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AMENDED IN ASSEMBLY MARCH 7, 2016  
AMENDED IN ASSEMBLY FEBRUARY 16, 2016  
AMENDED IN SENATE JANUARY 27, 2016

**SENATE BILL**

**No. 380**

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**Introduced by Senator Pavley**  
**(Principal coauthors: Senators De León and Huff)**  
**(Coauthors: Senators Allen, Hertzberg, and Runner)**  
(Coauthor: Assembly Member Wilk)

February 24, 2015

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An act to add and repeal Section 3217 of the Public Resources Code, and to add ~~Section 713 to~~ *and repeal Sections 714 and 715 of* the Public Utilities Code, relating to natural gas, and declaring the urgency thereof, to take effect immediately.

LEGISLATIVE COUNSEL'S DIGEST

SB 380, as amended, Pavley. Natural gas storage: moratorium.

(1) Under existing law, the Division of Oil, Gas, and Geothermal Resources in the Department of Conservation regulates the drilling, operation, maintenance, and abandonment of oil and gas wells in the state. Existing law requires the State Oil and Gas Supervisor to supervise the drilling, operation, maintenance, and abandonment of wells and the operation, maintenance, and removal or abandonment of tanks and facilities related to oil and gas production within an oil and gas field, so as to prevent damage to life, health, property, and natural resources, as provided; to permit owners and operators of wells to utilize all known methods and practices to increase the ultimate recovery of hydrocarbons; and to perform the supervisor's duties in a manner that encourages the

wise development of oil and gas resources to best meet oil and gas needs in this state. Under existing law, a person who fails to comply with certain requirements relating to the regulation of oil or gas operations is guilty of a misdemeanor.

~~This bill would require the supervisor to immediately institute a moratorium on injections of natural gas into any gas storage wells located within and serving~~ *continue the prohibition against Southern California Gas Company injecting any natural gas into the Aliso Canyon natural gas storage facility located in the County of Los Angeles until specified conditions are met, including that the integrity of each gas storage well has been quantitatively and objectively evaluated using state-of-the-art technology, as determined by the supervisor with input from independent experts, and the risks posed by gas storage well failure have been evaluated.* *a comprehensive review of the safety of the gas storage wells at the facility is completed, as specified, the supervisor determines that well integrity has been ensured by the review, the risks of failures identified in the review have been addressed, the supervisor's duty to prevent damage to life, health, property, and natural resources, and other requirements is satisfied, and the Executive Director of the Public Utilities Commission has concurred via letter with the supervisor regarding his or her determination of safety. The bill would require the supervisor to determine criteria for the gas storage well comprehensive safety review with input from independent experts and would require the criteria to include, but not be limited to, specified tests and inspections.* The bill would require the division to hold at least one public meeting concerning the technical methods and equipment to be used to evaluate gas storage well integrity and the risks posed by gas storage well failure, request the independent experts to also develop objective criteria to assess the overall risk of the Aliso Canyon natural gas storage facility, and make that objective criteria available to the public. *to provide the public an opportunity to comment on the criteria. The bill would require the supervisor to direct the contracted independent experts to provide a methodology to be used in assessing the tests and inspections specified in the criteria. The bill would require the division to post the methodology on a public portion of its Internet Web site. The bill would require the operator of the facility to provide the division with the proposed maximum reservoir pressure and to include data and calculations supporting the basis for the pressure limit. The bill would authorize the supervisor to allow injections of natural gas into the facility once the gas storage well comprehensive*

