

Comments/Testimony

By

Real Edwards Conservation and Reclamation District

Relating to;

The need for the State to regulate the drilling of new wells within prescribed depths and distances of Texas rivers in order to prevent the draining of surface water from alluvial plains of river basins

Prepared for

The Senate Natural Resource Committee

Submitted: September 22nd, 2010

Honorable Senator Troy Fraser, Chair and members of the Senate Natural Resource Committee;

The Real Edwards Conservation and Reclamation District is located in Edwards and Real Counties. The headwaters to the Frio, Nueces, West Nueces, South Llano and a section of the Sabinal Rivers all start in the District. The District is aware of the critical environmental and economic importance of these rivers from their headwaters to the bays and estuaries into which they drain. The District is completely supportive of proposed legislation that would enable underground water districts to define "Critical Alluvial Management Zones" and adopt rules for the management of those zones. However, we are not in favor of legislation that would set arbitrary depths and distances from a stream or river on wells. We do not support any legislation that would set mandatory pumping limits on such wells. To set such limits would have a negative impact on the local economy.

Arbitrary depth and distance present problems. Along many sections of the streams and rivers within our district and other districts, there is no alluvium present and where the alluvium is present, it may extend only a short distance or it may extend outwards for almost a mile. Where present, the depth of the alluvium may be limited to only a few feet or it may extend downwards up to seventy feet. Therefore such arbitrary distance and depth restrictions are not needed in many areas and in some areas they may not extend to all areas needed. Simply said, a large (permitted) well could be placed six (6) inches outside the proposed boundary and there may be little a District can do to prevent it.

As to a specific distance, this tends to require an additional expense to the proposed well owner in that the standard distance mark in the State of Texas is the Gradient Boundary. We realize that the gradient boundary is the best legal description available to designate State Water and boundaries of that water. However, there appears to be different interpretations of that description as can be seen in the court cases since the "Gradient Boundary" definition was established by a 1923 US Supreme Court Decision¹. Even Texas Parks and Wildlife, one of the primary enforcement agencies regarding the boundary, says that "Surveying the gradient boundary is a complex task performable only by specially trained persons."² Such a survey would be an expensive undertaking.

¹ *Oklahoma v. Texas* 1923

² Taken from Texas Parks and Wildlife website

http://www.tpwd.state.tx.us/publications/nonpwdpubs/water_issues/rivers/navigation/riddell/gradientboundary.html

Another issue in dealing with distance from a stream is the formation in which it is to be completed. If the well is to be completed in a formation below an alluvium formation and that alluvium is sealed/cemented off, then there is no need to place a distance restriction on the well.

In addressing any gallon per minute (gpm) restrictions, it should be noted that in Real County with the exception of one, all public water supply wells are completed within alluvial formations. There are two basic reasons for this. First is related to costs. The cost difference between a public supply well in an alluvial formation and a deeper (Trinity well) can be as great as \$150,000.00. This additional cost would cause economic hardships on communities and subdivisions that are supplied by public water entities. It would also negate any future potential growth that would require additional public water supply wells. The second issue is the simple fact that in Real County, most of the deeper water is bad water with high dissolved salt and solids and sulfide contents that would require extensive/expensive treatment. Again, this adds to the cost and creates an economic hardship.

Underground water districts currently have the ability to place restrictions on wells that fall outside the State's definition of an Exempt Well³. However, Districts do not have the ability to regulate wells that meet the Exempt Well definition. Currently there is proposed legislation that would give districts within certain watersheds the ability to establish **Critical Alluvial Management Zones** and to regulate these "**Exempt Wells**" within those zones. By giving Districts the authority to define and then regulate Critical Alluvial Management Zones and by including the regulation of "Exempt Wells" within those zones, each District would have the ability to best manage the alluvium within their area and in doing so, to help maintain base flows to the streams and rivers within their area. The Real Edwards Conservation and Reclamation District supports this proposed legislation and has drafted rules that would limit wells within these zones to public supply, wells for camp grounds, and small domestic-livestock wells of no more than ten gallons per minute. A copy of that draft is attached for your reference.

