

## Chapter 9.25 - WATER SOURCE PROTECTION

### Section

#### Appendix A

##### 9.25.010 - Purpose and intent.

- A. This chapter shall be known as the Salt Lake County Water Source Protection Ordinance.
- B. The purpose of this chapter is to comply with Utah Code Ann., §19-4-113 requiring counties to adopt a water source protection ordinance to protect groundwater sources of public drinking water. This chapter establishes use districts, known as drinking water source protection zones, and surrounding groundwater sources used by public drinking water systems and also provides for the regulation of land uses within such protection zones to prevent pollution.
- C. Salt Lake County has the authority to adopt this chapter to facilitate the protection of groundwater source areas pursuant to the Safe Drinking Water Act, § 19-4-113; the County Land Use, Development and Management Act, §§ 17-27a-101, et seq.; the Local Health Department Act §§ 26A-1-101, et seq., Utah Code Ann., 1953 as amended; and Utah Admin. Code R309-600.

(Ord. No. 1677, § I, 5-11-2010)

##### 9.25.020 - Definitions.

- A. "Allowed uses" means a use, activity or practice allowed by this chapter which does not create a risk of pollution or contamination in the specified protection zone of such significance so as to require the implementation of regulatory requirements, best management practices or engineered controls.
- B. "Best management practices" means a practice or combination of practices determined by the division of drinking water to be an effective practicable means of conducting a land use activity to minimize the potential for becoming a pollution source.
- C. "Board of health" means the SLVHD Board of Health as created in Chapter 9.04 of the Salt Lake County Code of Ordinances.
- D. "Collection area" means the area surrounding a groundwater source which is underlain by collection pipes, tile, tunnels, infiltration boxes, or other groundwater collection devices.
- E. "Council" means the Salt Lake County Council.
- F. "Division of drinking water" means the Utah Department of Environmental Quality, Division of Drinking Water.
- G. "Groundwater source" means any well, spring, tunnel, adit or other underground opening from or through which ground water flows or is pumped from subsurface water bearing formations.
- H. "Land management strategy" means a written agreement, including but not limited to, a "land use agreement" as provided for in Utah Admin. Code R309-600-13(2)(d), wherein the landowner agrees to implement such land use restrictions, covenants, conditions or controls as may be required by a public water system to prevent the discharge of pollutants, contaminants or substances to groundwater. Such agreements must be recorded in the county recorder's office.
- I. "Pollution source" means point source discharges of contaminants to ground or surface water or potential discharges of the liquid forms of "extremely hazardous substances" which are stored in containers in excess of "applicable threshold planning quantities" as specified in SARA Title III. Examples of possible pollution sources include, but are not limited to, the following: storage facilities that store the liquid forms of extremely hazardous substances, septic tanks, drain fields, class V underground injection wells, landfills, open dumps, landfilling of sludge and septage, manure piles, salt piles, pit privies, drain lines and animal feeding operations with more than ten animal units.

The following definitions are part of R309-600 and clarify the meaning of "pollution source:"

- (1) "Animal feeding operation" means a lot or facility where the following conditions are met: animals have been or will be stabled or confined and fed or maintained for a total of forty-five days or more in any twelve-month period, and crops, vegetation forage growth, or post-harvest residues are not sustained in the normal growing season over any portion of the lot or facility. Two or more animal feeding operations under common ownership are considered to be a single feeding operation if they adjoin each other, if they use a common area, or if they use a common system for the disposal of wastes.
  - (2) "Animal unit" means a unit of measurement for any animal feeding operation calculated by adding the following numbers: the number of slaughter and feeder cattle multiplied by 1.0, plus the number of mature dairy cattle multiplied by 1.4, plus the number of swine weighing over fifty-five pounds multiplied by 0.4, plus the number of sheep multiplied by 0.1, plus the number of horses multiplied by 2.0.
  - (3) "Extremely hazardous substances" means those substances which are identified in the Sec. 302(EHS) column of the "TITLE III LIST OF LISTS - Consolidated List of Chemicals Subject to Reporting Under SARA Title III" (EPA 550-B-96-015).
- J. "Potential contamination source" means any facility or site which employs an activity or procedure which may potentially contaminate ground or surface water. A pollution source is also a potential contamination source.
- K. "Prohibited use" means a use, activity or practice which creates a substantial risk of pollution or contamination in the specified protection zone. A prohibited use is not permitted.
- L. "Public water system" means a system, either publicly or privately owned, providing water through constructed conveyances for human consumption and other domestic uses, which has at least fifteen service connections; or serves an average of at least twenty-five individuals daily at least sixty days out of the year and includes collection, treatment, storage or distribution facilities that have an approved drinking water source protection plan from the division of drinking water.
- M. "Restricted use" means a use associated with a "potential contamination source." A restricted use may be permitted only after review and recommendations are received from the affected public water system and the Salt Lake Valley Health Department.
- N. "SLVHD" means Salt Lake Valley Health Department.
- O. "Source protection zone" means the specified surface and subsurface area surrounding a groundwater source supplying a public water system, through which contaminants are reasonably likely to reach the groundwater source of drinking water.
- P. "Time of travel" "TOT" means the time required for a particle of water to move in the producing aquifer from a specific point to a ground water source of drinking water.