*safety review is complete and the supervisor has approved the maximum and minimum reservoir pressure at the facility. The bill would also require the supervisor to prohibit that, before the completion of the gas storage well comprehensive safety review, the production of natural gas by any gas storage well originally drilled earlier than 1954 from gas storage wells at the Aliso Canyon natural gas storage facility located in the County of Los Angeles until specified conditions are met, except as specified: be limited to gas storage wells that have satisfactorily completed the testing and remediation required under the review, except as specified. The bill would require the supervisor to direct the operator of the facility to provide a plan to ensure, at the earliest possible time, the availability of sufficient gas production capacity using gas storage wells that have satisfactorily completed the testing and remediation required under the review. The bill would require all gas storage wells returning to service under these provisions to inject or produce gas only through the interior metal tubing, and would require the operator to conduct ongoing pressure monitoring and comply with any other requirements specified by the supervisor. The bill would require the gas storage wells at the facility that are plugged and abandoned pursuant to these provisions to be periodically inspected by the operator for leaks using effective gas leak detection techniques. The bill would require the division, with respect to the review and in a timely manner, to post all testing, inspection and monitoring results, and other safety review-related materials to a public portion of the division's Internet Web site. Because a violation of certain of these requirements would be a crime, the bill would impose a state-mandated local program. The bill would repeal these provisions on January 1, 2021.*

(2) Under existing law, the Public Utilities Commission is authorized to supervise and regulate every public utility in the state. *Under existing law, a violation of the Public Utilities Act or any order, decision, rule, direction, demand, or requirement of the commission is a crime.*

This bill would require the commission, no later than July 1, 2017, to determine the feasibility of minimizing or eliminating use of the Aliso Canyon natural gas storage facility located in the County of Los Angeles while still maintaining energy and electric reliability for the region, and to consult with specified entities in making its determination. *The bill would require the commission, in consultation with specified entities, to determine the range of working gas necessary to ensure safety and reliability for the region and just and reasonable rates in California, and to direct the operator of the facility to provide all*

*information the commission deems necessary to make that determination. The bill would require the commission, within 30 days of the effective date of this act, to publish a report, including specified information regarding gas production at the facility. The bill would require the commission to make the report available on its Internet Web site, and to seek public comments on the report, as specified. The bill would require the executive director of the commission, in consultation with the supervisor, to direct the operator of the facility to maintain the specified range of working gas after certain conditions have occurred. Certain provisions of this bill would be part of the act and an order or other action of the commission would be required to implement certain of the provisions. Because a violation of the bill’s provisions or of an order or decision of the commission would be a crime, this bill would impose a state-mandated local program by creating new crimes. The bill would repeal these provisions on January 1, 2021.*

(3) The California Constitution requires the state to reimburse local agencies and school districts for certain costs mandated by the state. Statutory provisions establish procedures for making that reimbursement.

This bill would provide that no reimbursement is required by this act for a specified reason.

(4) This bill would declare that it is to take effect immediately as an urgency statute.

Vote:  $\frac{2}{3}$ . Appropriation: no. Fiscal committee: yes.

State-mandated local program: yes.

*The people of the State of California do enact as follows:*

1 SECTION 1. ~~Section 3217 is added to the Public Resources~~  
 2 ~~Code, to read:~~  
 3 ~~3217.—(a) The supervisor shall immediately institute a~~  
 4 ~~moratorium on injections of natural gas into any gas storage wells~~  
 5 ~~located within and serving the Aliso Canyon natural gas storage~~  
 6 ~~facility located in the County of Los Angeles until all of the~~  
 7 ~~following conditions are met:~~  
 8 ~~(1) The integrity of each gas storage well has been quantitatively~~  
 9 ~~and objectively evaluated using state-of-the-art technology, as~~  
 10 ~~determined by the supervisor with input from independent experts,~~  
 11 ~~and the risks posed by gas storage well failure have been evaluated.~~

1 ~~(A) The age, history, and condition of each gas storage well~~  
2 ~~shall be specifically addressed, with particular emphasis on gas~~  
3 ~~storage wells drilled prior to 2006.~~

4 ~~(B) The technical methods and equipment used to evaluate gas~~  
5 ~~storage well integrity and the risks posed by gas storage well failure~~  
6 ~~shall be determined by the supervisor with input from independent~~  
7 ~~experts and the public.~~

8 ~~(C) The division shall hold at least one public meeting~~  
9 ~~concerning the technical methods and equipment. The division~~  
10 ~~shall request the independent experts to also develop objective~~  
11 ~~criteria to assess the overall risk of the Aliso Canyon natural gas~~  
12 ~~storage facility. The division shall make the objective criteria~~  
13 ~~available to the public.~~

