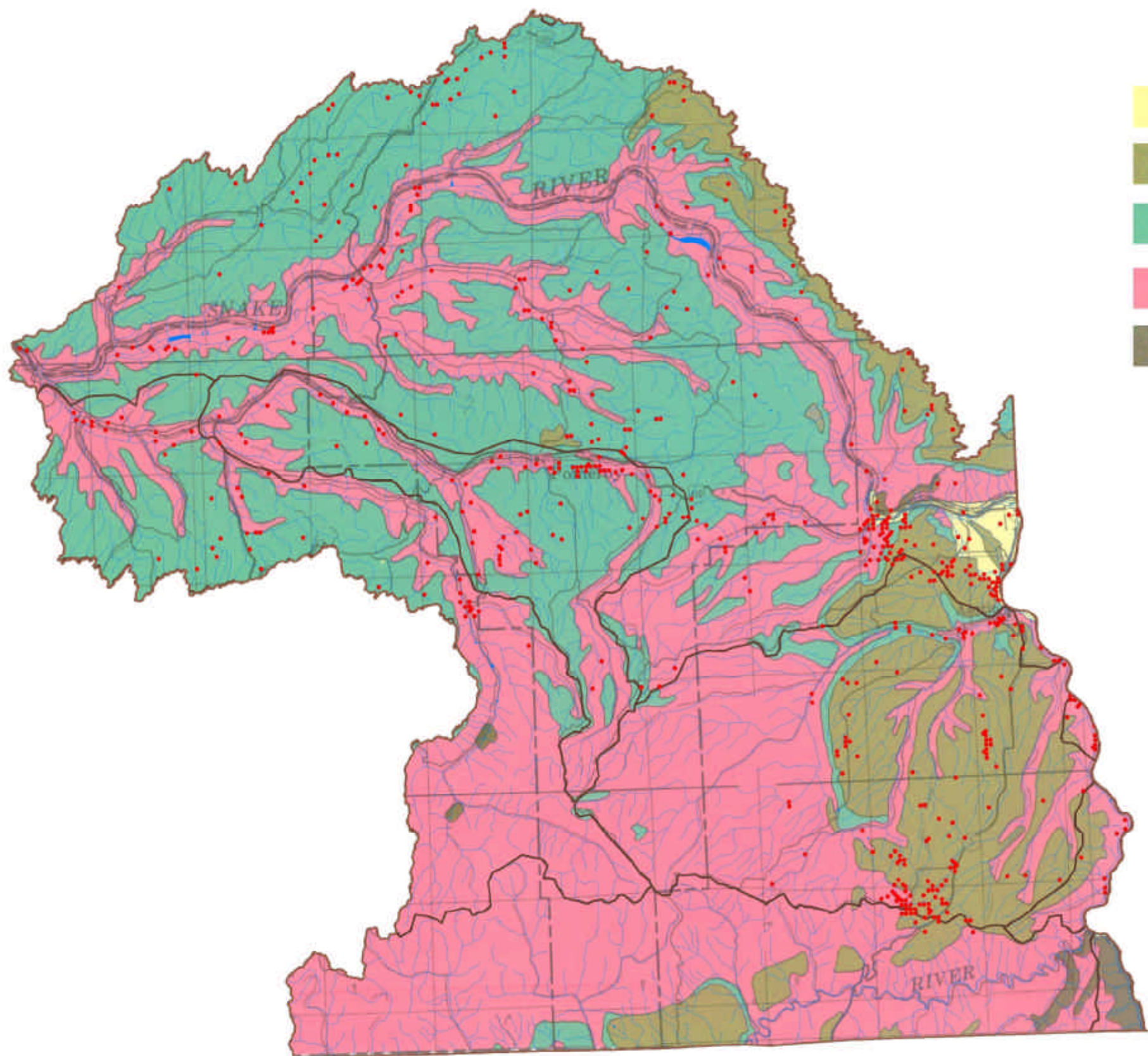


e:\ees\_pdfs\plots\DATE: 09/29/04 TIME: 16:43 e:\ees\_pdfs\Documents and Settings\carper\My Documents\ees\SurficialGeology.dwg



### LEGEND




-  Quaternary Sediments
-  Saddle Mountain Basalt
-  Wanapum Basalt
-  Grande Ronde Basalt
-  Rocks older than Grande Ronde Basalt
-  Wells

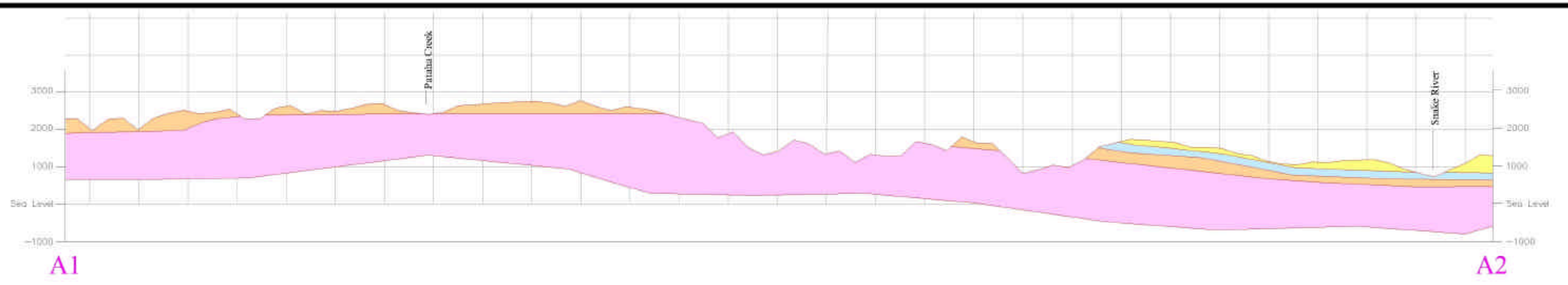
EXHIBIT 7-1  
WRIA 35 Surficial Geology  
Hydrogeological Map





