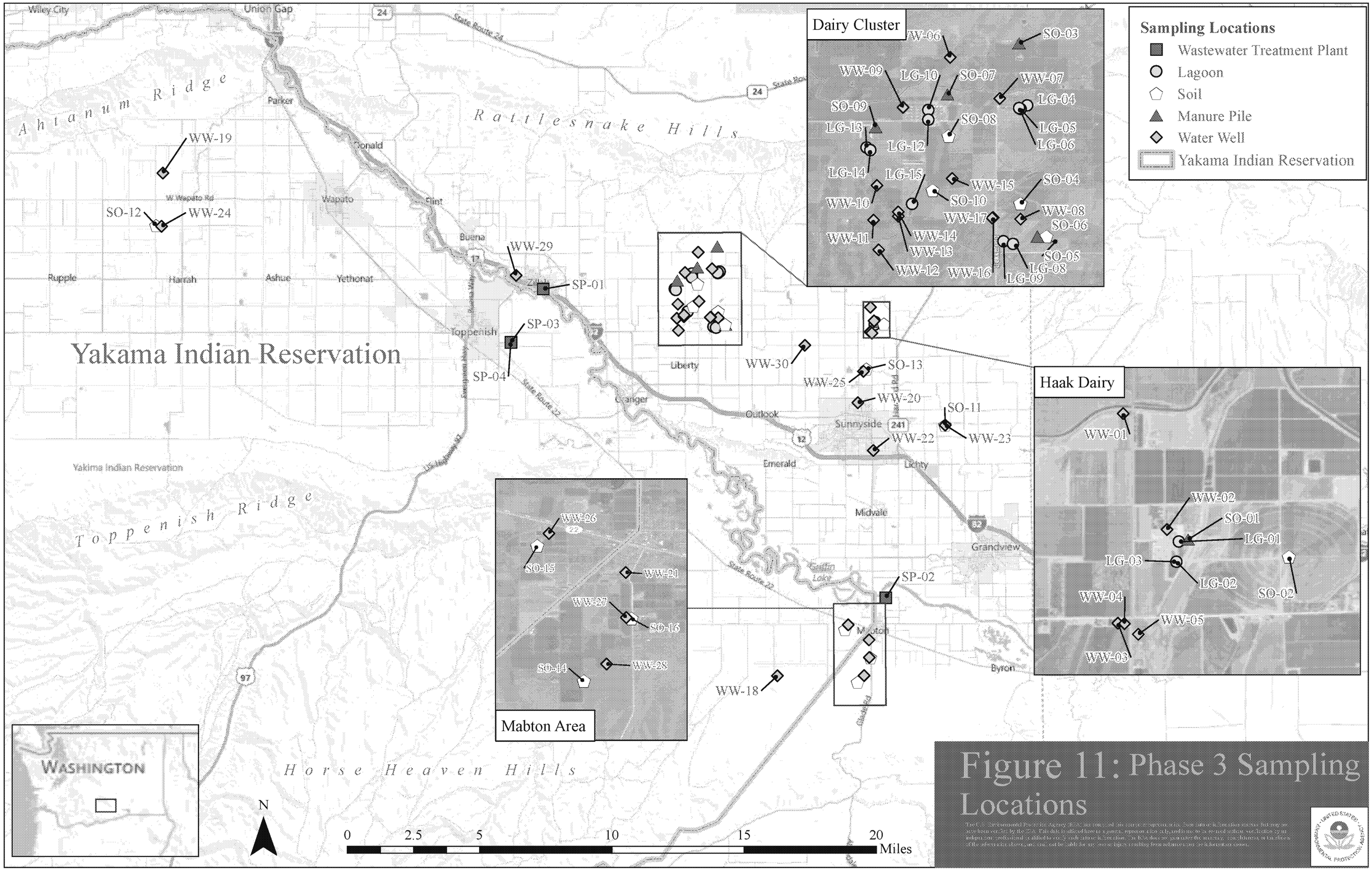


Figure 11: Phase 3 Sampling Locations

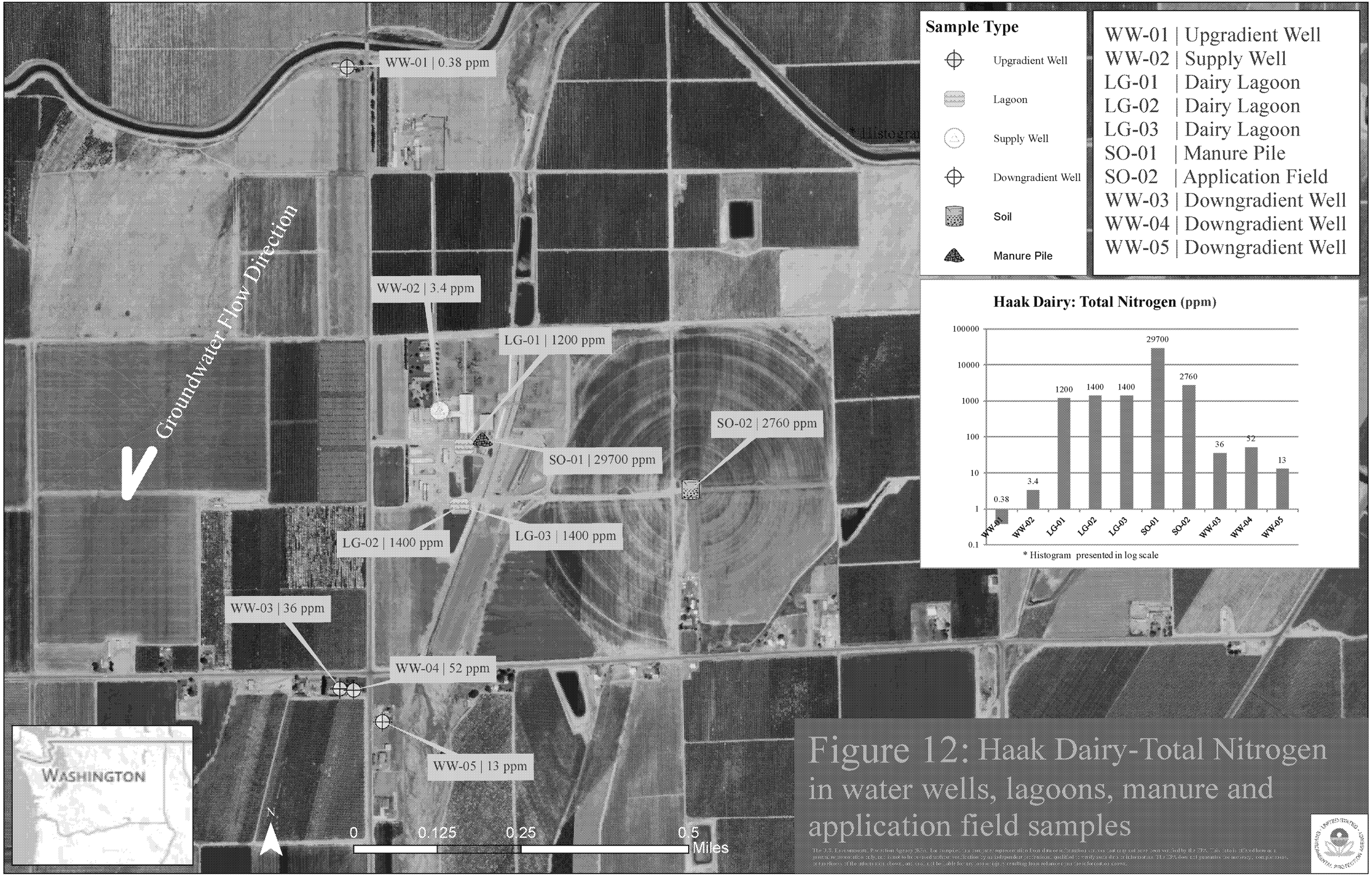
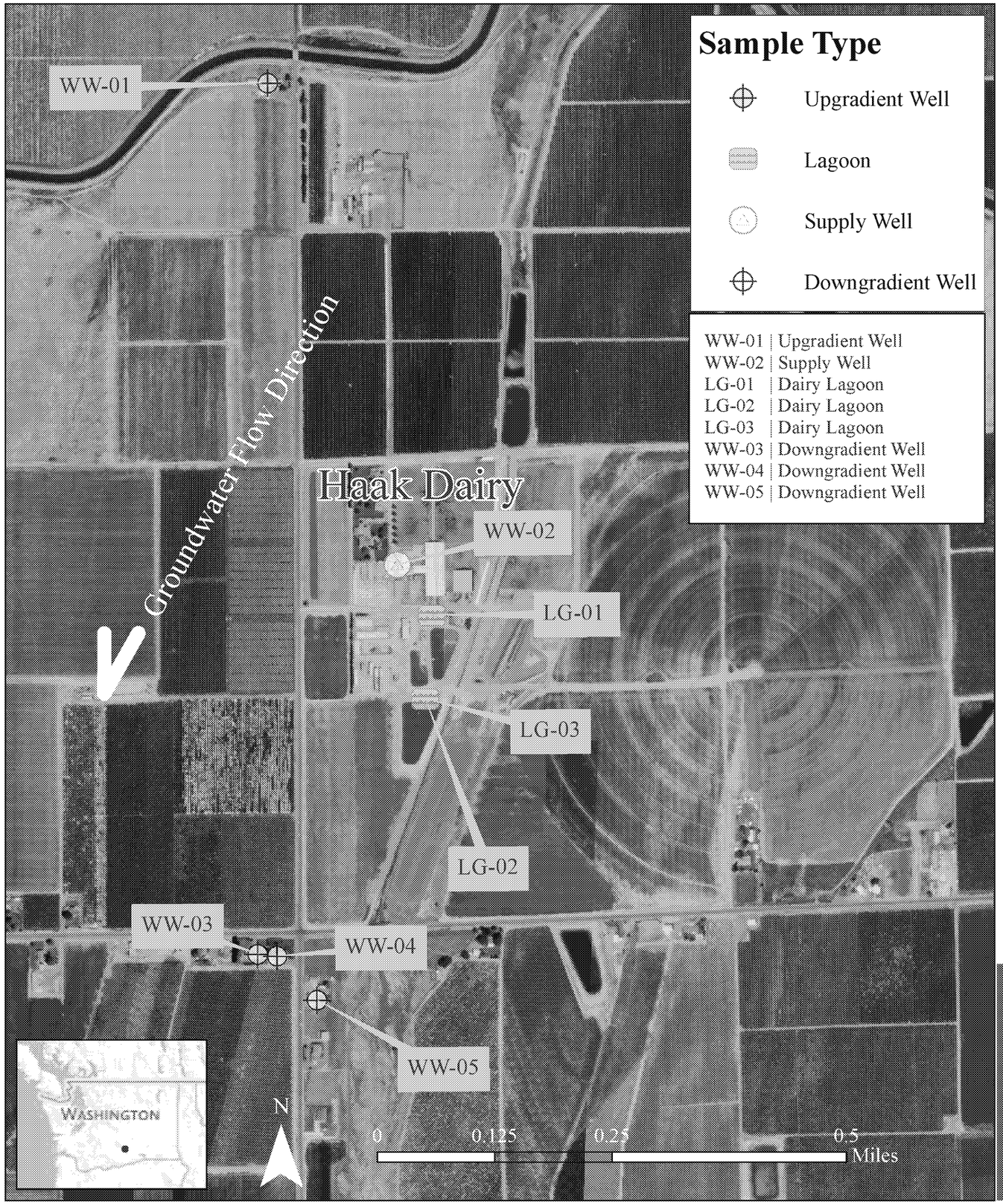
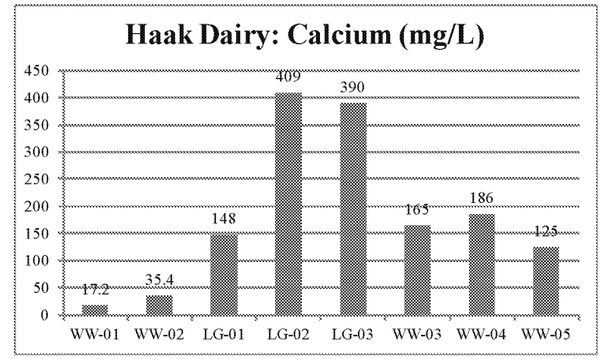