14 ~~(2) Any gas storage well posing an enhanced risk of failure has~~  
15 ~~been repaired to mitigate the enhanced risk or plugged and~~  
16 ~~abandoned.~~

17 ~~(3) The supervisor determines that the overall risk from gas~~  
18 ~~storage well failure satisfies the supervisor's duty pursuant to~~  
19 ~~Section 3106 to prevent damage to life, health, property, and~~  
20 ~~natural resources, and other requirements, as specified in Section~~  
21 ~~3106.~~

22 ~~(4) The Public Utilities Commission and the State Energy~~  
23 ~~Resources Conservation and Development Commission concur~~  
24 ~~with the supervisor's determination in paragraph (3).~~

25 ~~(b) The supervisor shall prohibit the production of natural gas~~  
26 ~~by any gas storage well originally drilled earlier than 1954 at the~~  
27 ~~Aliso Canyon natural gas storage facility located in the County of~~  
28 ~~Los Angeles until after the integrity of and the risks associated~~  
29 ~~with any of these gas storage wells have been evaluated and~~  
30 ~~determinations by the supervisor, with the concurrence of the~~  
31 ~~commissions, have been made pursuant to the process described~~  
32 ~~in subdivision (a), except when necessary to do either of the~~  
33 ~~following:~~

34 ~~(1) Respond to the uncontrolled leak of natural gas from the~~  
35 ~~"Standard Sesnon 25" well (American Petroleum Institute~~  
36 ~~identification number 03700776).~~

37 ~~(2) Maintain regional energy reliability, at the written direction~~  
38 ~~of the commissions.~~

1 ~~(e) This section shall remain in effect only until January 1, 2021,~~  
2 ~~and as of that date is repealed, unless a later enacted statute, that~~  
3 ~~is enacted before January 1, 2021, deletes or extends that date.~~

4 *SECTION 1. Section 3217 is added to the Public Resources*  
5 *Code, to read:*

6 *3217. (a) (1) The supervisor shall continue the prohibition*  
7 *against Southern California Gas Company injecting any natural*  
8 *gas into the Aliso Canyon natural gas storage facility located in*  
9 *the County of Los Angeles until a comprehensive review of the*  
10 *safety of the gas storage wells at the facility is completed and the*  
11 *supervisor determines that well integrity has been ensured by the*  
12 *review, the risks of failures identified in the review have been*  
13 *addressed, and the supervisor’s duty to prevent damage to life,*  
14 *health, property, and natural resources, and other requirements,*  
15 *as specified in Section 3106, is satisfied. The supervisor may not*  
16 *lift the prohibition on injection until the Executive Director of the*  
17 *Public Utilities Commission has concurred via letter with the*  
18 *supervisor regarding his or her determination of safety.*

19 *(2) For purposes of this section, “facility” means the Aliso*  
20 *Canyon natural gas storage facility located in the County of Los*  
21 *Angeles operated by Southern California Gas Company.*

22 *(b) (1) The criteria for the gas storage well comprehensive*  
23 *safety review shall be determined by the supervisor with input from*  
24 *contracted independent experts and shall include the steps in*  
25 *subdivision (c). The division shall hold at least one public meeting*  
26 *to provide the public an opportunity to comment on the criteria.*

27 *(2) The supervisor shall direct the contracted independent*  
28 *experts to provide a methodology to be used in assessing the tests*  
29 *and inspections specified in the criteria. This requirement may be*  
30 *satisfied by the independent experts reviewing and, if necessary,*  
31 *revising the division’s written methodology for assessing the tests*  
32 *and inspections specified in the criteria. The methodology shall*  
33 *include all tests and inspections required by the criteria. The*  
34 *division shall post the methodology online on a public portion of*  
35 *its Internet Web site.*

36 *(c) The gas storage well comprehensive safety review shall*  
37 *include the following steps to ensure external and internal well*  
38 *mechanical integrity:*

39 *(1) All gas storage wells shall be tested and inspected from the*  
40 *surface to the packer or to any wellbore restriction near the top*

1 of the geologic formation being used for gas storage, whichever  
2 is higher in elevation, to detect existing leaks using temperature  
3 and noise logs.

