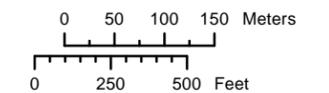
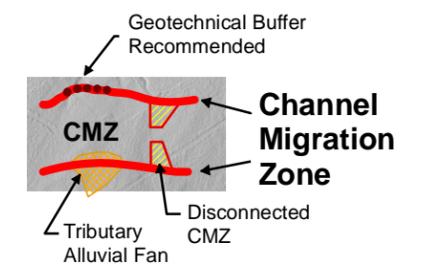


-  River Mile Marker
- CL\_##\_## Reach\_ID
-  Segment Boundaries



2010 aerial from Microsoft via ESRI World Imagery  
 1:24,000 USGS DRG  
 River miles calculated from NHD stream alignment (USGS)  
 Roads from TIGER (US Census Bureau)  
 Coordinate System: NAD83 State Plane Washington North

Analyzed by: Patricia Olson, PhD, LHG (WA Dept. of Ecology)  
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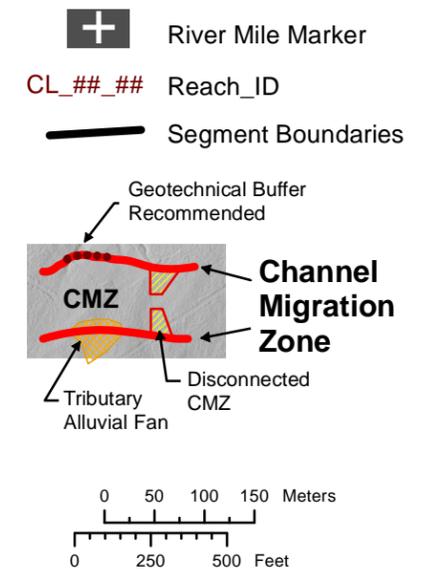
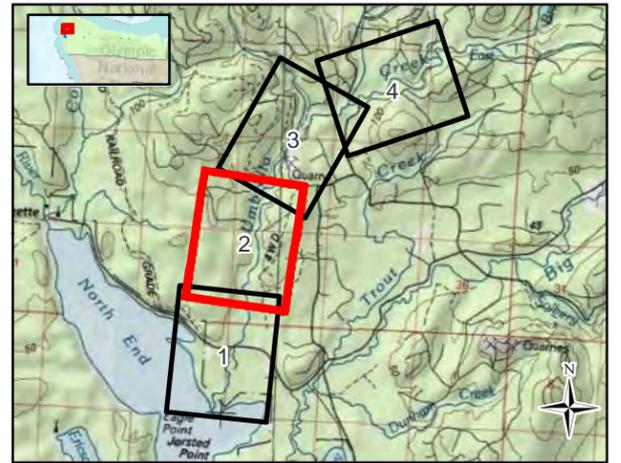


## Channel Migration Assessment

*Prepared for the Shoreline Master Program Update  
 Clallam County, Washington*

**Umbrella Creek**

**Map 1**



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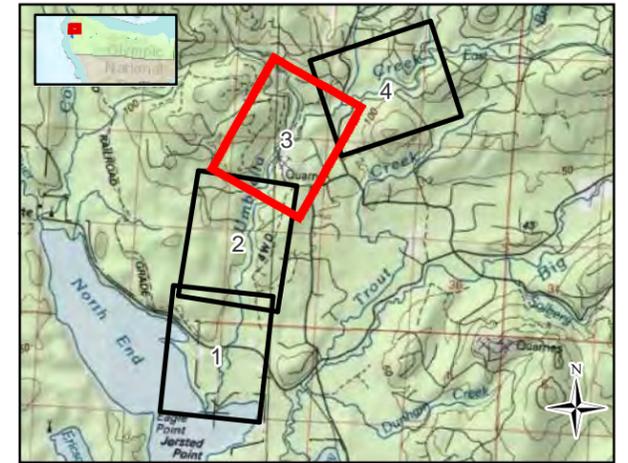


### Channel Migration Assessment

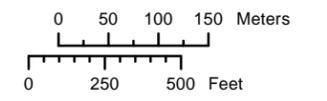
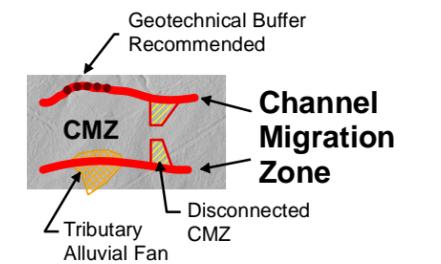
*Prepared for the Shoreline Master Program Update  
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**Umbrella Creek**

**Map 2**



-  River Mile Marker
- CL\_##\_##** Reach\_ID
-  Segment Boundaries



2010 aerial from Microsoft via ESRI World Imagery  
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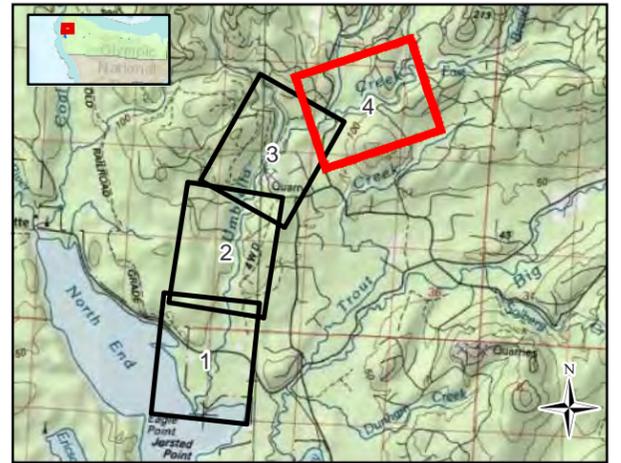


