IDAPA 20
TITLE 07
CHAPTER 02

20.07.02 - RULES GOVERNING CONSERVATION OF OIL AND NATURAL GAS IN THE STATE OF IDAHO

SUBCHAPTER A - GENERAL PROVISIONS

000. LEGAL AUTHORITY.
This Chapter is adopted under the legal authorities of Title 47, Chapter 3, Idaho Code; and Title 67, Chapter 52, Idaho Code. (4-11-15)

001. TITLE AND SCOPE.

01. Title. These rules shall be cited as IDAPA 20.07.02, "Rules Governing Conservation of Oil and Natural Gas in the State of Idaho." (3-29-12)

02. Scope. These rules apply to the exploration and extraction of any and all crude oil and natural gas resources in the state of Idaho, not including biogas, manufactured gas, or landfill gas, regardless of ownership. (3-29-12)

03. Other Laws. Owners or operators engaged in the exploration and extraction of crude oil and natural gas resources shall comply with all applicable laws and rules of the state of Idaho including, but not limited to the following: (3-29-12)

a. Idaho water quality standards and waste water treatment requirements established in Title 39, Chapter 1, Idaho Code; IDAPA 58.01.02, "Water Quality Standards"; IDAPA 58.01.16, "Wastewater Rules"; and IDAPA 58.01.11, "Ground Water Quality Rule," administered by the IDEQ. (3-29-12)

b. Idaho air quality standards established in Title 39, Chapter 1, Idaho Code and IDAPA 58.01.01 "Rules for the Control of Air Pollution in Idaho," administered by the IDEQ. (3-29-12)

c. Requirements and procedures for hazardous and solid waste management, as established in Title 39, Chapter 44, Idaho Code, and rules promulgated thereunder including IDAPA 58.01.05, "Rules and Standards for Hazardous Waste"; IDAPA 58.01.06, "Solid Waste Management Rules"; and IDAPA 58.01.10, "Rules Regulating the Disposal of Radioactive Materials Not Regulated Under the Atomic Energy Act of 1954, As Amended," administered by the IDEQ. (3-29-12)

d. Idaho Stream Channel Protection Act, Title 42, Chapter 38, Idaho Code, and rules promulgated thereunder including IDAPA 37.03.07, "Stream Channel Alteration Rules," administered by the IDWR. (3-29-12)

e. Injection Well Act, Title 42, Chapter 39, Idaho Code and rules promulgated thereunder including IDAPA 37.03.03, "Rules and Minimum Standards for the Construction and Use of Injection Wells," administered by the IDWR. (3-29-12)

f. Department of Water Resources – Water Resource Board Act, Title 42, Chapter 17, Idaho Code and rules promulgated thereunder including IDAPA 37.03.06, "Safety of Dams Rules," administered by the IDWR. (3-29-12)

002. WRITTEN INTERPRETATIONS.
The Idaho Department of Lands maintains written interpretations of its rules which may include, but may not be limited to, written procedures manuals and operations manuals and other written guidance which pertain to the interpretation of the rules of this chapter. Copies of the procedures manuals and operations manuals and other written interpretations, if applicable, are available for public inspection and copying at the director's office of the Idaho Department of Lands, 300 North 6th Street, Suite 103, Boise, Idaho. (3-29-12)

003. ADMINISTRATIVE APPEALS.
Any person aggrieved by any final decision or order of the Commission shall be entitled to judicial review pursuant to the provisions of Title 67, Chapter 52, Idaho Code, Title 47, Chapter 3, Idaho Code~~, and IDAPA 20.07.01, "Rules of Practice and Procedure before the Idaho Oil and Gas Conservation Commission."~~. ~~(4-11-15)~~(_____)

004. INCORPORATION BY REFERENCE.
The following documents are incorporated by reference into these rules: (3-29-12)

01. API Bulletin E3, Well Abandonment and Inactive Well Practices for U.S. Exploration and Production Operations, Environmental Guidance Document. 1st Edition, January 1993 and Reaffirmed June 2000 available at the office of the Idaho Department of Lands at 300 North 6th Street, Suite 103. (3-29-12)

02. API SPEC 5CT, Specifications for Casing and Tubing. The ~~8th~~9th edition dated July**,** ~~**1, 2005**~~2011 and the amendments ~~**dated March, 31, 2006 and April, 7, 2006**~~and Errata through September 2012 are available at the office of the Idaho Department of Lands at 300 North 6th Street, Suite 103. ~~(3-29-12)~~(_____)

03. API SPEC 10a, Specification for Cements and Materials for Well Cementing. The 24th Edition dated December, 2010 is available at the office of the Idaho Department of Lands at 300 North 6th Street, Suite 103. (3-29-12)

04. ASTM D698-~~07e1~~12e2, Standard Test Methods for Laboratory Compaction Characteristics of Soil Using Standard Effort (12,400 ft-lbf/ft3 (600 kN-m/m3)). ~~2007~~2012 revision. Available at the office of the Idaho Department of Lands at 300 North 6th Street, Suite 103. ~~(3-29-12)~~(_____)

05. ~~**ASTM D1250-08, Standard Guide for Use of the Petroleum Measurement Tables**. 2008 revision~~ASTM D1250-08(2013)e1, Standard Guide for Use of the Petroleum Measurement Tables. 2013 revision. Available at the office of the Idaho Department of Lands at 300 North 6th Street, Suite 103. ~~(3-29-12)~~(_____)

06. Adjunct to D1250-04 Temperature and Pressure Volume Correction Factors for Generalized Crude Oils, Refined Products, and Lubricating Oils. 2004 revision. Available at the office of the Idaho Department of Lands at 300 North 6th Street, Suite 103. (_____)

~~06~~07. ASTM D1557-~~09~~12e1, Standard Test Methods for Laboratory Compaction Characteristics of Soil Using Modified Effort (56,000 ft-lbf/ft3 (2,700 kN-m/m3)). ~~2009~~2012 revision. Available at the office of the Idaho Department of Lands at 300 North 6th Street, Suite 103. ~~(3-29-12)~~(_____)

~~07~~08. EPA SW-846 Method 9090A, Compatibility Test for Wastes and Membrane Liners. Revision 1, July 1992. Available at the office of the Idaho Department of Lands at 300 North 6th Street, Suite 103 and this website:~~http://www.epa.gov/osw/hazard/testmethods/sw846/pdfs/9090a.pdf~~ https://www.epa.gov/sites/production/files/2015-12/documents/9090a.pdf. ~~(3-29-12)~~(_____)

~~08~~09. OSHA Standard 1910.1200 (Hazard Communication). Last revised ~~1996~~2012. Available at the office of the Idaho Department of Lands at 300 North 6th Street, Suite 103 and this website: http://www.osha.gov/pls/oshaweb/owadisp.show_document?p_table=standards&p_id=10099. ~~(3-29-12)~~(_____)

005. OFFICE -- OFFICE HOURS -- MAILING ADDRESS AND STREET ADDRESS.
The principal place of business of the Idaho Department of Lands is 300 North 6th Street, Suite 103, Boise, Idaho and it is open from 8 a.m. to 5 p.m., Monday through Friday, except legal holidays. The mailing address is: Idaho

Comment [e1]: Is a more specific reference to 47-3 needed? Is this covered by ARRF? May create the impression that the process is under 67-52 and not 47-3.
A: Specific references may create gaps and some grey areas remain in what process applies in every circumstance. No change to proposed language, May 27.
20.07.01 will be proposed for repeal because it has been superceded by the above sections of code, so reference to it should be deleted here. June 23.

Comment [e2]: Is the 2004 the most current version?
A: Yes. No change to proposed language, May 27.

Comment [e3]: What do other agencies for email addresses?
A: Some agencies have a general email address that is referenced in rule, and some have a website address. We will include a website address, from which the Department or the Commission may be contacted. Done, June 23.

Department of Lands, P.O. Box 83720, Boise, Idaho 83720-0050. The telephone number of the office is (208) 334-0200 and the fax number is (208) 334-23393698. The Idaho Oil and Gas Conservation Commission's official website is http://www.idl.idaho.gov/oil-gas/commission/index.html. (3-29-12)( )

006. PUBLIC RECORDS ACT COMPLIANCE.
All records relating to this chapter are public records except to the extent such records are by law exempt from disclosure. Information obtained by the Department under these rules is subject to public disclosure pursuant to the provisions of Title 74, Chapter 1, Idaho Code. Upon request in any application or material submitted to the Department, confidentiality protection shall be provided for information by law exempt from disclosure, and only those parts of an application or other materials that are by law exempt from disclosure can be held as confidential. All claims of exemption from disclosure must include a specific citation under which the Department should withhold the information from a public records request, and how the information meets the standards for being withheld from disclosure. When a portion of a record or a portion of a page in that record is subject to disclosure and the other portion is subject to a claim that it is a trade secret from disclosure under Title 74, Chapter 1, Idaho Code, the person making the claim shall clearly identify the two portions at the time of submittal. (4-11-15)( )

007. -- 009. (RESERVED)

010. DEFINITIONS.

01. **Act**. The Idaho Oil and Gas Conservation Act, Title 47, Chapter 3, Idaho Code. (10-21-92)

02. **Active Well**. A permitted well used for production, disposal, or injection that is not idled for more than twenty-four (24) continuous months. (3-29-12)

03. **Annulus**. The void between any piping, tubing or casing and the piping, tubing, casing or borehole immediately surrounding it. ( )

03. **ASTM D1250 Tables**. Adjunct to D1250-04 Temperature and Pressure Volume Correction Factors for Generalized Crude Oils, Refined Products, and Lubricating Oils, and ASTM D1250-08(2013)e1, Standard Guide for Use of the Petroleum Measurement Tables, all published by ASTM International. ( )

0304. **Barrel**. Forty-two (42) U. S. gallons at sixty (60) Degrees F and 14.696 psiatmospheric pressure.

0405. **Blowout**. An unplanned sudden or violent escape of fluids from a well. (3-29-12)

0506. **Blowout Preventer**. A casinghead control equipped with special gates or rams that can be closed and sealed around the drill pipe, or that otherwise completely closes the top of the casing. (4-11-15)

0607. **Bonus Payment**. Monetary consideration that is paid by the lessee to the lessor for the execution of an oil and gas lease. (4-11-15)

09. **Borehole**. The hole created by the drill bit during drilling prior to casing being placed. ( )

0708. **Casing Pressure**. The pressure within the casing or between the casing, tubing, or drill pipe. (3-29-12)

0809. **Casinghead**. A metal flange attached to the top of the conductor pipe that serves several purposes including, but not limited to, the following: ( )

a. is theThe primary interface for the diverter system during drilling out for surface casing.; ( )

b. The adapter between the conductor pipe and the blowout preventer stack; and ( )

c. The adapter between the conductor pipe and the wellhead after completion. (3-29-12)( )

Comment [e4]: Does IDL have the authority to do rules on Public Records Act? Should the rule instead refer to "exempt from disclosure..."? Unreasonable is also not defined. Whose burden is it to prove the info is exempt? DEQ language in 74-114 may provide a guide.
A: Language modified to use "exempt from disclosure", which is the same term in the Public Records Act. Unreasonable is also removed. IDL has authority to place requirements on documents submitted under Idaho Code § 47-3. Done, July 5

Comment [e5]: Should the process for resolving disagreements be put into rule? Notice should be given to record owner, and opportunity to keep records withheld. Statute or rule?
A: The Department prefers to keep this as a policy at this time until a process is vetted through use. Policy is currently being written. Done, July 5.

Comment [e6]: Annulus and borehole definitions are needed. Wikipedia definition is okay for annulus. Desk and Derrick, Schlumberger, may also have them.
A: Done, May 27.
Flowback water definition needed to distinguish from formation water.
A: Flowback comes from well stimulations, but it is not used anywhere in the rules. Formation water is used in Subsections 341.06, 400.01, and 400.03, but appears to be self explanatory. No change to proposed language, May 27.
Geophone and vibroseis is used in geophysical surveys and should be defined.
A: Done, May 27.

Comment [e7]: Should instead refer to ASTM standard tables.
A: Specific pressure added to be more precise. This is the API standard. Done, May 27.

Comment [jat8]: added June 24

DRAFT

~~**09. Casinghead Gas**. Any gas or vapor, or both, indigenous to an oil stratum and produced from such stratum with oil. (3-29-12)~~

10. Commission. The Oil and Gas Conservation Commission of the state of Idaho. (10-21-92)

11. Common Source of Supply. The geographical area or horizon definitely separated from any other such area or horizon and which contains, or from competent evidence appears to contain, a common accumulation of oil or gas or both. Any oil or gas field or part thereof which comprises and includes any area which is ~~underlaid~~underlain, or which from geological or other scientific data or experiments or from drilling operations or other evidence appears to be ~~underlaid~~underlain by a common pool or accumulation of oil or gas or both oil and gas. ~~(3-29-12)~~(_____)

12. Completion. A single operation involving the installation of equipment in and on a well, after drilling and evaluating the well, to bring the well into production from one or more zones. An oil well shall be considered completed when the first new oil is produced through wellhead equipment into lease tanks from the ultimate producing interval after the production casing has been run. A gas well shall be considered completed when the well is capable of producing gas through wellhead equipment from the ultimate producing zone after the production casing has been run. (3-29-12)

13. Conductor Pipe. The first and largest diameter string of casing to be installed in a well. This casing extends from land surface to a depth great enough to keep surface waters from entering and loose earth from falling in the hole and to provide anchorage for the diverter system prior to setting surface casing. (3-29-12)

14. Cubic Foot of Gas. The volume of gas contained in one (1) cubic foot of space at a standard pressure base and a standard temperature base. The standard pressure base shall be ~~fourteen and seventy-three hundredths (14.73) pounds per square inch absolute~~14.696 psi and the standard temperature base shall be sixty (60) Degrees F. ~~(3-29-12)~~(_____)

15. Day. A period of twenty-four (24) consecutive hours from 8 a.m. one day to 8 a.m. the following day. (3-29-12)

16. Department. The Idaho Department of Lands ~~or its designee~~. ~~(3-29-12)~~(_____)

17. Development. Any work which actively promotes bringing in production. (10-21-92)

18. Director. The head of the Idaho Department of Lands and secretary to the Oil and Gas Conservation Commission, or his designee. (3-29-12)

~~**19. Drilling Logs**. The recorded description of the lithologic sequence encountered in drilling a well, and any electric, gamma ray, geophysical, or other logging done in the hole. (3-29-12)~~

19. Drill Cuttings. Rock chips and ground up rock materials obtained through the drilling process and screened out of the drilling mud. (_____)

20. Drill Pad. The constructed or leveled area upon which an oil and gas well is drilled. (_____)

21. Drilling Mud. A mixture of fluids and additives that are used in the drilling process to cool and lubricate and clean the drilling bit, bring the rock chips and ground up rock materials to the surface, form a mudcake on the inside of the borehole to prevent caving and fluid interactions with the surrounding formations, and provide for well control. (_____)

22. Exceptional Well Location. An oil or gas well that does not meet the well location requirements in Sections 120.01 or 120.02 of these rules or any field spacing order. (_____)

~~23. Field. **The general area underlaid by one (1) or more pools.** (10-21-92)~~

~~21~~**24. Fresh Water**. All surface waters and those ground waters that are used, or may be used in the future,

Comment [jat9]: added June 24.

Comment [e10]: Conflict with definition 59? This one should control.
A: This is the API standard. Done, May 27.

Comment [e11]: Change "from" to "upon".
A: Done, May 27.

Comment [e12]: Should petroleum based muds be prohibited in conductor and surface casing? Usually mud not used in drilling a hole for conductor casing. It may be used for surface casing, but IDWR reviews all permits for potential impacts to water quality.
A: The mud program is reviewed when drilling applications are submitted. No other changes needed here. May 27.

Comment [e13]: Add "and form a mudcake on inside of borehole to prevent caving and fluid interactions, and well control.
A: Done, May 27

Comment [e14]: Statute refers to "exceptional well location", page 17 refers to" exception to well locations".
A: Changes made throughout rule to use exceptional well location. Done, May 27.

Comment [e15]: Deleted because this is defined in statute.

for drinking water, agriculture, aquaculture, or industrial purposes other than oil and gas development. The possibility of future use is based on hydrogeologic conditions, water quality, future land use activities, and social/economic considerations. (3-29-12)

~~22~~**25.** **Gas-Oil Ratio**. The ratio of the volume of gas produced in standard cubic feet to each barrel of oil or condensate produced concurrently during any stated period. ~~(3-29-12)~~(_____)

~~23~~**26.** **Gas Processing Facility**. A facility that conditions liquids or gas by compression, dehydration, refrigeration, or by other means. (4-11-15)

~~24~~**27.** **Gas Well**. (10-21-92)

a. A well which produces primarily natural gas; (3-29-12)

b. Any well capable of producing gas in commercial quantities and also producing oil from the same common source of supply but not in commercial quantities; or (10-21-92)

c. Any well classed as a gas well by the Commission for any reason. (10-21-92)

~~**25. Geophysical or Seismic Operations.** Any geophysical method performed on the surface of the land utilizing certain instruments operating under the laws of physics respecting vibration or sound to determine conditions below the surface of the earth that may contain oil or gas, and is inclusive of, but not limited to, the preliminary line survey, the acquisition of necessary permits, the selection and marking of shot-hole locations, necessary clearing of vegetation, shot-hole drilling, implantation of charge, placement of geophones, detonation and backfill of shot-holes, and vibroseis. (3-29-12)~~

29. Geophone. Receiving device for ground vibrations used in seismic surveys. (_____)

~~26~~**28.** **Hydraulic Fracturing~~, or Fracing~~**. A method of stimulating or increasing the recovery of hydrocarbons by perforating the ~~production~~ casing and injecting fluids or gels with proppant into the potential target reservoir at pressures greater than the existing fracture gradient in the target reservoir. ~~(3-29-12)~~(_____)

~~27~~**29.** **Inactive Well**. An unplugged well that has no reported production, disposal, injection, or other permitted activity for a period of greater than twenty-four (24) continuous months, and for which no extension has been granted. (3-29-12)

~~28~~**30.** **Intermediate Casing**. The casing installed within the well to seal intermediate zones above the anticipated bottom hole depth. The casing is generally set in place after the surface casing and before the production casing. (3-29-12)

~~29~~**31.** **Junk**. Debris or any unwanted object in a hole that impedes drilling or completion. (3-29-12)

~~30~~**32.** **Lease**. A tract(s) of land which by virtue of one of the following: an oil and gas lease~~,~~; fee or mineral ownership~~,~~; a drilling, pooling, or other agreement~~,~~; a rule, regulation or order of a governmental authority~~,~~; or ~~otherwise~~ other means constitutes a single tract or leasehold estate for the purpose of the development or operation thereof for oil or gas or both. ~~(10-21-92)~~(_____)

~~31~~**33.** **Mechanical Integrity Test**. A test designed to determine if there is a significant leak in the casing, tubing, or packer of a well. (3-29-12)

29. Mudlog. The record and evaluation of natural gas in drilling mud and crude oil in well cuttings, lithology of the formation drilled, and drilling parameters for a well being drilled. (_____)

34. Occupied Structure. A building with walls and a roof within which individuals live or customarily work. (_____)

~~32~~**34.** **Oil and Gas**. Oil or gas or both. (10-21-92)

Comment [e16]: "The ratio of..." should be inserted.
A: Done, May 27.

Comment [e17]: Do we have authority over these in statute? If not, then need to restrict to upstream (LIttle Willow) facility. Northwest Gas Processing owns Hwy 30. Are separators on a well pad a facility?
A: Idaho Code 47-317(10)(c) mentions that cities and counties shall not adopt ordinances that prohibit facilities and infrastructure needed for the post-extraction processing and transport of gas and oil. The statute implies this is so the Commission will have sole authority over these activities. Also, Idaho Code 47-319(5)(a) give authority of the Commission over "facilities for the transportation or refining of oil and gas". Idaho Code 47-319(5)(f) gives the Commission authority over the separation of production into gaseous and liquid hydrocarbons. Idaho Code 47-319(5)(h) gives the Commission authority over the metering or measuring of oil, gas, or product. Idaho Code 47-319(6)(a) gives the Commission the authority over the compression or dehydration of oil and gas.
Given the above references, the Commission does have authority. No changes needed, May 27.

Comment [e18]: Should use Section 403 definition instead.
A: Section 403 has the proviso that it defines a well as a gas well " In the absence of an order by the Commission setting a field-specific oil-gas ratio..." Not certain that further clarification is needed, May 27.

Comment [e19]: eliminate "production"? Or separate out hydraulic fracturing from stimulation (acid job, leak off test). Does "stimulation" need a definition?
A: Definition modified in an attempt to distinguish hydraulic fracturing from other forms of stimulation that do not have the same concerns or scale.

Comment [jat20]: added June 24

Comment [jat21]: added June 24

Comment [e22]: Define occupied structure as used in Section 200, 420 and 430. Search for occupied structure.
A: Definition slightly modified from PA definition of building. Done, June 30.

DRAFT

~~33~~35. **Oil Well**. Any well capable of primarily producing oil in paying quantities, but not a gas well. (3-29-12)

~~34. **Operator**. Any duly authorized person who is in charge of the development of a lease or the operation of a producing well. (10-21-92)~~

~~35. **Owner**. The person who has the right to drill into and produce from a pool and to appropriate the oil or gas that produces there from either for himself and/or others. (10-21-92)~~

~~36. **Person**. Any natural person, corporation, association, partnership, receiver, trustee, executor, administrator, guardian, fiduciary, or other representative of any kind, and includes any government or any political subdivision or any agency thereof. The masculine gender, in referring to a person, includes the feminine and the neuter gender. (10-21-92)~~

~~37~~36. **Pit**. Any excavated or constructed depression or reservoir used to contain produced water or reserve, drilling, well treatment, produced water, or other fluids. Pits can be located at the drill site or at centralized facilities that collect these fluids for disposal, storage, or treatment. ~~This does not include e~~Enclosed, mobile, or portable tanks used to contain fluids are not pits. ~~(3-29-12)~~( )

37. Plug Back. Plugging the bottom section of a well when a recompletion is done at a higher interval. ( )

~~38~~38. **Pollution**. Constituents of oil, gas, salt water, or other materials used in oil and gas extraction, occurring in fresh water supplies at levels that exceed the standards in IDAPA 58.01.02, "Water Quality Standards," and IDAPA 58.01.11, "Ground Water Quality Rules," as the result of the drilling, casing, treating, operation or plugging of wells. (3-29-12)

~~39. **Pool or Reservoir**. An underground reservoir containing a common accumulation of oil or gas or both; each zone of a structure that is completely separated from any other zone in the same structure is a pool. (3-29-12)~~

~~40~~39. **Pressure Maintenance**. The injection of gas, water, or other fluids into oil or gas reservoirs to maintain pressure or retard pressure decline in the reservoir for the purpose of increasing the recovery of oil or other hydrocarbons therefrom. (10-21-92)

~~41~~40. **Produced Water**. Water that is produced along with oil or gas. (3-29-12)

~~42. **Producer**. The owner of a well(s) capable of producing oil or gas or both. (10-21-92)~~

~~43~~41. **Production Casing**. The casing set across the reservoir interval and within which the primary completion components are installed. (3-29-12)

~~44~~42. **Proppant**. Sand or other materials used in hydraulic fracturing to prop open fractures. (3-29-12)

43. Recompletion. Completing a well in a higher or lower interval than the initial completion. ( )

~~45~~44. **Release**. Any unauthorized spilling, leaking, emitting, discharging, escaping, leaching, or disposing into soil, ground water, or surface water. (3-29-12)

45. Sample Envelope. Three (3) inch by five (5) inch envelope with metal fold top or clasp. Envelope is labeled with the following information: ( )

a. Company Name; ( )

Comment [e23]: Is this redundant with DEQ review? Will their review be at the same time or after or before. Is pond defined? Is it used?
A: Pits may affect fresh waters and oil and gas infrastructure in a variety of ways, and they are a known weak point for water quality impacts in other states. Since DEQ only regulates pits used for disposal, and they are limited to an engineering review, the overlap in jurisdiction is not redundant. Their review will be concurrent with IDL. Pond does not need to be defined. Pond is only mentioned in Section 210.08.a, but is self evident in the context. May 27.