4 (2) Any leaks shall be stopped and remediated to the satisfaction  
5 of the supervisor.

6 (3) Following remediation, leak detection tests shall be repeated  
7 and results reviewed by the supervisor.

8 (4) (A) Unless a well has been fully plugged and abandoned  
9 to the supervisor's satisfaction and in accordance with Section  
10 3208, the well shall be evaluated and remediated in accordance  
11 with subparagraph (B) or plugged in accordance with  
12 subparagraph (C).

13 (B) If a gas storage well is intended to return to service for the  
14 purposes of resuming injections to the facility, it shall be tested  
15 and inspected from the surface to the packer or to any wellbore  
16 restriction near the top of the geologic formation being used for  
17 gas storage, whichever is higher in elevation, to ensure mechanical  
18 integrity. As identified in the division's criteria, these tests and  
19 inspections shall include the measurement of casing thickness and  
20 integrity, an evaluation of the cement bond on the casing, the  
21 determination as to whether any deformities in the well casing  
22 exist, and an evaluation of the well's ability to withstand pressures  
23 that exceed maximum allowable injection and production  
24 pressures, with a reasonable margin for safety, at the facility in  
25 accordance with the criteria determined by the supervisor with  
26 input from independent experts pursuant to subdivision (b). If the  
27 tests reveal that a well poses a risk of failure, the supervisor shall  
28 require remediation and repeat tests as necessary to demonstrate  
29 to the satisfaction of the supervisor that remediation has mitigated  
30 any potential identified risks. If the operator cannot remediate the  
31 well to mitigate the identified risks to the satisfaction of the  
32 supervisor, the well shall be plugged and abandoned in accordance  
33 with Section 3208.

34 (C) (i) If a well is to be taken out of service before resumption  
35 of gas injections at the facility, it shall be removed from operation  
36 and isolated from the gas storage reservoir through plugging  
37 according to the division's criteria, including, but not limited to,  
38 the demonstration of sufficient cement to prevent migrations  
39 between the reservoir and other zones, placement of a mechanical  
40 plug at the bottom of the well, and subsequent filling of the well

1 *with fluid, and to specifications approved by the supervisor. All*  
2 *gas storage wells that are taken out of service under this*  
3 *subparagraph shall be subjected to ongoing testing and monitoring*  
4 *requirements identified in the criteria determined by the supervisor*  
5 *with input from independent experts. The monitoring shall include,*  
6 *but not be limited to, real-time and daily pressure monitoring, as*  
7 *applicable. A gas storage well shall not be returned to service*  
8 *unless the testing and remediation required under subparagraph*  
9 *(B) has been completed.*

10 *(ii) A gas storage well, within one year of being plugged and*  
11 *isolated from the gas storage reservoir pursuant to clause (i), shall*  
12 *either be returned to service by satisfactorily completing the testing*  
13 *and remediation required under subparagraph (B) or be*  
14 *permanently plugged and abandoned to the supervisor's*  
15 *satisfaction in accordance with Section 3208.*

16 *(D) The supervisor shall make a written finding for each gas*  
17 *storage well that has satisfactorily completed the testing and*  
18 *remediation required under subparagraph (B).*

19 *(5) The gas storage well comprehensive safety review is not*  
20 *complete until every gas storage well at the facility has completed*  
21 *the testing and remediation required under subparagraph (B) of*  
22 *paragraph (4), been temporarily abandoned and isolated from the*  
23 *reservoir as required under clause (i) of subparagraph (C) of*  
24 *paragraph (4), or been fully plugged and abandoned to the*  
25 *supervisor's satisfaction in accordance with Section 3208.*

26 *(d) (1) Before commencing injections at the facility, the*  
27 *operator of the facility shall provide the division with the proposed*  
28 *maximum reservoir pressure and include data and calculations*  
29 *supporting the basis for the pressure limit. The pressure limit shall*  
30 *account for the pressure required to inject intended gas volumes*  
31 *at all proposed inventory levels and the pressure limit shall not*  
32 *exceed the design pressure limits of the reservoir, wells, wellheads,*  
33 *pipng, or associated facilities with an appropriate margin for*  
34 *safety.*