## Channel Migration Assessment

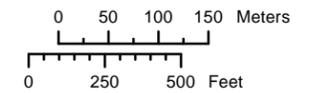
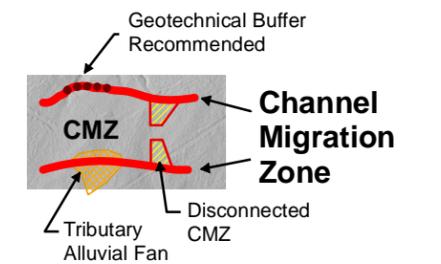
*Prepared for the Shoreline Master Program Update  
 Clallam County, Washington*

**Umbrella Creek**

**Map 3**



- River Mile Marker
- CL\_##\_##** Reach\_ID
- Segment Boundaries



2010 aerial from Microsoft via ESRI World Imagery  
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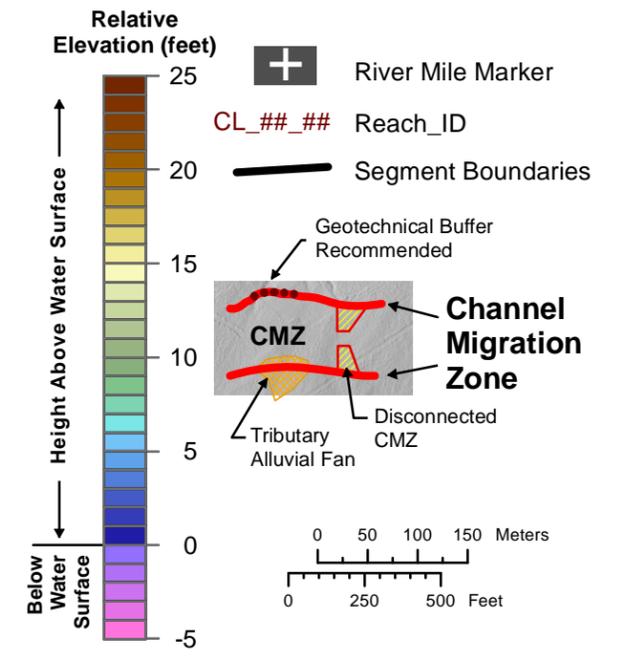
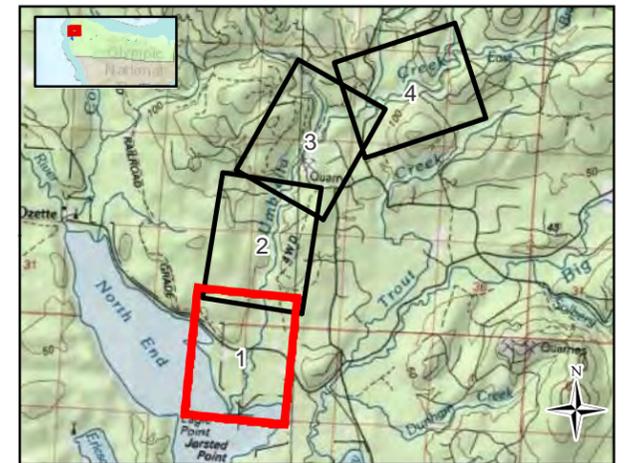
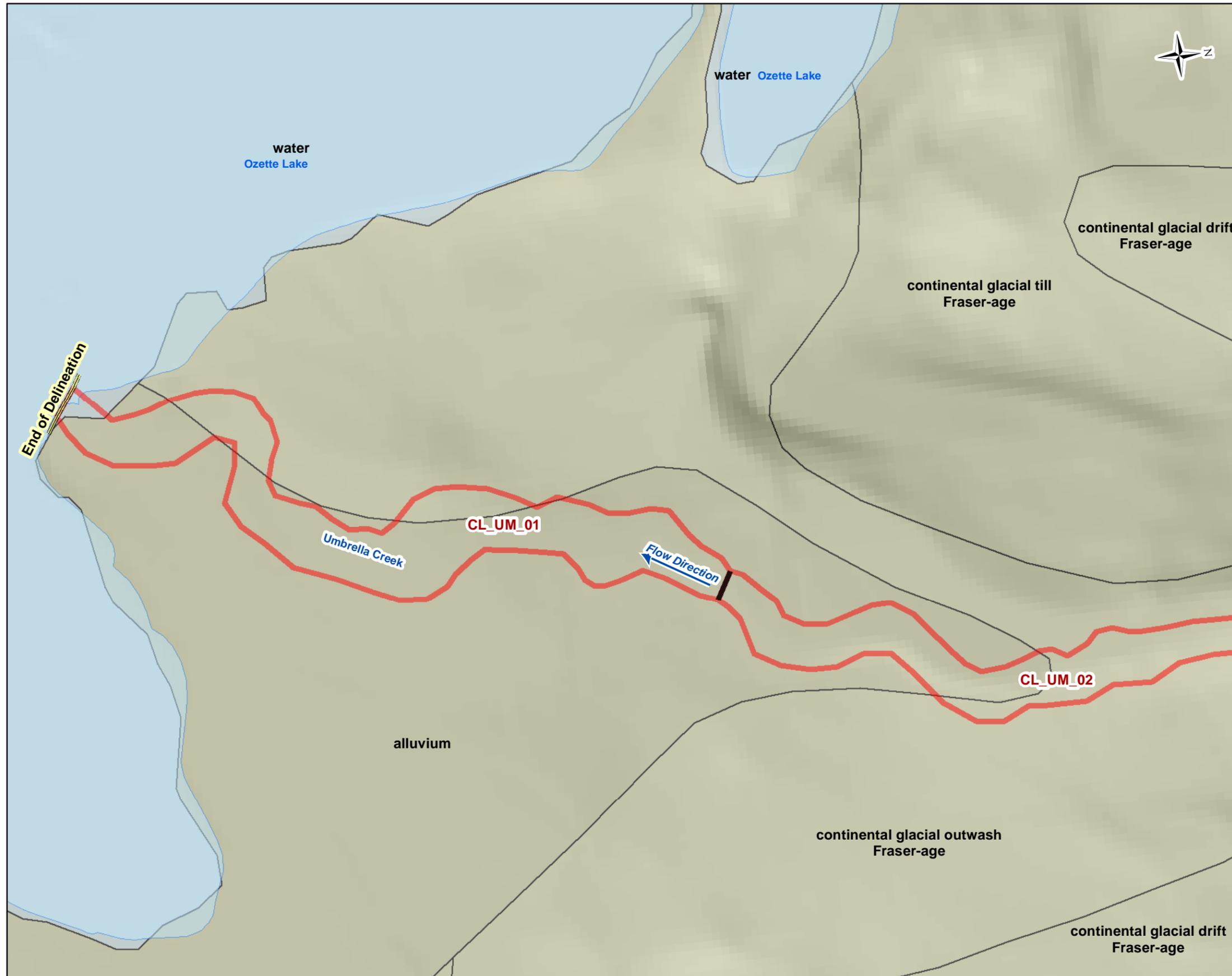


