood fringe. Compensatory storage is provided. There are flooding concerns upstream and downstream.

High Water Flooding: Information has been provided to substantiate low floor elevations. Low floor elevations do meet the criteria for the City of Blaine; 2 ft above mottled, 2 ft above 100 yr.

Groundwater: Geotechnical information collected in March 2016 indicates long term groundwater elevation is present at 4 feet below the surface.

The site is within a Municipal Drinking Water Supply Area (DWSMA).

The project site is within the Emergency Response Area/10 Year Well Head Protection Area/Drinking Water Supply Management Area.

The proposal does not contain a land use discouraged or prohibited by the Safe Drinking Water Supply Act (SDSA).

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.

Property owners affected by changes in drainage should be notified and acknowledge the changes proposed.

Maintenance: The Owner of the Stormwater Management features and treatment practices is unknown. The Stormwater Treatment Practices (STPs) consisting of the following:

<table>
<thead>
<tr>
<th>Stormwater Treatment Practices</th>
<th>Number</th>
<th>Maintenance Responsibility</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wet Basin</td>
<td>2</td>
<td>HOA</td>
</tr>
<tr>
<td>Infiltration Basin</td>
<td>1</td>
<td>HOA</td>
</tr>
<tr>
<td>Rain Guardians</td>
<td>5</td>
<td>HOA</td>
</tr>
</tbody>
</table>
A maintenance agreement has not been executed. The applicant has not submitted a Maintenance Plan for each Stormwater Treatment Practice.

Easements: The proposed project does include ditch maintenance easement. A ditch maintenance easement is required. A maintenance access to all storm water management features is provided.

**Stormwater & Hydrology:** Infiltration is allowed within the project area. The 1-inch infiltration is achieved. The stormwater management system utilizes sedimentation basin, filtration, wet ponds. Stormwater leaving the site is discharged into a well-defined receiving channel or pipe and routed to a public drainage system.

Drainage sensitive uses do not exist downstream from the proposed site. The rate of post-development runoff from the site does not exceed predevelopment rates, or rates which would interfere with sensitive downstream land uses. Properties and waterways downstream from the project are protected from erosion due to increases in the volume, velocity and peak water flow rates of stormwater runoff. Concentrated storm water leaving a site is discharged directly into a well-defined natural or man-made off-site receiving channel or pipe. All on-site constructed storm water conveyance channels are constructed to withstand the expected velocity from a 2-year frequency storm without erosion.

**Water Quality:** The proposed project does not cause an exceedance of State water quality standards. The project does not contribute to the adverse impact of wetlands through inundation or volume of flow. All discharges into wetlands are pretreated by a sediment basin/water quality pond, and are designed correctly. All work adjacent to wetlands, waterbodies and water conveyance systems are protected from erosion. 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.

**Impairments:** This project is within one (1) mile of but does not drain to an Impaired Water.

There are new impervious surfaces proposed as part of this project.

**Wetlands:** Wetlands do not exist on-site according to the 1987 Federal manual, NWI, PWI and Soil Survey. Wetlands have been delineated. The most recent delineation was completed on April 6, 2016. The wetland boundary has been checked.

**Wetland Replacement Plan:** A wetland replacement plan is not required.

**Wildlife:** The proposed project does not include endangered or threatened species, rare natural communities, colonial waterbird nesting sites, migratory waterfowl concentration areas, deer wintering areas or wildlife travel corridors.
**Performance Escrow:** $7300.00  
**Wetland Escrow:** $ N/A  
There are not ditch liens on the property.

### ISSUES/CONCERNS:

<table>
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<td><strong>Escrows:</strong> $2,000 + (10.6 ac * $500/ac) = $7300.00</td>
<td>1. Receipt of escrows.</td>
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<td><strong>Stormwater &amp; Hydraulics:</strong> Detailed utility plan for storm sewer not provided.</td>
<td>2. Provide utility plan that has inverts and pipe sizes shown and that are consistent with HydroCAD model.</td>
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<td><strong>Soils &amp; Erosion Control:</strong> Erosion control plan:</td>
<td>3. Provide additional erosion control notes on construction plans or SWPPP prior to construction of project that address the following items:</td>
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<td>Dewatering is required for utility construction.</td>
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<td>Maintenance: A maintenance agreement has not been executed. The applicant has not submitted a Maintenance Plan for each Stormwater Treatment Practice.</td>
<td>5. Provide an O&amp;M Agreement that meets District requirements.</td>
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**RECOMMENDATION:** Approve with 5 Stipulations

**Stipulations:**
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2. Provide utility plan that has inverts and pipe sizes shown and that are consistent with HydroCAD model.
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   b. Soil stockpiles have not been proposed to be fitted with sediment-trapping measures to prevent soil loss.
   c. Construction schedules detailing when sediment trapping measures will occur; stabilization of earthen structures and the general timing of construction phases have not been provided.
   d. Provisions have not been made to minimize transport of sediment (mud) by runoff or vehicle racking onto the paved surface.
   e. Provisions have not been made for cleaning road surfaces where sediment is transported by the end of the day.
   f. The erosion and sediment control plan does not provide for the repair and maintenance of all temporary and permanent erosion and sediment control practices.
4. Provide dewatering permit prior to construction of project.
5. Provide an O&M Agreement that meets District requirements.