

SENATE No. 2179

The Commonwealth of Massachusetts

PRESENTED BY:

Barry R. Finegold

To the Honorable Senate and House of Representatives of the Commonwealth of Massachusetts in General Court assembled:

The undersigned legislators and/or citizens respectfully petition for the adoption of the accompanying bill:

An Act relative to eliminating gas leaks.

PETITION OF:

NAME:	DISTRICT/ADDRESS:	
<i>Barry R. Finegold</i>	<i>Second Essex and Middlesex</i>	
<i>Jack Patrick Lewis</i>	<i>7th Middlesex</i>	<i>2/26/2021</i>
<i>Christina A. Minicucci</i>	<i>14th Essex</i>	<i>3/31/2021</i>

SENATE No. 2179

By Mr. Finegold, a petition (accompanied by bill, Senate, No. 2179) of Barry R. Finegold, Jack Patrick Lewis and Christina A. Minicucci for legislation to eliminate gas leaks. Telecommunications, Utilities and Energy.

The Commonwealth of Massachusetts

**In the One Hundred and Ninety-Second General Court
(2021-2022)**

An Act relative to eliminating gas leaks.

Be it enacted by the Senate and House of Representatives in General Court assembled, and by the authority of the same, as follows:

1 SECTION 1. Chapter 30A of the General Laws is hereby amended by inserting, after
2 Section 10A, the following new section:-

3 Section 10B. Notwithstanding the provisions of section 10, in any adjudicatory
4 proceeding conducted by the department of public utilities regarding any petition, request for
5 approval or investigation of a gas company or an electric company, as defined in section 1 of
6 chapter 164, the following shall be allowed to participate fully as a party in such proceeding: (a)
7 any municipality that is within the service area of such company; (b) any member of the general
8 court whose district includes ratepayers within the service area of such company; and (c) any
9 group of not fewer than 10 persons who are ratepayers within the service area of such company.

10 SECTION 2. Section 1 of Chapter 164 of the General Laws is hereby amended by
11 inserting the following definition:-

12 “Critical root zone of a tree”, the area measured from the trunk of a tree at a radius of 1
13 foot per inch of the diameter of the trunk of such tree at 4.5 feet above grade.

14 SECTION 3. Section 1 of Chapter 164 of the General Laws is hereby amended by
15 inserting, after the first use of the phrase “sell electricity” the following language:-

16 and to make, distribute or sell renewable thermal energy through a distribution system,
17 provided, however, that such thermal energy will reduce emissions of greenhouse gases in
18 accordance with chapter 21N; and further provided, however, that gas company shall not mean
19 an alternative energy provider; and further

20 SECTION 4. Section 1E of Chapter 164 is hereby amended by inserting, after the first
21 use of the word “standards,” the following:- for

22 SECTION 5. Section 1E of Chapter 164 is hereby amended by inserting, after the first
23 use of the word “public,” the following:- health and public

24 SECTION 6. Section 70 of Chapter 164 is hereby amended by striking the word
25 “selectmen” and inserting thereof:- “select board”

26 SECTION 7. Section 70 of Chapter 164 is hereby amended by inserting, after the last
27 sentence, the following:-

28 For the purposes of this section, damage to property shall include any tree on public or
29 private property damaged or killed by gas migrating into the critical root zone of such tree or by
30 construction in the critical root zone of such tree during the course of repairing or replacing gas
31 infrastructure. A municipality or person whose property is alleged to have been damaged by a
32 gas company may submit a claim for such damages against a gas company with the department

33 which shall follow the procedures of chapter 30A for the resolution of any such claim, provided,
34 however, that such claim for damage to a tree as a result of a gas leak or construction by a gas
35 company must be substantiated by a certified arborist; provided further that the detection of
36 methane in the critical root zone of a tree that has dead or dying branches shall be a rebuttable
37 presumption that such methane is the cause of the decline or death of such tree. Nothing in this
38 section shall prevent a municipality from further regulating the opening of streets or the use of
39 public ways by a gas company, or from conditioning the consent of such municipality to dig up
40 and open the ground.

41 SECTION 8. Section 75 of Chapter 164 is hereby amended by deleting the words, “the
42 aldermen or selectmen,” and inserting thereof the following:-

43 (a) The city council, aldermen or select board of a municipality

44 SECTION 9. Section 75 of Chapter 164 is hereby amended by inserting, after the word
45 “towns,” the following:-

46 and may regulate, restrict and control all acts and doings of a corporation subject to this
47 chapter which may in any manner affect the health, safety, convenience or property of the
48 inhabitants of their towns, and may require such corporation to confer with municipal officials to
49 address coordination of services provided and construction undertaken by such corporation,
50 including but not limited to grants of location and type of infrastructure installed or replaced.