## Channel Migration Assessment

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**Umbrella Creek**

**Map 4**



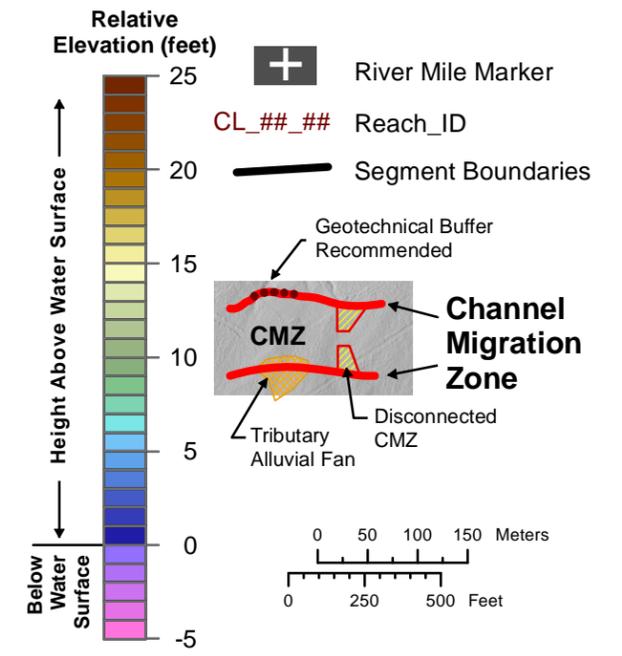
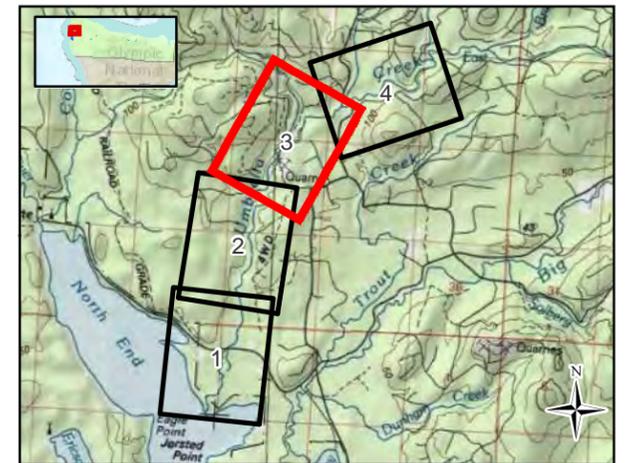
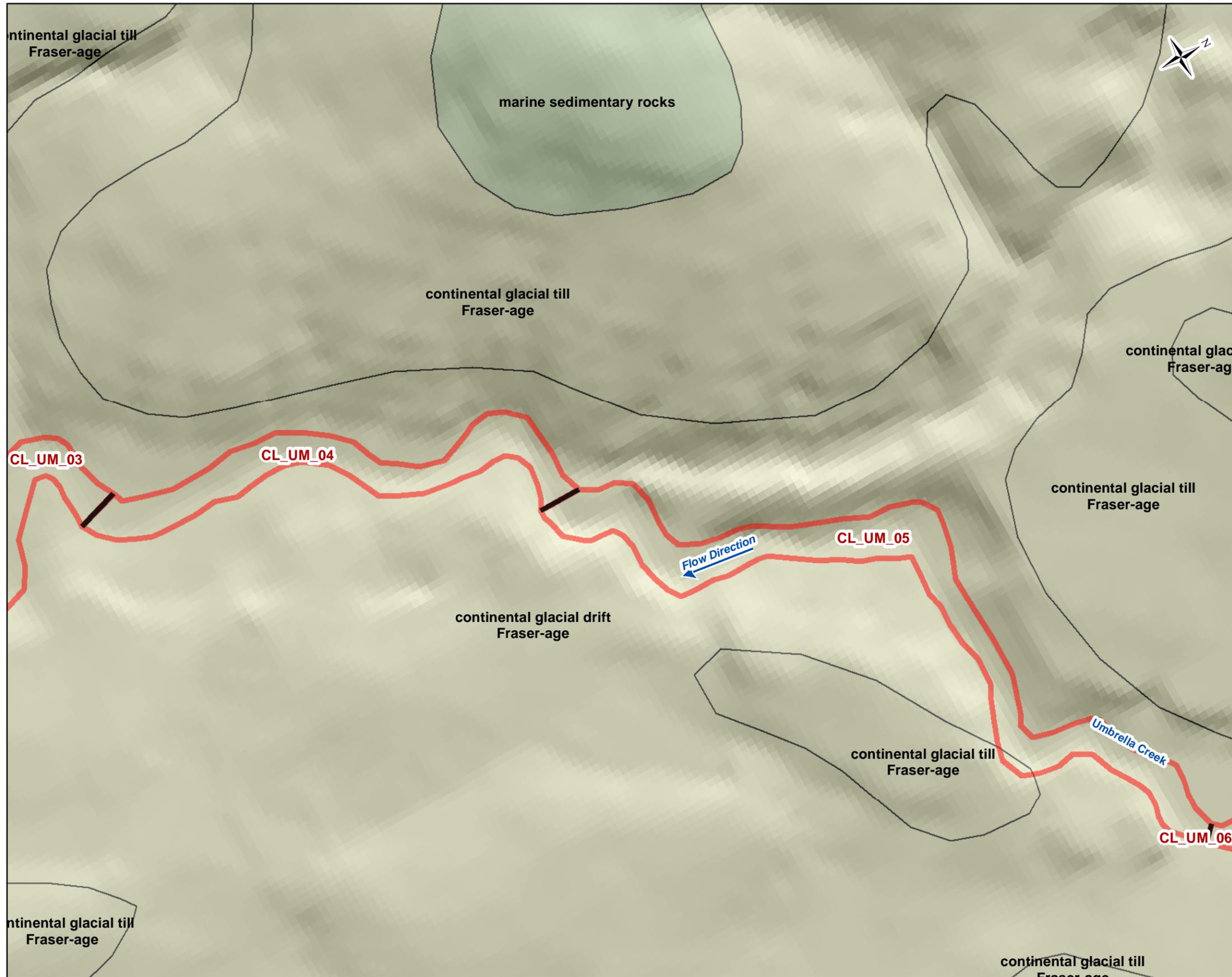
2002 LIDAR topography (Puget Sound LIDAR Consortium).  
 10m DEM USGS  
 1:24,000 USGS DRG  
 WA State Dept. of Nat. Resources 1:100,000 Geology  
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**Umbrella Creek      Map 1**