September 2004

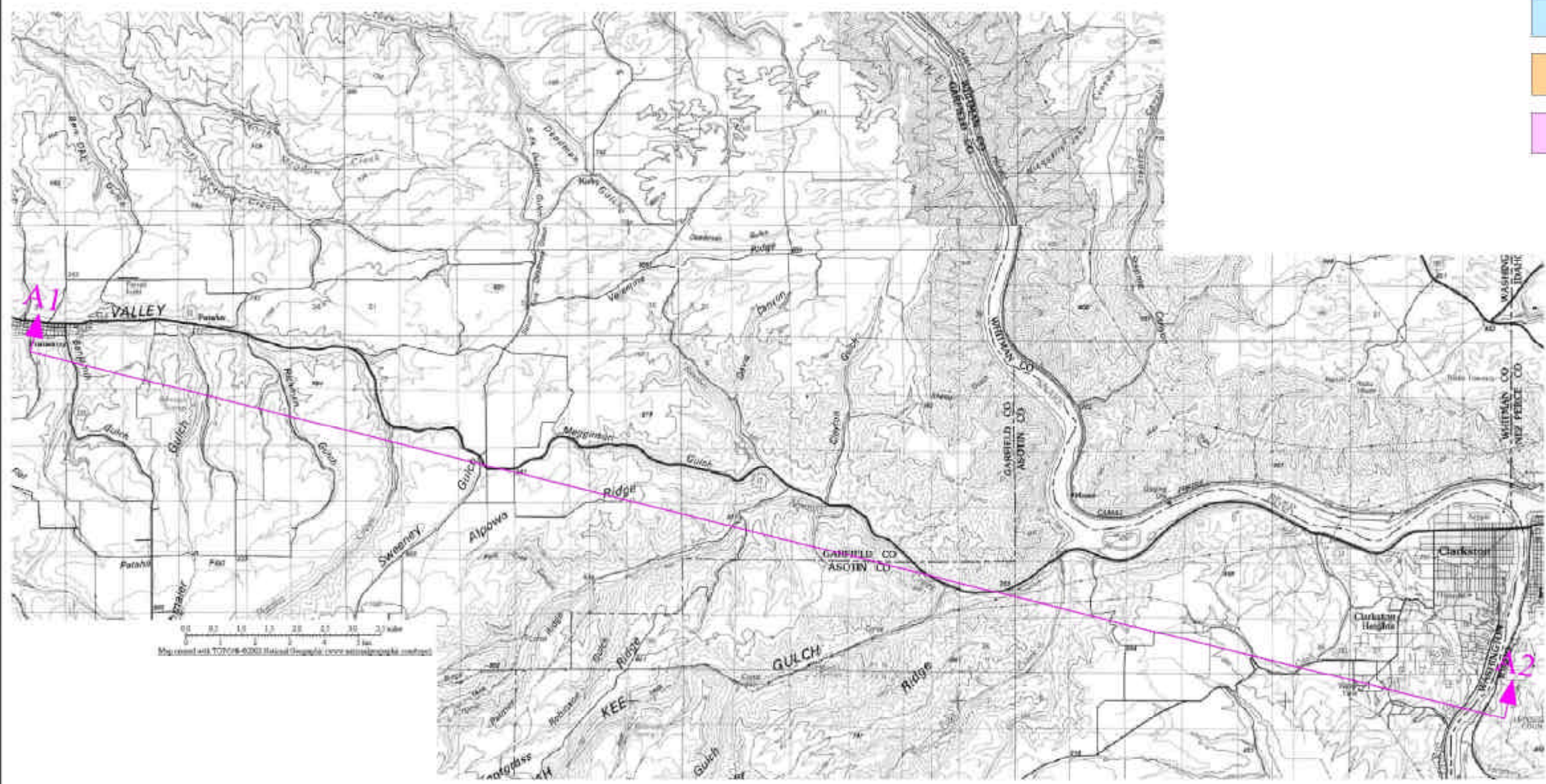


Economic and Engineering  
Services, Inc.  
Bellevue · Mount Vernon · Olympia · Portland · Tri-Cities


\\Server1\data\Consultants\PROJECTS-CONSULTING\ASOTIN (WRI35)\1-03-337 WIRA 35\Profiles\VarProfiles.dwg  
-SEES\_TRX- PLOT DATE: 06/28/04 TIME: 14:56



-  Over Burdon
-  Saddle Mountain Basalt
-  Wanapum Basalt
-  Grande Ronde Basalt