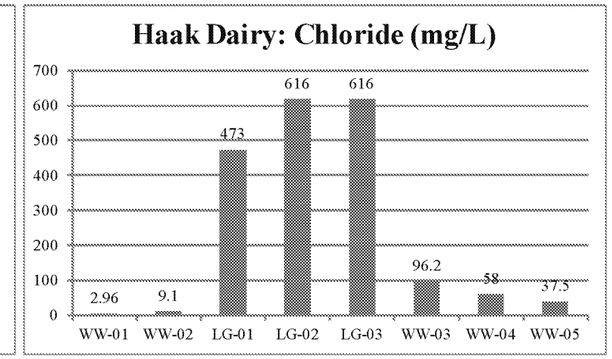


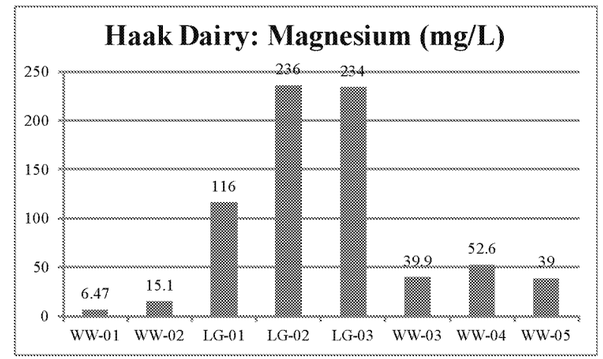
Figure 12: Haak Dairy-Total Nitrogen in water wells, lagoons, manure and application field samples

