

EXHIBIT A

TITLE 312 NATURAL RESOURCES COMMISSION

Final Rule
LSA Document #14-204(F)

DIGEST

Amends 312 IAC 12-2-4 to specify minimum pump setting depths for small capacity water wells that must be met to qualify for protection under IC 14-25-4. Amends 312 IAC 13-8-1 to help implement IC 25-39 for the use of high solids bentonite grout containing graphite, and other neat cement based geothermal grouts, for vertical closed loop geothermal systems to enhance thermal conductivity and pumpability of the grout material. Effective 30 days after filing with the Publisher.

312 IAC 12-2-4; 312 IAC 13-8-1

SECTION 1. 312 IAC 12-2-4 IS AMENDED TO READ AS FOLLOWS:

312 IAC 12-2-4 Duty of water well drillers and water well pump installers to notify; water wells not conforming to this article

Authority: IC 14-10-2-4; IC 14-25-4-13; IC 14-25-4-17

Affected: IC 14-25-4; IC 25-39

Sec. 4. (a) Before a ground water withdrawal facility that would not comply with IC 14-25-4 and this article is drilled or equipped, a water well driller or a plumbing contractor water well pump installer must:

(1) advise a person, for whom a ground water withdrawal facility is drilled or equipped, of the provisions of IC 14-25-4 and this article; before the ground water withdrawal facility is drilled or equipped; and

(2) obtain approval from the division for the installation of a water well or pumping equipment that does not comply with IC 14-25-4 and this article.

(b) A person may authorize a water well driller or a plumbing contractor water well pump installer to drill or equip a water well in a manner that does not conform to this article if the water well is drilled or equipped in a manner which otherwise conforms to otherwise conform to IC 25-39 and 312 IAC 13. A water well authorized under this subsection section is not unlawful, but the relief provided by IC 14-25-4 is unavailable to the owner of the well. (*Natural Resources Commission; 312 IAC 12-2-4; filed Feb 9, 1999, 5:08 p.m.: 22 IR 1952; filed Feb 7, 2000, 3:31 p.m.: 23 IR 1367; readopted filed Aug 4, 2005, 6:00 p.m.: 28 IR 3661; readopted filed Jul 28, 2011, 10:29 a.m.: 20110824-IR-312110177RFA*)

SECTION 2. 312 IAC 13-8-1 IS AMENDED TO READ AS FOLLOWS:

312 IAC 13-8-1 Geothermal heat pump wells

Authority: IC 14-10-2-4; IC 25-39-4-2; IC 25-39-4-9

Affected: IC 25-39

Sec. 1. (a) This section establishes standards for drilling ground water heat pump systems that are in addition to the general requirements for drilling a well under 312 IAC 12.

(b) If a return well is used with an open loop system, its design shall must provide a water transmitting capacity that is at least one and one-half (1 1/2) times the required water supply of the heat pump unit.

(c) With respect to a vertical closed loop system, boreholes shall must be pressure grouted from the bottom of the borehole to the ground surface with a neat cement or high solids bentonite grout that, ~~may contain sand~~ to enhance thermal conductivity, may contain any of the following:

(1) Sand.

(2) Graphite.

(3) Another material approved by the division.

(Natural Resources Commission; 312 IAC 13-8-1; filed Nov 22, 1999, 3:34 p.m.: 23 IR 770; readopted filed Aug 4, 2005, 6:00 p.m.: 28 IR 3661; filed Jul 14, 2006, 1:23 p.m.: 20060809-IR-312050341FRA; readopted filed May 20, 2011, 3:28 p.m.: 20110615-IR-312110002RFA)