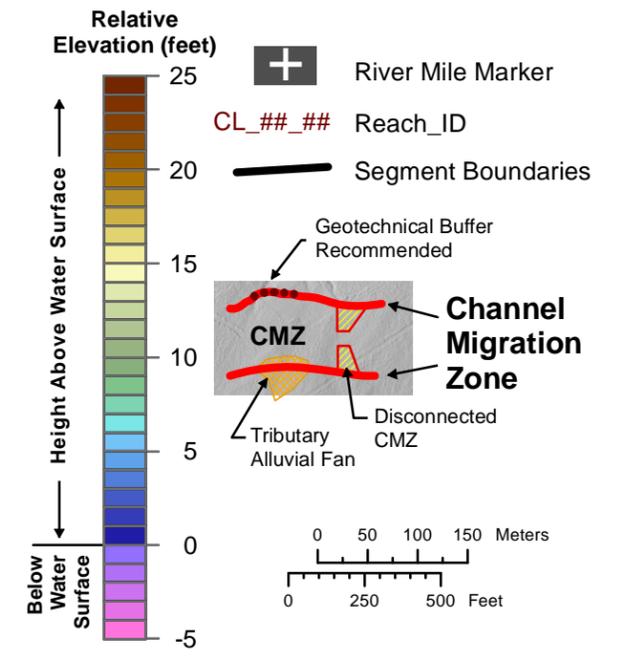
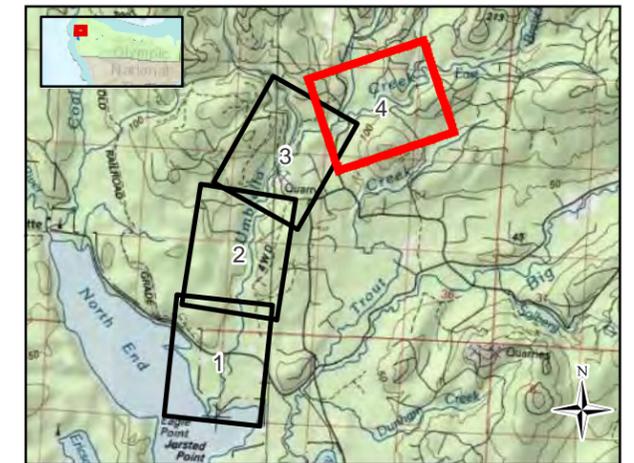
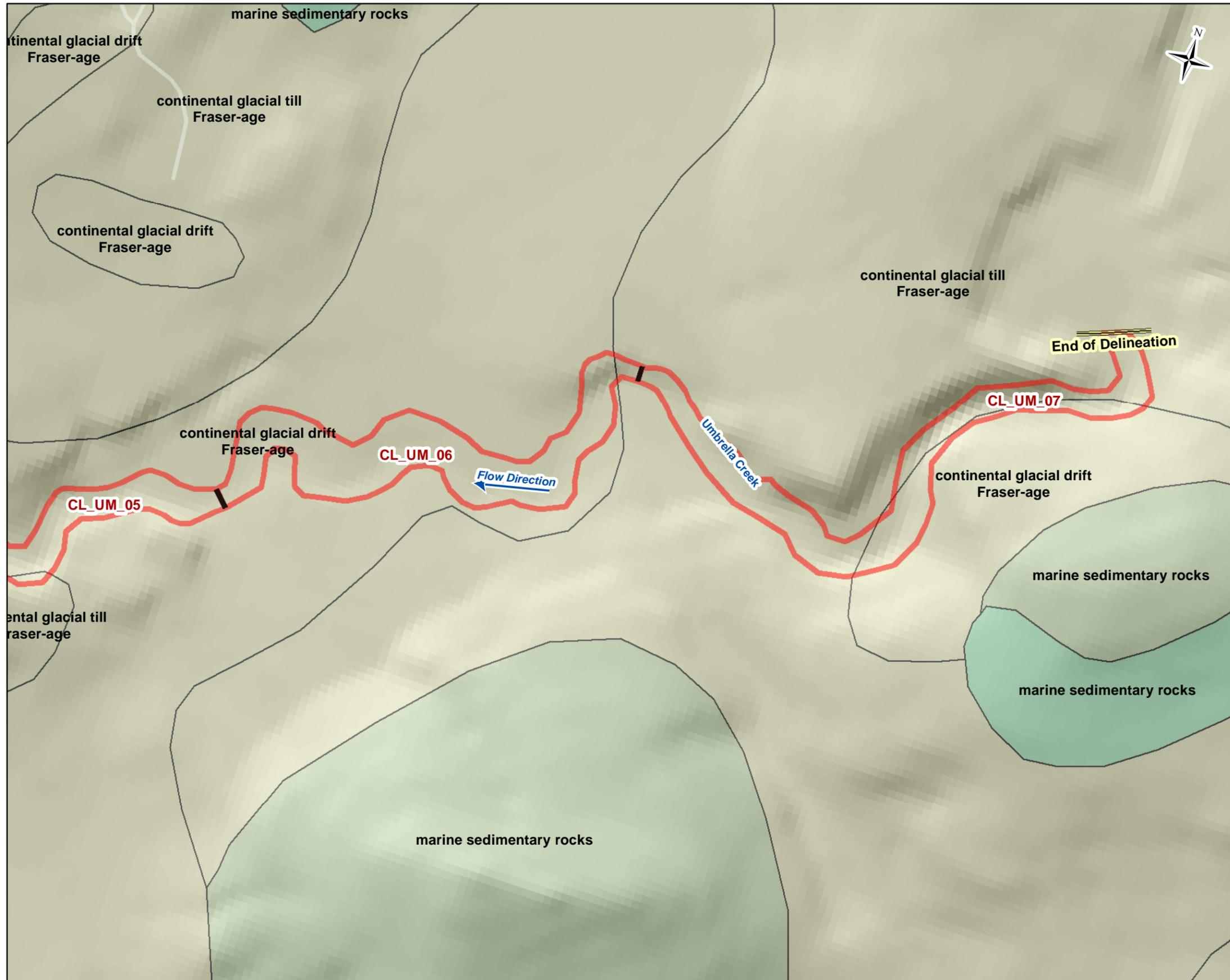


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**Umbrella Creek      Map 3**