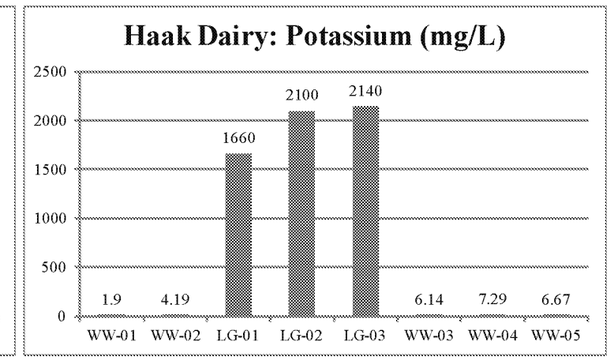






North → South





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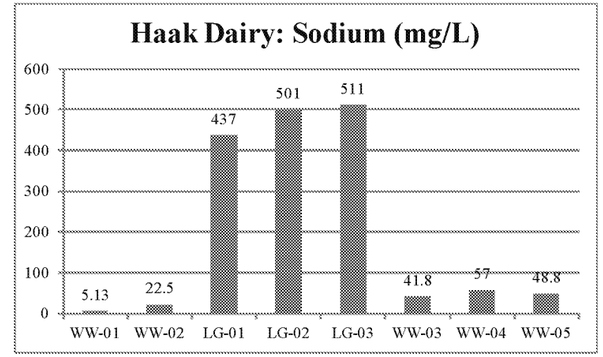
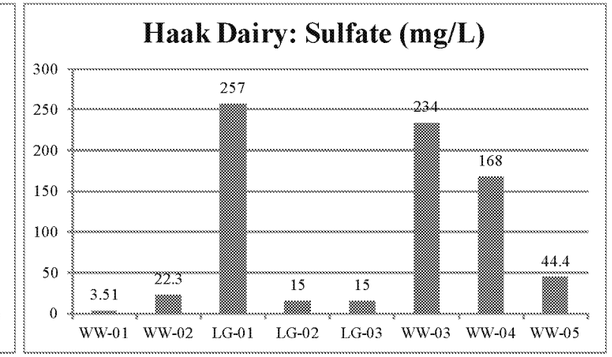




North → South

Figure 13: Haak Dairy: Concentration of Major Ions in Water Wells and Lagoons

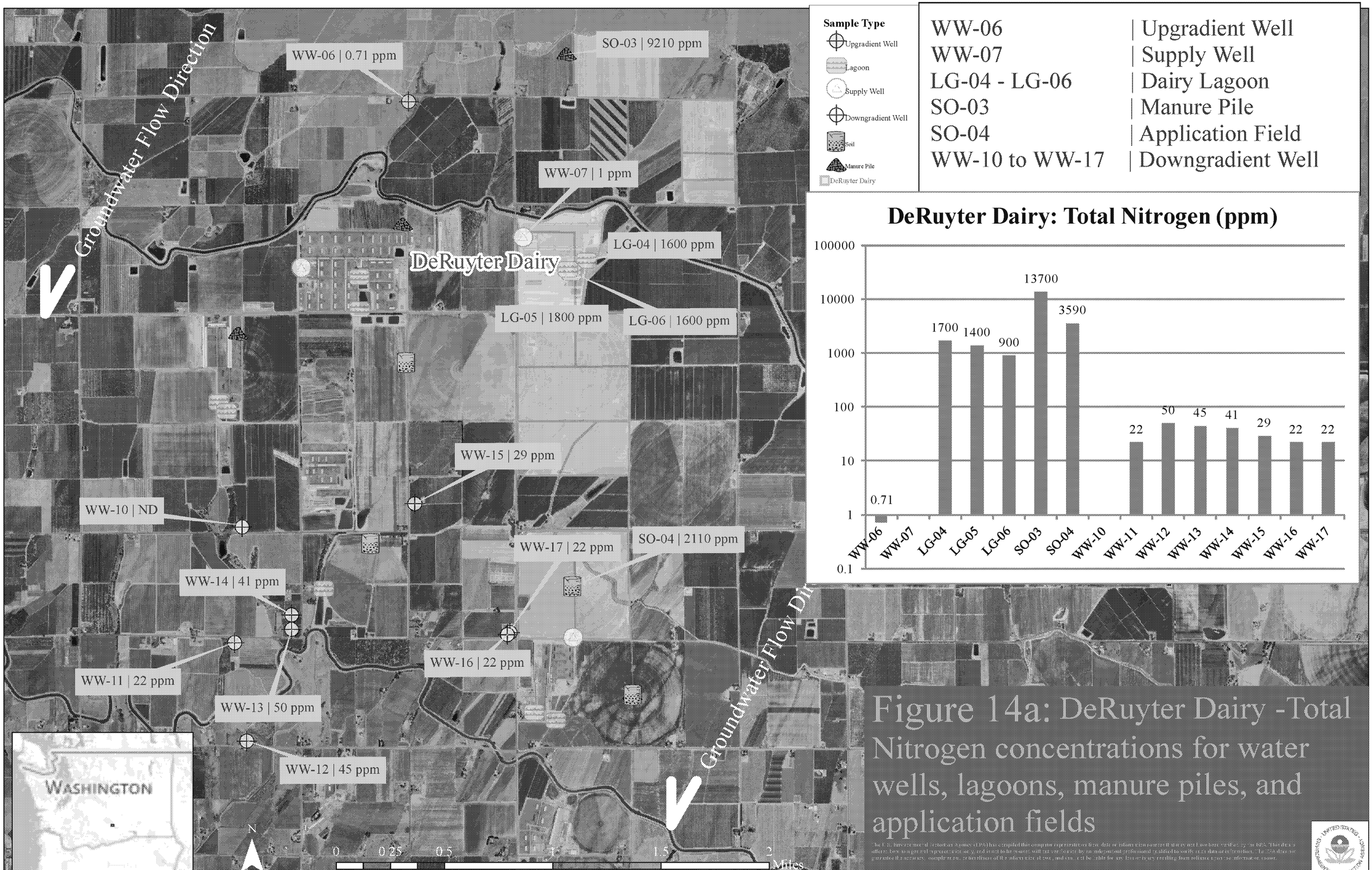
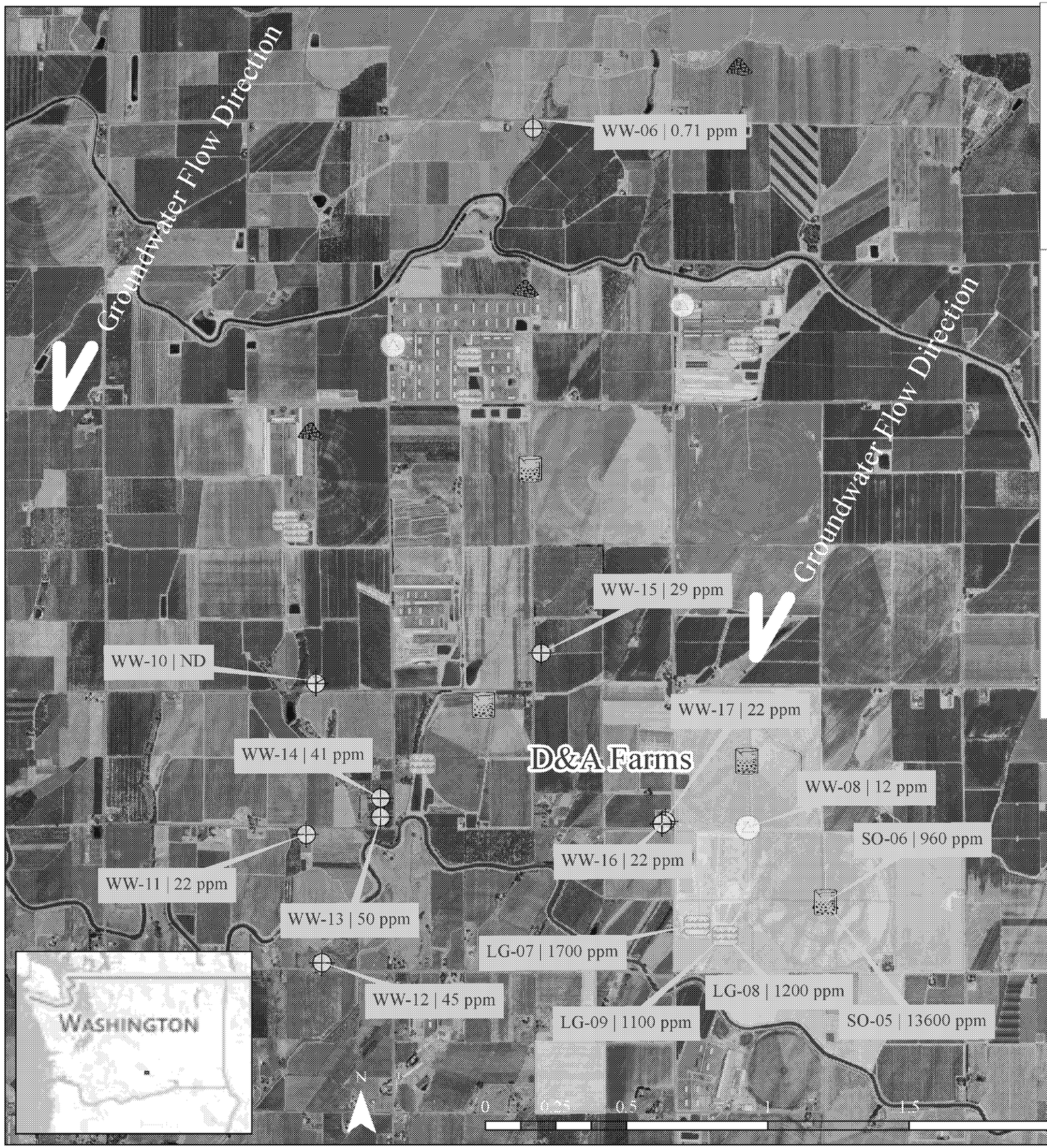
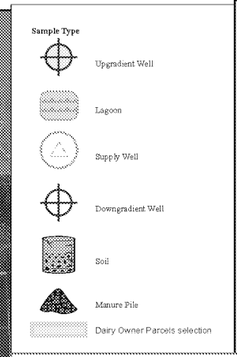