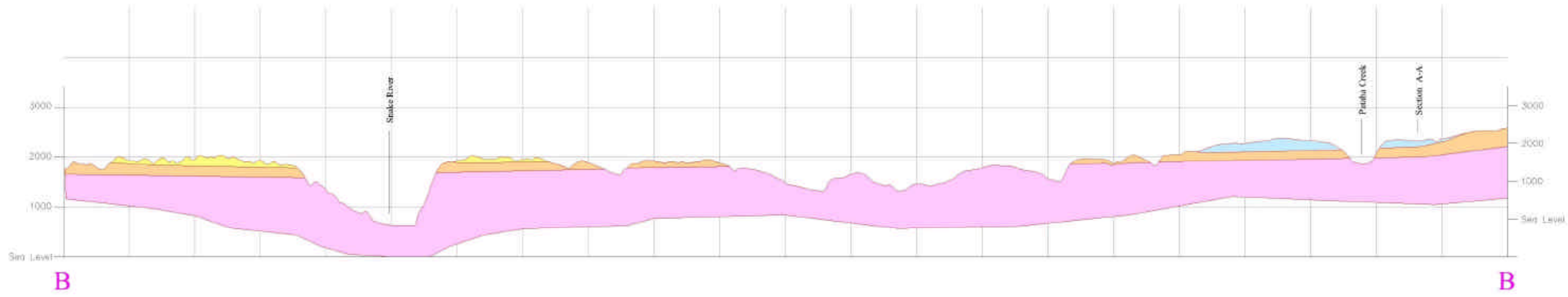
**EXHIBIT 7-2a**  
**ASOTIN PUD**  
Middle Snake (WRIA 35)  
Cross Section A1-A2  
September 2004



Economic and Engineering  
Services, Inc.  
Bellevue • Mount Vernon • Olympia • Portland • Tri-Cities

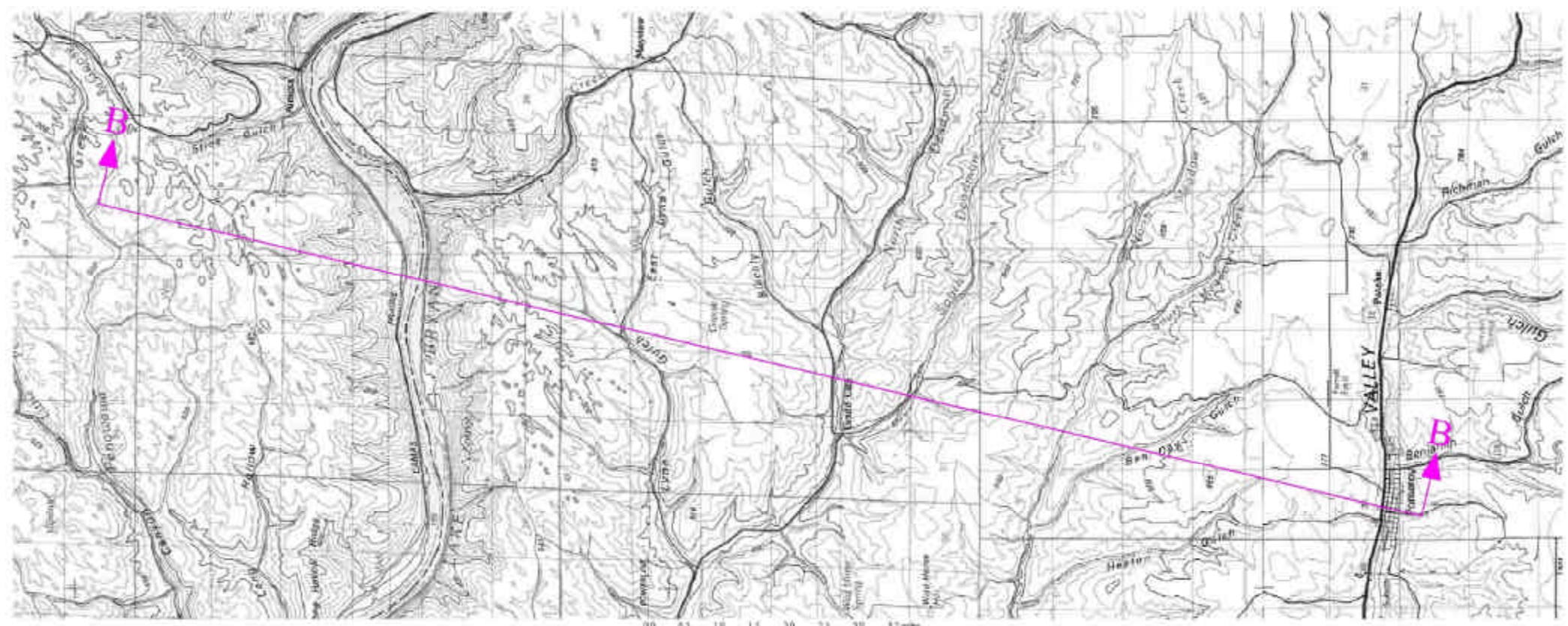






\\server1\ddico\consultants\PROJECTS-CONSULTING\asotin (MiddleSnake) PUD\_MSR35\1-03-33\WBA\_35\Profiles\SedProfiles.dwg  
-EES\_TRI> PLOT Date: 06/25/04 Time: 16:32