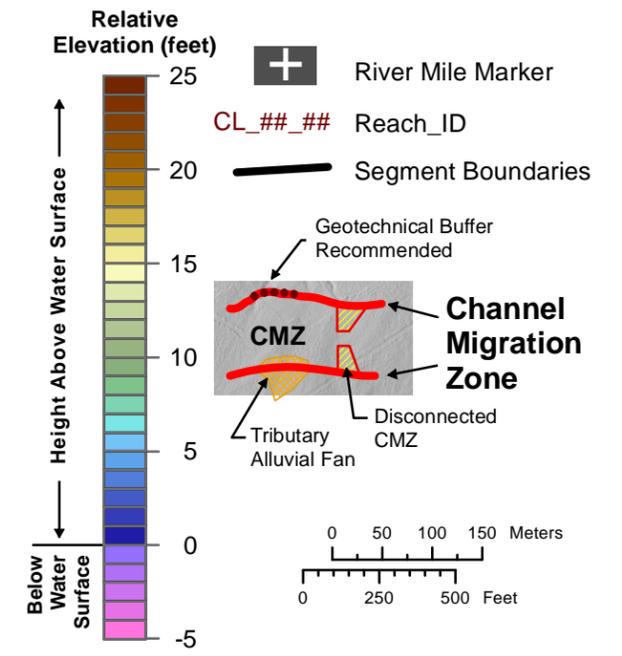
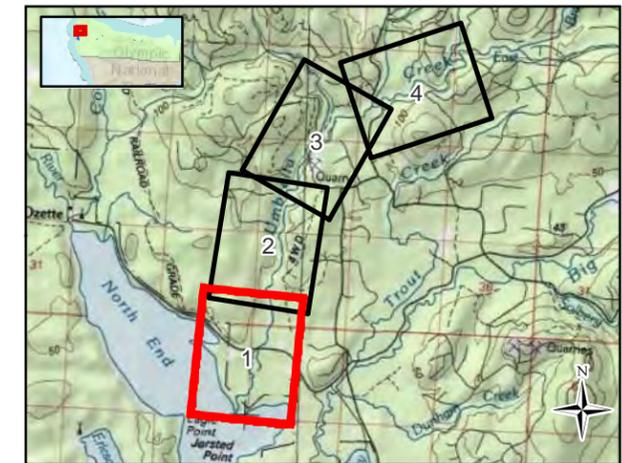


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**Umbrella Creek      Map 4**