(Ord. No. 1677, § I, 5-11-2010)

#### 9.25.030 - Application.

This chapter applies to the incorporated and unincorporated areas of Salt Lake County except that it does not apply in a municipality that has adopted an ordinance in compliance with §19-4-113, Utah Code Ann., 1953 as amended. In addition, any municipal ordinance adopted pursuant to § 10-8-15 shall supersede this chapter to the extent the ordinances conflict.

(Ord. No. 1677, § I, 5-11-2010)

#### 9.25.040 - Establishment of drinking water source protection zones.

Source protection zones are hereby established regulating specified land uses and conditions in zones designated for the protection of groundwater sources of drinking water. The drinking water source protection zones are identified and described as follows:

- A. Protection zone one is the area within a one hundred-foot radius from the wellhead or margin of the collection area.
- B. Protection zone two is the area within a two hundred fifty-day groundwater TOT to the wellhead, or margin of the collection area, the boundary of the aquifer(s) which supplies water to the groundwater source, or the groundwater divide, whichever is closer as specified on the "drinking water source protection map" described in Section 9.25.060 herein.
- C. Protection zone three is the area within a three-year groundwater TOT to the wellhead, or margin of the collection area, the boundary of the aquifer(s) which supplies water to the groundwater source, or the groundwater divide, whichever is closer, as specified on the "drinking waters source protection map" described in Section 9.25.060 herein.
- D. Protection zone four is the area within a fifteen-year groundwater TOT to the wellhead, the boundary of the aquifer(s) [recharge area] which supplies water to the ground water source, or the groundwater divide, whichever is closer, as specified on the "drinking water source protection map" described in Section 9.25.060 herein.

(Ord. No. 1677, § I, 5-11-2010)

9.25.050 - Identification of public water systems and source protection plans.

Utah Administrative Code R309-600 requires public water systems to submit a drinking water source protection plan to the division of drinking water, for each of its groundwater sources of drinking water.

(Ord. No. 1677, § I, 5-11-2010)

9.25.060 - Drinking water source protection map.

- A. The planning and development services division shall incorporate the GIS data files received from the division of drinking water identifying groundwater sources and source protection zones based on the source protection plans submitted to the division of drinking water by public water systems, on a county map known as the "drinking water source protection map."
- B. The adoption and any amendments, additions or deletions to this map shall be made by the council on an annual basis.
- C. Before identifying specific protection zones on the drinking water source protection map, each public water system submitting a source protection plan to the division of drinking water shall be responsible for notifying landowners who may be affected by the plan. Challenges to the source protection zones shall be resolved by the public water system that provided the relevant source protection plan and, if necessary, the division of drinking water may assist with the resolution of any challenges to the source protection plans and delineated protection zones approved for the public water system.

(Ord. No. 1677, § I, 5-11-2010)

9.25.070 - Overlapping source protection zones.

- A. Public water systems with overlapping protection zones shall cooperate in resolving conflicts in the land management strategies contained in the applicable source protection plans. If necessary, the division of drinking water may assist with the resolution of any conflicts. In the event the challenge or

conflict in overlapping protection zones cannot be resolved in one hundred eighty days, the most restrictive provision shall apply.

- B. No permits or land use approvals including, but not limited to, a subdivision approval, conditional or permitted use approval, business license or building permit shall be issued pending the resolution of any challenges to the boundaries or conflict between overlapping protection zones.

(Ord. No. 1677, § I, 5-11-2010)

#### 9.25.080 - Allowed uses.

Each use established before the effective date of this section and uses incidental and accessory to such use may be continued in the same manner thereafter, provided that such use is not in violation of any other ordinance, health regulation nor determined by a court of competent jurisdiction to be a nuisance under the provisions of federal, state and local laws or health regulations. All new land uses, change of uses, or expansion of uses shall comply with this section.