Figure 14a: DeRuyter Dairy -Total Nitrogen concentrations for water wells, lagoons, manure piles, and application fields





WW-06	Upgradient Well
WW-08	Supply Well
LG-07 to LG-09	Dairy Lagoon
SO- 05	Manure Pile
SO- 06	Application Field
WW-10 to WW-17	Downgradient Well

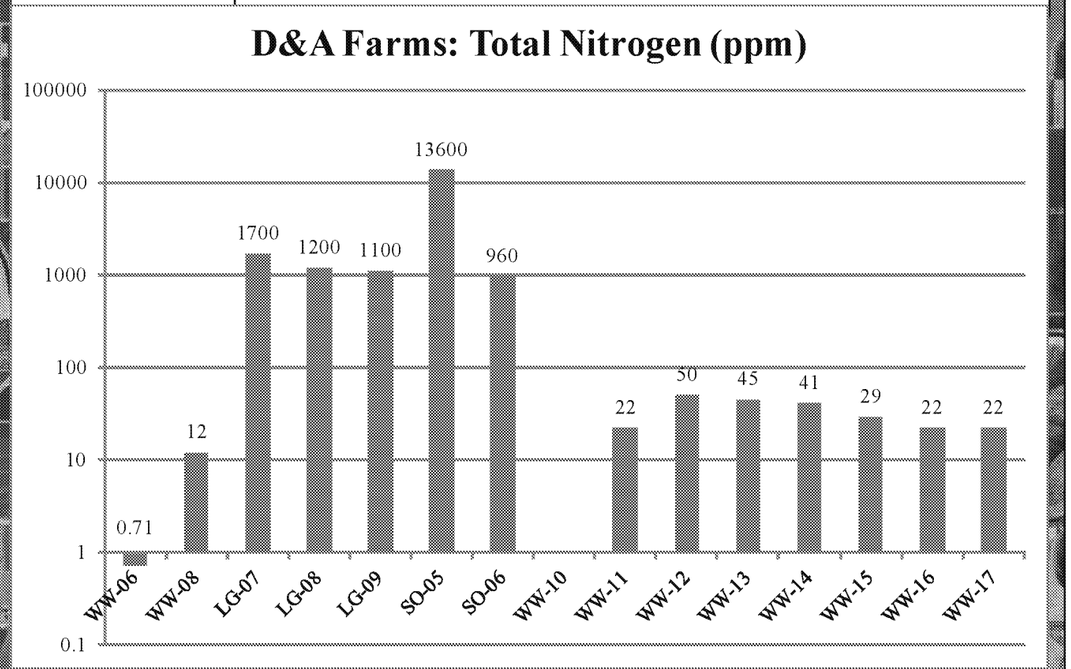


Figure 14b: D + A Farms-Total Nitrogen concentrations for water wells, lagoons, manure piles, and application fields