Comment [e24]: Delete "for disposal or treatment" or add storage? May be redundant for IDWR rules.
A: Storage was added. No redundancy with IDWR rules can be found, as they regulate dams. Most pits will not have fills large enough to be classified as dams. May 27.

Comment [e25]: Plugging any section of a well? Check Desk and Derrick.
A: Definition is accepted. Any activity to plug a shallower zone and try to complete a deeper zone would require an application to deepen the existing well unless the shallower zone of a dually completed well was depleted. Done, May 27.

DRAFT

b. Well Name and Number; ( )

c. U.S. Well Number (Vertical wells use 11 digit number, horizontal wells use 15 digit number); ( )

d. Legal Description using Subsection, Section, Township, and Range; ( )

e. County; ( )

f. State; and ( )

g. Sample interval measured depth from surface. ( )

46. Seismic Operations. Any geophysical method performed on or near the surface of the land utilizing instruments operating under the laws of physics respecting vibration or sound. These methods are used to determine conditions below the surface of the earth where oil or gas may be located. Seismic operations include, but are not limited to, the preliminary line survey, acquiring necessary permits, selecting and marking shot hole locations, selecting and surveying source point and receiver locations, clearing vegetation, drilling shot holes, implanting charges, placing geophones, detonating and backfilling shot holes, surface shots, and vibroseis. ( )

47. Shot Hole. Shallow hole drilled for explosive charges used in seismic operations. ( )

48. Spacing Unit. The geographic area allocated by rule or order that can be efficiently drained by one well. ( )

~~46~~49. Spud. To start the drilling process by removing rock, dirt, and other sedimentary material with the drill bit. (4-11-15)

~~47~~50. Surface Casing. The first casing which is run after the conductor pipe to anchor blow out prevention equipment and to seal out fresh water zones. (3-29-12)

51. Surface Shot. Explosive charges set off on, or just above, the surface for seismic operations. ( )

~~48~~52. Surface Water. Rivers, streams, lakes, and springs when flowing in their natural channels. (4-11-15)

~~49~~53. Systems Approach. The disclosure of chemical information by chemical abstract service name only, without disclosing component percentages or chemical relationships. (4-11-15)

~~50~~54. Tank. A concrete, metal, or plastic stationary vessel used to contain fluids. (4-11-15)

~~51~~55. Tank Battery. One (1) or more tanks that are connected to receive crude oil, condensate, or produced waters from a well(s) and which serves as the point of collection and disbursement of oil or gas from a well(s). (4-11-15)

~~52~~56. Tank Dike. An impermeable man-made structure constructed around a tank to contain leakage from the tank. (4-11-15)

~~53~~57. Tubing. Pipe used inside the production casing to convey oil or gas from the producing interval to the surface. (3-29-12)

58. U.S. Well Number. Well numbering convention used in U.S. to provide a unique, permanent, numeric identifier for each oil and gas well. This number is assigned by the Department when a drilling permit is under review. The number has up to 14 digits that are grouped and ordered to provide specific information about the well (SS-CCC-NNNNN-WW-XX). The meaning of the different parts is as follows: ( )

Comment [e26]: What about gravity and magnatism?
A: While these are valid geophysical studies, they do not require the volume of truck traffic and disruption that seismic surveys can generate. As a result, no permitting requirements or standards existed in the current rules. In the absence of a need to regulate these activities, they do not need to be mentioned in the rules. May 27.

Comment [e27]: May want to include "Area allocated to a well by a commission or order". Look at other definitions, but keep the word geographic.
A: Several sources of definitions refer to an area allocated to "a well". In addition, Idaho Code 47-321(4) states "An order establishing spacing units shall direct that no more than one (1) well shall be drilled to and produced from the common source of supply on any unit,…"
Wording modified July 1, done.

Comment [e28]: Include near the surface or just above the surface.
A: Done, May 27.

DRAFT

a. The first two digits, represented by "SS" in the above example, are a state code. Idaho is 11. ( )

b. Digits 3 through 5, represented by "CCC" in the above example, are a county code. ( )

c. Digits 6 through 10, represented by "NNNNN" in the above example, are the well code corresponding to the well number in each respective county. ( )

d. Digits 11 and 12, represented by "WW" in the above example, are the well bore codes given to each well bore from that surface location. The first wellbore is assigned 00 and may not appear if no other well bores have been made from that same surface location. A subsequent sidetrack, deepening, or lengthening of the well is given another number. ( )

e. Digits 13 and 14, represented by "XX" in the above example, are used for plugbacks, recompletions, deepening, or any other well conversion that requires additional work in the same well bore. These digits may not appear if only one completion has been made. ( )

60. Vibroseis. Source of ground vibrations used in seismic surveys, and generated by specially designed trucks. ( )

~~54~~59. Volatile Organic Compound. Organic chemical compounds whose composition makes it possible for them to evaporate under normal indoor atmospheric conditions of sixty-eight (68) degrees F and an absolute pressure of fourteen point seven (14.7) psi atmospheric. (3-29-12)

~~55~~60. Waterflooding. The injection into a reservoir through one (1) or more wells with volumes of water for the purpose of increasing the recovery of oil therefrom. (3-29-12)

~~**56. Waste as Applied to Oil**. Underground waste; inefficient, excessive, improper use, or dissipation of reservoir energy, including gas energy and water drive; surface waste, open pit storage, and waste incident to the production of oil in excess of the producer's above-ground storage facilities and lease and contractual requirements, but excluding storage (other than open pit storage) reasonably necessary for building up and maintaining crude stocks and products thereof for consumption, use, and sale; the locating, drilling, equipping, operating, or producing of any well in a manner that causes, or tends to cause, reduction of the quantity of oil or gas ultimately recoverable from a pool under prudent and proper operations. (10-21-92)~~

~~**57. Waste as Applied to Gas**. The escape, blowing or releasing, directly or indirectly, into the open air of gas from wells productive of gas only, or gas in an excessive or unreasonable amount from wells producing oil or both oil and gas; and the production of gas in quantities or in such manner as will unreasonably reduce reservoir pressure or unreasonably diminish the quantity of oil or gas that might ultimately be produced; excepting gas that is reasonably necessary in the drilling, completing, and testing of wells and in furnishing power for the production of wells. (10-21-92)~~

61. Well Logs. The recorded description of the lithologic sequence encountered in drilling a well, and the graphical display of one or more physical properties in or around a well versus depth or time, or both. The recorded descriptions include, but are not limited to, drill cutting sample logs and mud logs. The physical properties include, but are not limited to, electric, gamma ray, geophysical, and acoustic. ( )

Comment [e29]: Add acoustic properties.
A: Done, May 27

~~58~~62. Well Report. The written record progressively describing the strata, water, oil, or gas encountered in drilling a well with such additional information as to give volumes, pressures, rate of fill-up, water depths, caving strata, casing record, mud weight and viscosity records, directional surveys, etc., as is usually recorded in normal procedure of drilling; also, it includes the daily drilling report, electrical radioactivity, or other similar logs run, lithologic description or other scientific analyses of all whole or sidewall cores, and all drill-stem tests, including depth-tested, cushion-used, time tool open, flowing and shut-in pressures and recoveries. ~~(3-29-12)~~( )

~~59~~63. Well Site. The areas that are directly disturbed during the drilling and subsequent operation of, or affected by production facilities directly associated with, any oil well, gas well, or injection well, and its associated

~~well~~ drill pad. ~~(4-11-15)~~( )

~~60~~64. **Well Treatment**. Actions performed on a well to acidize, fracture, or stimulate the target reservoir. (3-29-12)

~~61~~65. **Wildcat Well**. An exploratory well drilled in an area of unknown subsurface conditions. (3-29-12)

66. **Workover**. The repair or stimulation of an existing producing zone or zones in a producing well for the purpose of restoring, prolonging, or enhancing the production of hydrocarbons, but does not include hydraulic fracturing. ( )

011. ABBREVIATIONS.

01. API. American Petroleum Institute. (3-29-12)

02. ASTM. American Society for Testing and Materials. (3-29-12)

03. BBL. Oilfield Barrel. (4-11-15)

04. BOP. Blowout Preventer. (3-29-12)

05. CAS. Chemical Abstracts Service. (3-29-12)

06. EPA. United States Environmental Protection Agency. (3-29-12)

07. F. Fahrenheit. (3-29-12)

08. GPS. Global Positioning System. (3-29-12)

09. HDPE. High Density Polyethylene. (3-29-12)

10. IDAPA. Idaho Administrative Procedure Act. (3-29-12)

11. IDEQ. Idaho Department of Environmental Quality. (3-29-12)

12. IDWR. Idaho Department of Water Resources. (3-29-12)

13. MCF. One thousand cubic foot. (4-11-15)

14. MSDS. Material Safety Data Sheet. (3-29-12)

15. OSHA. Occupational Safety & Health Administration. (3-29-12)

16. PSI. Pounds per Square Inch. (3-29-12)

17. PVC. Polyvinyl Chloride. (4-11-15)

18. U.S. United States ( )

012. -- 014. (RESERVED)

015. PROTECTION OF CORRELATIVE RIGHTS.

The Commission and the Department should ~~afford a reasonable opportunity to each person entitled thereto to recover or receive the oil or gas in such person's tract(s) or the equivalent thereof, without being required to drill unnecessary wells or to incur other unnecessary expense~~ protect correleative rights by administering these rules to not require an owner to drill unnessary wells or incur unnecessary expenses to recover or receive ~~such~~ oil or gas or its equivalent.

Comment [e30]: Concern about allowing hydraulic fracturing without a permit. Strike stimulation? Could specifically state it does not include hydraulic fracturing.
A: Changed to exclude hydraulic fracturing, May 27.

Comment [e31]: Add abreviation for BTU or MMBTU?
A: Neither abbreviation is used in the rule, so they are not needed. May 27.

Comment [e32]: Should just repeat the definition in statute and leave it at that. Refer to correlative rights and avoiding waste.
A: Section is reworded to focus on the protection of correlative rights without attempting to clarify what correlative rights are. Done, June 23.

~~(3-29-12)~~(_____)

016. -- 019. (RESERVED)

020. APPLICABILITY.

01. Oil and Gas Development. These rules apply to oil and gas development and carry out the Commission's duty to prevent waste, protect correlative rights, and prevent pollution of fresh water supplies through activities authorized by these rules. (3-29-12)

02. Exclusions. These rules do not apply to the exploration and development of other mineral resources covered by Title 47, Chapter 13, Idaho Code; Title 47, Chapter 15, Idaho Code; or Title 42, Chapter 40, Idaho Code. (3-29-12)

021. CLASS II INJECTION WELLS.
Class II injection wells, as described in IDAPA 37.03.03, "Rules and Minimum Standards for the Construction and Use of Injection Wells," are currently not authorized under this rule. Permits for Class II injection wells must be obtained through IDAPA 37.03.03. (3-29-12)

022. -- 029. (RESERVED)

030. NOTICES - GENERAL.

01. Written Authorization Required. Any written notice of intention to do work or to change plans previously approved must be filed with the Department, unless otherwise directed, and must be approved before the work is begun. Such approval may be given orally and, if so given, shall thereafter be confirmed by the ~~Department~~operator in writing. Written notices may be submitted to the Department by e-mail or facsimile. ~~(4-11-15)~~(_____)

02. Emergency Authorization. In case of emergency, or a situation where operations might be unduly delayed, any written notice required by these rules and regulations to be given to the Department may be given orally or by ~~wire~~email. ~~and i~~If approval is obtained, the ~~transaction shall be confirmed~~ Department shall confirm the notification in writing, as a matter of record. ~~(3-29-12)~~(_____)

03. Publication of Legal Notices. Whenever these rules require a legal notice to be published in a newspaper, the notice must be published once a week for two (2) consecutive weeks. (4-11-15)

031. FORMS.
The Department shall adopt such forms of notices, requests, permits, and reports as it may deem advisable or necessary in carrying out the provisions of law and its rules and regulations. (4-11-15)

032. ORGANIZATION REPORTS.

01. Required Content. Before any person engages in any activity covered by the statutes and rules of the Commission, that person must file an organization report with the Department. The organization report must include the following information: (4-11-15)

a. The person's name and the type of the business being operated or conducted; (4-11-15)

b. The mailing address to which all correspondence from the Department is to be sent; (4-11-15)

c. The telephone number(s), facsimile number(s), and e-mail address(es) for which contact by the Department may be made; (4-11-15)

d. The names of persons authorized to submit required forms, reports, and other documents to the Department; and (4-11-15)

Comment [e33]: Change "Commission" to "operator"?
A: Done, May 27.

Comment [e34]: Replace "transaction" with "notification"?
A: Done, May 27.

DRAFT

e. If a legal entity, proof the person is authorized to transact business within the state. (4-11-15)

02. Updates. A supplementary report must be filed with the Department within thirty (30) days of any change to facts stated in a previously-filed organization report. (4-11-15)

033. DESIGNATION OF AGENT.
A "Designation of Agent" shall be submitted to the Department in a manner and form approved by the Department prior to the commencement of operations. A Designation of Agent(s) will be accepted as authority of agent to fulfill the obligations of the owner and to sign any papers or reports required under these oil and gas operating regulations, and all authorized orders or notices given by the Department when given in the manner hereinafter provided shall be deemed service of such orders or notices upon the owner and the lessee. All changes of address and any termination of the agent's authority shall be immediately reported in writing to the Department and, in the latter case, the designation of a new agent(s) shall be immediately made. If the designated agent(s) shall at any time be incapacitated for duty or absent from the address provided, the owner shall designate in writing a substitute to serve in his or their stead, and in the absence of such owner or of notice of appointment of a substitute then, in such case, notices may be given by the Department by delivering a registered letter to the United States Post Office at Boise, Idaho, directed to the agent(s) at the address shown on the current Designation of Agent on file in the Department's office, and such notice will be deemed service upon the owner and lessee. (3-29-12)

Comment [e35]: Give scope of their designation through rule, or by modifying the form.
A: Modifying the form will be the easiest way to accomplish this. May 27.

034. -- 039. (RESERVED)

040. ~~PUBLIC COMMENT~~PERMIT PROCESSING.
Applications submitted under Sections 100, 200, 201, 210, 211, 230, ~~and~~ 330, and 502 of these rules will be ~~posted on the Department's website for a fifteen-day (15) written comment period. The Department will also send an electronic copy of the application to the respective county, and city if applicable, where the proposed operation is located. The purpose of the comment period is to receive written comments on whether a proposed application complies with these rules. These comments will be considered by the Department prior to permit approval or denial. Relevant comments will be posted on the Department's website following the comment period.~~ processed as follows: ~~(4-11-15)~~( )

Comment [e36]: What is this procedure? Not well explained in 47-320.
Would a Timeline or written interpretation help?
A: We can post the Department's interpretation of the timeline on our website. Done, June 23.

a. Permit review and approval will follow the procedure in Idaho Code § 47-320. ( )

Comment [e37]: Should clarify in rule that completeness review will be done first, then sent out and noticed.
A: Some circumstances may require the Department to send applications out to other agencies prior to the completeness review. No change, July 5.

b. The applicant may modify incomplete or denied applications. The applicant does not have to pay an additional application fee if they resubmit within fifteen (15) business days of receiving notice of an incomplete application or a denial. The applicant must pay a new fee if the Department receives the revised application past that fifteen (15) business days. ( )

Comment [e38]: Clarify that is business days.
A: Done, May 27.

c. The Department may deny applications if the applicant does not resubmit within thirty (30) business days of receiving notice of an incomplete application. ( )

d. The applicant may appeal the Department's decision to the Commission pursuant to Idaho Code § 47-324(d), (e), (f) and (g). ( )

041. -- 049. (RESERVED)

050. ENFORCEMENT.
The Department shall enforce these rules pursuant to Section 47-325, Idaho Code. (3-29-12)

051. -- 099. (RESERVED)

SUBCHAPTER B - EXPLORATION AND DEVELOPMENT

100. ~~GEOPHYSICAL OPERATIONS~~SEISMIC OPERATIONS.

01. Permit Required. Before beginning seismic ~~exploration~~ operations for oil and gas~~in the state of~~

~~Idaho, a representative of the client company and the seismic contractor shall meet with the staff of the Department, file an application for a permit to conduct seismic operations, and pay an application fee.~~ a person must obtain a permit from the Department. No seismic operation shall be conducted without such a permit. ~~The Department has discretion to waive the requirement of the pre-permit meeting for the client company. The permit for seismic operations may be revoked or suspended or the application for the permit denied by the Department for failure to comply with the Commission's rules, statutes, and orders.~~ The Department may revoke, suspend, or deny ~~the application for~~ a seismic permit without a hearing; provided that the seismic contractor shall be given an opportunity for a hearing at the next regularly scheduled Commission meeting. ~~The fact that a permit is revoked or suspended does not excuse the seismic contractor or client company from properly plugging existing seismic holes but does prohibit the person(s) from drilling any more.~~ The application for a seismic operation permit ~~for seismic operations~~ must include all of the following: ~~(3-29-12)~~(_____)

a. For two dimensional surveys, ~~The~~ the proposed route of the seismic line on a topographic or recent air photo base map at a sufficient scale to show roads, buildings, surface waters, density of the seismic source points and receiver lines, and Section, Township, and Range lines. The map must also show additional area as needed for any alternative routing. The alternative routing must be within at least one-half (1/2) mile of the proposed route. Reapplication must be made if the final route strays from the proposed route and outside the designated alternative routing areas~~; and~~. ~~(3-29-12)~~(_____)

b. For three dimensional surveys, the intended orientation and density of the seismic source points and receiver lines on a topographic or recent air photo base map at a sufficient scale to show roads, buildings, surface waters, and Section, Township, and Range lines. (_____)

Comment [e39]: Add intent to give some manuevering room for location of source and receiver points.
A: Wording modified, May 27.

~~b~~c. The energy sources proposed to be used for the seismic operation, such as vibroseis, shot holes, surface shot, or others. (3-29-12)

~~c~~d. The approximate number, depth, and location of the ~~seismic~~shot holes and the size of the explosive charges. The application shall be accompanied by a map with a scale of one inch equaling two (2) miles that shows the depth and location of the shot holes. ~~(10-21-92)~~(_____)

~~d~~e. The name and permanent address of the client company the Department may contact about the seismic ~~exploration~~ operation. ~~(3-29-12)~~(_____)

~~e~~f. The name, permanent address, and phone number of the seismic contractor and his local representative whom the Department may contact about the seismic activity. (3-29-12)

~~f~~g. The name, phone number, and permanent address of the shot hole plugging contractor, if different from the seismic contractor. ~~(3-29-12)~~(_____)

~~g~~h. A detailed description of the shot hole plugging procedures, and a description of the surface reclamation procedures, if such reclamation is needed. ~~(3-29-12)~~(_____)

~~h~~i. The anticipated starting date of seismic operations. (3-29-12)

~~i~~j. The anticipated completion date of seismic operations, and the anticipated date of any required reclamation or shot hole plugging. ~~(3-29-12)~~(_____)

~~j~~k. A description of the identifying mark that will be on the hat or nonmetallic plug to be used in the plugging of the ~~seismic~~shot hole. ~~(10-21-92)~~(_____)

l. A bond meeting the requirements of Subsection 03 below. (_____)

m. An application fee as described in Idaho Code § 47-320. (_____)

02. Operating Requirements. All ~~geophysical~~seismic operations must comply with the following requirements: ~~(3-29-12)~~(_____)

a. All vehicles utilized by the permit holder, or its agents or contractors, shall be clearly identified by signs or markings utilizing letters or numbers, or a combination thereof, a minimum of three (3) inches in height and one-half (1/2) inch wide, indicating the name of such agent. (3-29-12)

b. No seismic source generation from vibroseis, shot holes, surface shot, or other method shall be conducted within two hundred (200) feet of any residence, water well, oil well, gas well, injection well, or other structure without having first secured the express written authority of the owner(s) thereof and the permit holder shall be responsible for any resulting damages. ~~(3-29-12)~~(_____)

c. Written authority from the owner of a residence, water well, oil well, gas well, injection well, or other structure must also be obtained from the owner(s) if any explosive charge exceeds the maximum allowable charge within the scaled distance below:

DISTANCE TO STRUCTURE (Feet)~~*~~	MAXIMUM ALLOWABLE CHARGE WEIGHTS (Pounds)~~*~~
50	0.5
100	2.0
150	4.5
200	8.0
250	12.0
300	18.0
350	25.0
~~* Based upon a charge weight of seventy (70) Foot/Pound~~	

~~(3-29-12)~~(_____)

d. The maximum allowable charge weight is twenty-five (25) pounds, unless the permit holder requests and secures the prior written authorization from the Department. (3-29-12)

e. All seismic sources placed for detonation shall contain additives to accelerate the biodegradation thereof and shall be handled with due care in accordance with industry standards. The cap leads for any seismic sources that fail to detonate shall be buried at least three (3) feet deep. (3-29-12)

f. All vegetation cleared to the ground shall be cleared in a competent and workmanlike manner in the exercise of due care. (3-29-12)

g. Unless otherwise consented to by the surface owner in writing, permit holder shall not cut down any tree measuring six (6) inches or more in diameter, as measured at a height of three (3) feet from the ground surface, unless there are no reasonable alternatives to the removal of such tree(s) available to permit holder. Permit holder shall compensate surface owner the value of all such trees. (3-29-12)

h. All excessive rutting or soil disturbances shall be repaired or restored to the original condition and contour to the extent reasonable, unless otherwise agreed to by the permit holder and the surface owner in writing. (3-29-12)

i. All fences removed shall be replaced, unless otherwise agreed to by the permit holder and the surface owner in writing. (3-29-12)

Comment [e40]: Use of term "residence" not clear. Do rules need definition of Occupied structure or Primary residence? Does that include structures occupied during the day or seasonally?
A: This section uses "residence" in an effort to address concerns for seismic impacts to water wells. Sections 420.01 and 430.01 discuss setbacks for tank batteries and processing faciliites from occupied strucures, and are more concerned about public safety and protecting fresh waters. Also, the term "other structure" includes buildings that may be occupied any time or any season. No concern about the separate terms, and no changes made as a result. May 27.