51 (b) A municipality may file with the department a complaint alleging a breach by an
52 electric or gas company of its franchise or a breach of any regulation issued by the department,
53 or a breach of any provision of this chapter. The department shall investigate any such
54 complaint, including holding a public hearing at which the municipality shall participate as a

55 party according to the procedures of chapter 30A. The department shall issue a written decision
56 describing the resolution of such complaint, which decision shall be made public.

57 SECTION 10. Section 116B of Chapter 164 is hereby amended by striking the first
58 sentence and inserting thereof the following:-

59 (a) Whenever the commonwealth or a city or town undertakes the repair of streets, roads
60 or sidewalks the appropriate gas company shall provide for the maintenance and improvement of
61 each gas critical valve, shutoff valve, gate valve, and valve box cover located in the streets, roads
62 or sidewalks to be repaired, so that the gate boxes are more easily and immediately accessible;
63 provided, further, that the gas company shall comply with the requirements of section 144.

64 SECTION 11. Section 116B of Chapter 164 is hereby amended by inserting after the end
65 of the last sentence the following:-

66 (b) Within twelve months following the effective date of this provision, a gas company
67 shall locate by global positioning system and by street address each gas critical valve, shutoff
68 valve, gate valve, and valve box cover and shall (i) record its location, (ii) ensure its accessibility
69 and visibility, (iii) repair, replace or upgrade it as necessary to be in working order and in
70 compliance with applicable federal and state laws and regulations, and (iv) thereafter no less than
71 once every 5 years ensure that such valves are in compliance with applicable federal and state
72 laws and regulations. A gas company shall provide such locations and repair status to police and
73 fire departments of the municipality. A gas company may apply for funds under chapter 90 to
74 assist in paying the costs of locating, repairing or replacing each such gas critical valve, shutoff
75 valve, gate valve, and valve box cover.

76 SECTION 12. Section 144 of Chapter 164 is hereby amended by deleting the word
77 “natural” the first two times it is used.

78 SECTION 13. Section 144(b)(2) of Chapter 164 is hereby amended by inserting, after
79 first use of the word “property,” the following:- , as determined by a gas company, a municipal
80 fire department, or the department of transportation. A Grade 1 leak shall include any gas
81 reading that is (i) in equipment owned by a gas company inside a building, (ii) within 15 feet of
82 an outside wall or foundation, or (iii) a gas-in-air reading of 1 percent or higher inside a manhole
83 or confined space.

84 SECTION 14. Section 144(b)(2) of Chapter 164 is hereby amended by striking the last
85 sentence and inserting thereof the following:- A gas company shall notify within an hour or less
86 of detection the fire department and chief law enforcement officer in each city or town where a
87 Grade 1 leak is identified.

88 SECTION 15. Section 144(b)(3) of Chapter 164 is hereby amended by striking all words
89 after “hazard” and inserting thereof the following:- to be completed as immediately as possible.
90 The gas company shall immediately schedule a completion of repairs, such repair to be
91 completed within 6 months of detection, and the condition of such leak shall be kept under
92 surveillance at a frequency of not less than once every two weeks until the hazard or source of
93 the leak is eliminated. A Grade 2 leak shall include: (i) any leak migrating into the critical root
94 zone of a tree; (ii) any leak within 40 feet of a foundation or wall that is not classified as a Grade
95 1 leak; (iii) any leak deemed of sufficient magnitude by the fire chief of a municipality to be
96 hazardous or to be a public nuisance; and (iv) any leak within 150 feet of a school zone, as
97 defined in subsection (d). A gas company shall notify within an hour or less of detection the fire

98 department and chief law enforcement officer in each city or town where a Grade 2 leak is
99 identified.

100 (A) A municipality or person whose property is alleged to have been damaged by a gas
101 company may submit a claim against such gas company for such damages with the department,
102 which shall follow the procedures of chapter 30A for the resolution of any such claim. Filing
103 such claim with the department shall not affect any other remedy at law or in equity.

104 (B) Any suspected damage to a tree due to a gas leak or construction by a gas company
105 shall be reported to the gas company for mandatory inspection by a certified arborist. If a
106 certified arborist determines that a tree is damaged or has been killed by a natural gas leak or
107 construction by a gas company, the gas company shall provide the entity which owns the tree
108 with the funds of equal or greater value to replace the compromised tree. The department shall
109 promulgate rules and regulations to implement this section within 12 months of its effective date.

110 SECTION 16. Section 144(b)(4) of Chapter 164 is hereby amended by striking the word
111 “12” the first time it appears and inserting thereof: -“6”

112 SECTION 17. Section 144(b)(4) of Chapter 164 is hereby amended by inserting after the
113 last sentence the following:- A gas company shall notify within an hour or less of detection the
114 fire department and chief law enforcement officer in each city or town where a Grade 3 leak is
115 identified.