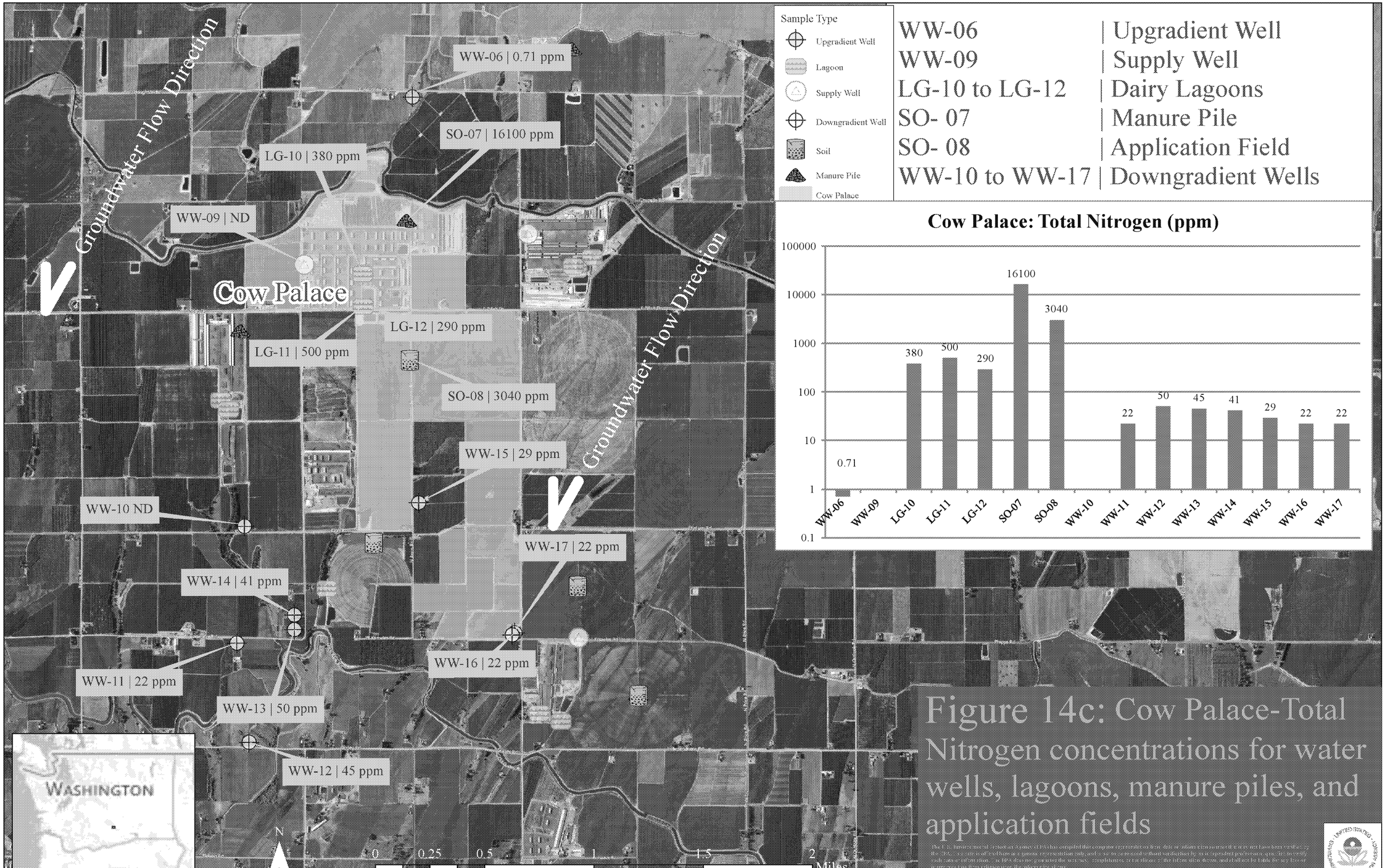


Figure 14c: Cow Palace-Total Nitrogen concentrations for water wells, lagoons, manure piles, and application fields