Comment [e41]: see previous

DRAFT

j. All debris associated with the seismic activity shall be removed and properly disposed. (3-29-12)

03. Bond Required. (3-29-12)

a. ~~Before beginning geophysical operations, the geophysical contractor must file and have approved by the Department a~~The bond for seismic exploration will be in the amount of at least ten thousand dollars ($10,000). The Department may increase this bond~~ing requirement~~ amount for ~~geophysical~~seismic contractors based on the amount of potential damage from the ~~contemplated~~proposed operation. The ~~condition of such~~ bond shall comply with the Act, the ~~rules and orders of the~~ Commission's rules and orders, and ~~orders of~~ the Department's orders. The obligation of the bond shall not be discharged until one (1) year from ~~completion of the survey~~receipt of the final completion report described in Subsection 100.07 of these rules or until the ~~geophysical~~seismic contractor has complied with the ~~Oil and Gas Conservation Law~~Act, the Commission's rules, and the orders of the Commission and the Department. ~~(3-29-12)~~(_____)

b. Persons ~~or other entities~~ who ~~engage in the~~ plug~~ging of seismic~~ shot holes and are not a regular full-time employee of the seismic company, owner, or operator shall ~~have~~ post~~ed~~ with the director a surety bond in favor of the Department. Said bond shall be on a form prescribed by the Department and in the amount of five thousand dollars ($5,000). The condition of the bond shall comply with the ~~Oil and Gas Conservation Law~~Act and the regulations and orders of the Commission and the Department. ~~(3-29-12)~~(_____)

04. Newspaper Notice. Before a ~~geophysical~~seismic operation contractor conducts the ~~geophysical~~ operation, the contractor shall publish a legal notice in a newspaper of general circulation in the county where the survey will be conducted. The notice shall conform with subsection 030.03 of these rules, and shall state the nature and approximate time period of the seismic operations. These requirements do not apply to operations conducted within a well ~~or conducted by aerial surveys~~. ~~(3-29-12)~~(_____)

05. Owner Agreement and Occupant Notification. No entry shall be made by any person to conduct seismic operations, upon the lands where such seismic operations are to be conducted, without the permit holder having first ~~given notice at least thirty (30) calendar days prior to commencement of field seismic operations~~obtained a written agreement with the surface owner and provided written notice to the following parties: ~~(3-29-12)~~(_____)

~~**a.** The notice shall be in writing and given either personally or by certified United States mail to the following persons: (3-29-12)~~

~~i. Surface owners reflected in the tax records of the counties where the lands are located, at the mailing addresses identified for such surface owners in such records; (3-29-12)~~

~~ii.~~**a.** Occupants residing on the lands who are not the surface owners, if it can be reasonably ascertained that there are such occupants; and (3-29-12)

~~iii.~~**b.** Owners or operators of oil and gas wells within the seismic survey area, as reflected in Department records. (3-29-12)

~~**b.**~~**06.** The notice provided for in subsection 100.05 of these rules shall contain the following: ~~(3-29-12)~~(_____)

i. Name of the person ~~or entity~~ that is conducting the seismic operations; ~~(3-29-12)~~(_____)

ii. Proposed location of the seismic operations; and (3-29-12)

iii. Approximate date the person ~~or entity~~ proposes to commence seismic operations. ~~(3-29-12)~~(_____)

06. Department Notifications. (3-29-12)

Comment [e42]: Is this really needed? Not done in other states.
A: Yes, it is. Unknown residents and those who do not give access need to know when the work will be done due to truck traffic and other disruptions. Done, July 5.

Comment [e43]: The operator always obtains permission from the surface owner prior to entry, and sometimes this is obtained the week before operations begin. If written permission is always obtained, then eliminate the 30 day notification.
A: Done, July 5.

DRAFT

~~**a.**~~ The permit holder shall ~~also~~ notify the Department within five (5) business days of ~~the commencement and completion of~~beginning each seismic operation. The permit holder shall also notify the Department within five (5) business days of completing each seismic operation. These notifications may be done with a sundry notice. ~~(3-29-12)~~(_____)

~~**b.** Before beginning geophysical operations other than seismic operations, the geophysical contractor shall file a notice of intention to do so with the Department. Said notice shall describe the geophysical method to be used and be accompanied by a map of a scale of one (1) inch equals two (2) miles showing the location of the project. (3-29-12)~~

07. Reports and Notices Required. (10-21-92)

a. Activity Report. Upon completion of the seismic ~~activity~~ operations or at thirty (30) day intervals after the work has commenced, whichever occurs first, the seismic contractor shall file with the Department a ~~report of the~~ completion or progress report ~~of the seismic project~~. The final completion report shall be in affidavit form ~~and shall~~, include a map, and shall be submitted to the Department within thirty (30) days of completing the seismic operations. The map in the completion report must be on a seven and one-half (7.5) - or fifteen (15) minute United States Geological Survey topographic quadrangle map (at a scale of one (1) inch equals two thousand (2,000) feet for the 7.5 minute map or one (1) inch equals ~~four thousand (4,000) feet~~ approximately one (1) mile for the 15 minute map, ~~that shows~~and each showing section, township, and range) and the location of each survey so that the shot holes and other potential impacts can be easily located. Maps must be dated and labeled with the permit number and the names of the contractor and client companies. The final completion report shall also include a statement that all work ~~has been~~ performed ~~in compliance~~has complied with the ~~application for a~~seismic permit ~~to perform seismic activity,~~and Section 100 of these rules~~, and permit provisions~~. ~~Said~~The permit, maps, ~~applications,~~ and reports shall be kept confidential by the Department for a period of one (1) year from the date of receipt, subject to the needs of the Department to use them to enforce these regulations, the Act, and the orders of the Commission or the Department. Also, the ~~owner of the~~ Department may advise the surface~~of the land may be advised~~ owner of the location of seismic lines, source points, receiver locations, or seismic holes on his land and of the exploration method used.~~(4-11-15)~~(_____)

b. Plugging Notice. Seismic contractors shall give the Department at least twenty-four (24) hours advance notice of shot hole plugging operations, provided that notice of plugging operations planned for Sunday or Monday may be given on the previous Friday. (3-29-12)

08. Client-Contractor Responsibility. The client company may be held responsible along with the seismic contractor for ~~conducting the operation in compliance~~ any failure to comply with the Commission's rules and orders, the Department's orders, and the Act ~~for the seismic contractor's failure to comply with such rules, statutes, and orders~~. The hats used ~~in the plugging of seismic~~to plug shot holes shall be imprinted with the name of the contractor ~~responsible for the plugging of~~who plugged the hole. ~~(3-29-12)~~(_____)

09. Plugging. Unless the seismic contractor can prove to the satisfaction of the Department that another method will provide better protection to ground water and long-term land stability, ~~seismic~~ shot hole operations shall be conducted in the following manner: ~~(3-29-12)~~(_____)

a. When water is used in conjunction with the drilling of ~~seismic~~ shot holes and artesian flow is not encountered at the surface, ~~seismic~~ shot holes ~~are to~~must be filled with a high grade bentonite/water slurry mixture. Said slurry shall have a density that is at least four percent (4%) greater than the density of fresh water; said slurry shall also have a Marsh funnel viscosity of at least sixty (60) seconds per quart. Density and viscosity are ~~to be~~ measured prior to adding cuttings to the slurry. Cuttings not added to the slurry are to be disposed of in accordance with Paragraph 100.~~09~~10.f. of this rule. Any other suitable plugging material commonly used in the industry may be substituted for the bentonite/water slurry as long as the physical characteristics of said substitute are ~~at least~~ comparable to those of the bentonite/water slurry. Between November 1 and May 1, coarse ground bentonite approved by the Department shall be used as a plugging material. ~~(4-11-15)~~(_____)

b. The hole will be filled with the slurry from the bottom up to ~~a depth of three (3) feet (~~three (3) feet below ground level~~)~~. A nonmetallic plug will then be set at this depth ~~of three (3) feet~~, and the remaining hole will be filled and tamped to the surface with cuttings and native soil. ~~(10-21-92)~~(_____)

Comment [e44]: 30 days after completion? Clarify?
A: Yes, 30 days after completion is now inserted. Done, July 5.

Comment [e45]: The Department may advise the surface owner of the location....
A: Changes made, May 27.

Comment [e46]: Delete "at least"?
A: Done, June 3.

c. When drilling with air and nonartesian water is encountered, the hole shall be plugged with the slurry mixture, or coarse ground bentonite, as specified in Paragraph 100.~~09~~10.a., supra. ~~(4-11-15)~~(_____)

d. When drilling with air only and in completely dry holes, plugging may be accomplished by returning the cuttings to the hole, tamping the returned cuttings to the above-referenced depth of three (3) feet, and setting the permaplug topped with more cuttings and soil as per Paragraph 100.~~09~~10.b. above. A small mound will be left over the hole for settling allowance. Auger holes twenty (20) feet or less in depth may be plugged in this same manner. ~~(4-11-15)~~(_____)

e. ~~The foregoing seismic~~ All shot holes shall be properly plugged and abandoned as soon as practical after the shot has been fired; however, a shot hole shall not be left unplugged for more than thirty (30) days without approval of the Department. ~~(3-29-12)~~(_____)

f. Any slurry, drilling fluid, or cuttings which are deposited on the surface around the ~~seismic~~ shot hole will be raked or otherwise spread out to at least within one (1) inch of the surface, so that the growth of the natural grasses or foliage will not be impaired. ~~(10-21-92)~~(_____)

g. The requirements of Paragraphs 100.~~09~~10.a. through 100.~~09~~10.f. of this rule may be modified by any reasonable written agreement between the seismic company and the surface owner. ~~(4-11-15)~~(_____)

h. If artesian flow (water flowing at the surface) is encountered in the drilling of any ~~seismic~~ shot hole, cement will be used to seal off the water flow thereby preventing cross-flow, erosion, and/or contamination of freshwater supplies. Said holes shall be cemented immediately. ~~(3-29-12)~~(_____)

i. After ~~completing the plugging of seismic~~ shot holes are plugged and ~~spreading the~~ cuttings ~~as required by this rule~~ are spread, the seismic contractor shall record the GPS location of the ~~seismic~~ shot hole, and ~~the contractor~~ shall provide the location data to the Department. ~~(3-29-12)~~(_____)

10. Forfeiture of ~~Geophysical Exploration~~Seismic Operation Bond. The Department may forfeit the bond submitted under Subsection 100.0~~3~~4 of this rule upon failure of the ~~owner or operators~~seismic contractor or client company to conduct the seismic survey and complete reclamation in conformance with Section 100 of this rule. The ~~owner or operators~~seismic contractor or client company will be given an opportunity to address compliance issues prior to the Department taking action against the bond. Forfeited bond money that is not needed for the Department to complete the permit obligations will be returned to the person who supplied the bond or the bonding company. ~~(4-11-15)~~(_____)

101. -- 109. (RESERVED)

110. SURFACE OWNER PROTECTIONS.

01. Surface Use Agreement. If the mineral estate has been severed from the surface estate where an oil or gas well is to be located, the owner or operator shall attempt a good faith negotiation of a surface use agreement with the surface owner. The surface use agreement must address how the surface owner will be compensated for lost agricultural income and lost value of improvements directly caused by oil and gas exploration and production. The owner or operator may rely on the tax records of the respective county assessor to identify the surface owner. (3-29-12)

02. Surface Owner Notification. If a surface use agreement cannot be negotiated, then the owner or operator must notify the surface owner of the intent to drill by certified mail at least sixty (60) days prior to the commencement of surface disturbing activities, unless otherwise agreed to by the surface owner. The notification must include a proposed surface use bond amount, and a copy must be sent to the Department. (3-29-12)

03. Surface Owner Objection. If the surface owner disagrees with the owner's or operator's proposed surface use bond amount, the surface owner must send a written objection to the Department within thirty (30) days of receiving the notification from the owner or operator. The objection must contain the owner's or operator's proposed

Comment [e47]: Change to just "spread".
A: Done, June 3.

Comment [e48]: Excess funds should be returned to operator or surety.
A: Done, June 3.

Comment [e49]: Do we need more specificity in this? Would two written attempts qualify? What do other states do?
A: BLM guidance for their split estate is very similar to what is currently in the rules. IDL's minimum bond is actually higher, at $5,000 instead of the BLM's $1,000. Their surface damages bond also only covers "loss or damage to crops or tangible improvements", and the expectation is for good faith negotiations for a surface use agreement.
Good faith negotiations are not defined in the context of oil and gas surface use agreements, but "good faith" is defined in Idaho Code 28-1-201(b)(20) (Uniform Commercial Code) as "honesty in fact in the conduct or transaction concerned." Other states do not prescribe what good faith negotiations means in regards to oil and gas operator and surface owner agreements, but some states do require good faith negotiations.
The existing language was distilled out of case law from several different states, extensive research was conducted, and the rule was negotiated at length. Also, extensive changes to this Section are beyond the scope of the rulesmaking in the approve ARRF. No changes made.

surface use bond amount. Any objection filed will not delay the owner's or operator's proposed start of surface disturbing activities. (3-29-12)

04. Surface Use Bond. The minimum surface use bond in all instances with no surface use agreement will be five thousand dollars ($5,000), and will be paid in cash to the Department. If the surface owner objects to the owner's or operator's proposed bond amount, the Department will determine a surface use bond based on the information received from both the owner or operator and the surface owner. The Department will then request that the owner or operator submit this bond. The Department may issue the permit to drill and authorize the commencement of drilling operations after this bond has been received. The purpose of this bond is to safeguard the surface owner's loss of agricultural income and improvement values pending the results of a hearing on the final bond.~~(3-29-12)~~(_____)

05. Hearing to Determine Surface Use Bond. When the owner, operator, or surface owner objects to the Department's proposed surface use bond, a hearing will be scheduled as soon as possible to determine the final bond amount. The owner, operator, surface owner, and Department may offer testimony to the hearing officer. The hearing officer will recommend a final bond amount to the ~~Commission~~Director. After the ~~Commission's~~Director's final order, the owner or operator and surface owner will have twenty-eight (28) days to file a request for judicial review. ~~(3-29-12)~~(_____)

06. Release of Surface Use Bond. The Department will hold the bond pending either a surface use agreement between the two (2) parties that negates the need for a surface use bond, or reclamation of the surface disturbance. (3-29-12)

07. Forfeiture of Surface Use Bond. The Department may forfeit this bond upon failure of the owner or operator to reclaim the disturbed area in a timely manner, or upon failure of the parties to reach a surface use agreement, upon the completion of drilling operations. (3-29-12)

111. -- 119. (RESERVED)

120. WELL SPACING.

01. Standard Spacing Units and Well Locations. In the absence of an order ~~by the Commission~~ setting spacing units for a pool, or a unit operation as described in Section ~~140~~135, the following rules shall apply:~~(4-11-15)~~(

~~01.~~a. ~~Wells Drilled for Oil; Standard Spacing Unit and Well Location.~~ Every well drilled for oil must be located ~~in the center of~~on a spacing unit consisting of a forty (40) acre governmental quarter quarter section, lot or tract, or combination of lots or tracts substantially equivalent thereto as shown by the most recent governmental survey~~, with a tolerance of two hundred (200) feet in any direction from the center location; provided that no~~. An oil well must have a minimum setback of three hundred thirty (330) feet from the Section's quarter quarter lines. No oil well shall be drilled less than nine hundred twenty (920) feet from any other well drilling to or capable of producing oil from the same pool, or no oil well shall be completed in a known pool unless it is located more than nine hundred twenty (920) feet from any other well completed in and capable of producing oil from the same pool.

~~(10-21-92)~~(_____)

Comment [e50]: May be too low.
A: This amount is higher than the BLM at $1,000, and Wyoming at $2,000, but lower than New Mexico at $10,000. Given the ability of the landower to submit their own proposed bond amount, no change is needed. Extensive changes to this Section are beyond the scope of the rulesmaking in the approve ARRF.

Comment [e51]: Loss to remainder of property should be included.
A: The existing language was distilled out of case law from several different states. Case law generally does not support affect on land values, only agricultural income and improvements. Damage to the remainder or damange to land values introduces the potential for substantial subjectivity. Extensive changes to this Section are beyond the scope of the rulesmaking in the approve ARRF.No changes made.

Comment [e52]: May be allowed by 47-319(5)(e), does not fit neatly into 47-324. Not a request for an order, it is an objection.
A: Extensive changes largely removed, May 27.

Comment [e53]: Change "Commission" to "Director".
A: Done, May 27.

Comment [e54]: see above

Comment [e55]: What if the bond is not sufficient?
A: Bonding for well plugging and reclamation of the pad area is covered by the bond described in Section 220. If a violation occurs, then the operator is subject to enforcement actions under the authority of Idaho Code 47-325. In addition, the surface owner still has the ability to pursue damages in a civil claim against the Operator. Lastly, any violations, including spills or releases, will be a compliance issue handled by IDEQ and IDL, with support from IDWR as needed. Idaho Code 47-325 includes fines of up to $10,000 per day. No changes made.

Comment [e56]: 460 feet too high, should be smaller. 200 feet is better.
A: Original rule had an effective 460 setback. Oil well setbacks from unit boundaries in other states commonly varies from 100 feet to 500 feet. 330 is fairly common. The 920' spacing between oil wells is right in the range of most other states. Changed to 330. Done, July 5.

DRAFT

~~02.~~**b.** ~~**Wells Drilled for Gas; Standard Spacing Unit and Well Location.**~~ Every well drilled for gas must be located on a ~~drilling~~spacing unit consisting of approximately six hundred forty (640) contiguous surface acres, which shall be ~~one governmental section or lot(s) equivalent thereto~~rectangular in shape, upon which there is not located, and of which no part is attributed to, any other well completed in or drilling to the same pool. ~~In areas not covered by United States Public Land Surveys, such drilling unit shall consist of an area which is: 1) bounded by four (4) sides intersecting at angles of not less than eighty five (85) degrees or more than ninety five (95) degrees; 2) the distance between two (2) points farthest apart thereon shall not exceed eight thousand five hundred (8,500) feet; and 3) shall contain at least six hundred (600) contiguous surface acres. In areas covered by United States Public Land Surveys, such drilling unit shall consist of one governmental section containing not less than six hundred (600) surface acres.~~ A gas well must have a minimum setback of ~~three hundred thirty~~six hundred sixty (~~330~~660) feet from the ~~governmental section line~~spacing unit boundary. Gas wells shall be located at least two thousand six hundred forty (2,640) feet from any other gas well completed in and capable of producing gas from the same pool.~~(4-11-15)~~( )

02. Meaning of Well Location for Spacing. Well location for the purposes of this Section means where the producing interval is pierced by the well. If casing perforations in the producing interval extend for more than 10 feet along the length of the casing, then the mid-point of the producing casing perforations is the well location. ( )

03. Well Locations Adjacent to Spaced Areas. The Commission shall have the discretion to determine the pattern location of wells adjacent to an area spaced by the Commission, or under application for spacing where there is sufficient evidence to indicate that the pool or reservoir spaced or about to be spaced may extend beyond the boundary of the spacing order or application, and the uniformity of spacing patterns is necessary to insure orderly development of the ~~reservoir~~ pool. ~~(10-21-92)~~( )

04. ~~Exceptions~~Exceptional Well ~~to~~ Locations ~~of Wells~~ and Well-Spacing Orders. ~~Upon proper application therefore, the Department may approve, as an administrative matter, an exception to Subsections 120.01 and 120.02 or any order of the Commission establishing well spacing for a pool.~~ An operator may apply for an exceptional well location, and the application will be processed as described in Idaho Code § 47-324(c). The application for an exceptional well location shall ~~state fully the reasons why such an exception is necessary or desirable, provide all geologic evidence that supports the exception, include the consent of the owners of all drilling units directly or diagonally offsetting the drilling unit for which an exception is requested, and shall be accompanied by a plat showing:~~ include the following: ~~(4-11-15)~~( )

a. Affidavit that the applicant has leased the entire proposed spacing unit, unless integration is also being applied for as described in Subsection 120.05 below; ( )

b. A list of lessees and uncommitted owners in offset units, and list of applicant's lessors in the proposed and offset units; ( )

c. Affidavit that the applicant has notified the mineral interest owners and lessees and the applicant's lessors in the proposed and offset units, and supplied them with a copy of the application and instructions for response and participation in the hearing; ( )

d. A statement explaining fully the reasons why the exceptional well location is necessary or desirable; ( )

e. All geologic evidence, if any, that supports the exceptional well location; ( )

f. A map showing: ( )

~~a~~**i.** The location at which an oil or gas well could be drilled in compliance with Subsections 120.01 or 120.02 or the applicable order; (4-11-15)

~~b~~**ii.** The location at which the applicant requests permission to drill an oil or gas well and the location of the proposed spacing unit; and (4-11-15)

Comment [e57]: The spacing is less important than looking at the production data and determining the drainage area, this should determine the spacing unit.
A: This Subsection describes the default spacing in the absence of a field spacing order or any other data. Without production data, the drainage area cannot be determined. Done, July 5.

Comment [e58]: Should not be constrained by Section lines, this limits the 640 acre spacing available without an exception location.
Could have unintended consequences if Section lines are not used, as resources may be stranded. Do other states allow non-Section units?
A: Other states generally refer to unit boundaries, which are not required to coincide with Section lines. Resources may also be stranded due to faults or other factors that limit drainage. Infill drilling will pick up those resources if the cost justifies the additional well. Reference to Section lines deleted, June 3.

Comment [e59]: This should not be changed. It was negotiated two years ago, and is similar to what other states have. Look at well spacing in other states.
A: 1,320 original proposal. Generally, the larger default spacing unit in other states have larger setbacks from spacing unit boundaries and larger well spacings. Many states have boundary setbacks of 500 to 660 feet, and well spacings of 1,200 to 3,000 feet. Changed to 660. Done, July 5.

Comment [e60]: What about carried properties? Should this refer to an affidavit instead of a statement?
A: No provision, or definition, currently exists for "carried property". Could it be construed as leased, as defined in definition 010.32? Still being researched on June 9.
"Statement" changed to "affidavit" on June 9, also in 04.c.

Comment [e61]: List of lessees and uncommitted owners in adjoining units and applicant's lessors should be supplied, and they must provide notification to the mineral interest owners in proposed or offset units. Operator should send copy of application and notice of hearing to these people after IDL determines it is complete.
Colorado only requires 2 owners to integrate, so may make sense in their context. May not make sense otherwise.
A: The additional notifications are needed to protect correlative rights. Inserted as items 120.04.b and 04.c, June 6.

Comment [e62]: "evidence, if any, that" to match statutory language
A: Done, June 3.