Respectfully submitted

Real Edwards Conservation & Reclamation District

³ Water Code Chapter 36, Sec. 36.117. EXEMPTIONS; EXCEPTION; LIMITATIONS (copy attached)

Attachments

State Water Code Chapter 36, Sec. **6.117. EXEMPTIONS; EXCEPTION;
LIMITATIONS.**

**Proposed/Draft District Rules on Wells within Critical Alluvial Management
Zones**

Attachment 1

Chapter 36

Sec. 36.117. EXEMPTIONS; EXCEPTION; LIMITATIONS.

- (a) A district may exempt wells from the requirement of obtaining a drilling permit, an operating permit, or any other permit required by this chapter or the district's rules.
- (b) A district may not require any permit issued by the district for:
 - (1) a well used solely for domestic use or for providing water for livestock or poultry on a tract of land larger than 10 acres that is either drilled, completed, or equipped so that it is incapable of producing more than 25,000 gallons of groundwater a day;
 - (2) the drilling of a water well used solely to supply water for a rig that is actively engaged in drilling or exploration operations for an oil or gas well permitted by the Railroad Commission of Texas provided that the person holding the permit is responsible for drilling and operating the water well and the well is located on the same lease or field associated with the drilling rig; or
 - (3) the drilling of a water well authorized under a permit issued by the Railroad Commission of Texas under Chapter 134, Natural Resources Code, or for production from such a well to the extent the withdrawals are required for mining activities regardless of any subsequent use of the water.
- (c) A district may not restrict the production of any well that is exempt from permitting under Subsection (b)(1).
 - (d) Notwithstanding Subsection (b), a district may require a well to be permitted by the district and to comply with all district rules if:
 - (1) the purpose of a well exempted under Subsection (b)(2) is no longer solely to supply water for a rig that is actively engaged in drilling or exploration operations for an oil or gas well permitted by the Railroad Commission of Texas; or
 - (2) the withdrawals from a well exempted under Subsection (b)(3) are no longer necessary for mining activities or are greater than the amount necessary for mining activities specified in the permit issued by the Railroad Commission of Texas under Chapter 134, Natural Resources Code.
- (e) An entity holding a permit issued by the Railroad Commission of Texas under Chapter 134, Natural Resources Code, that authorizes the drilling of a water well shall report monthly to the district:

- (1) the total amount of water withdrawn during the month;
 - (2) the quantity of water necessary for mining activities; and
 - (3) the quantity of water withdrawn for other purposes.
- (f) Notwithstanding Subsection (d), a district may not require a well exempted under Subsection (b)(3) to comply with the spacing requirements of the district.
- (g) A district may not deny an application for a permit to Drill and produce water for hydrocarbon production activities if the application meets all applicable rules as promulgated by the district.
- (h) A water well exempted under Subsection (a) or (b) shall:
- (1) be registered in accordance with rules promulgated by the district; and
 - (2) be equipped and maintained so as to conform to the district's rules requiring installation of casing, pipe, and fittings to prevent the escape of groundwater from a groundwater reservoir to any reservoir not containing groundwater and to prevent the pollution or harmful alteration of the character of the water in any groundwater reservoir.
- (i) The driller of a well exempted under Subsection (a) or (b) shall file the drilling log with the district.
- (j) A well to supply water for a subdivision of land for which a plat approval is required by Chapter 232, Local Government Code, is not exempted under Subsection (b).
- (k) Groundwater withdrawn from a well exempt from permitting or regulation under this section and subsequently transported outside the boundaries of the district is subject to any applicable production and export fees under Sections 36.122 and 36.205.
- (l)** This chapter applies to water wells, including water wells used to supply water for activities related to the exploration or production of hydrocarbons or minerals. This chapter does not apply to production or injection wells drilled for oil, gas, sulphur, uranium, or brine, or for core tests, or for injection of gas, saltwater, or other fluids, under permits issued by the Railroad Commission of Texas.