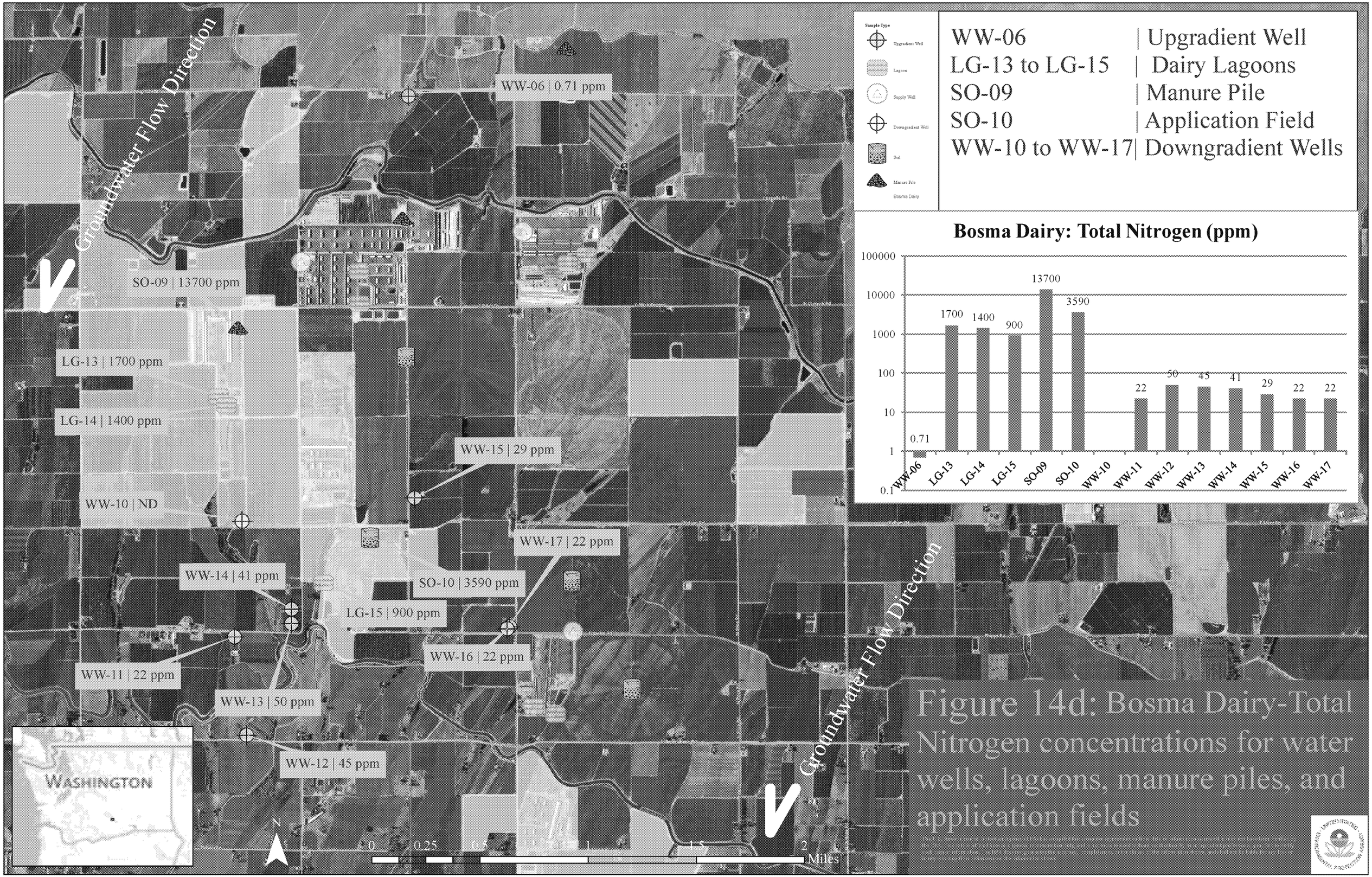
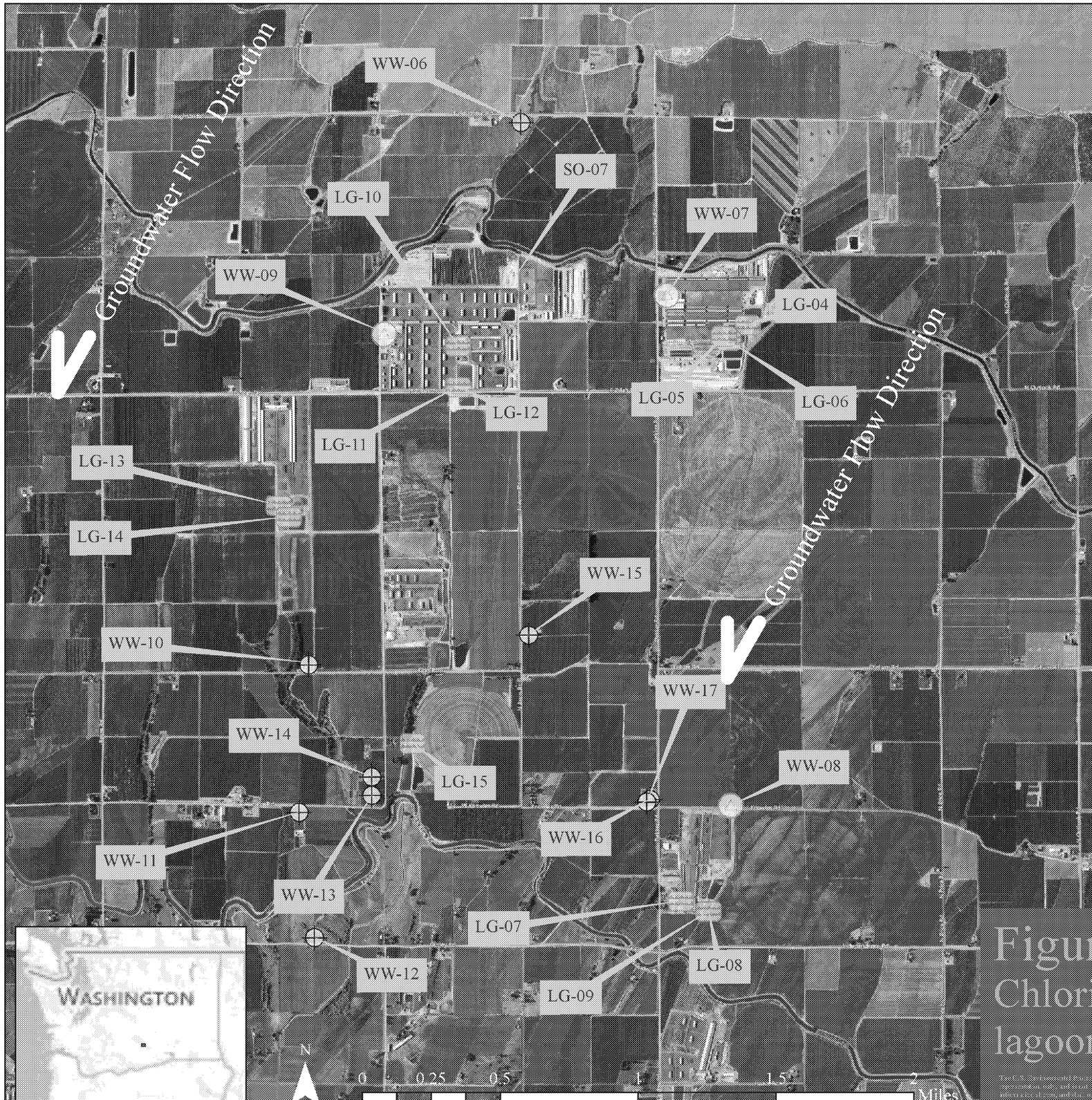
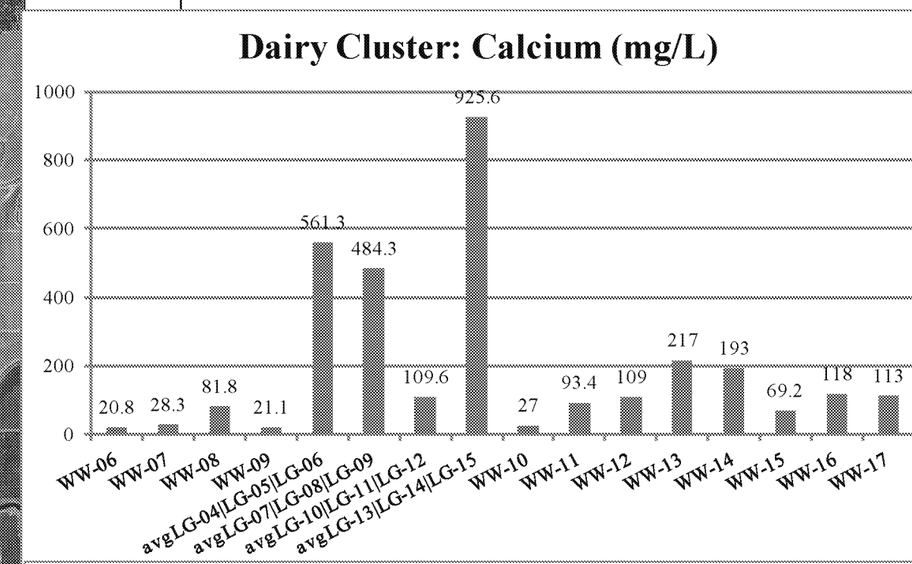