DRAFT

~~c~~iii. The location at which oil or gas wells have been drilled or could be drilled, in agreement with Subsections 120.01 or 120.02 or the applicable order, directly or diagonally offsetting the proposed exception. No exceptional well location shall prevent any owner or operator from drilling an oil or gas well on adjacent lands, directly or diagonally offsetting the exceptional well location, at locations permitted by Subsections 120.01 or 120.02 or any applicable order of the Commission establishing oil or gas well-spacing units for the pool involved. (4-11-15)

iv. The location and size of the proposed spacing unit. ( )

v. The operator's existing leases in all spacing units directly or diagonally offsetting the spacing unit. ( )

05. Exceptional Well Location Combined With Integration. An operator who applies for an exceptional well location and does not have the proposed spacing unit under lease may simultaneously apply for integration of unleased tracts within the proposed spacing unit. The exceptional well location and integration applications will be processed together under Sections 130 and 140 of these rules. ( )

~~05~~06. Spacing Unit Changes. The ~~Commission~~Department will review applications to change the size or shape of established spacing units ~~established by Subsections 120.01 or 120.02 of these rules or an order by the Commission~~. Changes to spacing units may be authorized if the change would assist in preventing waste of oil or gas, avoid the drilling of unnecessary wells, or protect correlative rights. Spacing units will be based on geographic boundaries using Section and quarter quarter lines in the United States Public Land Surveys. The size and shape of the units may be adjusted as reasonably required due to geologic or other circumstances affecting the orderly development of a pool, Applications will be processed according to the procedures in Section 140 of these rules. ~~(4-11-15)~~( )

Comment [e63]: Can we throw out requirement for 55% in integration with this? Otherwise, Commission could change the unit size, which affects the 55% and then they no longer qualify for integration.
A: No, the 55% requirement is in statute and cannot be changed via this rule. Idaho Code 47-322(a) suggests that integrations and exception locations can be processed at the same time. The Operator proposes the spacing unit, so it is incumbant upon them to devise a spacing unit that protects correlative rights as well as develops the resource in an effecient and orderly manner. Preapplication meetings with the Department that resulted in all Department concerns being addressed would increase the likelyhood of a successful application.
Idaho Code 47-321(4) mentions that orders for exception locations may be granted when consent is obtained from unspaced lands where "the majority of mineral interest owners of those lands which would be included in directly or diagonally offsetting drilling units under said order, if said order were extended to include such additional lands." This confirms the possibility that the Commission could create drilling units different from those proposed in an application for an exceptional well location.

Comment [e64]: Same concerns about geologic units and not just sticking to the default spacing. Is using geologic data even allowed?
A: Idaho Code 47-321(2)(b) allows adjustments to size and shape of units based on geologic or other circumstances. The language has been modified to reflect this.
The default spacing is used to establish spacing in the absence of any data, as described in Idaho Code 47-321(2)(a). As production occurs, reservoir analysis can estimate what the optimum spacing is for a given pool. Idaho Code 47-321(3) gives authority for modification of spacing units.

DRAFT

a. The spacing of wells as described in Subsections 120.01 and 120.02 of these rules is temporary as stated in Idaho Code § 47-321(2)(a). A temporary spacing unit must remain in effect until superseded by an order that establishes a permanent spacing unit. Production and reservoir information shall be used to establish a permanent spacing unit. ( )

b. Permanent spacing units must result in the efficient and economic development of the pool as a whole. In establishing permanent spacing units, the Department determines the unit's acreage and shape based upon evidence introduced at the hearing. The Department may divide a pool into zones and establish spacing units for each zone if necessary. The spacing units within the zone may differ in size and shape from spacing units in any other zone but may not be smaller than the maximum area that can be efficiently and economically drained by one well. ( )

c. A spacing order may permit only one well to be drilled and completed in the common source of supply on any spacing unit. The well must be drilled at a location authorized by the order. An exceptional well location may be included in the request to establish permanent or temporary spacing units if, upon application, notice, and hearing, the Department finds that the spacing unit is located on the edge of a pool or field and adjacent to a producing unit, or that the required well location on the spacing unit would not be likely to produce in paying quantities, or that surface conditions would substantially add to the burden or hazard of drilling the well, or for other good cause shown. The Department shall act to offset any advantage that the person securing the exceptional well location may have over other producers by reason of drilling the well as an exception. The order must include provisions to prevent production from the spacing unit from being more than its just and equitable share of the producible oil and gas in the pool. ( )

d. An order establishing temporary or permanent spacing units for a pool must cover all lands determined or believed to be underlaid by the pool and may be modified by order of the Department to include additional areas subsequently determined to be underlain by the pool. ( )

121. -- 129. (RESERVED)

130. INTEGRATION.

When two (2) or more separately owned tracts or interests are within a spacing unit, the owners of the tracts or interests may voluntarily integrate their tracts or interests for the development and operation of the spacing unit. In the absence of voluntary integration and upon an application by an owner within a proposed spacing unit, the ~~Commission~~Department ~~may, either before or after drilling a well, make an~~ shall order ~~integrating~~ integration of all tracts or interests within the spacing unit for the development and operation of the spacing unit. ~~(4-11-15)~~( )

01. Integration Application Requirements. ~~Integration applications must be filed with the Commission in hard copy and electronic formats.~~ Applicants must submit one paper copy and one electronic copy of the application. The application must ~~contain~~ be accompanied by the following ~~information~~items:~~(4-11-15)~~( )

a. ~~Name and address of the applicant~~Information listed in Idaho Code § 47-322(d);~~(4-11-15)~~( )

b. ~~Description of the spacing unit to be integrated~~An application fee as described in Idaho Code § 47-320; and ~~(4-11-15)~~( )

c. ~~Plat of the subject spacing unit identifying the location of the well site, tank battery, gas processing facility, pipelines, and roads;~~Affidavit that certifies the applicant published a notice of the application as required by Idaho Code § 47-322(e). ~~(4-11-15)~~( )

~~**d.** A geologic statement explaining the likely presence of hydrocarbons; (4-11-15)~~

~~**e.** A statement of the proposed operations for the spacing unit, including the name and address of the proposed operator; (4-11-15)~~

~~f. A proposed joint operating agreement and a proposed lease form; (4-11-15)~~

Comment [e65]: Should be permanent to provide for orderly development.
A: Spacing should be based on the area that can be efficiently drained by one well. In most other states, this is already established through field spacing orders. Idaho has only had significant production since August of 2015. Once enough production occurs, reservoir analysis can be done to determine what the spacing should be.

Comment [e66]: Language is permissive in statute, and is talking about spacing changes in a hearing not the default spacing.
A: The exact reference in Idaho Code 47-321(2)(a) is for a propose modification to spacing determined by a hearing, but the same principle applies. Idaho Code 47-312(1) states that the Department shall promptly establish spacing units for each pool, except those pools where not enough data exists. The statute does not state what the default spacing should be in the absence of any data, so IDAPA 20.07.02.120.01 and 02 provides that guidance. In the absence of this guidance, the Department would seek an order establishing the size and shape of the spacing units as described in Idaho Code 47-321(2)(a). A complete absence of size or shape requirements for spacing would create disorderly development and hinder the protection of correlative rights, so the default spacing in the rules provides a valuable function.

Comment [e67]: IDL envisions this would be a field wide spacing order, but participants not sure if field spacing is addressed in this rule or in statute.
A: Field is defined in Idaho Code 47-318(e)as " the general area underlaid by one (1) or more pools." Field wide spacing is not fully described in the statute, but Idaho Code 47-320(3)(j) describes an application fee for "a field-wide spacing order". Spacing of pools is referenced throughout Idaho Code 47-321, and given the definition of "field" this could be extended to a field. Lastly, unitization of a field is described in Idaho Code 47-322(2)(a), and proposed spacing units must be described in the unit application. The rules do not specifically describe field spacing, but the spacing of pools appears to adequately describe the process.

DRAFT

g. A list of all mineral interest owners in the spacing unit and a list of the owners to be integrated under the application, including names, addresses, and respective acreages within the spacing unit; (4-11-15)

h. Affidavits indicating that at least fifty-five percent (55%) of the mineral interest owners in the spacing unit support the integration application by leasing or participating as a working interest owner; (4-11-15)

i. An affidavit stating the highest bonus payment paid to leased mineral interest owners prior to filing the integration application; and (4-11-15)

j. A resume of efforts documenting the applicant's good faith efforts on at least three (3) separate occasions within a period of time no less than sixty (60) days to inform mineral interest owners of the applicant's intentions to develop the mineral resources in the spacing unit and reach an agreement with owners in the spacing unit. At least one (1) contact must be by certified U.S. mail return receipt requested sent to an owner's last known address. If an owner of a tract cannot be found, the applicant must publish a legal notice in a newspaper in the county where the tract is located. The resume of efforts must show the applicant has exhausted all reasonable efforts to reach an agreement with owners in a spacing unit. (4-11-15)

02. Response to the Application and Hearing Processing Integration Applications. At the time the integration application is filed with the Commission, the applicant must certify that a copy of the integration application and supporting information was served on all mineral interest owners in the spacing unit to be integrated under the application. The affected mineral interest owners in the spacing unit will have twenty-one (21) days from the date of service of the application to file a response to the application with the Commission. The Commission will schedule a hearing on the application for integration. The applicant will give notice of the hearing to all mineral interest owners in the unit to be integrated under the application in the manner required by Section 47-324(b), Idaho Code.Applications will be processed as per Section 140 of these rules. (4-11-15)( )

131. INTEGRATION ORDERS.
The Commission will issue an integration order if the Commission approves an application for integration. The integration order will authorize the drilling and operation of a well in a spacing unit, prescribe the time and manner in which all owners in the spacing unit may elect to participate therein, and prescribe the manner for the payment of the costs of drilling and operating the well upon terms that are just and reasonable pursuant to Section 47-322, Idaho Code. (4-11-15)

01. Participation Terms. Upon issuance of an integration order by the Commission, the operator of the integrated spacing unit must issue an elections form to all non-leased owners in the spacing unit by certified U.S. mail, return receipt requested. The election form must clearly identify the participation terms, the course of action if an owner does not respond to the election form, and a response deadline. The terms in Subsections 131.02, 03, and 04 of these rules are available to non-leased owners in an integrated spacing unit. (4-11-15)

02. Working Interest Owner. An owner who elects to participate as a working interest owner will pay the proportionate share of the actual costs of drilling and operating a well allocated to the owner's interest in the spacing unit. Prior to the drilling operations, working interest owners who share in the costs of drilling and operating the well are entitled to their respective shares of the production of the well. The operator of the integrated spacing unit and working interest owners must enter into a joint operating agreement approved by the Commission in the integration order. (4-11-15)

03. Nonconsenting Working Interest Owner. An owner who refuses to share in the risk and actual costs of drilling and operating the well is a nonconsenting working interest owner. Nonconsenting working interest owners are entitled to their respective shares of the production of the well, not to exceed one-eighth (1/8) royalty, until the operator of the integrated spacing unit has recovered up to three hundred percent (300%) of the nonconsenting working interest owner's share of the cost of drilling and operating the well under the terms set forth in the integration order. After all the costs have been recovered by the consenting owners in the spacing unit, the nonconsenting owner owns the proportionate share in the well, surface facilities, and production, and will be liable for further costs as if the nonconsenting owner had originally agreed to pay the costs of drilling and operating the well. The operator of the

~~integrated spacing unit and nonconsenting working interest owners must enter into a joint operating agreement approved by the Commission in the integration order. (4-11-15)~~

~~**04. Lease**. An owner may enter into a lease with the operator of the integrated spacing unit under the terms and conditions in the integration order. The owner will receive one-eighth (1/8) royalty. The operator of an integrated spacing unit must pay a leasing mineral owner the same bonus payment per acre as the operator originally paid to other owners in the spacing unit prior to the issuance of the integration order. If an owner fails to make an election within the election period set forth in the integration order, such owner's interest will be deemed leased under the terms and conditions in the integration order. (4-11-15)~~

~~132~~131. -- ~~139~~134. (RESERVED)

~~140~~135. UNIT OPERATION AGREEMENTS.
Any person desiring to obtain the benefits of Section 47-323, Idaho Code, relating to any method of unit, cooperative development, or operation of a field or pool or a part of either, shall file an application with the Department ~~for approval of such agreement which shall have attached a copy of such agreement. Notice of the hearing of such application shall be given by publication of a legal notice in a newspaper of general circulation in Ada County, Idaho, and the county of the unit operation. (4-11-15)~~( )

01. Unit Operation Application. Applicants must submit one paper copy and one electronic copy of the application. The application must be accompanied by the following items: ( )

a. Information listed in Idaho Code § 47-323(3); ( )

b. An application fee as described in Idaho Code § 47-320; ( )

02. Processing Unit Operation Applications. Applications will be processed as per Section 140 of these rules. ( )

136. -- 139. (RESERVED)

140. PROCESSING APPLICATIONS NOT LISTED IN IDAHO CODE § 47-320

01. Applications Covered By This Section. Applications not processed under Section 040 of these rules must be processed as described in this Section. ( )

02. Preapplication Meeting. An applicant must meet with the Department staff at least five (5) but no more than twenty (20) business days prior to filing an application. The purpose of this meeting is to coordinate potential hearing dates. ( )

03. General Review Process. Applications will be processed as per Idaho Code § 47-324(c).( )

04. Resubmittal. The applicant may modify incomplete applications. The applicant may resubmit the modified application within fifteen (15) business days of the applicant receiving notice of an incomplete application. No additional application fee will be required within that 15 days, but new fees may be required if the Department receives the revised application past that 15 day dead line and the operator does not request an extension for good cause. ( )

05. Reimbursement for Mailing Costs. For integration and unitization applications, the Department will send the applicant an invoice after mailing copies of the application. The applicant must pay the invoice within thirty (30) days of receipt. ( )

141. -- 199. (RESERVED)

SUBCHAPTER C - DRILLING, WELL TREATMENT, AND PIT PERMITS

Comment [e68]: Should be longer, 20 business days?
A: Change made, July 5.

Comment [e69]: Business or Calendar days?
A: Business, change made June 9.

Comment [e70]: More flexibility needed.
A: IDL has 15 business days to completely review the application, so this timeframe is consistent.
A: Done, June 9.

Comment [e71]: Change "will" to "may"? Due to circumstances beyond their control, Force Majure, etc.
This could lead to inconsistency, and may be subject to misuse.
A: Some circumstances may require a longer time frame, so the change is acceptable as long as an extension is requested for reasonable cause. Done, June 9.

200. PERMIT TO DRILL, DEEPEN, OR ~~PLUG BACK~~ RE-ENTER.

01. Permits Required. The Department must receive an application and approve a permit before an operator begins ~~Prior to the commencement of~~ operations to drill~~,~~ or deepen~~, or plug back to any source of supply other than the existing producing horizon, application shall be delivered to the Department of intention to drill, deepen, or plug back~~ any well for oil or gas~~, and approval obtained~~. Drill pad construction may proceed prior to permit approval if a surface use agreement or lease is in place, and a sundry notice is submitted to IDL. No drilling or casing may occur until the permit to drill is approved by the Department. ~~(3-29-12)~~(_____)

02. ~~Fees~~Application Processing. ~~An application fee must accompany each application for permit to drill, deepen, or plug back. No service fee is required for a permit to deepen or plug back in a well for which the fee has been paid for permit to drill unless the drilling permit has expired.~~Applications will be processed as described in Section 040 of these rules. ~~(3-29-12)~~(_____)

03. Time Required to Commence Operations; Term of Permit. ~~On~~A permit to drill will expire on the first anniversary of the date of issuance of a permit to drill~~,~~ or deepen~~, or plug back, said permit will expire and be of no further force or effect,~~ unless the work for which the permit was issued has been started. Prior to the anniversary date, the owner or operator may apply for a one-time, six-month extension ~~if work has not started~~. If conditions have not changed and no changes to the permit are requested, the extension may be approved by the Department. If a permit expires ~~due to the failure to commence operations,~~ then ~~reapplication is required prior to commencing~~an operator must reapply before beginning operations. ~~(3-29-12)~~(_____)

04. Location of Wells. No oil or gas wells may be drilled within three hundred (300) feet of existing occupied structures without express written permission from the owner of the structure(s). (_____)

~~04~~05. Application. The Application for Permit to Drill shall include a Department approved form and the following: (3-29-12)

a. ~~An accurate plat~~A map with a surveyed well location at a scale of one (1) inch to one thousand (1,000) feet showing the location of the proposed well with reference to the nearest lines of an established public survey and with reference to the boundaries of the proposed spacing unit that conforms to the requirements in Subsections 120.01, 120.02, or any spacing requirement in a Commission Order. ~~(3-29-12)~~(_____)

b. The location of the nearest structure with a water supply, or the nearest water well as shown on the IDWR registry of water rights or well log database. (3-29-12)

c. Information on the type of tools to be used and the proposed logging program. (3-29-12)

d. Proposed total depth to which the well will be drilled, estimated depth to the top of the important geologic markers, and the estimated depth to the top of the target formations. (3-29-12)

e. A schematic diagram of the BOP and well head assembly. The schematic diagram should indicate the minimum size and pressure rating of all components of the well head and BOP assembly. (_____)

~~e~~f. The proposed casing program, including size and weight thereof, the depth at which each casing type is to be set. (3-29-12)

~~f~~g. The proposed type ~~and amount~~, number of sacks, and total volume of cement to be used, and the intervals cemented. ~~(3-29-12)~~(_____)

~~g~~h. Information on the drilling plan, including proposed type of mud. ~~(3-29-12)~~(_____)

~~h~~i. Best management practices to be used for erosion and sediment control. (3-29-12)

Comment [e72]: Are county grading permits required?
A: Unknown. With 44 different counties, this question potentially has 44 different answers. No change made, June 9.

Comment [e73]: If a surface use agreement or lease is in place then a prohibition on pad construction prior to permit approval is not needed.
In reclamation section, require reclamation of all pads constructed.
Instead, Sundry Notice with compliance to local regulations.
A: Changes made. No reference to local regulations included, as IDL cannot enforce local regulations.

Comment [e74]: "constructed" or "drilled?"
A: Changed to "drilled", June 9.

Comment [e75]: Should be farther, maybe 500.
A: 300' is similar to, or greater than, NFPA 30 for setbacks, and is the same as the tank batteries in this rule. 15' is the setback often recommended for plugged and abandoned wells. States have setbacks that vary from zero to 1,000 feet. Several are in the range of 200 to 500. No change, July 5.

Comment [e76]: The proposed type, number of sacks, etc.
A: Change made, June 9.

Comment [e77]: Does mud program need to address Petroleum versus water based mud?
A: Department will evaluate proposed mud with site specific conditions. Disposal covered under Subsection 310.13. Done, July 5.

DRAFT

ij. Plan for interim reclamation of the drill site after the well is completed, and a plan for final reclamation of the drill site following plugging and abandonment of the well. These plans must contain the information needed to implement reclamation as described in Subsection 310.16 and Section 510 of these rules. (4-11-15)

jk. Applications that include the following actions must also provide the information from thereqquired in each respective Section of these rules: (3-29-12)(_____)

i. Well treatments require the submittal of the information in Section 210. (4-11-15)

ii. Pit construction and use requires the submittal of the information in Section 230. (4-11-15)

iii. Directional or horizontal drilling requires the submittal of the information in Section 330. (4-11-15)

l. Affidavit that the operator has leases with all mineral interest owners in the spacing unit. (_____)

m. An application fee as described in Idaho Code § 47-320. (_____)

n. Bond meeting the requirements of Section 220 of these rules. (_____)

ko. Any other information which may be required by the Department based on site specific reasons. (3-29-12)

0506. **Permit Denial**. Applications may be denied for the following reasons: (3-29-12)

a. Application fee was not submitted. (3-29-12)

b. Application is incomplete. (3-29-12)

c. Failure to post required bonds. (3-29-12)

d. Proposedif the proposed well will result in a waste of oil or gas, a violation of correlative rights, or the pollution of fresh water supplies. (3-29-12)(_____)

201. MULTIPLE ZONE COMPLETIONS.

01. Requirements of the Owner or Operator; Request for Approval. A multiple zone completion may be approved by the Department upon application by the owner or operator and payment of an application fee, as herein provided. The application shall be accompanied by an contain the following items: (_____)

a. eExhibit showing the location of wells on applicant's lease and all offset wells on leases.;(_____)

b. and shall set forth aAll material facts involved and the manner and method of completion proposed, including a diagrammatic sketch of the mechanical installation of the proposed well.; (_____)

c. TheAn application fee may not exceed that required by Subsection 200.02 of these rules. Notice of the filing of such application shall be given by the applicant by mailing to each offset operator a notice containing a full description of the proposed completion for which approval is requested, and proof of mailing such notice shall be made by affidavit, which shall be attached to the application showing names and addresses of those to whom notice was mailed.as described in Idaho Code § 47-320; (4-11-15)(_____)

02. Conditions for Approval; Cause for HearingApplication Processing. In the event the Department is in agreement with the application and that no offset operator files a written objection to the application with the Department within fifteen (15) days of the date of the offset operator's receipt of application, the application

Comment [e78]: "Sworn statement" should be changed to "affidavit".
A: Done, June 9.

Comment [e79]: Does not allow carried interests.
A: No provision, or definition, currently exists for "carried property". Could it be construed as leased, as defined in definition 010.32? Is this allowed by statute and integration sections of code? Still being researched on June 9.

DRAFT

~~shall be approved as an amendment to the drilling permit. If any offset operator shall file in writing with the Department an objection to such multiple completion, or if the Department is not in agreement with the application, the matter shall be immediately set for hearing and Notice of Hearing duly given by the Department.~~ Applications will be processed as described in Section 040 of these rules. ~~(3-29-12)~~( )

03. Zone Effectiveness; Requirement for Production Testing. The Department may require such tests as necessary to determine the effectiveness of the segregation of the different productive zones. (3-29-12)

04. Commingling Production. The Department may require that oil or gas from multiple zones be produced through different sets of tubing, if needed to protect correlative rights or to prevent waste. (3-29-12)

202. -- ~~209~~204. (RESERVED)

205. RECOMPLETIONS AND PLUG BACK

01. An application for a recompletion or plug back in a well with an exception location that does not meet the spacing requirements in Subsections 120.01 and 120.02 will be processed under Section 140 of these rules.