Added by Acts 1995, 74th Leg., ch. 933, Sec. 2, eff. Sept. 1, 1995.
Amended by Acts 1997, 75th Leg., ch. 1010, Sec. 4.32, eff. Sept. 1, 1997; Acts 1999, 76th Leg., ch. 239, Sec. 1, eff. Sept. 1, 1999;
Acts 2001, 77th Leg., ch. 966

Attachment 2

Draft Rule Regarding Completion of wells within alluvial aquifers and/or alluvial formations with the District

RULE 7.3 EXCLUSIONS AND EXEMPTIONS

The District will not require an Operating Permit for any of the following (provided, however, that the following must be registered in accordance with Rule 5.2 above and remain subject to the other requirements of these Rules):

- A. The District may not require an Operating Permit for ~~drilling or~~ producing from a well used solely for domestic use or for providing water for livestock or poultry on a tract of land larger than 10 acres that is either drilled, completed or equipped so that it is incapable of producing more than 25,000 gallons of groundwater a day (36.117(b)(1)).
- B. The District may not require an Operating Permit for drilling or producing from a well for groundwater used to supply water for hydrocarbon production in accordance with 36.117(b)(2) and (3), except that permits may be required by the District for water wells drilled for hydrocarbon production under conditions defined in 36.117(d)(1) and (2).
- C. In addition to the exceptions required by law in Texas Water Code, Section 36.117 and by Section 7.4 (A) and (B) of these Rules, the District also excludes from requiring an Operating Permit for ~~drilling or~~ producing from a well:
 - i. on lot sizes of ten (10) acres or fewer insofar as there shall be only one well per lot that is either drilled, completed or equipped so that it is incapable of producing more than 25,000 gallons of groundwater a day and the well is used to supply groundwater for five or fewer households if each of the households is for the well owner, a person related to the well owner within the second degree of affinity or consanguinity, or an employee of the well owner and the water is for Domestic Use only. Except that wells completed within an established alluvial management zone shall be limited to no more than ten (10) gpm as required in Rule 13.4.2
 - ii. that is equipped so that it is incapable of producing greater than 25,000 gallons per day and is used to supply water for Camp Grounds, Beds and Breakfast, Hunting Camps and other such related activities
- D. A well to supply water for a subdivision of land for which plat approval is required by Chapter 232, Local Government Code, is not exempted under Subsections A and C above.

- E. Nothing in the exemptions of (A) and (C) above can be construed to allow waste of groundwater.
- F. At any time the production of a well exempted or excluded by Subsections (A), (B) and (C) is used for purposes other than those stated in Subsections (A), (B) and (C), the well is no longer exempted or excluded and application must be made for an Operating Permit
- G. Water wells exempted under this section shall be equipped and maintained so as to conform to District Rule 13.4 **STANDARDS OF COMPLETION FOR DOMESTIC, INDUSTRIAL, INJECTION, AND IRRIGATION WELLS**

RULE 13.4.2 Completion Standards for wells drilled in an alluvial management zone in Edwards and Real County.

- (a) Wells completed in an alluvial management zone herein listed in 13.4.2 above shall be limited to “Exempt Wells” or “Excluded Wells” as defined in Section 1 of these rules and shall be equipped so as to be incapable of producing more than ten (10) gallons per minute.
- (b) Wells completed to depths at a depth past the alluvial management zone herein listed in 13.4.2 above are exempt from 13.4.2, (a). However such wells shall:
 - (i) seal/cement the well to a depth of fifty feet (50 ft) or to a depth beyond the alluvial management zone, whichever is greater to insure no contribution to the well from said alluvial zone; and
 - a. meet all other requirements herein listed in these rules.
- (c) except that public water supply wells and wells listed in rule 7.3 C. (ii) shall be not be required to meet 13.4.2 (a) of this section