B


B



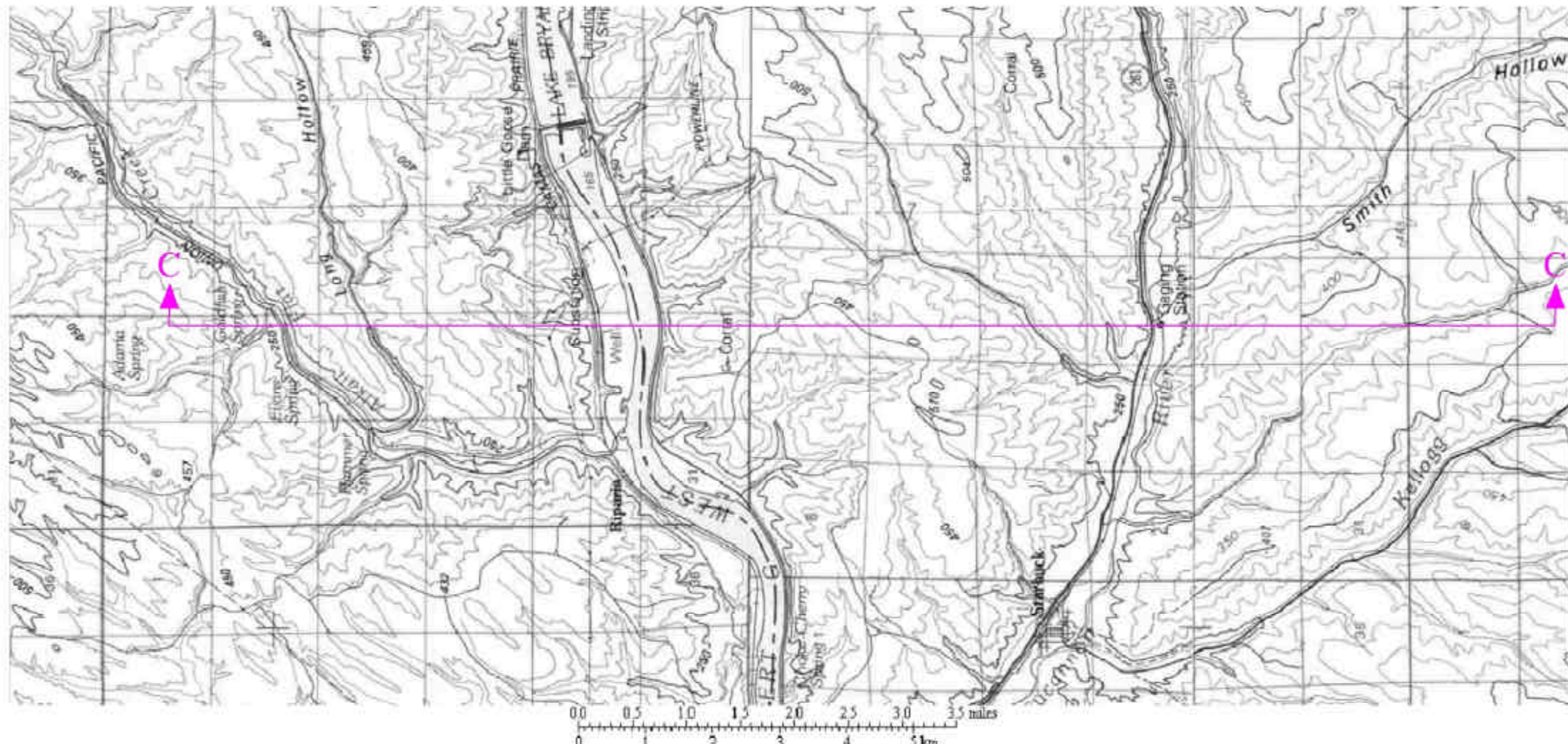
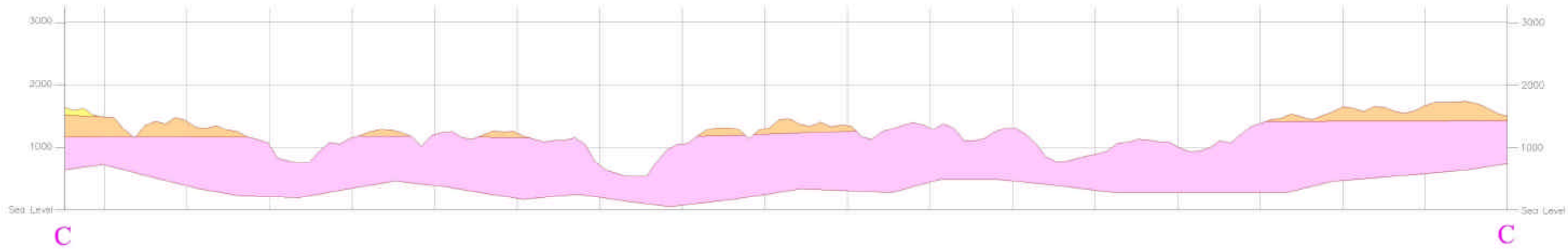
-  Over Burden
-  Saddle Mountain Basalt
-  Wanapum Basalt
-  Grande Ronde Basalt





**EXHIBIT 7-2c**  
**ASOTIN PUD**  
**Middle Snake (WRIA 35)**  
**Cross Section B-B**

September 2004

 Economic and Engineering Services, Inc.  
Bellevue, Mount Vernon, Olympia, Portland, Tri-Cities