02. Applications for recompletion or plug back must include the following: ( )

a. The applicable U.S. well number; ( )

b. A detailed statement of the proposed work, including: ( )

i. Description of proposed plugging materials, volumes, plug lengths, and methods as described in Subsection 502.05, as applicable to the intervals being plugged; ( )

ii. The proposed plug's depth from surface; ( )

iii. Depth and number of perforations proposed in the new target interval. ( )

206. SUNDRY NOTICES

Any person giving the Department a notice that does not require an approval or order will submit a sundry notice. These notices are required when the condition of a well is temporarily modified, such as, but not limited to, flow testing, starting production, workovers, etc. ( )

207. --209. (RESERVED)

210. WELL TREATMENTS.

01. Application Required. An Application for Permit to Drill required by Section 200 must include any plans for well treatment if they are known before the well is drilled. If well treatments are not covered in the original drilling permit, then ~~an application to amend the permit be made~~the operator must submit an application for well treatment to the Department with an application fee. Approval by the Department is required prior to the well treatments being implemented. Actions to clean the casing or perforations not in excess of pressures sufficient to overcome the fracture gradient in the surrounding formation are not considered to be well treatments, but operators must notify the Department when such actions occur. Applications for well treatments must include the ~~permit~~U.S. well number, well name, well location, as-built description if drilling has been completed, and the following: ~~(4-11-15)~~( )

a. Depth to perforations or the openhole interval; (3-29-12)

b. The source of water or type of base fluid; (3-29-12)

c. Additives, meaning any substance or any combination of substances including proppant, having a specified purpose that is combined with base treatment fluid by trade name, if available, and MSDS for each additive;

Comment [e80]: This is only true for wells that do not meet the minimum spacing requirements in Section 120.01 and 02. The well may not have been an exceptional location to begin with.
A: Change made, June 9.

Comment [e81]: Specify amount of cement or length of plug proposed.
A: Done, in 02.b.i above, June 9.

Comment [e82]: will submit? subject/verb issue
Done, June 9.

Comment [e83]: Do we need more specificity on this? Do counties get notified?
A: Idaho Code 47-317(10)(a) requires notification of a city or county upon receipt of an application. A sundry, however, is a notification and not an application, so the Department is not required to notify the city or county. The Department is working on a statewide database that would include this information, but at the current time these are only available through a public records request.

DRAFT

(3-29-12)

d. Type of proppant(s); (3-29-12)

e. Anticipated percentages by volume and total volumes of base treatment fluid, individual additives, and proppant(s); (3-29-12)

f. Estimated pump pressures; (3-29-12)

g. Method and timeline for the management, storage, and disposal of well treatment fluids, including anticipated disposal site of treatment fluids or plans for reuse; (3-29-12)

h. Size and design of storage pits, if proposed, in conformance with Section 230 of these rules; (4-11-15)

i. Information specific to hydraulic fracturing as described in Section 211 of these rules; (4-11-15)

j. Summary identifying all water bearing zones from the surface down to the bottom of the well; (3-29-12)

k. Fresh water protection plan that describes the proposed site specific measures to protect water quality from activities associated with well treatments. The Department will review this plan in consultation with the IDEQ. The Fresh Water Protection Plan shall include the following information: (3-29-12)

i. Ground water and storm water best management practices; (3-29-12)

ii. Statement certifying that the owner or operator is complying with Spill Prevention, Control, and Countermeasures (SPCC) requirements administered by the EPA; (3-29-12)

iii. A preconstruction topographic site map or aerial photos identifying all habitable structures, wells, perennial and intermittent springs, surface waters, and irrigation ditches within one-quarter (1/4) mile of the oil or gas well. The distance or location may be changed based on site specific factors such as horizontal drilling, the expected length of fractures, or lack of suitable water sample locations within one-quarter (1/4) mile; (3-29-12)

iv. A brief description of the structural geology that may influence ground water flow and direction; and (3-29-12)

v. The general hydrogeological characteristics of the treatment area and surrounding land. (3-29-12)

l. Certification by the owner or operator that all aspects of the well construction, including the suitability and integrity of the cement used to seal the well, are designed to meet the requirements of proposed well treatments; (3-29-12)

m. Affidavit signed by the owner or operator stating that all home owners and water well owners within one-quarter (1/4) mile of the oil or gas well, and all owners of a public drinking water system that have a IDEQ recognized source water assessment or protection area within one-quarter (1/4) mile of the oil or gas well, have been notified of the proposed treatment. If a well deviates from the vertical, these surface distances will be from the entire length of the wellbore from the surface to total depth. The notification will also offer an opportunity to have the owner or operator sample and test the water, at the owner or operator's cost, prior to and after the oil or gas well being treated. Notification shall be by certified mail to the surface owner as identified by the county assessor's records, or to the well owner as identified on the IDWR registry of water rights or well log database; (3-29-12)

n. Proof of publication in a newspaper of general circulation in the county where the well is located of a legal notice briefly describing the well treatment to be performed. Notice shall also advise all water well or public drinking water system owners, as described in Paragraph 210.01.m. of these rules, of the opportunity to have their water tested at the owner's or operator's cost before and after the well treatment; and (4-11-15)

Comment [e84]: We should require third party sampling to ensure integrity of the results.

What do water well drillers have for requirements? They work in the aquifers.

What do other state agencies do in Idaho for reporting and sampling? What about other states?
A: IDEQ typically requires that all sampling be done as per a sampling plan that follows EPA protocols. This includes a Quality Assurance Project Plan, duplicates, blanks, purging, and other measures that ensure good data is collected. Paragraph 08.c in this section requires IDEQ review of sampling programs, so this requirement can be met. Whether or not the operator samples or contracts with a consulting firm is immaterial. No change, July 5.

o. Additional information as required by the Department. (3-29-12)

02. Master Drilling/Treatment Plans. Where multiple stimulation activities will be undertaken for several wells proposed to be drilled in the same field within an area of geologic similarity, approval may be sought from the Department for a comprehensive master drilling/treatment plan containing the information required. The approved master drilling/treatment plan must then be referenced on each individual well's Application for Permit to Drill. (3-29-12)

03. Application Processing. Applications will be processed as described in Section 040 of these rules. ( )

~~03~~**04. Application Denial**. The Department may deny well treatment applications for one (1) or more of the following reasons: (3-29-12)

a. Application does not contain the information in Subsection 210.01 of these rules; (4-11-15)

b. Application fee was not submitted. (3-29-12)

c. Proposed treatment will result in a waste of oil or gas, a violation of correlative rights, or the pollution of fresh water supplies. (3-29-12)

~~04~~**05. Time Limit**. If a treatment approved in a ~~drilling permit or amended drilling~~ permit is not started within one (1) year of the approval of the well treatment, the ~~well treatment~~ permit will expire and reapplication will be required prior to conducting the well treatment. Prior to the anniversary date, the owner or operator may apply for a six-month (6) extension. If conditions have not changed, and no changes to the permit are requested, the extension may be approved by the Department. ~~(3-29-12)~~( )

~~05~~**06. Inspections**. The Department may conduct inspections prior, during, and after well treatments. (3-29-12)

~~06~~**07. Reporting Requirements**. A report on the well treatment must be submitted within thirty (30) days of the treatment. The report shall present a detailed account of the work done and the manner in which such work was performed, including: (3-29-12)

a. The daily production of oil, gas, and water both prior to and after the operation. (3-29-12)

b. The size and depth of perforations. (3-29-12)

c. Percentages by volume and total volumes of base treatment fluid, individual additives, and proppant(s). This requirement can be met by the submittal of well completion field tickets if they contain this information. (3-29-12)

d. Documentation demonstrating the chemicals used in the well treatment have been reported to the website www.fracfocus.org, its successor website, or another publicly accessible database approved by the Department. The chemical information must be reported in a systems approach. (4-11-15)

e. Information specific to hydraulic fracturing, as described in Section 211 of these rules. (4-11-15)

f. Static pressure testing results before and after the well treatment. (3-29-12)

g. The amounts, handling, and if necessary, disposal at an identified appropriate disposal facility, or reuse of the well stimulation fluid load recovered during flow back, swabbing, and/or recovery from production facility vessels. Reporting of recovered fluids shall be included with other monthly production reports required by the Department. Storage of such fluid shall be protective of ground water as demonstrated by the use of either tanks or authorized lined pits as described in Section 230 of these rules. (4-11-15)

h. Any other information related to operations which alter the performance or characteristics of the well. (3-29-12)

~~07~~08. Fresh Water Protections for Well Treatments. (3-29-12)

a. The Department will not authorize pits, lagoons, ponds, or other methods of subsurface storage for treatment fluids within IDEQ recognized source water assessment or protection areas for public drinking water systems. Owners or operators must store and transport treatment fluids using above ground storage facilities and tanker trucks for well treatments in these locations. (3-29-12)

b. The Department will not authorize well treatments to create fractures within five hundred (500) vertical feet above or below fresh water aquifers. (4-11-15)

c. The Department shall require the owner or operator to complete fresh water monitoring at the owner's or operator's cost before and after a well treatment unless the Department, in consultation with the IDEQ, determines that the proposed treatment does not pose a threat of pollution to fresh waters. The Department will review and approve all monitoring proposals with the IDEQ. The monitoring will be done using representative existing water wells or surface waters within one-quarter (1/4) horizontal mile of the treated well. For wells that deviate from the vertical, sampling may be required within one-quarter (1/4) horizontal mile of the wellbore's projected location on the surface. If no water wells or surface waters are present in this area, the sampling area may be enlarged as needed with approval by the Department. If the Department determines that existing water wells are not representative of the ground waters that could be impacted, then the Department may require the owner or operator to install one (1) or more ground water monitoring wells at the owner's or operator's cost. The owner or operator must obtain consent from appropriate property owners to gain access prior to any sampling or well construction. When monitoring is required by the Department, the operator will prepare a monitoring plan that includes the following: (3-29-12)

i. Location of proposed monitoring sites; (3-29-12)

ii. Construction details of any sampled or constructed wells including total well depth, depth of screened interval(s), screen size, and ~~drilling~~well log. For existing wells, the operator must make every reasonable attempt to locate this information; ~~(3-29-12)~~(_____)

iii. When possible, data from the existing wells collected within the last five (5) years and analyzed in a state or EPA certified drinking water lab; (3-29-12)

iv. List of proposed analytes, testing methods, and their detection limits; (3-29-12)

v. Additional tests such as stable isotopic analysis; and (3-29-12)

vi. Pre-treatment sampling and analysis when no relevant data exists, and a schedule for post-treatment sampling and analysis. (3-29-12)

d. The owner or operator will provide the Department with copies of any analysis or reports within thirty (30) days of samples being taken. All samples must be analyzed in a state or EPA certified drinking water lab. (3-29-12)

e. Pollution of fresh water supplies due to a well treatment is a violation of these rules and Title 47, Chapter 3, Idaho Code. (3-29-12)

211. HYDRAULIC FRACTURING.

01. Application Requirements. In addition to the information required by Subsection 210.01 of this rule, the owner or operator shall provide the following application information regarding hydraulic fracturing: (4-11-15)

a. The geological names and descriptions of the formation into which well stimulation fluids are to be injected; (3-29-12)

b. Detailed information on the base stimulation fluid source. For each stage of the well stimulation program, provide the chemical additives and proppants and concentrations or rates proposed to be mixed and injected, including: (3-29-12)

i. Stimulation fluid identified by additive type (such as but not limited to acid, biocide, breaker, brine, corrosion inhibitor, crosslinker, demulsifier, friction reducer, gel, iron control, oxygen scavenger, pH adjusting agent, proppant, scale inhibitor, surfactant); (3-29-12)

ii. The chemical compound name and Chemical Abstracts Service (CAS) number as found on the previously submitted MSDS shall be identified (such as the additive biocide is glutaraldehyde, or the additive breaker is ammonium persulfate, or the proppant is silica or quartz sand, and so on for each additive used); (3-29-12)

iii. The proposed rate or concentration for each additive and the total volume of each shall be provided (such as gel as pounds per thousand gallons, or biocide at gallons per thousand gallons, or proppant at pounds per gallon, or expressed as percent by weight or percent by volume, or parts per million, or parts per billion); and (3-29-12)

iv. The formulary disclosure of the chemical compounds used in the well stimulation(s) for the purpose of protecting public health and safety. (3-29-12)

c. A detailed description of the proposed well stimulation design that shall include: (3-29-12)

i. The anticipated surface treating pressure range; (3-29-12)

ii. The maximum injection treating pressure, which shall be within accepted safety limits. Accepted safety limits are generally eighty percent (80%) of the maximum pressure rating of the pressurized system; (4-11-15)

iii. The estimated or calculated fracture height in both the horizontal and vertical directions. (3-29-12)

02. Volatile Organic Compounds and Petroleum Distallates. The injection of volatile organic compounds, such as benzene, toluene, ethyl benzene and xylene, also known as BTEX compounds, or any petroleum distillates into ground water in excess of the applicable ground water quality standards is prohibited. Volatile organic compounds or petroleum distallates may be appropriate as additives, but they are not appropriate for use as the base fluids. The proposed use of volatile organic compounds or any petroleum distillates for well stimulation into hydrocarbon bearing zones may be authorized with prior approval of the director. Water that is produced with oil and gas, and which may contain small amounts of naturally occurring volatile organic compounds or petroleum distillates, may be used as well stimulation fluid in hydrocarbon bearing zones. (3-29-12)

03. Well Integrity. Prior to the well stimulation, the owner or operator will perform a suitable mechanical integrity test of the casing or of the casing-tubing annulus or other mechanical integrity test methods and submit an affidavit certifying that the well was tested in anticipation of proposed treatment pressures. The owner or operator will notify the Department of this test twelve (12) to twenty-four (24) hours in advance. (3-29-12)

04. Pressure Monitoring. During the well stimulation operation, the owner or operator shall monitor and record the annulus pressure at the casinghead. If intermediate casing has been set on the well being stimulated, the pressure in the annulus between the intermediate casing and the production casing shall also be monitored and recorded. If the annulus pressure increases by more than five hundred (500) psi gauge as compared to the pressure immediately preceding the stimulation, the owner or operator shall verbally notify the Department as soon as practicable but no later than twenty-four (24) hours following the incident. (3-29-12)

05. Post Treatment Report. In addition to the information required by Subsection 210.06 of this rule, the owner or operator shall provide the following post-treatment reporting: (4-11-15)

a. The actual total well stimulation treatment volume pumped; (3-29-12)

b. The actual surface pressure and rate at the end of each fluid stage and the actual flush volume, rate and final pump pressure; (3-29-12)

c. The instantaneous shut-in pressure, and the actual fifteen (15) minute and thirty (30) minute shut-in pressures when these pressure measurements are available; (3-29-12)

d. A continuous record of the annulus pressure during the well stimulation; (3-29-12)

e. A copy of the well stimulation service contractor's job log, without any cost/pricing data from the field ticket, in lieu of paragraphs (a) through (d) above. If the job log does not contain all the needed information, it must be supplemented with additional information needed to satisfy Paragraphs 211.05.a. through 211.05.d. of this rule. (4-11-15)

f. A report containing all details pertaining to any annulus pressure increases of more than five hundred (500) psi gauge as described in Subsection 211.04 of this rule. The report shall include corrective actions taken, if necessary. (4-11-15)

g. Results of post treatment fluid analysis used to help determine where the fluid can be disposed. (3-29-12)

212. -- 219. (RESERVED)

220. BONDING.

01. Individual Bond. The Department shall, except as hereinafter provided, require from the owner or operator a good and sufficient bond in the sum of not less than ten thousand dollars ($10,000) plus one dollar ($1) for each foot of planned well length in favor of the Department. The bond shall be conditioned upon the performance of the owner's or operator's duty to comply with the requirements of the Act and the rules of the Commission, with respect to the drilling, maintaining, operating, and plugging of each well drilled for oil and gas and the reclamation of surface disturbance associated with these activities. Said bond shall remain in force and effect until the plugging of said well is approved by the Department and the well site is reclaimed as described in Section 510 of these rules, or the bond is released by the Department. (4-11-15)

02. Blanket Bond. In lieu of the bond in Subsection 220.01 of this rule, any owner or operator may file with the Department a good and sufficient blanket bond covering all active wells drilled or to be drilled in the state of Idaho. The bond, or a bond rider, must list all the wells covered by the bond. The amount of the blanket bond will be as follows according to the number of active wells covered by the bond: ~~(4-11-15)~~( )

Comment [e85]: Why do bonds have to be submitted prior to permit approval?
A: Permits approved but not bonded must be monitored by the Department to ensure that drilling activities do not commence prior to the bond being submitted. This puts an additional monitoring burden on the Department. June 23.

a. Up to ten (10) wells, fifty thousand dollars ($50,000); (3-29-12)

b. Eleven (11) to thirty (30) wells, one hundred thousand dollars ($100,000); or (3-29-12)

c. More than thirty (30) wells, one hundred fifty thousand dollars ($150,000). (3-29-12)

03. Inactive Well Bond. An owner or operator must provide the Department with a bond of at least ten thousand dollars ($10,000) plus eight dollars ($8) for each foot of planned well length for each inactive well conditioned upon the performance of the duty to comply with the requirements of the Act and the rules of the Commission, with respect to the drilling, maintaining, operating, and plugging of each well drilled for oil and gas. Said bond shall remain in force and effect until the plugging of said well is approved by the Department, or the bond is released by the Department. Inactive wells may not be covered by a blanket bond as provided in Subsection 220.02 of this rule. (4-11-15)

04. Additional Bonding. The Department may impose additional bonding on an owner or operator given sufficient reason, such as non-compliance, unusual conditions, horizontal drilling, or other circumstances that

suggest a particular well or group of wells has potential risk or liability in excess of that normally expected. The owner or operator may request a hearing to appeal either the decision to impose an additional bond or the proposed amount of the bond. (3-29-12)

05. Authorized Bonds. The bond(s) referred to in Section 220 must be by a corporate surety authorized to do business in the state of Idaho or in cash. If cash is used to satisfy the bonding requirements in these rules, interest on the cash will be allocated to the general fund. (4-11-15)

221. TRANSFER OF DRILLING PERMITS.

No person to whom a permit has been issued shall transfer the permit to any other location or to any other person until the following requirements have been complied with: (10-21-92)

01. Prior to Drilling Well. If, prior to the drilling of a well, the person to whom the permit was originally issued desires to change the location, he shall submit a letter so stating and another application properly filled out showing the new location. Drilling shall not be started until the transfer has been approved and the new permit posted at the new location. (3-29-12)

02. During Drilling or After Completion. If, while a well is being drilled or after it has been completed, the person to whom the permit was originally issued disposes of his interest in the well, he shall submit a written statement to the Department setting forth the facts and requesting that the permit be transferred to the person who has acquired the well. (3-29-12)

03. Terms for Acceptance of Transfer. Before the transfer of a drilling permit shall be recognized, the person who has acquired the well must submit ~~a written statement setting forth that he has acquired such well and assumes full responsibility for its operation and abandonment in conformity with the law, rules, regulations, and orders issued by the Commission. If bond is required to guarantee compliance with the rules and regulations of the Commission, the person acquiring such well shall furnish bond.~~ the following: ~~(3-29-12)~~( )

a. A written statement setting forth that he has acquired such well and assumes full responsibility for its operation and abandonment in conformity with the law; ( )

b. If a bond is required, the person acquiring such well shall furnish the bond; and ( )

c. An Organization Report and Designation of Agent as required by Sections 032 and 033 of these rules if they have not been previously submitted. ( )

222. -- 229. (RESERVED)

230. PIT REQUIREMENTS.

01. Plans Required. If pits are proposed to be constructed in connection with another permit application required by these rules, then the owner or operator must include plans for pit construction in the application. If a pit is needed after the other permits have been approved, then a~~n~~ pit application ~~to amend the permit~~ must be made to the Department with an application fee. Approval by the Department is required prior to the pit being constructed unless the pit is necessary for an emergency action. Pit applications must include the ~~permit~~applicable U.S. well number, well name, well location, as-built description if drilling has been completed, proposed pit location, and plans for pit construction, operation, and reclamation. ~~(3-29-12)~~( )

02. Application Processing. Applications will be processed as described in Section 040 of these rules. ( )

~~02~~**03. Location**. (3-29-12)

a. Pits must be located where they are structurally sound and the liner systems can be adequately protected against factors such as wild fires, floods, landslides, surface and ground water systems, equipment operation,

Comment [e86]: Does IDEQ process include an inspection after construction?
A: Inspection is not required. Record plans must be submitted by an Idaho licenced professional engineer after construction. The engineer will ensure that the plans are accurate and construction has been completed in accordance with the plans. Done, July 5.

and public access. (3-29-12)

b. Pits located in a one hundred-year floodplain must ~~be in conformance~~conform with any applicable floodplain ordinances pertaining to activities within the one hundred-year floodplain. ~~(3-29-12)~~(_____)

c. Pits shall not be located within an IDEQ recognized source water assessment or protection areas for public drinking water systems. (3-29-12)

~~03~~**04.** **Site Preparation**. All sites must be properly prepared prior to pit construction. Vegetation, roots, brush, large woody debris and other deleterious materials, topsoil, historic foundations and plumbing, or other materials that may adversely affect appropriate construction, must be removed from the footprint of the pit unless approved by the Department. (3-29-12)

~~04~~**05.** **Pit Sizing Criteria**. (3-29-12)

a. Pits that have constructed berms ten (10) or more feet in height or hold fifty (50) acre-feet or more of fluid must also comply with the dam safety requirements of IDAPA 37.03.06, "Safety of Dams Rules." (3-29-12)

b. Pits must be designed to hold the maximum volume of fluids being used for drilling or well treatment and the volume of water associated with a one hundred-year, twenty-four-hour precipitation event. (3-29-12)

c. Snowmelt events shall be considered in determining the containment capacity. (3-29-12)

d. Pits that are left over winter must be able to contain one hundred twenty-five percent (125%) of the average annual precipitation that falls from October through May. (3-29-12)

e. Pits must be designed to maintain a minimum two (2) foot freeboard at all times. Contingency plans for managing excesses of fluids shall be described in the application. At no time shall fluids in a pit be allowed to escape from the ~~impoundment~~pit. ~~(3-29-12)~~(_____)

~~05~~**06.** **Minimum Plans and Specifications for Reserve, Well Treatment, and Other Short Term Pits**. Pits used for one (1) year or less, not including extensions, are short term pits. Construction plans and specifications for short term pits must include the requirements under Subsections 230.02 through 230.04 of this rule and the following: (4-11-15)

a. A prepared subbase, which shall be free of plus three (3) inch rocks, roots, brush, trash, debris or other deleterious materials, and compacted to ninety-five percent (95%) of Standard Proctor Test ASTM D698-07e1 or ninety-five percent (95%) of Modified Proctor Test ASTM D1557-09; (3-29-12)

b. Slopes of two (2) feet horizontal to one (1) foot vertical (2H:1V) or flatter for all interior and exterior pit walls. The top of a bermed pit wall must be a minimum of two (2) feet wide; (3-29-12)

c. A primary liner system consisting of a synthetic liner of at least twenty (20) mils thickness and constructed according to manufacturers' standards with at least four (4) inches of welded seam overlap and complete coverage on the floor and inside walls of the pit. Seams must run parallel to the line of maximum slope so they do not traverse across the slope. The liner edges shall be anchored in a compacted earth filled trench at least eighteen (18) inches in depth. The liner must be protected against cracking, sun damage, ice, frost penetration or heaving, wildlife and wildfires, and damage that may be caused by personnel or equipment operating in or around these facilities. Liner compatibility shall comply with EPA SW-846 method 9090A. Alternative liner systems with similar standards may be proposed by the owner or operator and approved at the Department's discretion; (3-29-12)

d. Minimum factors of safety, and the logic behind their selection, for the stability of the earthworks and the lining system of the pit; (3-29-12)

e. Site-specific methods for excluding people, terrestrial animals, and avian wildlife from the pits;

(3-29-12)

f. Segregation and stockpiling of topsoil in a manner that will support reestablishment of the pre-disturbance land use after pit closure; and (3-29-12)

g. A closure plan including the following: (3-29-12)

i. Testing of residual fluids and any accumulated solids, if anything other than water based drilling fluid was placed in the pit; (3-29-12)

ii. Plans for removal and disposal of residual fluids and accumulated solids, with the liner material, at an appropriate facility; (3-29-12)

iii. Regrading plan, replacement of topsoil, and erosion control measures; and (3-29-12)

iv. Reseeding and Revegetation. (3-29-12)

~~06~~07. Minimum Plans and Specifications for Long Term Pits. Pits used for more than one (1) year, not including extensions, are long term pits. Construction plans and specifications for long term pits must include the requirements under Subsections 230.02 through 230.05 of this rule and the following: (4-11-15)

a. A quality control/quality assurance construction and installation plan; (3-29-12)

b. Type of fluids to be contained in the pit; (3-29-12)

c. Secondary containment synthetic liners, which shall have a minimum thickness of sixty (60) mils consisting of HDPE and a maximum coefficient of permeability of 10^{-9} cm/sec, or comparable liners approved by the Department; (3-29-12)

d. Leak detection and collection systems. The plans and specifications shall: (3-29-12)

i. Provide a material between primary and secondary containment synthetic liners to collect, transport and remove all fluids that pass through the primary containment synthetic liner at such a rate as to prevent hydraulic head from developing on the secondary containment synthetic liner to the level at which it may be reasonably expected to result in discharges through the secondary containment synthetic liner; (3-29-12)

ii. Provide routines and schedules for the evaluation of the efficiency and effectiveness of the removal of fluids from the layer placed between primary and secondary containment synthetic liners. The properly working system shall continually relieve head pressures on the secondary containment synthetic liner; (3-29-12)

iii. Provide specific triggers for maintenance routines, which shall be initiated in response to inadequate performance of primary or secondary containment synthetic liners; and (3-29-12)

iv. Specify operation and maintenance procedures, which shall be initiated in response to inadequate performance of primary and secondary containment or leak detection and collection systems. (3-29-12)

e. All piping, including that contained in the leak detection and collection system, shall have a minimum wall thickness of PVC Schedule 80 and be designed to: (4-11-15)

i. Withstand chemical attack from oil field waste or leachate; (3-29-12)

ii. Withstand structural loading from stresses and disturbances from cover materials or equipment operation; and (3-29-12)

iii. Facilitate clean-out and maintenance. (3-29-12)

Comment [e87]: Is this done by operator or third party?
A: Sampling should be done as per a sampling plan that follows EPA protocols. This includes a Quality Assurance Project Plan, duplicates, blanks, and other measures that ensure good data is collected. This will be part of the closure plan. No change, July 5.