Figure 14d: Bosma Dairy-Total Nitrogen concentrations for water wells, lagoons, manure piles, and application fields



WW-06	Upgradient Well
WW-07, 08, 09	Supply Wells
LG-04 to LG-15	Dairy Lagoons
WW-10 to WW-17	Downgradient Wells



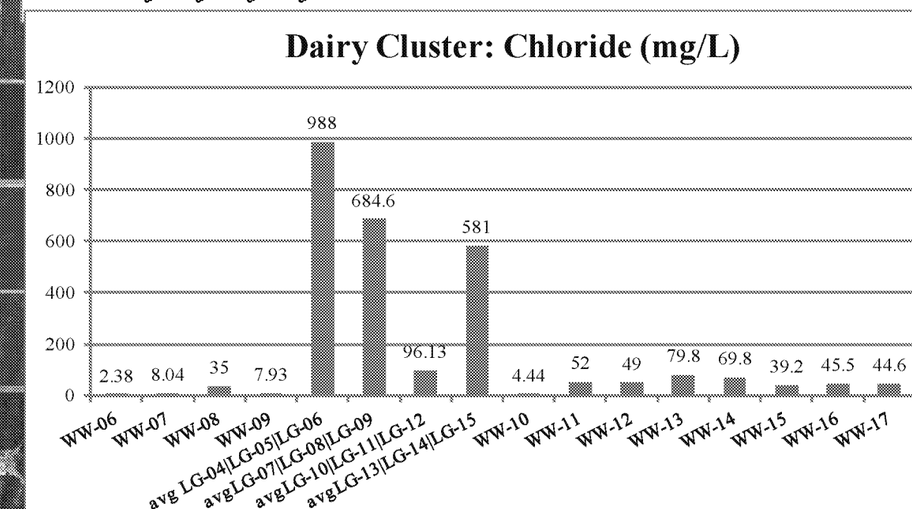
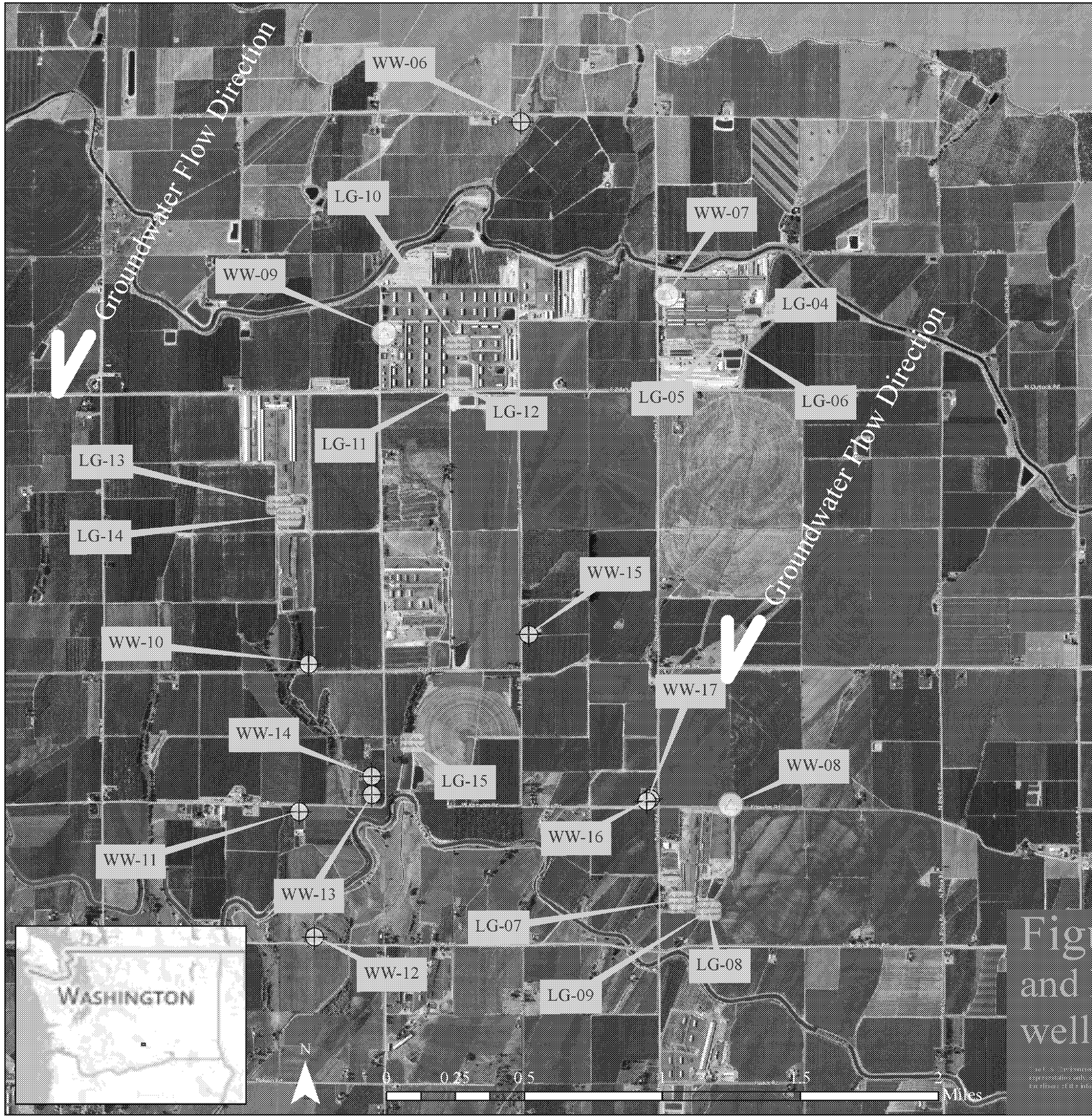


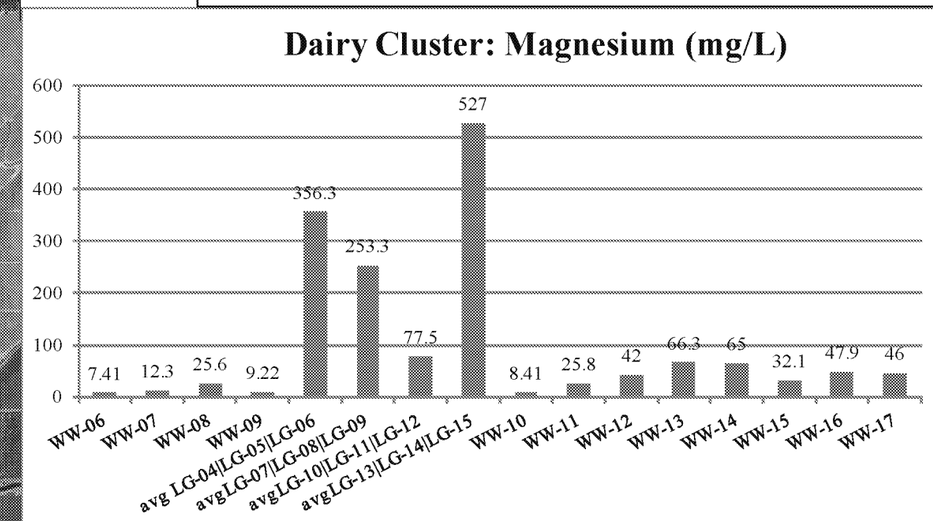
Figure 15a: Dairy Cluster- Calcium and Chloride Concentrations for water wells and lagoons



Sample Type

- Upgradient Well
- Lagoon
- Supply Well
- Downgradient Well

WW-06	Upgradient Well
WW-07, 08, 09	Supply Wells
LG-04 to LG-15	Dairy Lagoons
WW-10 to WW-17	Downgradient Wells