\\server1\000\consultants\PROJECTS-CORPUS\TMO\A\000 (MiddleSnake) PUD\_WRIA35\1-05-33T\_WRA\_35\Profiles\SeeProfiles.dwg  
G:\GIS\TRIS\PILOT DATE: 09/28/04 TIME: 16:43



-  Over Burdon
-  Saddle Mountain Basalt
-  Wanapum Basalt
-  Grande Ronde Basalt

**EXHIBIT 7-2d**  
**ASOTIN PUD**  
Middle Snake (WRIA 35)  
Cross Section C-C

September 2004

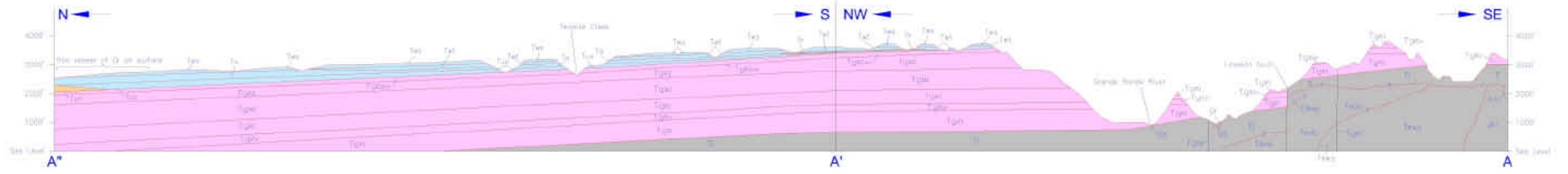


Economic and Engineering  
Services, Inc.  
Bellevue, Miami, Venice, Olympia, Portland, Tallahassee

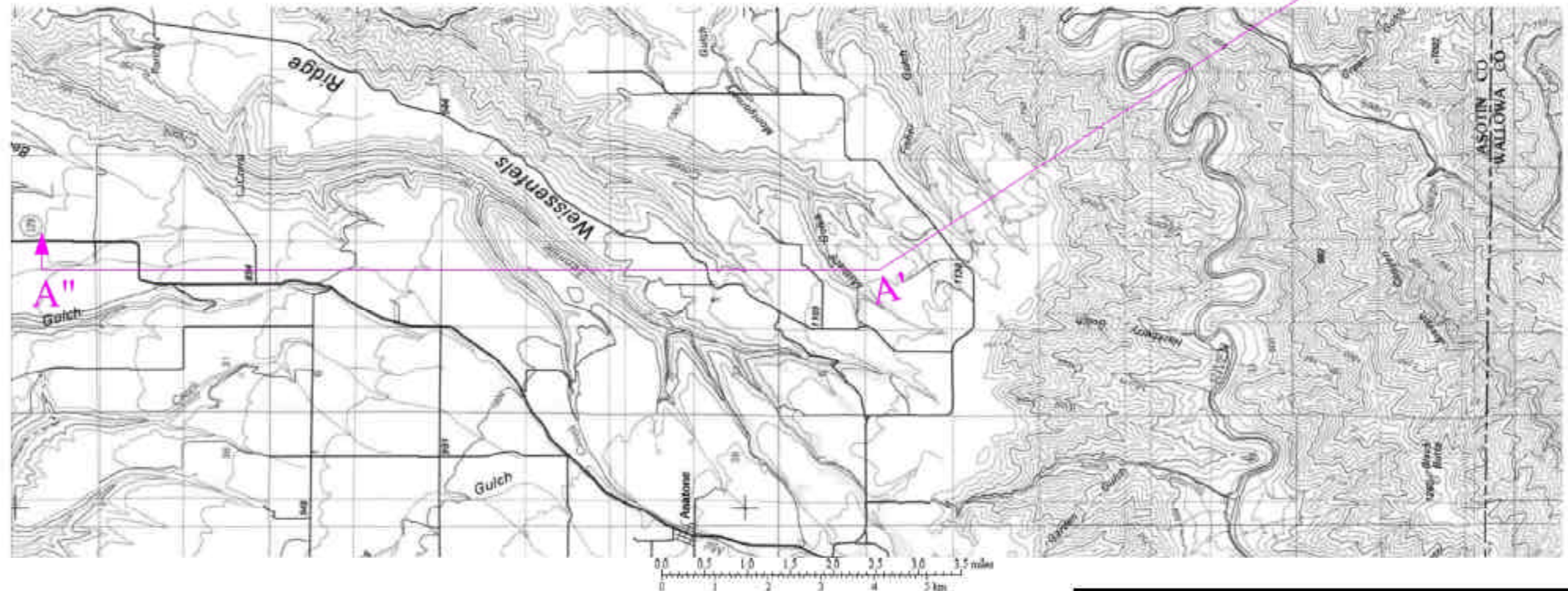
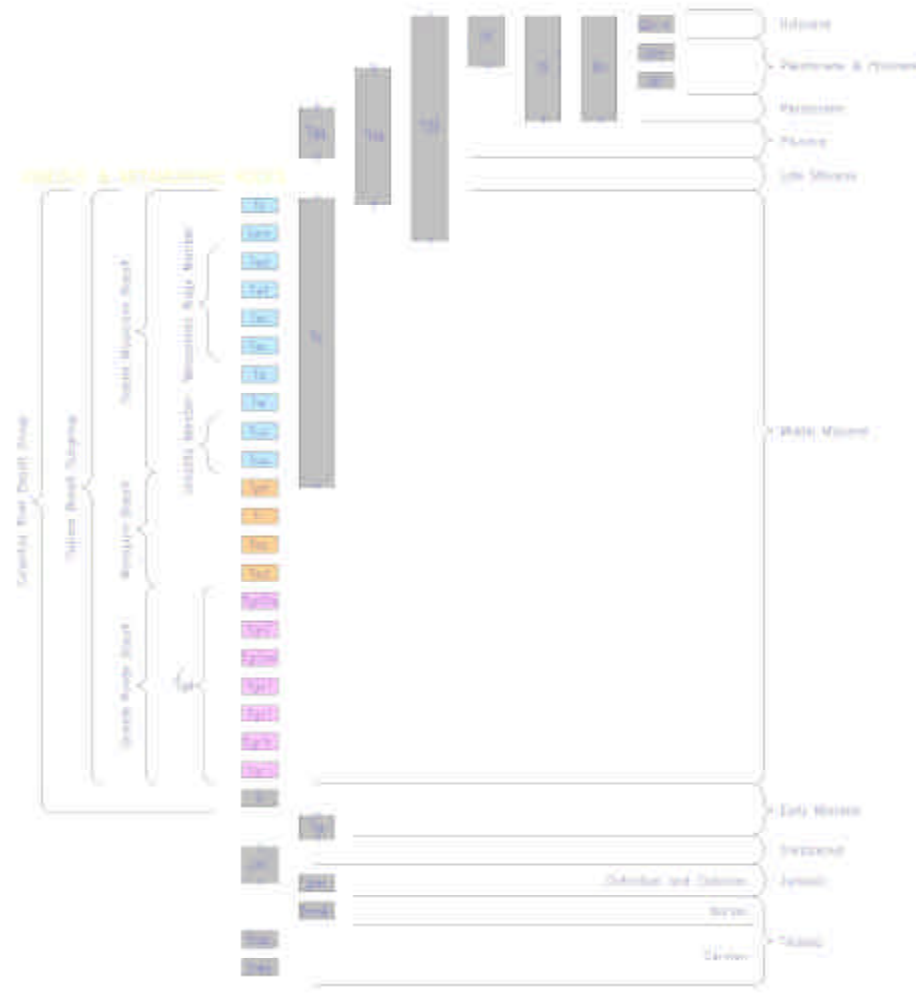
Map created with TOPO!® ©2002 National Geographic (www.nationalgeographic.com/topo)