35 *(2) The operator's proposed maximum reservoir pressure shall*  
36 *be subject to review and approval by the supervisor, and the*  
37 *supervisor shall consult with independent experts regarding the*  
38 *appropriate maximum and minimum reservoir pressure at the*  
39 *facility.*

1 (e) Once the gas storage well comprehensive safety review is  
2 complete pursuant to paragraph (5) of subdivision (c) and the  
3 supervisor has approved the maximum and minimum reservoir  
4 pressure pursuant to paragraph (2) of subdivision (d), the  
5 supervisor may allow injections of natural gas at the facility.

6 (f) All gas storage wells returning to service pursuant to  
7 subdivision (e) shall only inject or produce gas through the interior  
8 metal tubing and not through the annulus between the tubing and  
9 the well casing. The operator shall also conduct ongoing pressure  
10 monitoring and comply with any other requirements specified by  
11 the supervisor.

12 (g) The gas storage wells at the facility that are plugged and  
13 abandoned in accordance with Section 3208 pursuant to this  
14 section shall be periodically inspected by the operator for leaks  
15 using effective gas leak detection techniques such as optical gas  
16 imaging.

17 (h) (1) Before the completion of the gas storage well  
18 comprehensive safety review, production of natural gas from gas  
19 storage wells at the facility shall be limited to gas storage wells  
20 that have satisfactorily completed the testing and remediation  
21 required under subparagraph (B) of paragraph (4) of subdivision  
22 (c) unless insufficient production capacity is available. Only if  
23 production capacity supplied by the tested and remediated wells  
24 is demonstrably insufficient may the supervisor allow other gas  
25 storage wells to be used.

26 (2) The supervisor shall direct the operator of the facility to  
27 provide a plan to ensure, at the earliest possible time, the  
28 availability of sufficient gas production capacity using gas storage  
29 wells that have satisfactorily completed the testing and remediation  
30 required under subparagraph (B) of paragraph (4) of subdivision  
31 (c).

32 (i) With respect to the gas storage well comprehensive safety  
33 review at the facility, all testing, inspection and monitoring results  
34 reported to the division, gas storage well compliance status, any  
35 required remediation steps, and other safety review-related  
36 materials shall be posted in a timely manner by the division online  
37 on a public portion of its Internet Web site.

38 (j) This section shall remain in effect only until January 1, 2021,  
39 and as of that date is repealed, unless a later enacted statute, that  
40 is enacted before January 1, 2021, deletes or extends that date.

1 SEC. 2. Section ~~713~~714 is added to the Public Utilities Code,  
2 to read:

3 ~~713.~~

4 714. (a) The commission, no later than July 1, 2017, shall  
5 determine the feasibility of minimizing or eliminating use of the  
6 Aliso Canyon natural gas storage facility located in the County of  
7 Los Angeles while still maintaining energy *and electric* reliability  
8 for the region. *This determination shall be consistent with the*  
9 *Clean Energy and Pollution Reduction Act of 2015 (Chapter 547*  
10 *of the Statutes of 2015) and Executive Order B-30-2015.* The  
11 commission shall consult with the State Energy Resources  
12 Conservation and Development Commission, the Independent  
13 System Operator, the local publicly owned utilities that rely on  
14 natural gas for electricity generation, the Division of Oil, Gas, and  
15 Geothermal Resources in the Department of Conservation, *affected*  
16 *balancing authorities*, and other relevant government entities, in  
17 making its determination.