DRAFT

f. Protections for the liner from excessive hydrostatic force or mechanical damage at the point of discharge into, or suction from, the pit. External discharge or suction lines shall not penetrate the liner; (3-29-12)

g. Plans for erosion control during and immediately following construction; and (3-29-12)

h. Operating and maintenance plans. (3-29-12)

~~07~~**08**. **Time Limits for Short Term Pits**. Reserve, well treatment, and other short term pits must be closed out and reclaimed within one (1) year of being constructed. The owner or operator may request a one-time extension for up to six (6) months. The Department may grant the request if the owner or operator gives sufficient cause and presents a plan for ensuring that the pit is adequately monitored and maintained. (3-29-12)

a. Fluids may be left in a pit for up to six (6) months after the associated well activities are conducted. The owner or operator may request a one-time extension ~~for~~of up to one (1) year. The Department may grant the request if the owner or operator gives sufficient cause and presents a plan for keeping the fluids in a usable state. ~~(3-29-12)~~( )

b. Notwithstanding the above time limits, the owner or operator may request additional time based upon conditions wholly outside of the owner's or operator's control including, but not limited to, governmental lease requirements and delays related to difficult drilling conditions. The Department may impose additional construction or monitoring requirements prior to granting additional time. (3-29-12)

~~08~~**09**. **Emergency Pits**. Pits constructed during an emergency situation may be approved by an after-the -fact application submitted to the Department. The requirements in Subsections 230.02 through 230.05 of this rule shall apply, and the pit must be closed out and reclaimed within six (6) months of being constructed. The Department must be notified within twenty-four (24) hours of an emergency situation requiring an emergency pit. (4-11-15)

~~09~~**10**. **Operating Requirements**. (3-29-12)

a. Waste oil, hydraulic fluid, transmission fluids, trash, or any other miscellaneous waste products must not be disposed of in a pit. Placement of these materials into a pit may result in the creation of a mixed waste that requires handling and disposal as a hazardous waste. (3-29-12)

b. If a pit liner's integrity is compromised, or if any penetration of the liner occurs above the liquid's surface, then the owner or operator shall notify the appropriate Department area office within forty-eight (48) hours of the discovery and repair the damage or replace the liner. (3-29-12)

c. If a pit or closed-loop system develops a leak, or if any penetration of the pit liner occurs below the liquid's surface, then the owner or operator shall remove all liquid above the damage or leak line within forty-eight (48) hours, notify the appropriate Department area office within forty-eight (48) hours of the discovery, and repair the damage or replace the pit liner. (3-29-12)

d. The owner or operator shall install, or maintain on site, an oil absorbent boom or other device to contain and remove oil from a pit's surface. Visible oil must be removed from short term pits immediately following the cessation of activity for which the pit was constructed. Visible oil must be removed from long term pits as soon as it is discovered. (3-29-12)

~~10~~**11**. **Closure of Pits**. (3-29-12)

a. The owner or operator shall remove all liquids from the pit prior to closure and dispose of them at an appropriate facility or reuse them at a different location. If the nature of the fluids has substantially altered during their use, then the fluids must be sampled and tested to determine which disposal facility can accept them. (3-29-12)

b. Any solids that have been accumulated in the bottom of the pit will be tested to determine which disposal facility can accept the material. The solid material and liner will then be removed and disposed of at an appropriate facility. (3-29-12)

c. The owner or operator must notify the Department at least forty-eight (48) hours prior to removal of the pit liner so an inspection may be conducted. (3-29-12)

d. The pit foundation will be inspected for signs of leakage. If evidence of leakage is observed, the owner or operator must contact the Department and the IDEQ within twenty-four (24) hours and report the type of fluids released and the estimated extent of release. The owner or operator must then remediate the site in conformance with the applicable standards administered by IDEQ in IDAPA 58.01.02," Water Quality Standards," Sections 850 through 852. (3-29-12)

e. After addressing any pit leakage concerns, the owner or operator shall perform the activities described in Subsections 510.04 through 510.08 of these rules. (4-11-15)

~~11~~12. Condemnation Due to Improper Impoundment. The Department shall have authority to condemn any pit that does not properly impound fluids and order the disposal of such fluids in conformance with IDAPA 58.01.16, "Wastewater Rules," and other applicable rules. (3-29-12)

231. -- 299. (RESERVED)

SUBCHAPTER D - WELL SITES AND DRILLING

300. IDENTIFICATION OF WELLS.

01. Signs; Lease Access Roads. To identify all producing leases the owner or operator thereof shall cause a sign to be placed where the principal lease road enters the lease and such sign shall show the name of the lease and the owner or operator thereof and the section, township, and range. (10-21-92)

02. Signs; Well Sites. Prior to spud activity, a legible sign must be placed near the well to identify the operator, ~~permit~~ U.S. well number, well name, and emergency telephone number. If a multiple completion, each well head connection shall be identified. ~~(4-11-15)~~(_____)

301. WELL SITE OPERATIONS.

The owner or operator must conduct all operations and maintain the well site at all times in a safe and workmanlike manner. Best management practices and good housekeeping practices must be used at well sites. (4-11-15)

01. Fencing. Within sixty (60) days after completion of the well, the owner or operator must install a fence around the well site to maintain safe working conditions, secure the well site, and prevent access by wildlife and livestock. The fence design must be acceptable to both the ~~landowner~~surface owner and owner or operator. ~~(4-11-15)~~(_____)

02. Storage. All chemicals must be stored and maintained in accordance with the applicable MSDS requirements. Materials related to operations must be palletized where applicable. Vehicles and materials not in use must be removed from the well site. (4-11-15)

03. Vegetation. All well sites must be kept free of excessive vegetation. (4-11-15)

04. Trash. All trash, debris, and scrap metal must be removed from the well site. Pending removal, any trash or debris that might constitute a fire hazard shall be removed to a distance of at least one hundred (100) feet from the well location, tanks, and separator. (4-11-15)

05. Wellhead Equipment. After a well is completed, the operator will send a scaled drawing of the as built pad with all wellhead equipment to the Department. If equipment is added or removed during subsequent workovers or other activity, a revised sketch will be submitted with a sundry notice. (_____)

Comment [e88]: Can we clarify that the state regulates equipment on the wellpad so they do not have to get CUPs?
A: Subsection 05 added to address this concern and allow the Department to have an inventory of well head equipment in case of emergencies. June 24.

302. ACCIDENTS AND FIRES.

The owner or operator shall take all reasonable precautions to prevent accidents and fires. An emergency response plan will be prepared and available at the well for use or inspection. Coordination with local emergency responders and the Idaho Bureau of Homeland Security is recommended prior to rig set up. The following actions must be taken in event of a release, industrial accident, or fire of major consequence: (3-29-12)

01. Provide Information to Emergency Response. Emergency workers will be given information on all fluids or chemicals involved in a spill or accident as needed according to OSHA Standard 1910.1200 (Hazard Communication). Nothing in this rule shall authorize any person to withhold information that is required by state or federal law to be provided to a health care professional, a doctor, or a nurse. All information required by a health care professional, a doctor, or a nurse shall be supplied, immediately upon request, by the owner or operator, or their contractors, directly to the requesting health care professional, doctor, or nurse, including the percent by volume of the chemical constituents (and associated CAS numbers) in the fluids and the additives; (3-29-12)

02. Initiate Spill Response and Corrective Actions. Owner or operator must comply with the requirements of IDAPA 58.01.02, "Water Quality Standards," Sections 850 through 852; and (3-29-12)

03. Notify the Department. Notify the Department within twenty-four (24) hours and submit a full report thereon within fifteen (15) days. (3-29-12)

303. -- 309. (RESERVED)

310. GENERAL DRILLING RULES.

01. General Design Requirements for Casing and Cementing. Casing and cementing programs adopted for wells must be so planned as to protect any potential oil- or gas-bearing horizons penetrated during drilling from infiltration of injurious waters from other sources, and to prevent the migration of oil or gas from one horizon to another. Owners and operators shall follow the standards for casing and tubing in API SPEC 5CT and the standards for cementing in API SPEC 10A. (3-29-12)

02. Wildcat and High-Pressure Conditions. When drilling wildcat territory or in any field where high pressures are likely to exist, the owner or operator shall take all necessary precautions to keep the well under control at all times and shall use proper high-pressure fittings and equipment at the time the well is started. Under such conditions all strings of casings must be securely anchored. (3-29-12)

03. High Temperature Conditions. Due to high geothermal gradients in Idaho, the temperature of the return drilling mud shall be monitored daily during the drilling of the surface casing hole and all deeper holes. The owner or operator must use cements appropriate for the temperatures expected or encountered. (3-29-12)

04. Conductor Pipe or Casing Requirements. A minimum of forty (40) feet of conductor pipe shall be installed. If geologic conditions are such that forty (40) feet is not feasible, the owner or operator may request a variance from the Department. The annular space is to be cemented solid to the surface. A twenty-four (24) hour cure period for the grout must be allowed prior to drilling out the shoe unless sufficient additives, as determined by the Department, are used to obtain early strength. (3-29-12)

05. Surface Casing Requirements. (3-29-12)

a. The Department must be notified in writing seventy-two (72) hours in advance of planned spud activity for surface casing. The Department will post the spud activity notice on its website and send an electronic copy of the notice to the county where the well is located. (4-11-15)

b. Surface casing must be set at a minimum depth equal to ten percent (10%) of the proposed total depth of the well. In areas where pressures and formations are unknown, a minimum of two hundred (200) feet of surface casing shall be set. (3-29-12)

c. Surface casing shall provide for control of formation fluids, protection of fresh water, and for adequate anchorage of blow out prevention equipment. The casing must be seated through a sufficient series of low

Comment [e89]: What about volunteer fire-fighters? How do they get compensated if they get injured? Or is this better handled by county ordinance?
A: Unknown, and beyond the scope of these rules. Bill passed in 2016 allows volunteer firefighters to be covered by worker's compensation. Done, July 5.

Comment [e90]: Does this tie back to the Community Right to Know act? Check it out.
A: No, EPCRA is a separate act under the authority of EPA and not OSHA. Trade secret provisions are similar. EPCRA has similar spill reporting requirements as CERCLA. Done, July 5.

permeability, competent lithologic units such as claystone, siltstone, basalt, etc., to insure a solid anchor for blow out prevention equipment and to protect usable ground water from contamination. Additional surface casing may be required if the first string has not been cemented through a sufficient series of low permeability, competent lithologic units, or if rapidly increasing thermal gradients or formation pressures are encountered. ~~(4-11-15)~~(_____)

d. All surface casing shall be cemented solid to the surface by pump and plug, displacement, or other approved method. When surface samples are cured, additional drilling activities may commence. (3-29-12)

e. The Department must be notified in writing twenty-four (24) hours in advance of planned cementing activity for surface casing. The Department will witness and document all surface casing cementing activities. (4-11-15)

06. Requirements for BOP Equipment. Unless altered, modified, or changed for a particular pool(s) upon hearing before the ~~Commission~~Department, BOP and related equipment shall be installed and maintained during the drilling of all wells in accordance with the following rules: ~~(3-29-12)~~(_____)

a. BOP equipment installed on wells in which formation pressures to be encountered are abnormal or unknown shall consist of a double-gate, hydraulically operated preventer with pipe and blind rams or two (2) single-ram-type preventers; one (1) equipped with pipe rams, the other with blind rams and an annular type preventer. In addition, upper and lower kelly cocks, pit level indicators with alarms and/or flow sensors with alarms, and surface facilities to handle pressure kicks shall be installed prior to drilling any formation with known abnormal pressure. (10-21-92)

i. Accumulators shall maintain a pressure capacity reserve at all times to provide for operation of the hydraulic preventers and valves with no outside source. (10-21-92)

ii. In all other drilling operations, BOP equipment shall consist of at least one (1) double-gate preventer with pipe and blind rams or two (2) single-ram-type preventers, one (1) equipped with pipe rams, the other with blind rams, and sufficient valving to permit fluid circulation at the surface. (10-21-92)

b. All BOP equipment, choke lines, and manifolds shall be installed above ground level. Casing heads and optional spools may be installed below ground level provided they are visible and accessible. (4-11-15)

c. BOP equipment and related casing heads and spools shall have a vertical bore no smaller than the inside diameter of the casing to which they are attached. (3-29-12)

d. The working pressure rating of all BOP and related equipment shall equal or exceed the maximum anticipated pressure to be contained at the surface. (4-11-15)

e. All ram-type BOP and related equipment, including casing, shall be tested to the full working pressure rating of said equipment upon installation, provided that components need not be tested to levels higher than the lowest working pressure rated component. Annular type BOP and related equipment must be tested in conformance with the manufacturer's published recommendations. If, for any reason, a pressure seal in the assembly is disassembled, a test to a full working pressure rating of that seal shall be conducted prior to the resumption of any drilling operation. In addition to the initial pressure tests, ram-type BOP shall be checked for physical operation at least once per week and all components, again with exception of the annular-type BOP, tested at least once every twenty-one (21) days to at least fifty percent (50%) of the rated pressure of the BOP equipment and/or to the maximum anticipated pressure to be contained at the surface, whichever is greater. (4-11-15)

f. The Department will require an affidavit covering the initial pressure tests after installation signed by the owner, operator, or contractor attesting to the satisfactory pressure tests. The Department must be advised at least twenty-four (24) hours in advance of all tests. The Department may inspect and witness all BOP operations and testing. (4-11-15)

~~**g.** A schematic diagram of the BOP and well head assembly shall be submitted to the Department upon application for a permit to drill. The schematic diagram should indicate the minimum size and pressure rating of all~~

~~components of the well head and BOP assembly. (3-29-12)~~

~~h~~g. Studs on all well head and BOP flanges shall be checked for tightness each week. Hand wheels for locking screws shall be installed and operational, and the entire BOP and well head assembly shall be kept clean of mud and ice. (10-21-92)

~~i~~h. A drillstem safety valve shall be available on the rig floor at all times with correct thread for the pipe in use. (3-29-12)

~~j~~i. A drillstem float valve shall be installed in bit sub or as close to bit as reasonably possible. (3-29-12)

07. Intermediate Casing. (3-29-12)

a. Intermediate casing, if installed, shall be cemented solidly to the surface or to the top of the casing. (3-29-12)

b. Intermediate casing not run to surface will be lapped into at least one hundred (100) feet of the surface casing, or at least one hundred (100) feet of the next larger casing to provide overlap and secure a seal. (3-29-12)

c. Such casing shall be cemented and pressure tested before cement plugs are drilled. (3-29-12)

d. The Department must be notified in writing twenty-four (24) hours in advance of planned cementing activity for intermediate casing. The Department may witness and document all intermediate casing cementing activities. (4-11-15)

08. Production Casing; Cementing and Testing Requirements. (3-29-12)

a. If and when it becomes necessary to run a production casing, such casing shall be cemented and pressure tested before cement plugs are drilled. (3-29-12)

b. The Department must be notified in writing twenty-four (24) hours in advance of planned cementing activity for production casing. The Department may witness and document all production casing cementing activities. (4-11-15)

c. When not run to the surface, production casing will be cemented from the bottom of the hole up into at least one hundred (100) feet of the next larger casing to provide overlap and secure a seal. (3-29-12)

d. If the bottom plug will be drilled out, the open hole interval must be completed to protect any potential oil-bearing or gas-bearing horizons penetrated during drilling from infiltration of injurious waters from other sources, and to prevent the migration of oil or gas from one horizon to another. (3-29-12)

09. Step-off. An owner or operator may submit to the Department a step-off request to complete a new borehole from surface if a borehole without production casing deviates from vertical plumb by more than five (5) degrees. A step-off borehole must be drilled within the existing pad of the permitted well. The incomplete borehole must be plugged and abandoned in accordance with Section 502 of these rules. (4-11-15)

10. Well Control (Rotary Tools); Reserve Mud Tanks. When drilling with rotary tools, the owner or operator shall provide, as required by the Department, a reserve mud pit or tank of suitable capacity for the anticipated depth of the well and maintain an on-site supply of mud additives that can raise the mud weight by one (1) pound per gallon in case of loss of well control. (4-11-15)

11. Mud Pits. Before commencing to drill, proper and adequate mud pits shall be constructed for the reception and confinement of mud and cuttings and to facilitate the drilling operation. Special precautions shall be taken, if necessary, to prevent contamination of fresh waters. These pits must conform to the standards in Section 230

of these rules. If tanks will be used, then mud pits may not be required. (4-11-15)

12. Well Control (Cable Tools); Fluid Containment. Natural gas or oil which may be encountered in a substantial quantity in any section of a cabletool drilled hole above the ultimate objective shall be shut off with reasonable diligence either by mudding or by casing, or other approved method, and confined to its original source to the satisfaction of the Department. The use of cable tools for drilling activities requires written approval by the Department prior to spud activities. A request to use cable tools must include the following: (4-11-15)

a. Proposed pressure control measures; (4-11-15)

b. Diversion and disposal methods for stray gas; (4-11-15)

c. Safety protocols for mud weights and well controls; and (4-11-15)

d. Annual drill rig safety inspection information, including the date of last replacement of cables, draw works inspection report, and metallurgic report of safety compliance for structural integrity of the drill rig. (4-11-15)

13. Drilling Mud Disposal. Drilling mud will be disposed of at an appropriate facility in compliance with applicable state and federal requirements. (3-29-12)

14. Report of Water Encountered; Owner's or Operator's Duties. It shall be the duty of any owner or operator drilling an oil or gas well or drilling a seismic, core or other exploratory hole to report to the Department all potential water bearing zones encountered; such report shall be in writing and give the location of the well or hole, the depth at which the zones were encountered, the thickness of such zones, and the rate of flow of water if known. This requirement can be met by the submittal of the logs required in Section 340 of this rule. (4-11-15)

15. Spill Prevention, Control, and Countermeasures Plan. The owner or operator must have a Spill Prevention, Control, and Countermeasures Plan in conformance with the requirements of the EPA. This plan must be updated as needed when facilities or activities change. (3-29-12)

16. Interim Drill Site Clean Up. If a well is completed for production or other purposes, interim reclamation must be completed within six (6) months of the rig being removed. Interim reclamation includes the following activities: (3-29-12)

a. Debris and waste materials including, but not limited to, concrete, sack bentonite and other drilling mud additives, sand, plastic, pipe, and cable associated with the drilling, re-entry, or completion operations shall be removed and disposed of properly. (3-29-12)

b. All disturbed areas affected by drilling or subsequent operations, except areas reasonably needed for production operations or for subsequent drilling operations to be commenced within twelve (12) months, shall be reclaimed and revegetated to approximately the pre-drilling condition or to the condition specified in an agreement with the surface owner. The reclamation standards in Subsections 510.04 through 510.07 of these rules, shall apply. (4-11-15)

311. LOSS OF TOOL WITH RADIOACTIVE MATERIAL.

01. Recovery or Cementing of Tool. If a gamma ray tool, or some other tool containing radioactive material, becomes lost in a well, the owner or operator shall make every reasonable attempt to retrieve the tool from the well. If the tool cannot be recovered, the owner or operator must immediately cover the tool with cement sufficient to secure it in place and prevent it from contacting any fluids in the well. A whipstock or other approved deflection device shall be placed on top of the cement plug to prevent accidental or intentional mechanical disintegration of the radioactive source. (3-29-12)

02. Sidetracking. If the hole is later sidetracked above the radioactive material, the sidetracked hole must be at least fifteen (15) feet from the original hole with the lost radioactive material. (3-29-12)

03. Reporting. A report must be sent to the Department and IDEQ within thirty (30) days of cementing the tool. The report must describe the tool that was lost, the depth it was lost at, the specific type and amount of radioactive material in the tool, and an estimate of the length of cement covering the tool. This report may be included in a plugging report if the well will be plugged. (3-29-12)

312. CHOKES.
All flowing wells shall be equipped with adequate chokes or beans to properly control the flow thereof. (10-21-92)