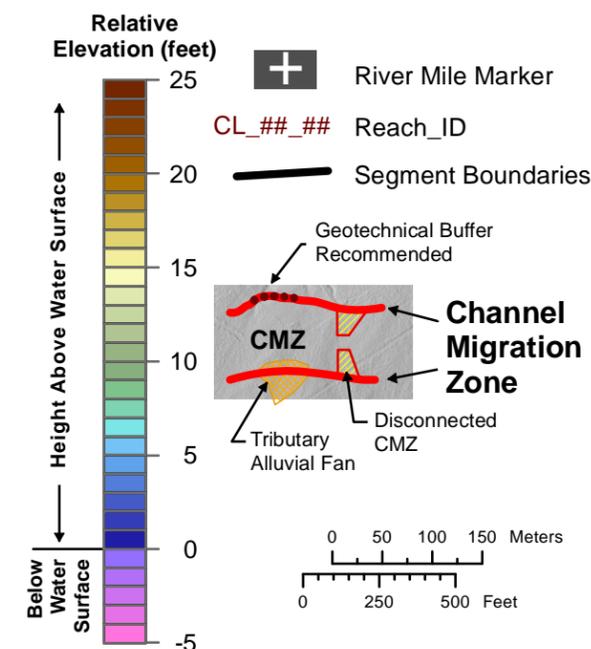
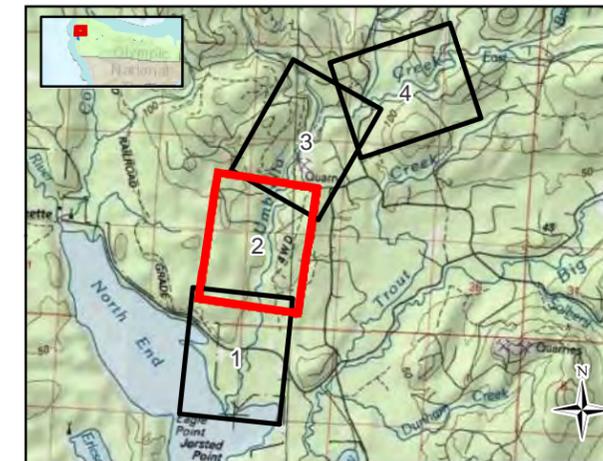
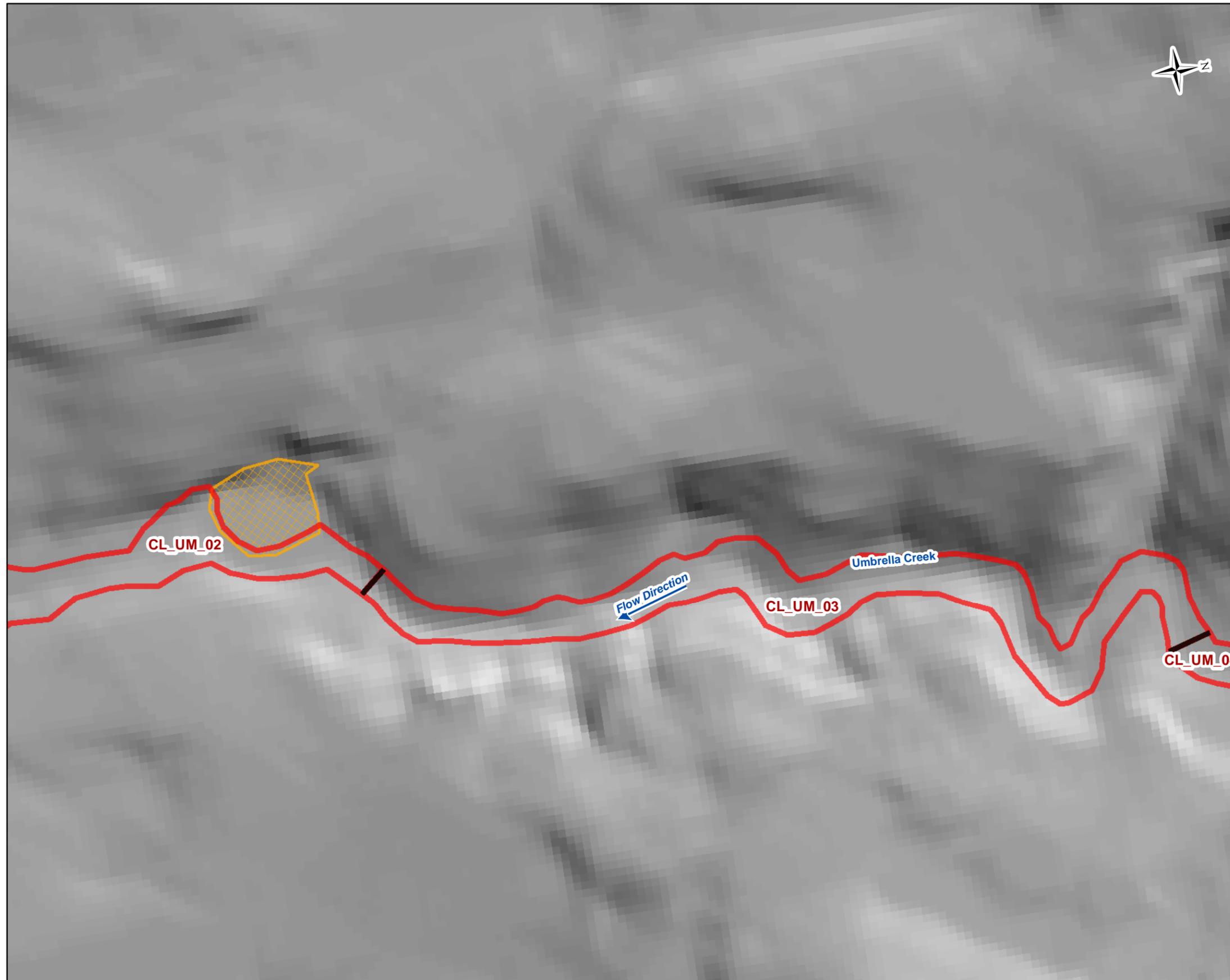