C:\Users\p0504276\Documents\ASOTIN\_PUD\ASOTIN\_PUD\_091311\07-337\_WRI35\_ASOIN\07-337\_ASOIN\07-337\_ASOIN.dwg



**EXPLANATION**

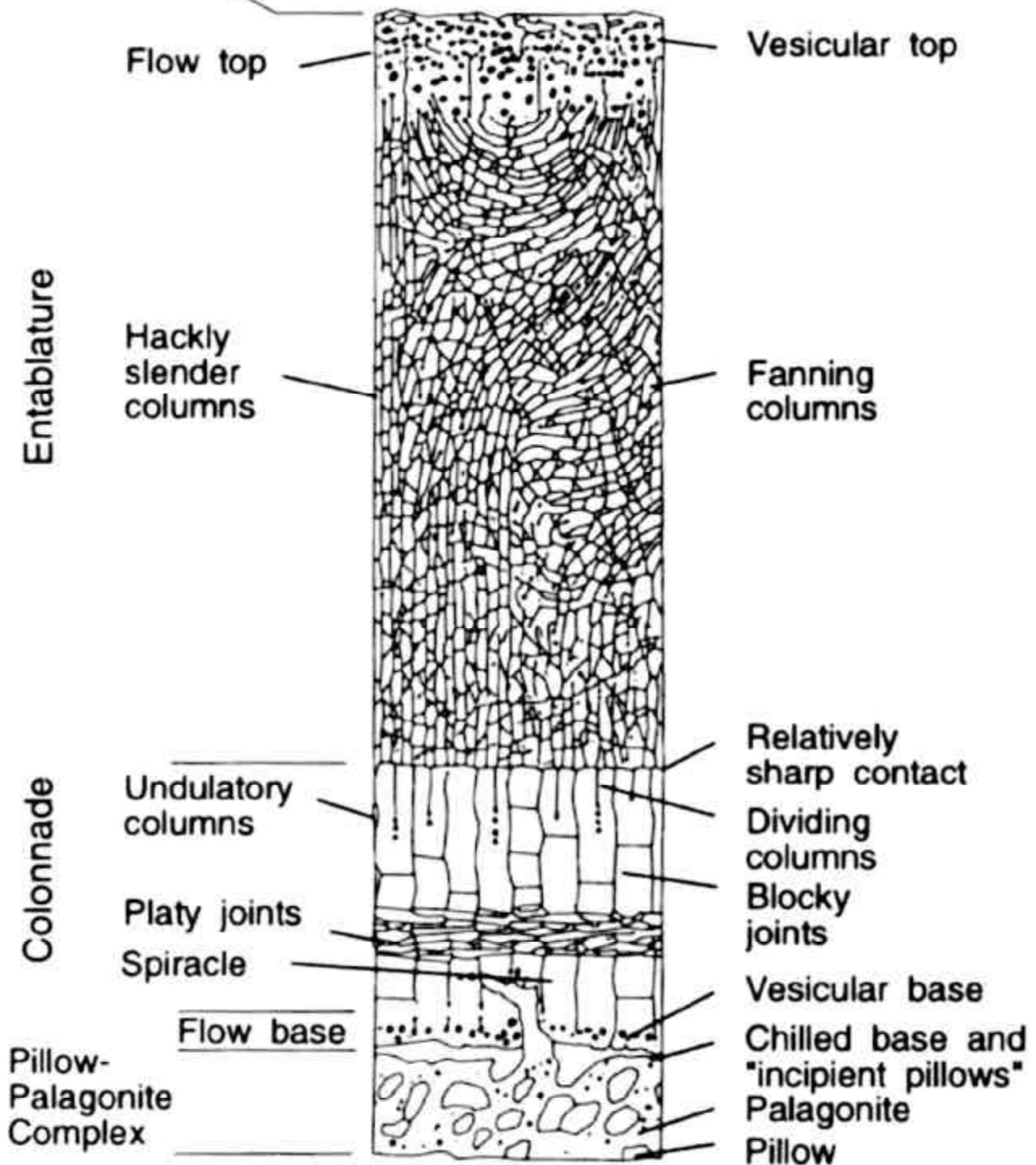


**EXHIBIT 7-3b**  
**ASOTIN PUD**  
**Middle Snake (WRIA 35)**  
**Asotin**  
 September 2004