(Ord. No. 1677, § I, 5-11-2010)

#### 9.25.090 - Restricted and prohibited uses.

- A. The matrix attached as Appendix "A" adopted in this chapter, identifies specified land uses and conditions which have the potential to pollute or contaminate groundwater sources.
- B. These land uses have been classified according to the potential risk of pollution or contamination posed by specified land uses and conditions in each of the four designated source protection zones as a "restricted" or "prohibited" use.
- C. Any use deemed a potential contamination source by the public water system or a regulatory agency not listed on the matrix shall be reviewed by the source protection technical advisory committee as provided for in Section 9.25.130.

(Ord. No. 1677, § I, 5-11-2010)

#### 9.25.100 - Drinking water source protection requirements.

Following the effective date of this section, no building permit or other form of approval required to develop or use real property in Salt Lake County shall be issued by the planning and development services division until the SLVHD determines that the proposed development or use of real property complies with the requirements of this section.

(Ord. No. 1677, § I, 5-11-2010)

#### 9.25.110 - Review of applications.

- A. Restricted use - a restricted use poses some risk of causing pollution or potential contamination in a specified protection zone. Following preliminary staff review of an application, the planning and development services division will request a verification of compliance from the SLVHD and from the appropriate public water system. The applicant shall submit to the appropriate public water system the best management practices and engineered and/or construction controls, or land management strategy to be implemented. Upon acceptance and approval, the appropriate public water system must issue a recommendation letter to the SLVHD listing the best management practices, engineered and/or construction controls, or land management strategy to be implemented as part of the recommendation. Any engineered and/or construction controls must be illustrated on the site

plan or construction drawings. A public water system shall respond to an applicant's best management practices, engineered and/or construction controls, or land management strategy within forty-five days of submission. If a public water system does not approve of the best management practices, engineered and/or construction controls, or land management strategy submitted by an applicant, or cannot come to an agreement on the issue, the public water system will submit the reason that approval is not given and provide recommendations for additions or changes. The recommendation must also comply with this chapter and any applicable SLVHD health regulations. The SLVHD shall review all recommendations received and specify the conditions of any approval before forwarding the approval to the planning and development services division.

Challenges to the best management practices, engineered and/or construction controls, land management strategy or other conditions recommended by a public water system may be appealed as provided for in Section 9.25.130 herein. The division of drinking water may assist the SLVHD in the resolution of an appeal challenging the recommendations of a public water system. No permits or land use approvals including, but not limited to, a subdivision approval, conditional or permitted use approval, business license or building permit shall be issued until such appeal has been resolved.

Every applicant having received a land use approval in accordance with this title shall re-submit to the responsible public water system their best management practices whenever significant changes or modifications are made and once every three years. Failure to do so may result in revocation of the land use permit.

- B. Prohibited use - a prohibited use poses a very high risk of causing pollution or potential contamination in the specified source protection zone. An application received by the planning and development services division for any permits or land use approvals including, but not limited to, a subdivision approval, conditional or permitted use approval, business license or building permit in a zone designated as prohibited shall be denied. If a denial is based on a prohibited use designation listed on the matrix within a specified source protection zone, the applicant may:
- (1) work with the public water system in the specified source protection zone to implement an acceptable engineered and/or construction control or a land management strategy; or
  - (2) appeal the denial to the SLVHD. The division of drinking water may assist the SLVHD, public water system, and applicant in the resolution of any appeal challenging a prohibited use.

(Ord. No. 1677, § I, 5-11-2010)

#### 9.25.120 - Administration.

The policies and procedures for the administration of any groundwater source protection zone established under this chapter shall be administered by the planning and development services division and the SLVHD as provided for in this chapter.

(Ord. No. 1677, § I, 5-11-2010)

#### 9.25.130 - Appeals process.

An applicant challenging the use restrictions imposed in a specified source protection zone, the best management practices, engineered and/or construction controls, conditions, or the denial of an application based on this chapter, may appeal by filing a written notice of appeal with the SLVHD within thirty days following the action. The public water system in the specified source protection zone must be made a party to the appeal.