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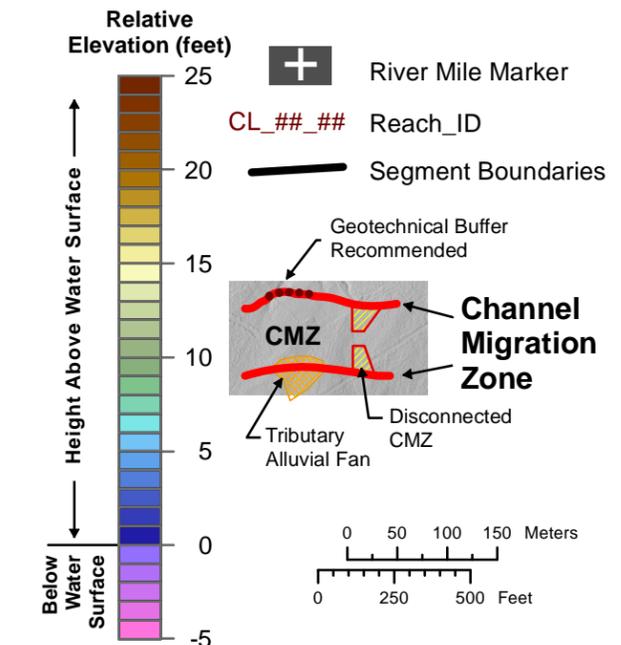
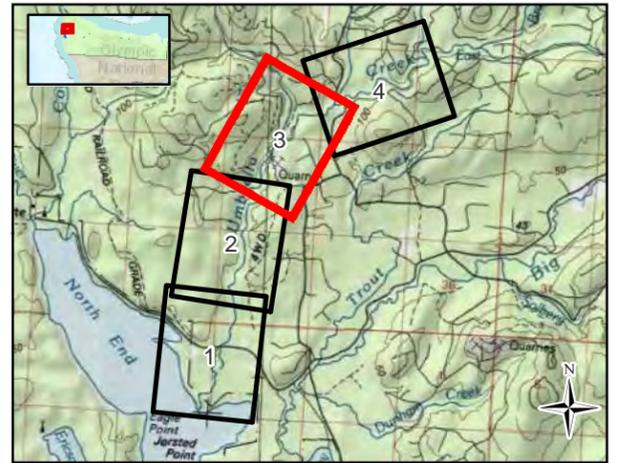
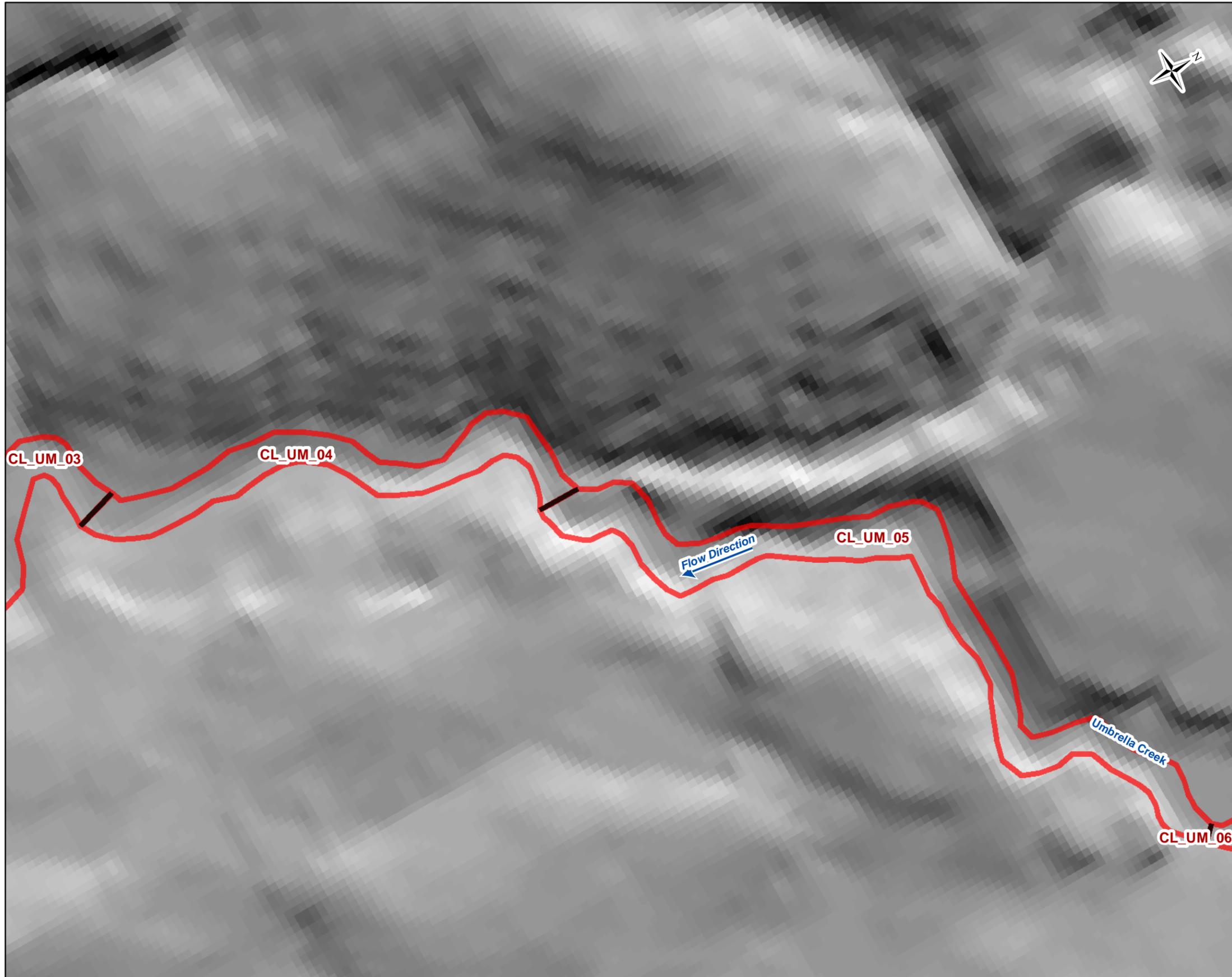