Economic and Engineering  
 Services, Inc.  
 Bellevue, Mount Vernon, Olympia, Portland, Tri-Cities

Flow top and base  
of subsequent flow  
form interflow zone

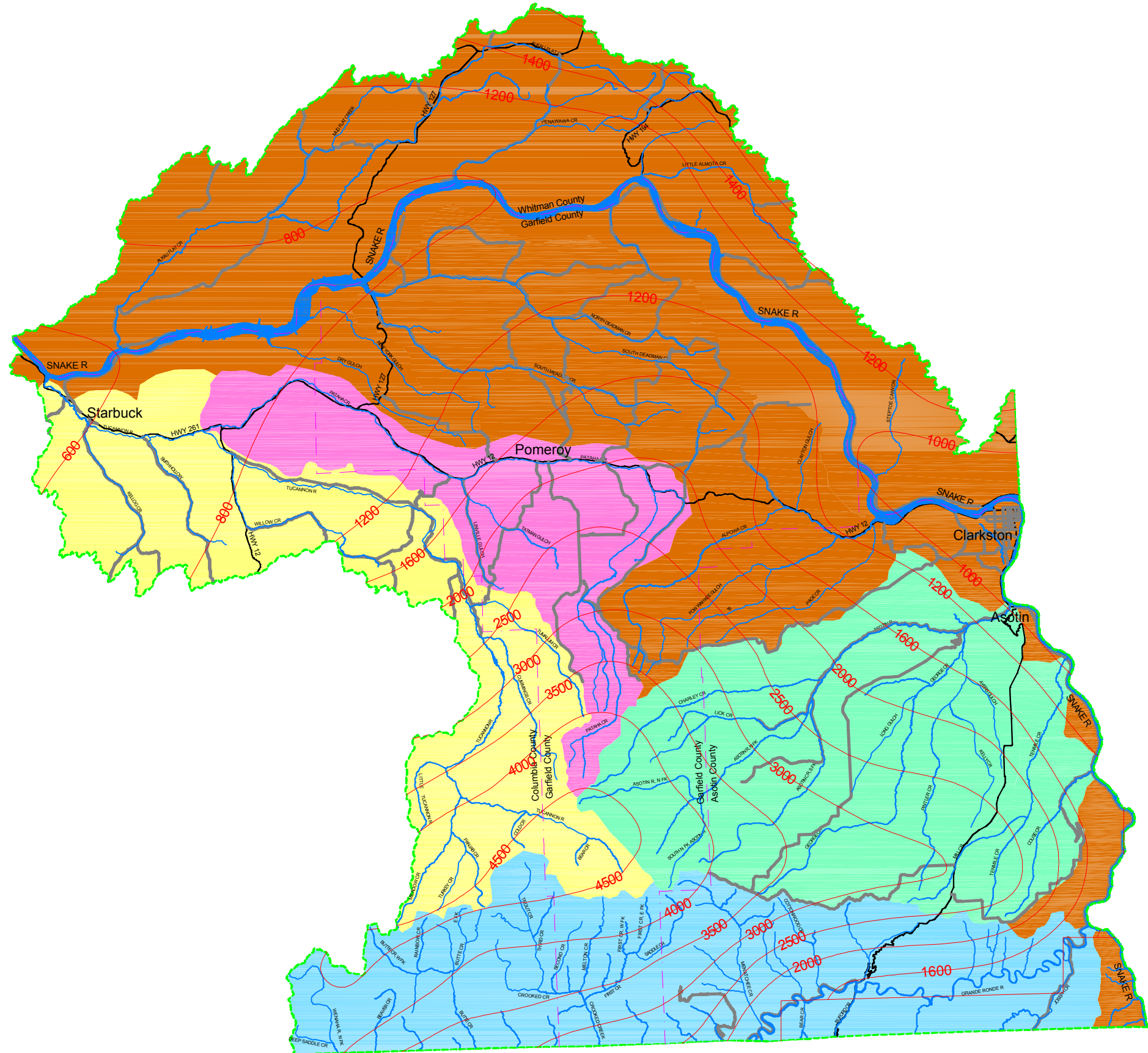


Modified from Swanson and  
Wright (1978, p-51)

