

APPENDIX B

LISTS OF POTENTIAL CONTAMINANT

SOURCES BY RISK CATEGORIES

Potential Sources of Ground Water Contamination by Risk Category

Higher Risk Potential Contamination Sources for Ground Water PWS Systems

COMMERCIAL/INDUSTRIAL

- E Automobile Body shops
 - Gas stations
 - Repair shops
- E Chemical /petroleum processing/storage
- E *Sewer lines
- E Utility right-of-way/pesticide use
- E Chemical/petroleum pipelines
- E Wood/pulp/paper processing and mills
- E Dry cleaners
- E Electrical/electronic manufacturing
- E Fleet/trucking/bus terminals
- E Furniture repair/manufacturing
- E Home manufacturing
- E Junk/scrap/salvage yards
- E Machine shops
- E Metal plating/finishing/fabricating
- E Mines/sand or gravel excavations
- E Parking lots/malls (>50 spaces)
- E Photo processing/printing
- E Plastics/synthetics producers
- E Research laboratories

OTHER

- E Road salt storage areas
- E Military installations
(for classified risks not otherwise listed)

AGRICULTURAL/RURAL

- E Farm machinery repair
- E Rural machine shops
- E *Intensive livestock operations;
Lagoons, spray fields
- E Fertilizer, pesticide, and
petroleum
storage, distribution, handling,
mixing, and cleaning areas
- E*Sewage sludge (biosolids) storage,
handling, mixing and cleaning
areas
- E *Sewage sludge (biosolids) land
application
- E Unauthorized/illegal disposal of
wastes/chemicals

RESIDENTIAL/MUNICIPAL

- E Airports - maintenance/fueling areas
- E Railroad
yards/maintenance/fueling areas
- E Landfills/dumps
- E Utility stations - maintenance areas
- E *Septic systems - high density (>1/acre)
- E *Sewer lines
- E *Stormwater drains/discharges
- E Fertilizer, pesticide, sewage sludge

Notes: 1. This is a list of potential sources of contamination not a list of known databases of contaminants.

2. Higher risk potential contaminant sources are considered to have a higher potential for drinking water contamination than those designated moderate risk or lower risk Facility-specific management practices are not taken into account in estimating risks and assigning these categories.

3. An asterisk [*] indicates activities that may be associated with microbiological contamination.

Ground Water PWS Systems

Moderate Risk PCSs

COMMERCIAL/INDUSTRIAL

- E Car washes
- E Cement/concrete plants
- E Food processing
- E Hardware/lumber/parts stores

AGRICULTURAL/RURAL

- E *Auction lots
- E *Boarding stables
- E Crops, irrigated (berries, Christmas trees, hops, mint, orchards, vineyards, nurseries, greenhouses, vegetables, sod)
- NOTE: Drip-irrigated crops are considered lower risks.
- E Drinking water treatment plant residuals/sludge application

RESIDENTIAL/MUNICIPAL

- E Drinking water treatment plants
- E Golf courses
- E Housing - high density (>1 house/.5 acres)
- E Motor pools
- E Parks
- E Waste transfer/recycling stations
- Wastewater treatment plants
- collection stations

OTHER

- E Above ground storage tanks
- E Construction/demolition areas
- E Hospitals
- E Transportation corridors
- Freeways/state highways
- Railroads, Right-of-way maintenance (herbicide use areas)
- E Irrigation, water supply, or monitoring wells

Lower Risk PCSs

COMMERCIAL/INDUSTRIAL

- E Office buildings/complexes
- E RV/mini storage

AGRICULTURAL/RURAL

- E Crops, non-irrigated (grains, grass seeds, hay)
- E *Rangeland
- E Managed forests/silviculture

RESIDENTIAL/MUNICIPAL

- E Apartments and condominiums
- E Campgrounds/RV parks
- E Fire stations
- E Schools
- E Housing Blow density (< 1 house/.5 acres)