The board of health shall appoint a source protection technical advisory committee. The purpose of the committee shall be to hear appeals filed by an applicant and to make recommendations to the board of health. The committee shall consist of a member from the planning and development services division,

a member from the environmental health division, a member from a public water system, a member from the division of drinking water, a member of the board of health, and a member from a municipality with extra-territorial jurisdiction. All appeals shall be governed by the adjudicative hearing procedures adopted by the board of health.

(Ord. No. 1677, § I, 5-11-2010)

9.25.140 - Enforcement.

A retail water supplier may seek enforcement of this chapter following the procedures provided for in § 19-4-113(3)(c), Utah Code Ann.

(Ord. No. 1677, § I, 5-11-2010)

9.25.150 - Effective date.

This chapter shall become effective fifteen days after its passage and upon at least one publication of the ordinance from which this chapter derives or a summary thereof in a newspaper published and having general circulation in Salt Lake County.

(Ord. No. 1677, § I, 5-11-2010)

**APPENDIX A**

The following table identifies uses which have varying potentials to contaminate groundwater sources. These uses have been classified according to the risk of contamination in each protection zone as follows:

Restricted (R)

Prohibited Uses (X)

Allowed (A)

**Appendix A  
Regulated Uses**

Potential Contamination Sources	Protection Zone		
	Zone 1	Zone 2	Zones 3 and 4
Agricultural pesticide, herbicide, and fertilizer storage, use, filling, and mixing areas	X	R	R
Agriculture experimental station	X	R	R
Airport maintenance and fueling sites	X	R	R

Animal byproduct plants; offal or dead animal reduction or dumping	X	X	R
Animal feeding operations with more than 10 animal units, including dairy, stockyard, etc	X	X	R
Animal hospital or clinic; veterinary office	X	R	A
Apiary (Bee yard)	X	R	A
Appliance repair (commercial)	X	R	A
Aviary	X	R	A
Baby diaper service	X	R	R
Beauty salons and barber shops	X	R	A
Beverage bottling facilities	X	R	R
Boat building and refinishing	X	R	R
Blacksmith shop	X	R	R
Blast furnace	X	R	R
Boilers	X	R	R
Bookbinding	X	R	A
Breweries	X	R	R
Campgrounds	X	R	A
Carpet, rug, and upholstery cleaning or dyeing	X	X	R
Car washes	X	R	A
Cemetery, mortuary, etc	X	R	R
Chemical reclamation facilities	X	X	R

Chemical storage or pipelines (Ref the hazardous materials and extremely hazardous material lists found in (40 CFR 261 and 355))	X	X	X
Chemigation wells	X	X	R
Coal and fuel yards	X	R	R
Coke ovens	X	R	R
Commercial and private recreation	X	R	R
Concrete, asphalt, and tar use, storage, or processing	X	R	R
Draying, freighting or trucking yard or terminal	X	R	R
Dry cleaners with chemicals on site	X	X	R
Dry cleaners without chemicals onsite	X	A	A
Embalming services	X	R	R
Equipment storage or rental yards	X	R	R
Fabrication, assembly and maintenance of business machines and/or electronic instruments, excluding processing and compounding of raw materials	X	R	R
Fabrication, assembly and treatment of articles of merchandise from previously prepared precious or semiprecious metals or stones	X	R	R
Farm dump sites	X	R	R
Farm maintenance garage	X	R	R
Fat rendering processes	X	X	R
Feed, cereal or flour mill	X	R	R
Fertilizer and soil conditioner manufacture, processing and/or sales	X	X	R
Firearms and/or archery range; Gun club	X	R	A

Food processing and meat packing facilities	X	R	R
Forest industry; production of forest products	X	R	R
Foundry	X	R	R
Fruit and vegetable storage and packing plant	R	R	R
Fuel, oil, and heating oil distribution and storage facilities	X	R	R
Fur farm	X	R	R
Furniture stripping, painting, and finishing business	X	R	R
Gasohol production for private use	X	R	R
Geothermal heat pumps, less than 30 feet deep	X	R	R
Geothermal heat pumps, more than 30 feet deep	X	X	X
Golf course	X	R	R
Grain storage elevator	X	R	R
Gravel pits; quarries; mines	X	R	R
Greenhouse or nursery	X	R	R
Hatchery	X	R	R
Home business	X	R	A
Hospitals and medical and dental clinics or offices	X	R	R
Hydroelectric dam	X	R	R
Impound lot	X	R	R
Improperly Abandoned wells	X	X	X