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**Umbrella Creek      Map 2**

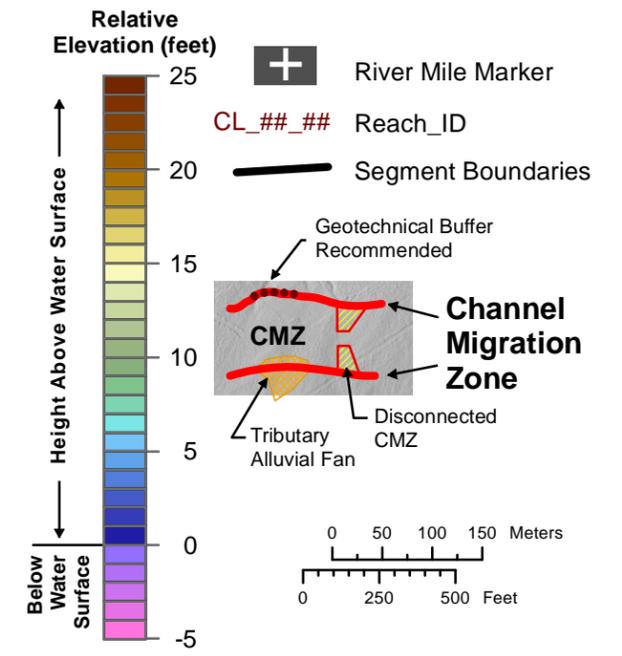
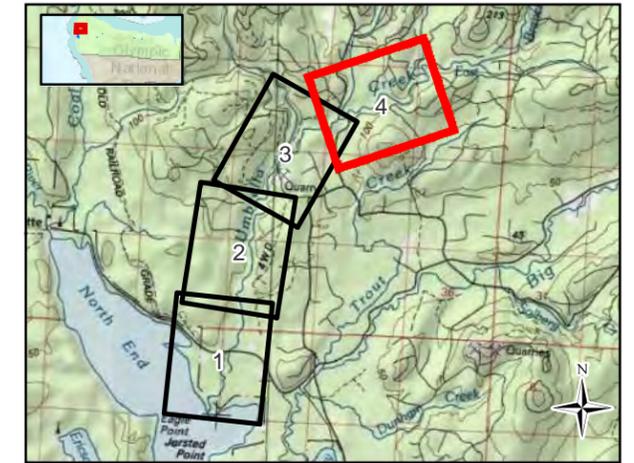


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**Umbrella Creek      Map 4**