313. USE OF EARTHEN RESERVOIRS.
Oil shall not be produced, stored, or retained in earthen reservoirs or in open receptacles. (10-21-92)

314. VACUUM PUMPS PROHIBITED.
The use of vacuum pumps or other devices for the purpose of placing a vacuum on any gas- or oil-bearing stratum is prohibited; however, the Department may upon application and hearing and for good cause shown permit the use of vacuum pumps. Applications will be processed as described in Section 140 of these rules. ~~(3-29-12)~~(_____)

315. PULLING OUTSIDE STRINGS OF CASING.
Casing shall not be recovered if its recovery will expose any abnormal pressure, lost circulation, oil, gas, or water zone. In pulling outside strings of casing from any oil or gas well, the space outside the casing left in the hole shall be kept and left full of mud-laden fluid of adequate specific gravity to seal off all fresh and saltwater strata and any strata bearing oil or gas which is not producing. Casing may not be pulled without first making application to the Department and receiving approval. The application must describe how fresh waters will be protected. Applications will be processed as described in Section 140 of these rules. ~~(3-29-12)~~(_____)

316. -- 319. (RESERVED)

320. MECHANICAL INTEGRITY TESTING.

01. Mechanical Integrity Testing. (3-29-12)

a. The mechanical integrity test shall include one (1) of the following tests to determine whether leaks are present in the casing, tubing, or packer: (3-29-12)

i. A pressure test with liquid or gas at a pressure of not less than three hundred (300) psi or the minimum injection pressure, whichever is greater, and not more than the maximum injection pressure; or (3-29-12)

ii. The monitoring and reporting to the Department, on a monthly basis for sixty (60) consecutive months, of the average casing-tubing annulus pressure, following an initial pressure test; or (3-29-12)

iii. In lieu of Subparagraphs 320.01.a.i. and 320.01.a.ii. of this rule, any equivalent test or combinations of tests approved by the Department. (4-11-15)

b. The mechanical integrity test shall include one (1) of the following tests to determine whether there are fluid movements in vertical channels adjacent to the well bore: (3-29-12)

i. Tracer surveys; (3-29-12)

ii. Cement bond log or other acceptable cement evaluation log; (3-29-12)

iii. Temperature surveys; or (3-29-12)

iv. In lieu of Subparagraphs 320.01.b.i. through 320.01.b.iii. of this rule, any other equivalent test or combination of tests approved by the Department. (4-11-15)

c. Mechanical integrity tests shall be performed at the rate of not less than one (1) test every five (5) years, regardless of well status. The first five-year period shall commence on the date the initial mechanical integrity

test is performed. (3-29-12)

02. Inactive Wells. If, at any time, surface equipment excluding the wellhead is removed or the well becomes incapable of production, a mechanical integrity test shall be performed within thirty (30) days. The mechanical integrity test for an inactive well shall be isolation of the wellbore with a bridge plug or similar approved isolating device set one hundred (100) feet or less above the highest perforations and a pressure test with liquid or gas at a pressure of not less than three hundred (300) psi surface pressure or any equivalent test or combination of tests approved by the Department. (3-29-12)

03. Prior Notification. Not less than ten (10) days prior to the performance of any mechanical integrity test required by this rule, any person required to perform the test shall notify the Department, in writing, of the scheduled date on which the test will be performed. (3-29-12)

04. Reporting Requirements. Mechanical integrity test results shall be submitted to the Department within thirty (30) days of testing. (3-29-12)

05. Mechanical Integrity Required. All wells shall maintain mechanical integrity. All wells that fail a mechanical integrity test, or that are determined through any other means to lack mechanical integrity, shall immediately be investigated by the owner or operator. The well shall be repaired or immediately shut down following the investigation. Repairs shall be completed within six (6) months, or the well shall be plugged and abandoned. If the repair cannot be completed within six (6) months, the owner or operator may request an extension and provide a plan for the repair, (3-29-12)

321. -- 329. (RESERVED)

330. WELL DIRECTIONAL CONTROL.

01. General Restrictions; Allowable Deviation. The maximum point at which a well penetrates the producing formation shall not unreasonably vary from the vertical drawn from the center of the hole at the surface. Deviation is permitted without special permission to remedy blowouts and, for short distances, to straighten the hole, sidetrack junk, or correct other mechanical difficulties. (10-21-92)

02. Controlled Directional Drilling. Except for the purposes recited in Subsection 330.01, no well hereafter drilled may be intentionally directionally deviated from the vertical unless the owner or operator thereof shall first file an application ~~and application fee to amend the drilling permit~~ and receive approval from the Department. Such application may be included with a drill permit application and shall contain the following information: ~~(4-11-15)~~( )

a. Name and address of the owner or operator. (3-29-12)

b. ~~Lease~~Well name, ~~well~~U.S. number, name of field and reservoir, and county. ~~(10-21-92)~~( )

c. Description of surface location and proposed location of the producing interval (footage from lease and section or block and survey lines). (10-21-92)

d. Reason for intentional deviation. (10-21-92)

~~**e.** List of offset operators and statement that each has been furnished a copy of the application by registered mail. (10-21-92)~~

~~**f**~~**e.** Signature of representative of owner or operator. (3-29-12)

~~**g.** Notification to offset operators that any objection they may have to the proposed intentional deviation of the well must be filed with the Department within fifteen (15) days of receipt of a copy of the application. (3-29-12)~~

~~h~~**f.** ~~The application shall be accompanied by a~~A neat, accurate ~~plat~~map or sketch of the lease and all offset leases showing the names of all offset operators and the surface and proposed producing interval locations of the well. ~~Plat~~Map shall be drawn to a scale which will permit facile observation of all pertinent data.~~(10-21-92)~~( )

g. An application fee as described in Idaho Code § 47-320. ( )

03. ~~**Copy of Application to Offset Operators**~~**Application Processing**. ~~At the time the application is filed with the Department, a copy of the application and the plat shall be forwarded by registered mail to all offset operators to the lease on which the well is to be drilled.~~ Applications will be processed as described in Section 040 of these rules. ~~(3-29-12)~~( )

~~**04. Department Action**. Upon receipt, the Department will hold the application for fifteen (15) days. If objection from any offset operator to the proposed intentional deviation is received within fifteen (15) days of receipt of the application by said operator, or if the Department is not in agreement with the proposed deviation, the application shall be set down for public hearing. If no objection from either an offset operator or the Department is interposed within the fifteen (15) day period, the application shall be approved and permit issued by the Department. If written consent of the offset operator(s) is filed concurrently with the application to drill directionally, the Department may immediately approve the application without waiting fifteen (15) days. (3-29-12)~~

~~05~~**04.** **Angular Deviation and Directional Survey**. Upon completion, a complete angular deviation and directional survey of the well obtained by an approved well surveying company shall be filed with the Department~~, together with other regularly required reports~~when the well report is submitted. ~~(3-29-12)~~( )

~~06~~**05.** **Application for Exceptions**. In the event the proposed, or final, location of the producing interval of the directionally deviated well is not in agreement with spacing or other rules of the Commission applicable to the reservoir, proper applications shall be made ~~to obtain approval of exceptions to such rules. Such approval shall be granted or denied at the discretion of the Department, and shall be accorded with the same consideration and treatment as if the well had been drilled vertically to the producing interval.~~ as described in Section 120 of these rules. ~~(3-29-12)~~( )

331. -- 339. (RESERVED)

340. WELL COMPLETION/RECOMPLETION REPORT AND WELL REPORT.
Within thirty (30) days after the completion of a well drilled for oil or gas, or the recompletion of a well into a different source of supply, or where the producing interval is changed, a completion report shall be filed with the Department, on a form prescribed by the Department. Such report shall include name, number, and exact location of the well; lease name, date of completion and date of first production, if any; name and depth of hydrocarbon reservoir(s)~~, if a multiple completion,~~ from which well is producing; annulus pressure test; initial production test, including oil, gas, and water, if any; a well report as defined in Section 010; and such other relevant information as the Department may require. ~~(3-29-12)~~( )

341. DRILLING LOGS.

01. Minimum Required Logs. All wells shall have a lithologic log from the bottom of the hole to the top, to the extent practicable. (3-29-12)

02. Bottom Hole Survey. All wells shall have a bottom hole location survey. (3-29-12)

03. Cement Bond Log. All wells that are cased and cemented shall have a cement bond log run across the casing. (3-29-12)

04. Other Logs. ~~If other logs are run, including, but not limited to, resistivity, gamma-neutron log, sonic log, etc., then the owner or operator shall retain a copy regardless of results.~~The operator shall run an open hole electrical, radioactivity, or other similar log, or combination of open hole logs, of the operator's choice. That log must show the formation tops and porosity zones. The operator shall also run a gamma ray log from total depth to ground level elevation. The Director may waive or postpone the obligation to log in this Subsection if he determines the log is

Comment [e91]: Does this mean mud log, or neutron density and resistivity? The latter may only be needed over the interval of interest.

Comment [e92]: If it does not pass the cement bond log, then what? Pressure test to see if it is isolated, then take proper corrective actions (squeeze job, top job).

Comment [e93]: These are subject to interpretation. Leave out porosity, and just state that the operator must show their best estimate of formation tops.

unnecessary. The Director can condition the waiver upon appropriate terms and conditions. ~~(3-29-12)~~( )

05. Log Submittal. ~~The~~Final processed versions of the above logs shall be submitted to the Department in paper and digital formats within thirty (30) days of the log being run. If logs were run in color, then the submitted copies shall also be in color. Digital formats must be Tiff and LAS 2.0 or higher. Logs submitted to the Department must have a scale of at least one (1) inch per one hundred (100) feet for correlation logs and five (5) inches per one hundred (100) feet for detail logs. ~~(4-11-15)~~( )

06. Other Records. Operators shall submit to the Department any copies of drill stem test reports and charts, formation water analyses, core analyses, geologic reports, and non-interpretive lithologic logs or sample descriptions. ( )

07. Cuttings and Side Cores. ( )

a. For all wells drilled for oil or gas exploration, the operator shall collect representative formation samples of drill cuttings. The operator shall wash and dry the cuttings, and package each sample in standard sample envelopes. These envelopes shall be placed in order by depth in a corresponding standard sample box that is labeled with the same information required for the envelopes. The operator shall send the box to the Department within thirty (30) days after drilling operations are complete. The operator of any well drilled for oil or gas shall inform the Director of all intervals that are to be cored, or have been cored. The operator must provide this notice while the well is being drilled or immediately following the well's completion. Unless specifically exempted by the Director, all side cores and whole cores taken shall be preserved, placed in a standard core box, and forwarded to the Department within one hundred eighty (180) days after completion of drilling operations. The Director may grant an extension of the one hundred eighty (180) day time period for good reason. If an exemption is granted, the operator shall advise the Director of the final disposition of the core. This section does not prohibit the operator from taking such samples of the core as the operator may desire for identification and testing. The operator shall submit to the Department all identification and testing results within thirty (30) days of the completion of such work. The Director may extend the thirty (30) day time period for good reason. ( )

b. Representative samples of drill cuttings means one of the following when drilled below the conductor casing: ( )

i. Samples taken every thirty (30) feet through non-productive intervals and every ten (10) feet through target intervals; or ( )

ii Samples taken every fifteen (15) minutes when the rate of penetration exceeds one hundred twenty (120) feet per hour. ( )

342. -- 399. (RESERVED)

SUBCHAPTER E - PRODUCTION

400. PRODUCTION REPORTS.

01. Required Content. An owner or operator must report production on a form created by the Department. Production reports submitted to the Department must include gas quantities sold in thousand cubic feet (mcf), condensate sold in barrel quantities (bbl), oil sold in barrel quantities (bbl), and formational waters produced in barrel quantities (bbl). (4-11-15)

02. Frequency. Initial production reports must be submitted to the Department no later than the twenty-first (21st) day of the month following the ~~sixth month after the beginning~~ initial month of production. After the initial production report, operators must report production monthly to the Department. Monthly reports must be submitted to the Department no later than the twenty-first (21st) day of the following month. In the event the twenty-first (21st) day of the month falls on a non-business day, the report is due the next business day. ~~(4-11-15)~~( )

Comment [e94]: 2 inch logs are the standard, but it is written in the permissive with 1 inch being the minimum.

Comment [e95]: Okay, but hardly used anymore due to modern logging methods.

Comment [e96]: This is okay

Comment [e97]: Too open ended, could be seismic data, isopach maps, etc.

Comment [e98]: Except for Montana, this is not a standard requirement.

Other state standards not important because we are in a wildcat situation.

Comment [e99]: Should be one year as is well logs. May need to have a statutory change even for this. If claimed as a trade secret, then the one year may not even apply.

Comment [e100]: If samples are taken, then provide a split to IDL.

Should require operator to hold samples, not automatically submit to IDL. IDL can request samples as needed.

Comment [e101]: Intervals are too close, not realistic. Should be subject to operator discretion.

Comment [e102]: No measurement requirement for condensate exists as it does for oil and gas in Sections 401 and 402.

A: The measurement requirements for oil and gas are partly to ensure that the oil-gas ratios are determined in a consistent manner. This has implications for well spacing. Also, condensate is defined by statute as being part of the gas, which makes a measurement standard difficult because it is a liquid at standard temperature and pressure and is measured by the barrel. No change, June 17.

Comment [e103]: Was negotiated in 2014 and should not be changed.
A: The Department needs to have access to production data as soon as possible. The current requirements create confusion for Department staff, other agencies, and the public. The majority of states require production reporting as soon as it occurs. Done, July 5.

Comment [e104]: Oil is paid 30 day Gas is paid 60 days out from production, so report 90 days from Production?

Or, 60 days from end of month of production?

DRAFT

03. Annual Production Report. By January 31 of each year, an owner or operator must submit to the Department an aggregated report of all hydrocarbons and formational waters produced and sold or disposed of for each well during the previous calendar year. (4-11-15)

Comment [e105]: May have similar issues as above, April 1??

401. MEASUREMENT OF OIL.
The volume of production of oil shall be computed in terms of barrels of clean oil on the basis of meter measurements or tank measurements of oil-level difference made and recorded to the nearest quarter-inch (1/4") of one hundred percent (100%) capacity tables, subject to the following corrections: (10-21-92)

01. Correction for Impurities. The percentage of impurities (water, sand, and other foreign substances, not constituting a natural component part of the oil) shall be determined to the satisfaction of the Department, and the observed gross volume of oil shall be corrected to exclude the entire volume of such impurities. (3-29-12)

02. Temperature Correction. The observed volume of oil corrected for impurities shall be further corrected to the standard volume at sixty (60) Degrees F in accordance with ASTM ~~D 1250-08, Table 7~~D1250 Tables, or any revisions thereof and any supplements thereto, or any close approximation thereof approved by the Department. ~~(3-29-12)~~(_____)

03. Gravity Determination. The gravity of oil at sixty (60) degrees F shall be determined in accordance with ASTM ~~D 1250-08, Table 5~~D1250 Tables, or any revisions thereof and any supplements thereto approved by the Department. ~~(3-29-12)~~(_____)

402. MEASUREMENT OF GAS.

01. Gas Metering. For protection of correlative rights of all parties, the owner or operator of a natural gas well shall meter or caused to be metered all natural gas produced from a well, utilizing a standard industry meter approved by the American Gas Association and capable of recording accurately the volume of natural gas produced at each well, unless another methodology, approved by the director, is utilized to provide for proper production allocation back to the individual well from a central point production meter or central point sales meter, which ever meter occurs first. (3-29-12)

02. Gas Measurement. For computing volume of gas to be reported to the Department, the standard of pressure shall be ~~fourteen point seventy-three (14.73)~~14.696 psi atmospheric, and the standard of temperature shall be sixty (60) Degrees F. All volumes of gas to be reported to the Department shall be adjusted by computation to these standards, unless otherwise authorized by the Department. ~~(3-29-12)~~(_____)

403. GAS-OIL RATIO FOR WELL CLASSIFICATIONS.
In the absence of an order by the Commission setting a field-specific oil-gas ratio, a well that produces gas of five thousand (5,000) cubic feet or greater to one (1) bbl of oil at standard temperature and pressure will be classified as a gas well. (4-11-15)

Comment [e106]: Is this correct? It is low. EPA and other states use 1,000,000.

Prior to 2012 rules, ratio was 2,000 to 1. See 20.07.02.280.03.b

404. GAS-OIL RATIO LIMITATION.

01. Waste Prevention; Conditions for Emergency Order. To further prevent waste resulting from the production of wells with inefficient gas-oil ratios, the Department may enter an emergency order temporarily prohibiting the production of oil or gas from all wells in a pool producing both oil and gas when the Department believes that waste may be occurring or is imminent in said pool by reason of the operation of wells with inefficient gas-oil ratios. The emergency order shall ~~specify a date for the hearing described~~ be in effect until a final order can be processed as described in Subsection 404.02 of these rules. The Department may use information provided by an offset operator or an owner or operator in a common source of supply to determine if waste is occurring. ~~(4-11-15)~~(_____)

02. ~~Notice and Cause for Hearing~~Final Orders. A final order regarding inefficient oil and gas ratios will be processed as described in Idaho Code § 47-324 The Department will ~~notify~~consider all offset operators and

owners or operators in the common source of supply ~~of the hearing date~~as interested parties in Idaho Code § 47-324(b). ~~A hearing~~An order regarding waste due to inefficient gas-oil ratios ~~will held~~is required for any of the following reasons: ~~(3-29-12)~~(_____)

i. If an emergency order is issued as described in Subsection 404.01 of these rules. ~~The hearing will be scheduled between five (5) and fifteen (15) days after the effective date of the order.~~ ~~(4-11-15)~~(_____)

ii. Upon application to the Department from any person with an ownership interest in the common source of supply who believes that waste is occurring due to inefficient oil and gas ratios. The application must include credible evidence of such waste. ~~The hearing shall be held within thirty (30) days of the Department receiving the application.~~ ~~(3-29-12)~~(_____)

iii. Prior to an emergency situation and upon its own motion with reasonable cause, the Department may ~~schedule a hearing~~request an order regarding potential waste due to inefficient gas-oil ratios. ~~(3-29-12)~~(_____)

03. Determination of Inefficient Ratios; Power to Limit Production. If the Department ~~after notice and hearing, whether held upon its own motion, upon the application of an interested party, or pursuant to an emergency order entered as hereinafter provided for, shall find~~ determines that a well(s) in the pool ~~are operating~~operates with inefficient gas-oil ratios, and that waste is occurring or is imminent as a result thereof, it shall enter an order limiting the production of oil and gas from said pool. The production will be limited to that amount which the pool can produce without waste and in accordance with sound engineering practice. The order shall also limit the amount of oil or gas, or both, that may be produced from any well in the pool, so that each owner or operator is given an opportunity to produce his just and equitable share in the pool in accordance with sound engineering practice. ~~(3-29-12)~~(_____)

405. GAS-OIL RATIO SURVEYS AND REPORTS.
Within thirty (30) days following the completion or recompletion of each well producing oil and gas and thereafter as the Department may require, the owner or operator of such well shall make a gas-oil ratio test of such well and the results of such test shall be reported to the Department within twenty (20) days after the test is made. Certain wells may be excepted from this rule by the Department upon written request. Entire fields may be excepted from this rule after notice and hearing. (3-29-12)

406. -- 409. (RESERVED)

410. METERS.

01. General Requirements. Meter fittings of adequate size to measure the gas efficiently for the purpose of obtaining gas-oil ratios shall be installed on the gas vent line of every separator or proper connections made for orifice well tester. Well-head equipment shall be installed and maintained in excellent condition. Valves shall be installed so that pressures can be readily obtained on both casing and tubing. (3-29-12)

02. Meter Calibration. All required meters shall be calibrated at least once per calendar year. The records of such calibration shall be maintained ~~or made available~~ by the owner or operator of the well and shall be available for inspection by the Department. Such records shall be maintained by the owner or operator for ~~a period of~~ at least five (5) years. ~~(3-29-12)~~(_____)

Comment [e107]: Who at IDL is checking on the meters and their calibration? Royalty owners and the state must be assured that meters are present and functioning.

A: Gas plant and production started in August of 2015, so production has not even occurred for one year yet. No specific rule changes suggested, so no changes, June 17.

03. Visibility. All required meters shall be accessible and viewable by the Department for the purpose of monitoring daily, monthly and/or cumulative production volumes from individual wells. (3-29-12)

411. SEPARATORS.
All flowing oil wells must be produced through an adequate oil and gas separator or emulsion treater, provided, however, the director may approve producing wells without a separator or emulsion treater. (10-21-92)

412. PRODUCING FROM DIFFERENT POOLS THROUGH THE SAME CASING STRING.
No well shall be permitted to produce either oil or gas from different pools through the same string of casing without first receiving written permission from the Department. (3-29-12)

413. GAS UTILIZATION.
After a well is completed and while it is being tested, the owner or operator may flare gas for no more than fourteen (14) days without paying royalties and severance taxes on the flared gas. Under no conditions may gas be flared for more than sixty (60) days after a well is completed or recompleted. Prior to flaring gas, owners or operators must notify the county in which the well is located and all owners of occupied structures within one-quarter (1/4) mile radius of the well. After the owner or operator has tested a well, no gas from such well shall be permitted to escape into the air, and all gas produced therefrom shall be utilized without waste. (4-11-15)

414. -- 419. (RESERVED)

420. TANK BATTERIES.
Tank batteries must meet the following requirements. (4-11-15)

01. Location of Tank Batteries. No tank batteries may be constructed within three hundred (300) feet of existing occupied structures, water wells, canal, ditches, the natural or ordinary high water mark of surface waters, or within fifty (50) feet of highways, as measured from the outermost portion of the tank dike. ~~The owner of a water well or existing occupied structure may provide express written permission to construct a tank battery closer than three hundred (300) feet, but in no event may a tank battery be constructed within one hundred (100) feet of a water well or existing occupied structure.~~The following exceptions may apply: ~~(4-11-15)~~( )

a. The owner of a water well or existing occupied structure may provide express written permission to construct a tank battery closer than three hundred (300) feet, but in no event may a tank battery be constructed within one hundred (100) feet of these features. ( )

b. The owner of a canal, ditch, or surface water may provide express written permission to construct a tank battery closer than three hundred (300) feet, and the Department may approve this location upon the operator showing good cause, but in no event may a tank battery be constructed within one hundred (100) feet of these features. ( )

02. Containment Requirements. All tank batteries consisting of tanks containing produced fluids or crude oil storage tanks or containing tanks equipped to receive produced fluids must be surrounded by tank dikes that meet the following requirements: (4-11-15)

a. Tank dikes must be designed to have a capacity of at least one and one-half (1½) times the volume of the largest tank which the dike surrounds. (4-11-15)

b. The material used to construct a tank dike and the material used to line the bottom and sides of the containment reservoir must have a maximum coefficient of permeability of 10-9 cm/sec so as to contain fluids and resist erosion. An operator must submit proof of compliance for tank dike liner construction to the Department in the form of a manufacturer's statement of design or a nuclear density test performed by a third party trained to perform the test. (4-11-15)

c. All piping and manmade improvements that perforate the tank dike wall or tank battery floor must be sealed to a minimum radius of twelve (12) inches from the outside edge of the piping or improvement. (4-11-15)

d. Valves and quick-connect couplers on tank batteries must be at least eighteen (18) inches from the inside wall of the tank dike unless adequate catchment guards are installed and maintained to catch incidental spillage. ~~(4-11-15)~~( )

e. Vegetation on the top and outside surface of tank dike must be properly maintained so as to not pose a fire hazard. (4-11-15)

f. A ladder or other permanent device must be installed over the tank dike to access the containment reservoir. (4-11-15)

Comment [e108]: Not adequate, should be 500 feet as per North Dakofa and Colorado.