Incinerator	X	X	R
Industrial manufacturers of: chemicals, pesticides, herbicides, paper products, leather products, textiles, rubber, plastic, fiberglass, silicone glass, pharmaceuticals, and electrical equipment, etc.	X	R	R
Industrial waste disposal / impoundment areas	X	X	R
Junk and salvage yards	X	R	R
Laboratory which may include scientific research, investigation, testing or experimentation including prototype product development or incidental pilot plants	X	R	R
Landfills and transfer stations	X	X	R
Laundromats	X	R	R
Logging and lumber processing, provided evidence is presented of approval by any federal or state agencies with jurisdiction over such use	X	R	R
Machine shops, metal plating, heat treating, smelting, annealing, and descaling facilities	X	R	R
Manufacturing: any use which involves the assembly, compounding, fabrication, maintenance, packaging, processing, refining, storage, or treatment, etc of any product or substance. (all uses listed in the M-1 or M-2 zones which involve manufacturing)	X	R	R
Manure spreading, processing, drying and sales	X	X	R
Manure piles > than 20 cu. ft.	X	X	R
Meat products smoking, curing and packing	X	R	R
Medical, optical and dental laboratories	X	R	A
Metal plating; metal anodizing; metal polishing	X	R	R
Metals crushing for salvage; metals and metal products treatment and	X	R	R

processing			
Mine; quarry; gravel pit; mining operations; including crushers, concrete batching plants, asphalt plant or any type of oil or asphalt emulsion mixing operation	X	R	R
Mineral extraction and processing	X	R	R
Monument works	X	R	R
Motor vehicles, trailers, bicycles and machinery assembling, painting, upholstering, rebuilding, repairing, rentals, sales and reconditioning	X	R	R
Motor Vehicles: any use which involves motor vehicles: storage, maintenance, sales, car wash etc. Including boats, trailers etc. (any motorized vehicles)	X	R	R
Municipal wastewater treatment plants	X	R	R
Oil and/or gas storage and pipelines (excluding natural gas and propane)	X	R	R
Oil or lubricating grease compounding	X	X	R
Ore beneficiation	X	R	R
Organic disposal site	X	X	R
Other potential contamination sources	R	R	R
Outdoor chemical toilet use, storage,	X	R	R
Packaging facility	X	R	R
Paint store or paint shop of any kind, sign, auto body, etc	X	R	R
Park	X	R	R
Parking lot drainage	R	A	A
Pest extermination and control business	X	R	R

Petroleum refining or storage	X	R	R
Pharmacy	X	R	A
Photo processing and print shops	X	R	R
Planning mill	X	R	R
Printing and copying processes, including lithographing, engraving and photoengraving, etc	X	R	R
Public stable; riding academy; rodeo grounds	X	R	R
Publishing shop	X	R	R
Radiological materials mining, use , storage, or processing	X	R	R
Railroad yards, shop and/or roundhouse	X	X	R
Recreational grounds	X	R	A
Recreational vehicles campers, snowmobiles, etc.) use, storage	X	R	R
Recycling collection center	X	R	R
Residential pesticide, herbicide, and fertilizer storage, use, filling, and mixing areas	X	R	R
Rock crushing;	X	R	R
RV waste disposal stations	X	X	A
Salt and/or sand piles	X	R	R
Sand and gravel excavation and processing	X	R	A
Sandblasting	X	R	R
Sanitary landfill	X	X	R

Septic system (gray water) and black water holding tank	X	X	R
"Septic system, conventional" shall mean an underground wastewater disposal system for domestic wastewater. It consists of a building sewer, a septic tank and an absorption system.	X	X	R
Slaughterhouse; stockyard	X	X	X
Smelting or refining	X	R	R
Soil composting manufacture and sales	X	R	R
Solar evaporation pond for the processing of salt	X	R	R
Sportsman's kennel	X	R	R
Steel or iron mill	X	R	R
Storm water detention basin and snow storage sites	X	R	A
Swimming pool	X	R	R
Taxidermist	X	R	R
Tire store, or processing of any kind including re-treading, vulcanizing, etc	X	R	R
Underground record storage vaults	R	R	A
Underground storage tanks	X	R	R
Upholstering, including mattress manufacturing, rebuilding and renovating	X	R	R
Warehouse	X	R	R
Water treatment plant, pump station, or reservoir	X	R	R
Welding facilities	X	R	R
Wood preservative use, storage, or disposal	X	R	R

Worm farming	X	R	R
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(Ord. No. 1677, § I, 5-11-2010)