OTHER

- E Medical/dental offices/clinics
- E Veterinary offices/clinics

SOURCE: Adapted from EPA (1993), and from the Oregon Wellhead Protection Program

Potential Sources of Surface Water Contamination by Risk Category

Higher Risk Potential Contaminant Sources for Surface Water PWS Systems

COMMERCIAL/INDUSTRIAL

- E Automobile Body shops
 - Gas stations
 - Repair shops
- E Chemical /petroleum processing/storage
- E *Sewer lines
- E Utility right-of-way/pesticide use
- E Chemical/petroleum pipelines
- E Wood/pulp/paper processing and mills
- E Dry cleaners
- E Electrical/electronic manufacturing
- E Fleet/trucking/bus terminals
- E Furniture repair/manufacturing
- E Home manufacturing
- E Junk/scrap/salvage yards
- E Machine shops
- E Metal plating/finishing/fabricating
- E Mines/sand or gravel excavations
- E Parking lots/malls (>50 spaces)
- E Photo processing/printing

- E Plastics/synthetics producers
- E Research laboratories

OTHER

- E Road salt storage areas
- E Military installations
(for classified risks not otherwise listed)
- E Recreational use of motorized watercraft on surface waters

AGRICULTURAL/RURAL

- E Farm machinery repair
- E Rural machine shops
- E *Intensive livestock operations;
Lagoons, spray fields
- E Fertilizer, pesticide, and petroleum storage, distribution, handling, mixing, and cleaning areas
- E*Sewage sludge (biosolids) storage, handling, mixing and cleaning areas
- E *Sewage sludge (biosolids) land application
- E Unauthorized/illegal disposal of wastes/chemicals

RESIDENTIAL/MUNICIPAL

- E Airports - maintenance/fueling areas
- E Railroad yards/maintenance/fueling areas
- E Landfills/dumps
- E Utility stations - maintenance areas
- E *Septic systems - high density (>1/acre)
- E *Sewer lines
- E *Stormwater drains/discharges
- E Fertilizer, pesticide, sewage sludge

Notes: 1. This is a list of potential sources of contamination not a list of known databases of contaminants.

2. Higher risk potential contaminant sources are considered to have a higher potential

*for drinking water contamination than those designated moderate risk or lower risk
Facility-specific management practices are not taken into account in estimating risks and
assigning these categories.*

3. An asterisk [] indicates activities that may be associated with microbiological
contamination.*

Surface Water PWS Systems

Moderate Risk PCSs

COMMERCIAL/INDUSTRIAL

- E Car washes
- E Cement/concrete plants
- E Food processing
- E Hardware/lumber/parts stores

AGRICULTURAL/RURAL

- E *Auction lots
- E*Boarding stables
- E Crops, irrigated (berries, Christmas trees, hops, mint, orchards, vineyards, nurseries, greenhouses, vegetables, sod)
- NOTE: Drip-irrigated crops are considered lower risks.
- E Drinking water treatment plant residuals/sludge application
- E Managed forests/silviculture (logging operations)

RESIDENTIAL/MUNICIPAL

- E Drinking water treatment plants
- E Golf courses
- E Housing - high density (>1 house/.5 acres)
- E Motor pools
- E Parks
- E Waste transfer/recycling stations
- Wastewater treatment plants/collection stations

OTHER

- E Above ground storage tanks
- E Construction/demolition areas
- E Hospitals
- E Transportation corridors
 - Freeways/state highways
 - Railroads
 - Right-of-way maintenance (herbicide use areas)

Lower Risk PCSs

COMMERCIAL/INDUSTRIAL

- E Office buildings/complexes
- E RV/mini storage

AGRICULTURAL/RURAL

- E *Rangeland
- E Crops, non-irrigated (grains, grass seeds, hay)

RESIDENTIAL/MUNICIPAL

- E Apartments and condominiums
- E Campgrounds/RV parks
- E Fire stations
- E Schools
- E Housing Blow density (< 1 house/.5 acres)

OTHER

- E Medical/dental offices/clinics
- E Veterinary offices/clinics

SOURCE: Adapted from EPA (1993), and from the Oregon Wellhead Protection Program