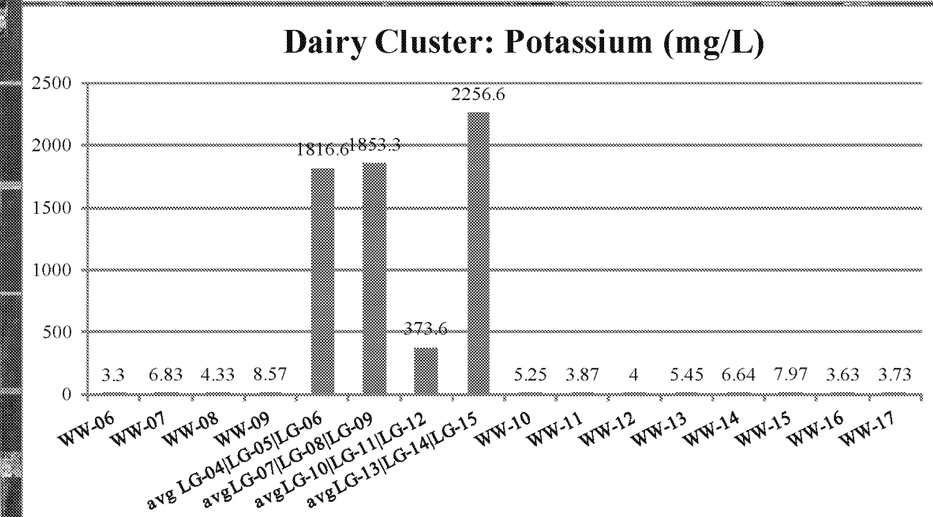
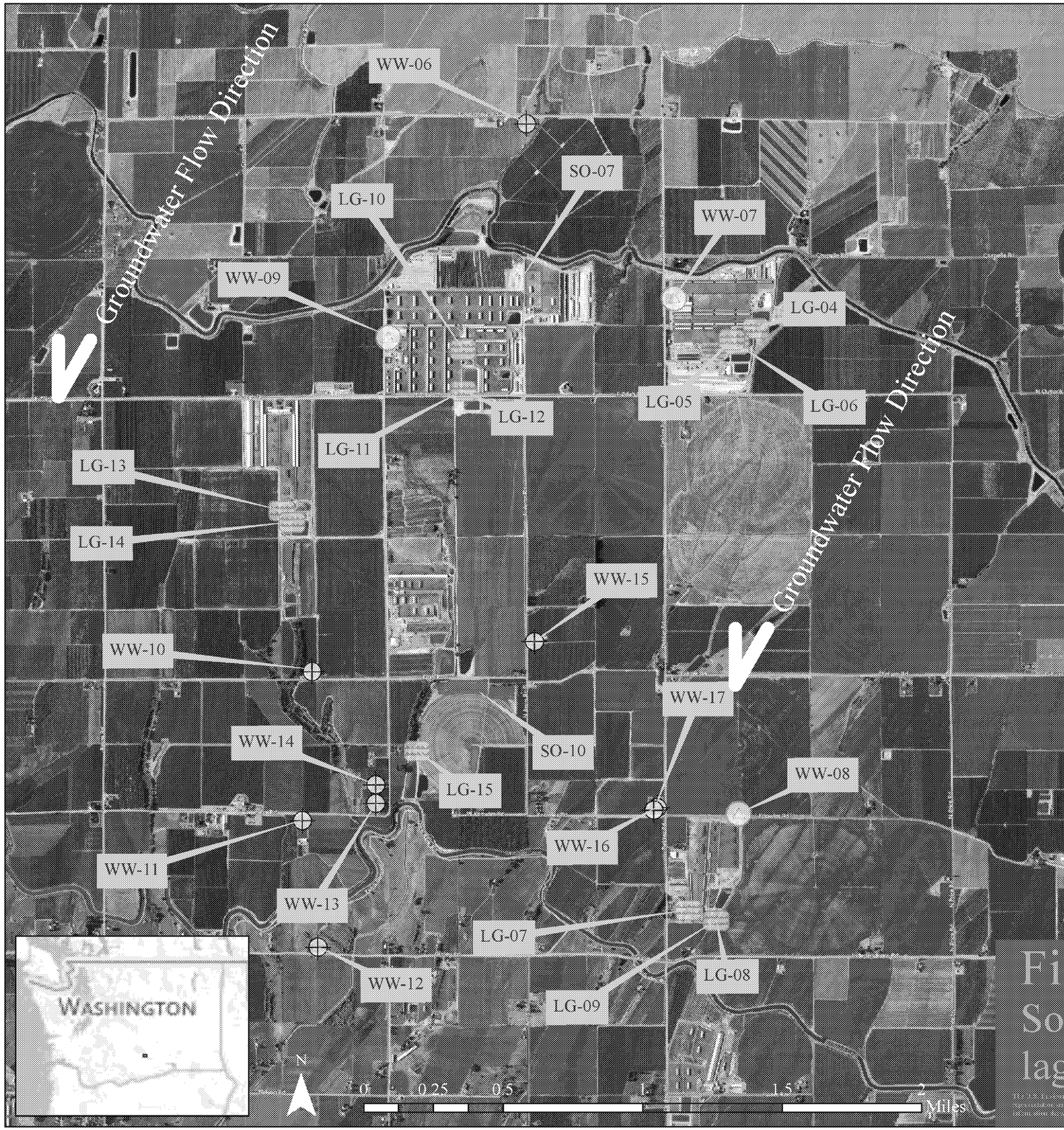
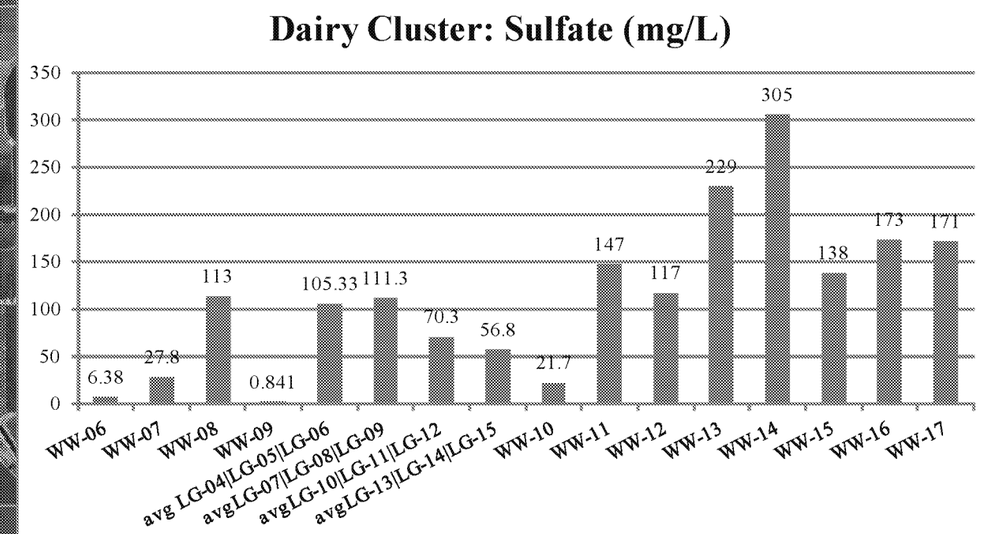


Figure 15b: Dairy Cluster- Magnesium and Potassium Concentrations for water wells and lagoons



Sample Type		
Upgradient Well	WW-06	Upgradient Well
Lagoon	WW-07, 08, 09	Supply Wells
Supply Well	LG-04 to LG-15	Dairy Lagoons
Downgradient Well	WW-10 to WW-17	Downgradient Wells



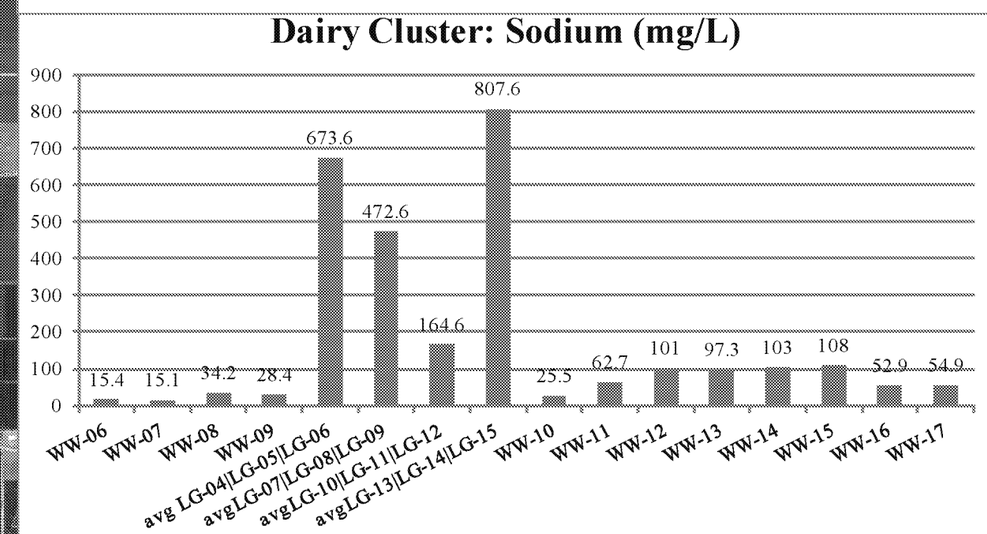


Figure 15c: Dairy Cluster- Sulfate and Sodium Concentrations for water wells and lagoons