NOTES:
1. THIS DETAIL CAN ONLY BE USED IN THE RESIDENTIAL ESTATES (RE) ZONE WHEN THE ROAD SLOPE IS LESS THAN 5% AND THE ROAD MUST HAVE FRONTING RESIDENTIAL LOTS WITH CIRCULAR DRIVEWAYS.

2. AREAS WITH SLOPES EQUAL TO OR GREATER THAN 5% WILL REQUIRE FULL IMPROVEMENTS OF CURB, GUTTER, AND SIDEWALK.

3. THE ROAD MUST HAVE A MINIMUM LONGITUDINAL SLOPE OF 0.25%, WITH AN EXCEPTION AT INTERSECTIONS TO GO FLATTER AS LONG AS 2% CROSS-SLOPE IS MAINTAINED FOR DRAINAGE.

4. RIPRAP WITH 8 OZ. NON-WOVEN GEOFABRIC IS REQUIRED IN DITCH FLOWLINE IF FLOW IS GREATER THAN 2 CFS OR IF CALCULATIONS SHOW SCOUR POTENTIAL.

5. RIPRAP WITH 8 OZ. NON-WOVEN GEOFABRIC IS REQUIRED IN LOCATIONS WHERE UTILITIES COULD BE IMPACTED BY SCOUR. RIPRAP WITH FABRIC IS REQUIRED AT ALL WATER METERS, FIRE HYDRANTS, AND STREET LIGHTS TO PREVENT SCOUR.

6. REFER TO DETAIL R4C FOR DRIVEWAY ACCESS.

7. POSTED SPEED LIMIT MUST BE 25 MPH.

8. IF A MASTER-PLANNED TRAIL IS REQUIRED, THEN USE EITHER DETAIL R4F OR USE THIS DETAIL WITH THE TRAIL LOCATED IN AN EASEMENT OUTSIDE THE RIGHT-OF-WAY.

9. THIS DETAIL IS NOT ALLOWED ON MAJOR ARTERIALS.

10. WATER METERS, FIRE HYDRANTS, AND STREET LIGHTS SHALL BE LOCATED AT LEAST 10 FEET OUTSIDE THE ROW AT AN ELEVATION AT LEAST AS HIGH AS THE ADJACENT EDGE OF ASPHALT.

11. MINIMUM ASPHALT THICKNESS IS 2-1/2", MINIMUM COMPACTED ROAD BASE THICKNESS IS 6", AND MINIMUM COMPACTED PIT RUN MATERIAL THICKNESS IS 8". PIT RUN MATERIAL CAN BE ELIMINATED IF NATIVE MATERIAL MEETS OR EXCEEDS PIT RUN MATERIAL STANDARD GRADATION, COMPACTED SUBGRADE THICKNESS SHALL BE ACCORDING TO THE SOILS REPORT.

12. A DRAINAGE STUDY IS REQUIRED TO ENSURE THAT THE DRAINAGE IS CONTROLLED PROPERLY. STORM DRAIN PIPES WILL BE REQUIRED IF THE BORROW DITCHES CANNOT HANDLE THE DRAINAGE.

---

**MASTER-PLANNED TYPICAL RURAL ROAD SECTIONS FOR RESIDENTIAL ESTATES ZONE w/ SLOPES < 5% & ROADS w/ FRONTING LOTS THAT HAVE CIRCULAR DRIVEWAYS**

<table>
<thead>
<tr>
<th>STREET</th>
<th>ROW</th>
<th>A</th>
<th>B</th>
<th>C</th>
<th>D</th>
<th>E</th>
<th>F</th>
<th>G</th>
<th>H</th>
</tr>
</thead>
<tbody>
<tr>
<td>MAJOR COLLECTOR</td>
<td>66'</td>
<td>18.5'</td>
<td>12.5'</td>
<td>1.5'</td>
<td>2.5'</td>
<td>6.5'</td>
<td>12'</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>MINOR ARTERIAL</td>
<td>75'</td>
<td>23'</td>
<td>12.5'</td>
<td>1.5'</td>
<td>2.5'</td>
<td>6'</td>
<td>11'</td>
<td>0</td>
<td>12'</td>
</tr>
</tbody>
</table>

MINOR COLLECTOR - USE DETAIL R4A "TYPICAL LOCAL ROAD SECTION FOR RESIDENTIAL ESTATES ZONE w/ SLOPES < 5%"