A: 300' is similar to, or greater than, NFPA 30 for setbacks. Language is permissive for North Dakota, not absolute. States have setbacks that vary from zero to 1,000 feet. Several are in the range of 200 to 500. No change, July 5.

Comment [e109]: For water well owners and occupied structures the Department approving locations is not needed. Department approval only needed for canals, ditches, and surface waters.

A: Changes made, July 5.

g. The containment reservoir must be kept free of vegetation, stormwater, produced fluids, other oil and gas field related debris, general trash, or any flammable material. Drain lines installed through the tank dike for the purpose of draining storm water from the containment reservoir must have a valve installed which must remain closed and capped when not in use. Any fluids collected, spilled or discharged within the containment reservoirs must be removed as soon as practical, characterized, treated if necessary, and disposed in conformance with IDAPA 58.01.16, "Wastewater Rules," and other applicable rules. (4-11-15)

421. -- 429. (RESERVED)

430. GAS PROCESSING FACILITIES.
Gas processing facilities must meet the following requirements. (4-11-15)

01. Location of Gas Processing Facilities. No gas processing facility may be constructed within three hundred (300) feet of existing occupied structures, water wells, canal, ditches, the natural or ordinary high water mark of surface waters, or within fifty (50) feet of highways, as measured from the outermost portion of the gas processing facility. ~~The owner of a water well or existing occupied structure may provide express written permission to construct a gas processing facility closer than three hundred (300) feet, but in no event may a gas processing facility be constructed within one hundred (100) feet of a water well or existing occupied structure.~~The following exceptions may apply: ~~(4-11-15)~~( )

a. The owner of a water well or existing occupied structure may provide express written permission to construct a gas processing facility closer than three hundred (300) feet, but in no event may a gas processing facility be constructed within one hundred (100) feet of these features. ( )

b. The owner of a canal, ditch, or surface water may provide express written permission to construct a gas processing facility closer than three hundred (300) feet, and the Department may approve this location upon the operator showing good cause, but in no event may a gas processing facility be constructed within one hundred (100) feet of these features. ( )

02. Operations. Operators of gas processing facilities must notify the Department which wells, by API number, are served by a gas processing facility. All gas processing facilities not constructed on a well site must comply with the requirements in Sections 301 and 302 of these rules. (4-11-15)

03. Meters and Facility Plans. Gas processing facilities must account for all liquids and gas entering and leaving the facility with accurate meters. A supervisory control and data acquisition systems or other data recording system must be used to monitor the liquids and gas in the facility. Operators of gas processing facilities must submit an as-built facility design plan to the Department upon completion of the facility, a facility design plan must contain at the minimum: (4-11-15)

a. Site layout; (4-11-15)

b. Piping and instrumentation diagram; (4-11-15)

c. Process Flow schematics; (4-11-15)

d. Electronic controls and sensing schematic; and ~~(4-11-15)~~( )

~~**e.** Equipment operations and maintenance manuals for, pumps, meters, heat exchangers and any other operationally critical equipment that requires periodic maintenance and calibration; (4-11-15)~~

~~**f.** Periodic maintenance schedule for critical equipment; (4-11-15)~~

~~**g.** Troubleshooting metric; and (4-11-15)~~

~~**h.**~~**e.** Other information or documentation necessary for the safe and continued operation of a gas

Comment [e110]: Not adequate, should be 500 feet as per North Dakofa and Colorado.

A: 300' is similar to, or greater than, NFPA 30 for setbacks. Language is permissive for North Dakota, not absolute. States have setbacks that vary from zero to 1,000 feet. Several are in the range of 200 to 500. No change, July 5.

Comment [e111]: For water well owners and occupied structures the Department approving locations is not needed. Department approval only needed for canals, ditches, and surface waters.

A: Changes made, July 5.

Comment [e112]: B, c, and d, should be treated as items below.
A: IDL believes this information can be submitted and treated as a trade secret upon request. Done, July 5.

Comment [e113]: E through g, instead require IDL have access to the information. It is a combination of electronic and paper, lots of computer programs.
Public safety requires IDL to have this information. Should be routine information available on site.
A: Change made by transferring to new subsection. Done, June 24.

processing facility. (4-11-15)

04. Operational Details. The operator must also provide the Department access to the following documentation upon request: ( )

a. Equipment operations and maintenance manuals for, pumps, meters, heat exchangers and any other operationally critical equipment that requires periodic maintenance and calibration; ( )

b. Periodic maintenance schedule for critical equipment; and ( )

c. Troubleshooting metric. ( )

~~04~~05. Flaring. Flaring at gas processing facilities must be in conformance with IDAPA 58.01.01, Rules for the Control of Air Pollution in Idaho, and any permit issued by the IDEQ. (4-11-15)

~~05~~06. Inspections. Gas processing facilities must have site specific facility design plans and a log book of gas metered in and out of the facility available for review by Department staff during the inspections of gas processing facilities. During inspections, gas process facility staff must demonstrate knowledge of all operations and the location of all emergency shut off equipment, direction of flow lines, and heat exchangers. ~~The Department will conduct quarterly inspections of facilities. (4-11-15)~~( )

~~06~~07. Reports. A quarterly report must be submitted to the Department accounting for receipt, processing, and disposition of all gas by the gas processing facility within the reporting period. The report is due to the Department by the twenty-first (21st) day following the end of the reporting period. (4-11-15)

Comment [e114]: Is this wise? When will IDL inspect?
A: IDL will inspect as needed. Inspections may be more frequent during periods of maintenance or construction, and may be less frequent during routine operations. June 24.

Comment [e115]: Same timing issue as with monthly well production.

431. -- 499. (RESERVED)

SUBCHAPTER F - WELL ACTIVITY AND RECLAMATION

500. ACTIVE WELLS.

01. Gas Storage Wells. Gas storage wells are to be considered active at all times unless physically plugged. (3-29-12)

02. Extension of Active Status. An owner or operator may request an extension of active well status for wells that are idled for more than twenty-four (24) continuous months. The owner or operator shall provide a written request to the Department stating the reason for the extension, the length of extension, the method used to close the well to the atmosphere, and the plans for future operation. The Department shall review the request for approval, modification, or denial, and shall set the duration of the extension if approved. An extension shall not exceed five (5) years and may be renewed upon request. (3-29-12)

03. Annual Reports for Active Wells. The owner or operator shall submit an annual report to the Department describing the current status of the well and the plans for future well operation by January 31 of each year. Failure to submit the annual report may result in the Department declaring the well inactive. (4-11-15)

04. Biannual Pressure Reporting. All wells will be tested at least twice a year for daily production potential. Test results will be entered on a Department form and submitted to the Department within thirty (30) days of the test. These test results must include the following: ( )

a. A daily steady flow report of oil, gas, and water production; ( )

b. Choke size and tubing pressures. Both flowing and shut in pressures will be provided if available; and ( )

c. Interim bottom-hole pressure surveys. ( )

501. INACTIVE WELLS.

01. Determination of Inactive Status. The Department shall declare a well inactive after twenty-four (24) continuous months of inactivity if the owner or operator has not received approval for an extension of active status, or after an owner or operator fails to submit an annual report for an active well. The Department will immediately notify an owner or operator of this determination by certified mail, and the owner or operator may appeal this determination to the Commission. (3-29-12)

02. Owner's or Operator's Responsibility for Inactive Wells. The owner or operator must plug and abandon an inactive well in accordance with Section 502 of these rules within six (6) months of being notified by the Department unless the owner or operator supplies the following information within the six-month time period: (4-11-15)

a. A written request to extend inactive status; (3-29-12)

b. An individual bond, as provided for in Subsection 220.03 of these rules, if the well was covered by a blanket bond; and (4-11-15)

c. A description of how the well is closed to the atmosphere with a swedge and valve, packer, or other approved method, and how the well is to be maintained. (3-29-12)

03. Inactive Review and Decision. The Department shall review the request for approval, modification, or denial, and shall set the duration of the extension if approved. An extension shall not exceed three (3) years and may be renewed upon request. (3-29-12)

04. Testing of Inactive Wells. In addition to the requirements of Section 320 of these rules, inactive wells shall have a mechanical integrity test performed within two (2) years after the date of last use in order to retain inactive status. (4-11-15)

05. Converting Inactive Wells to Active Wells. The owner or operator must apply to the Department to change the status of a well from inactive to active. The Department shall review the request for approval, modification, or denial. A mechanical integrity test may be required by the Department if the well has been worked over or if a test has not been conducted for five (5) years or longer. If approved, the well may again be covered by a blanket bond. (3-29-12)

502. WELL PLUGGING AND ABANDONING.

01. Plugging Required. The operator or owner shall not permit any well drilled for oil, gas, saltwater disposal or any other purpose in connection with the production of oil and gas, to remain unplugged after such well is no longer used for the purpose for which it was drilled or converted. If plugging will occur within one year of the permit issuance for the well, then an additional application and fee as per this section of the rules is not needed. ~~(10-21-92)~~( )

Comment [e116]: Triggering should be different in case drilling occurs near end of permit time.
A: The proposed rule language mirrors that in Idaho Code 47-320(3)(c). No change, June 24.

02. ~~Notice of Intention to Abandon Well~~Application Required. ~~Before~~ An operator must file an application and the Department must approve a permit before beginning abandonment work on an oil or gas well~~, a Notice of Intention to Abandon shall be filed with the Department and approval obtained as to the method of abandonment before the work is started. The notice must show the reason for abandonment and must give a detailed statement of the proposed work, including such information as kind, location, and length of plugs (by depths), and plans for mudding, cementing, shooting, testing, and removing casing as well as any other pertinent information~~ that was approved by the Department more than a year prior to the abandonment. Applications will be processed as described in Section 040 of these rules. ~~(3-29-12)~~( )

03. Application Contents. Applications must contain the following: ( )

a. The reason for abandonment; ( )

b. A detailed statement of the proposed work, including: ( )

i. Kind, location, and length of plugs by depths; ( )

ii. Plans for mudding, cementing, shooting, testing, and removing casing; ( )

iii. Any other information which may be required by the Department based on site specific reasons. ( )

c. An application fee as described in Idaho Code § 47-320. ( )

~~03~~04. **Plugging Dry Holes**. If a nonproductive well, or dry hole, is drilled and not needed for any specific purpose, it must be plugged and abandoned prior to removal of the drill rig. A verbal notification and approval may be used for dry holes in lieu of the ~~written notification~~ plugging permit referenced in Subsection 502.02 of these rules. The standards in Subsections 502.0~~4~~5 through 502.0~~6~~7 of these rules will still apply. ~~(4-11-15)~~( )

~~04~~05. **Plugging of Wells**. The owner or operator of any well drilled for oil or gas, or any seismic, core, or other exploratory holes, whether cased or uncased, and regardless of diameter shall be responsible for the plugging of said hole in a manner sufficient to properly protect all freshwater-bearing and possible or probable oil- or gas-bearing formations. The material used in plugging, whether cement, mechanical plug, or some other equivalent method approved in writing by the Director, must be placed in the well in a manner to permanently prevent migration of oil, gas, water, or other substance from the formation or horizon in which it originally occurred. The preferred plugging cement slurry is that recommended in API Bulletin E3. Pozzolan, gel, and other approved extenders may be used if the owner or operator can document to the Department's satisfaction that the slurry design will achieve a minimum compressive strength of three hundred (300) psi after twenty-four (24) hours, and eight hundred (800) psi after seventy-two (72) hours measured at ninety-five (95) degrees F and at eight hundred (800) psi. No substances of any nature or description other than those normally used in plugging operations shall be placed in any well at any time during plugging operations. (3-29-12)

~~05~~06. **Plugged Intervals**. The following plugging standards shall be followed for all wells: (3-29-12)

a. Cement must be placed for a length of at least one hundred (100) feet on either side of each casing shoe, or casing bottom if no shoe is present. If the bottom of the hole is less than one hundred (100) feet from the bottom of the lowest casing, then the entire length of the uncased hole below the casing will be cemented. (3-29-12)

b. In the uncased portions of a well, cement plugs must be placed to extend from one hundred (100) feet below the bottom up to one hundred (100) feet above the top of any oil, gas, and abnormally high pressure zones, so as to isolate fluids in the strata in which they are found and to prevent them from escaping into other strata. (3-29-12)

c. A cement plug shall be placed a minimum of one hundred (100) feet above all producing zones in uncased portions of a well. (3-29-12)

d. A cement plug shall be placed a minimum of fifty (50) feet above and below the following intervals: (3-29-12)

i. Where the casing is perforated or ruptured. If no cement is present behind the casing, then cement must also be squeezed out the perforations or ruptures and into the annular space between the casing and the borehole. (3-29-12)

ii. Top and bottom of fresh water zones. If fresh water zone is less than one hundred (100) feet thick, then continuous cement must be placed from fifty (50) feet below the zone upward to fifty (50) feet above the zone. (3-29-12)

e. The top of all cement plugs will be tagged to verify their depth. (3-29-12)

f. The owner or operator shall have the option as to the method of placing cement in the hole by: (3-29-12)

i. Dump bailer; (3-29-12)

ii. Pumping a balanced cement plug through tubing or drill pipe; (3-29-12)

iii. Pump and plug; or (3-29-12)

iv. Equivalent method approved by the Director prior to plugging. (3-29-12)

g. Unless prior approval is given, all wellbores shall have water based drilling muds, high viscosity pills, or other approved fluids between all plugs. (3-29-12)

h. All abandoned wells shall have a plug or seal placed at the surface of the ground or the bottom of the cellar in the hole in such manner as not to interfere with soil cultivation or other surface use. The top of the pipe must be sealed with either a cement plug and a screw cap, or cement plug and a steel plate welded in place or by other approved method, or in the alternative be marked with a permanent monument which shall consist of a piece of pipe not less than four (4) inches in diameter and not less than ten (10) feet in length, of which four (4) feet shall be above the general ground level, the remainder to be embedded in cement or to be welded to the surface casing. (3-29-12)

~~06~~07. Subsequent Report of Abandonment. If a well is plugged or abandoned, a subsequent record of work done must be filed with the Department. This report shall be filed separately within thirty (30) days after the work is done. The report shall give a detailed account of the manner in which the abandonment of plugging work was carried out, including the weight of mud, the nature and quantities of materials used in plugging, the location and extent (by depths) of the plugs of different materials, and the records of any tests or measurements made and of the amount, size, and location (by depths) of casing left in the well. If an attempt was made to part any casing, a complete report of the method used and the results obtained must be included. (3-29-12)

~~07~~08. Wells Used for Fresh Water (Cold Water < 85 degrees Fahrenheit), Low Temperature Geothermal (85 - 212 Degrees Fahrenheit) or Geothermal Wells (>212 Degrees Fahrenheit). (3-29-12)

a. Oil and gas wells, seismic, core or other exploratory holes no longer being used for their original purpose may not be converted into fresh water, low temperature geothermal, or geothermal wells unless the following actions occur: (3-29-12)

i. Owner, operator, or surface owner files an application with the IDWR describing the conversion and the proposed use for the water or geothermal resource and any modifications necessary to meet the applicable well construction standards; (3-29-12)

ii. The surface owner provides written documentation assuming responsibility for the converted well including, should it become necessary, decommissioning (plugging) of the converted well in accordance with applicable law; (3-29-12)

iii. IDWR issues a permit for a geothermal resource well, a water right, or recognizes a domestic exemption authorizing the withdrawal of water from the converted well; and (3-29-12)

iv. A licensed driller in Idaho inspects and certifies that the converted well meets all well construction standards for its intended purpose. (3-29-12)

b. The Department's bond may not be released, and the oil and gas permit cancelled, until all requirements in Paragraph 502.07.a. of these rules are met. (4-11-15)

503. -- 509. (RESERVED)

510. SURFACE RECLAMATION.

01. Timing of Reclamation. After the plugging and abandonment of a well or closure of other oil and gas facilities, all reclamation work described in this Section shall be completed within twelve (12) months. The Director may grant an extension where unusual circumstances are encountered, but every reasonable effort shall be made to complete reclamation before the next local growing season. Drill pads constructed prior to drill permit approval are subject to the reclamation requirements of this Section. ~~(3-29-12)~~(_____)

02. General Clean Up. All debris, abandoned gathering line risers and flowline risers, surface equipment, supplies, rubbish, and other waste materials shall be removed within three (3) months of plugging a well. The burning or burial of such material on the premises shall be performed in accordance with applicable local, state, or federal solid waste disposal and air quality regulations. In addition, material may be burned or buried on the premises only with the prior written consent of the surface owner. (3-29-12)

03. Road Removal. All access roads to plugged and abandoned wells and associated production facilities shall be ripped, regraded, and recontoured unless otherwise specified in a surface use agreement. Culverts and any other obstructions that were part of the access road(s) shall be removed. Roads to be left will be graded to drain and prepared with rolling dips or other best management practices to minimize erosion. (3-29-12)

04. Regrading. Drill pads, pits, berms, cut and fill slopes, and other disturbed areas will be regraded to approximate the original contour. Where possible, slopes should be reduced to three (3) horizontal feet to one (1) vertical foot (3H:1V) or flatter. (3-29-12)

05. Compacted Areas. All areas compacted by drilling and subsequent oil and gas operations that are no longer needed following completion of such operations shall be cross-ripped. Ripping shall be undertaken to a depth of eighteen (18) inches or bedrock, whichever is reached first. (3-29-12)

06. Topsoiling. Stockpiled topsoil shall be replaced in a manner that will support reestablishment of the pre-disturbance land use and contoured to control erosion and provide long-term stability. If necessary, topsoiled areas shall be tilled adequately in order to establish a proper seedbed. (3-29-12)

07. Revegetation. (3-29-12)

a. The owner or operator shall select and establish plant species that can be expected to result in vegetation comparable to that growing on the affected lands prior to the oil and gas operations. Certified weed free seed should be used in revegetation. The owner or operator may use available technical data and results of field tests for selecting seeding practices and soil amendments that will result in viable revegetation. (3-29-12)

b. The disturbed areas shall be reseeded in the first favorable season following rig demobilization, site regrading, and topsoil replacement. (3-29-12)

c. Unless otherwise specified in the approved permit, the success of revegetation efforts shall be measured against the existing vegetation on site prior to the oil and gas operations, or against an adjacent reference area supporting similar types of vegetation. Reseeding or replanting is required until the following cover standards are met: (3-29-12)

i. The ground cover of living plants on the revegetated area should be comparable to the ground cover of living plants on an adjacent reference area for two (2) full growing seasons after cessation of soil amendment or irrigation, if used; (3-29-12)

ii. Ground cover shall be considered comparable if the planted area has at least seventy percent (70%) of the pre-disturbance, or adjacent reference area, ground cover; (3-29-12)

iii. For locations with an average annual precipitation of more than twenty-six (26) inches, the Department, in approving a drilling permit or a pit, may set a minimum standard for success of revegetation as follows: Vegetative cover of seventy percent (70%) for two (2) full growing seasons in areas planted to herbaceous species

only; or fifty percent (50%) vegetative cover for two (2) full growing seasons and six hundred (600) woody plants per acre in areas planted to a mixture of herbaceous and woody species; (3-29-12)

iv. As used in this section, "herbaceous species" means grasses, legumes, and other forbs; "woody plants" means woody shrubs, trees, and vines; and "ground cover" means the area of the ground surface covered by the combined aerial parts of vegetation and the litter that is produced naturally on-site, expressed as a percentage of the total area measured. Rock surface areas will be excluded from this calculation; and (3-29-12)

v. In all cases, vegetative cover shall be established to the extent necessary to control erosion. (3-29-12)

d. Introduced species may be planted if they are known to be comparable to previous vegetation, or if known to be of equal or superior use for the approved post-reclamation land use, or, if necessary, to achieve a quick, temporary cover for soil stabilization purposes. Species classified as poisonous or noxious weed species shall not be used in revegetation. (3-29-12)

e. By mutual agreement of the Department, the surface owner, and the owner or operator, a site may be converted to a different, more desirable or more economically suitable habitat. (3-29-12)

f. Planting of grasses and forbs should be done in a manner which promotes rapid stabilization of the soil surface. Wherever terrain permits, grasses and forbs should be drilled or compacted into the ground using agricultural grass planting equipment or other seeders specifically designed for revegetation applications. Broadcast and hydroseeding may be used on areas where other methods are impractical or unavailable. (3-29-12)

g. The owner or operator should plant shrubs or shrub seed, as required, where shrub communities existed prior to oil and gas operations. Shrub seed may be planted as a portion of a grass seed mix or planted as bare-root transplants after grass seeding. Where the surface owner desires a specific land use such as grazing or cropland, shrubs will not be required in the revegetation species mix. Shrub lands undergoing revegetation with shrubs shall be protected from erosion by vegetation, chemical binders, or other acceptable means during establishment of the shrubs. (3-29-12)

h. Tree stocking of forestlands should meet the following criteria: (3-29-12)

i. Trees that are adapted to the site should be planted in a density which can be expected over time to yield a timber stand comparable to pre-disturbance timber stands; (3-29-12)

ii. Trees shall be established for two (2) full growing seasons after cessation of any soil amendments and irrigation before they are considered to be established; and (3-29-12)

iii. Forestlands undergoing revegetation with trees should be protected from erosion by vegetation, chemical binders, or other acceptable means during seedling establishment. (3-29-12)

i. Revegetation is not required on areas that the surface owner wishes to incorporate into an irrigated field and any roads which will be used for other oil and gas operations. (3-29-12)

j. Mulch should be used on severe sites and may be required by the permit where slopes are steeper than three (3) horizontal feet to one (1) vertical foot (3H:1V) or the mean annual rainfall is less than twelve (12) inches. When used, straw, or hay mulch should be obtained from certified weed free sources. "Mulch" means vegetation residues or other suitable materials to aid in the stabilization of soil and soil moisture conservation which will provide a micro-climate more suitable for germination and growth on severe sites. Annual grains such as rye, oats, and wheat may be used as a substitute for mulch where they will provide adequate protection and will be replaced by permanent species within a reasonable length of time. (3-29-12)

08. Reclamation Under a Surface Use Agreement. Notwithstanding the requirements of Subsections 510.03 through 510.07 of this rule, reclamation may be superseded by the conditions of a surface use agreement as long as the site is left in a stable, non-eroding condition that will not impact fresh waters. (4-11-15)

511. -- 999. (RESERVED)

DRAFT