EXHIBIT 7-4


**Figure 2.--**Sketch showing internal structure  
of an individual basalt flow.



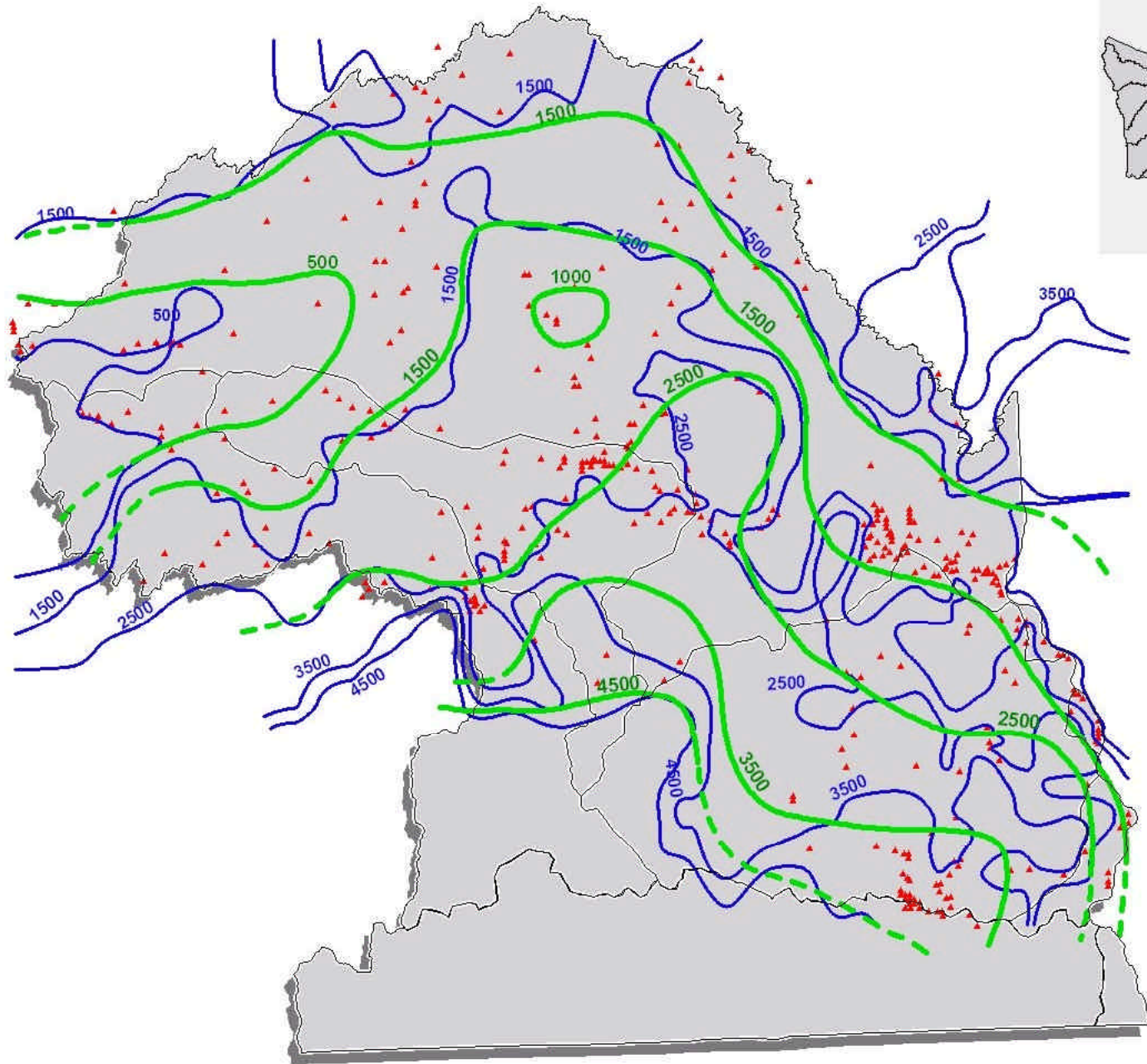


- Sub-Basins:
- Asotin
  - Lower Snake River Mainstem
  - Pataha
  - Tucannon
  - Grande Ronde (Not in Planning Area)
  - Contour Lines

**EXHIBIT 7-5**  
**ASOTIN PUD**  
**Middle Snake (WRIA 35)**  
**Potentiometric Contours**  
September 2004



Economic and Engineering  
Services, Inc.  
Bellevue Mount Vernon Olympia Portland Tri-Cities



*Grande Ronde & Wanapum Wells*  
**WRIA 35**

September 2004

EXHIBIT 7-6



Economic and Engineering  
 Services, Inc.

Bellevue MerittVernon Olympia Portland Tri-Cities