18 (b) *This section shall remain in effect only until January 1, 2021,*  
19 *and as of that date is repealed, unless a later enacted statute, that*  
20 *is enacted before January 1, 2021, deletes or extends that date.*

21 SEC. 3. Section 715 is added to the Public Utilities Code, to  
22 read:

23 715. (a) *The commission shall direct the operator of the Aliso*  
24 *Canyon natural gas storage facility located in the County of Los*  
25 *Angeles to provide all information the commission deems necessary*  
26 *for the commission to determine, in consultation with the State*  
27 *Energy Resources Conservation and Development Commission,*  
28 *the Independent System Operator, and affected publicly owned*  
29 *utilities, the range of working gas necessary to ensure safety and*  
30 *reliability for the region and just and reasonable rates in*  
31 *California. The determination shall be based on best available*  
32 *data, and shall incorporate data from recent and on-going studies*  
33 *being conducted to determine energy and gas use in the region by*  
34 *the commission, the State Energy Resources Conservation and*  
35 *Development Commission, the Independent System Operator, and*  
36 *affected publicly owned utilities.*

37 (b) *Within 30 days of the effective date of the act adding this*  
38 *section, the commission shall publish a report that includes, but*  
39 *is not limited to, all of the following:*

1     (1) *The range of working gas necessary at the facility to ensure*  
2 *safety and reliability and just and reasonable rates in California*  
3 *determined pursuant to subdivision (a).*

4     (2) *The amount of natural gas production at the facility needed*  
5 *to meet safety and reliability requirements.*

6     (3) *The number of wells and associated injection and production*  
7 *capacity required.*

8     (4) *The availability of sufficient natural gas production using*  
9 *gas storage wells that have satisfactorily completed testing and*  
10 *remediation required under subparagraph (B) of paragraph (4)*  
11 *of subdivision (c) of Section 3217 of the Public Resources Code.*

12     (c) *The commission shall make the report required under*  
13 *subdivision (b) available on its Internet Web site and seek, either*  
14 *through written comments or a workshop, public comments on the*  
15 *report.*

16     (d) *The executive director of the commission, in consultation*  
17 *with the State Oil and Gas Supervisor, shall direct the operator*  
18 *to maintain the specified range of working gas, determined*  
19 *pursuant to subdivision (a), at the facility to ensure reliability and*  
20 *just and reasonable rates in California, after all of the following*  
21 *occur:*

22     (1) *The gas storage well comprehensive safety review is*  
23 *complete pursuant to paragraph (5) of subdivision (c) of Section*  
24 *3217 of the Public Resources Code.*

25     (2) *The State Oil and Gas Supervisor has approved the maximum*  
26 *and minimum reservoir pressure pursuant to subdivision (d) of*  
27 *Section 3217 of the Public Resources Code.*

28     (3) *The State Oil and Gas Supervisor has allowed injections of*  
29 *natural gas at the facility, pursuant to subdivision (e) of Section*  
30 *3217 of the Public Resources Code.*

31     (4) *The commission has allowed, and received, public comment*  
32 *on the report pursuant to subdivision (c).*

33     (e) *In no case may the volume of working gas set by the*  
34 *executive director of the commission result in reservoir pressures*  
35 *that fall out of the range established pursuant to subdivision (d)*  
36 *of Section 3217 of the Public Resources Code.*

37     (f) *This section shall remain in effect only until January 1, 2021,*  
38 *and as of that date is repealed, unless a later enacted statute, that*  
39 *is enacted before January 1, 2021, deletes or extends that date.*

1     ~~SEC. 3.~~

2     ~~SEC. 4.~~ No reimbursement is required by this act pursuant to  
3 Section 6 of Article XIII B of the California Constitution because  
4 the only costs that may be incurred by a local agency or school  
5 district will be incurred because this act creates a new crime or  
6 infraction, eliminates a crime or infraction, or changes the penalty  
7 for a crime or infraction, within the meaning of Section 17556 of  
8 the Government Code, or changes the definition of a crime within  
9 the meaning of Section 6 of Article XIII B of the California  
10 Constitution.

11    ~~SEC. 4.~~

12    ~~SEC. 5.~~ This act is an urgency statute necessary for the  
13 immediate preservation of the public peace, health, or safety within  
14 the meaning of Article IV of the Constitution and shall go into  
15 immediate effect. The facts constituting the necessity are:

16    In order to mitigate, at the earliest possible time, ongoing harm  
17 from the gas leak at the Aliso Canyon natural gas storage facility,  
18 and to evaluate the integrity of and the risks associated with ~~older~~  
19 gas storage wells at that facility, it is necessary that this act take  
20 effect immediately.