CLEAR CREEK COUNTY Public & Environmental Health	**Minimum Separation Distances**	**Appendix A**

Table A-1 – Minimum Horizontal Distances in Feet between Components of an OWTS and Water, Physical, and Health Impact Features

	Drinking water wells, springs, suction lines	Drinking water lines	Drinking water cisterns	Dwelling, occupied building	Property lines	Subsurface drains, dry well, storm water infiltration	Lake, water course, irrigation ditch, stream, wetland	Dry gulches, cutbank, fill area	Septic tank
Septic tanks, higher level treatment unit, dosing tanks, vault	50[1]	10[1]	25	5	10	10	50	10	-
Building sewer or effluent lines	50[1]	10[1]	25[1]	-	10	10[1]	50[1]	10[1]	-
STA trench or bed, unlined sand filter, sub-surface dispersal system, seepage pit	200[2] (100)[2,3,6]	25[1]	25	20	10	25	50[2,4]	25[5,7]	5
Lined sand filter, ET field or outside of berm lined wastewater pond	60	10[1]	25	15	10	10	25	10	5
Unlined sand filter in soil with a percolation rate slower than 60 minutes per inch, unlined or partially lined ET system, outside of berm unlined wastewater pond	100	25[1]	25	15	10	25	25[2]	15	10
Vault privy	50	10[1]	25	15	10	10	25	10	-

1. Crossings or encroachments may be permitted at the point as noted above provided that the water or wastewater conveyance pipe is encased for the minimum setback distance on each side of the crossing. A length of pipe shall be used with a minimum Schedule 40 rating of sufficient diameter to easily slide over and completely encase the conveyance. Rigid end caps of at least Schedule 40 rating shall be glued or secured in a watertight fashion to the end

of the encasement pipe. A hole of sufficient size to accommodate the pipe shall be drilled in the lowest section of the rigid cap so that the conveyance pipe rests on the bottom of the encasement pipe. The area in which the pipe passes through the end caps shall be sealed with an approved underground sealant compatible with the pipe being used.

2. Except for systems with effluent that meets TL3N treatment level, add eight (8) feet additional distance for each 100 gallons per day of design flows between 1,000 and 2,000 gallons per day, unless it can be demonstrated by a professional engineer or geologist by a hydrologic analysis or the use of a barrier, consisting of a minimum 30 mil PVC liner or equivalent, that contamination will be minimized.

3. Minimum setback of 100 feet permitted for systems receiving TL2N. TL3 or TL3N treatment level effluent.

4. Minimum setback of 25 feet permitted for systems receiving TL2N, TL3 or TL3N treatment level effluent.

5. Minimum setback of 10 feet permitted for systems receiving TL2N, TL3 or TL3N treatment level effluent.

6. Minimum setback of 100 feet permitted upon submission of a written report demonstrating compliance with the provisions of Appendix D.

7. The separation distance between the STA and the crest of a dry gulch or cut bank will be evaluated for potential erosion or slope instability; if there is potential for erosion or instability, the separation distance shall be increased until the risk is minimized.

Table A-2 – Minimum Vertical Separation between STA Infiltrative Surface and Groundwater or a Limiting Layer in Feet

	Treatment Levels				
Type of STA	**TL1**	**TL2**	**TL2N**	**TL3**	**TL3N**
Unlined Sand Filters	2	0[2]	0[2]	0[2]	0[2]
Trenches or Beds	4 (3)[1]	3	2	2	2

TABLE NOTES

1. If pressure dosed.
2. The bottom of the sand layer shall be at or above the high ground water surface or bedrock for installations in which effluent is percolated downward through the soil.