116 SECTION 18. Chapter 164 is hereby amended by striking all words in Section 144(c) and
117 inserting thereof the following:-

118 (c) (1) For the purposes of this subsection and subsection (c)(1) of section 145, a Grade 3
119 leak identified as having a significant environmental impact shall be defined by the department
120 using the leak extent method and threshold, defined as an area in which a gas company has
121 detected positive subsurface gas readings surrounded by an area of negative subsurface gas
122 readings. At least every three years a gas company shall reassess the leak extent method and
123 threshold to ensure that the method and threshold are identifying more than 5% of the existing
124 Grade 3 leaks having a significant environmental impact and that the approach is the best
125 available technology for identification of leaks having a significant environmental impact,
126 defined as the 7% of leaks with the highest emissions in the service territory.

127 (2) Upon the undertaking of a significant project on a public way exposing confirmed gas
128 infrastructure, and with sufficient notice, a municipality or the commonwealth shall submit
129 written notification of the project to a gas company. In response to such notice from the
130 municipality or upon seeking a permit from a municipality to open a public way for the purpose
131 of repairing or replacing leak-prone infrastructure, the gas company shall survey the project area
132 for the presence of Grade 1 leaks, Grade 2 leaks and Grade 3 leaks identified as having a
133 significant environmental impact and shall set repair and replacement schedules for all known or
134 newly detected Grade 1 leaks, Grade 2 leaks and Grade 3 leaks identified as having a significant
135 environmental impact. The gas company shall provide to such municipality for each such leak,
136 the location, history, and leak grade classification as defined in this section, and for each such
137 pipeline, the age, type, condition, operating pressure, size and material. Upon completion of any
138 repair or replacement of leak-prone infrastructure, the gas company shall provide to such
139 municipality a report from a gas inspector that (i) all pipes are installed at the proper depth and
140 all new joints are sealed; (ii) all gas critical valves, shutoff valves, gate valves, and valve box

141 covers are uncovered, accessible, operational, tested and capable of accepting a gate key; (iii) the
142 repaired or replaced infrastructure is free from defects that could cause new leaks; and (iv) the
143 repair or replacement has otherwise been properly completed according to state and federal
144 regulations.

145 SECTION 19. Chapter 164 is hereby amended by striking all words in Section 144(d)
146 and inserting thereof the following:-

147 (d) A gas company shall survey pipelines in every school zone at least once every 12
148 months or during the next scheduled survey, whichever is sooner. Grade 3 gas leaks detected in a
149 school zone shall be repaired by the gas company no later than 6 months from the date the leak
150 was detected. Grade 1 leaks and Grade 2 leaks shall be repaired as required in subsection (b) of
151 this section. For the purposes of this section, "school zone" shall mean on or within 150 feet of
152 the real property comprising a public or private accredited preschool, accredited Head Start
153 facility, elementary, vocational or secondary school.

154 SECTION 20. Chapter 164 is hereby amended by striking all words in Section 144(e) and
155 inserting thereof the following:-

156 (e) (1) For the purposes of this subsection, the following words shall have the following
157 meaning:-

158 "global positioning system," a positioning system using satellites that continuously
159 transmit coded information. The information transmitted from the satellites is interpreted by
160 receivers to precisely identify locations on earth by measuring distance from the satellites.

161 (2) As part of the annual service quality standards report required by section 1I, each gas
162 company shall report to the department the following data as of the time of the report: (i) the
163 location by street address and by the global positioning system of each Grade 1, Grade 2 and
164 Grade 3 leak; (ii) the date each Grade 1, Grade 2 and Grade 3 leak was classified or reclassified;
165 and (iii) the dates of repairs performed on each Grade 1, Grade 2 and Grade 3 leak; and (iv) the
166 location of each such leak according to the global positioning system. A gas company shall
167 specify any reclassification of previously identified leaks in its annual report.

168 (3) The annual service quality standards report shall include (i) definitions of terms and
169 acronyms; (ii) methodologies and instrumentation used to detect a gas leak and to determine its
170 grade; (iii) the location by street segment of all leak-prone infrastructure to be replaced; (iv) the
171 percent of leak-prone infrastructure remaining under plans mandated by subsection (b) of section
172 145; (v) safety violations in the territory of a gas company, including but not limited to, over
173 pressurization incidents, third-party hits, and natural force pipe failures, reported both as absolute
174 numbers as well as by incidents per linear mile of pipe; (vi) the cost of replacing all leak prone
175 infrastructure as compared to repairing all known gas leaks in the gas company's service
176 territory; (vi) the cost to ratepayers of lost and unaccounted for gas; and (vii) progress by the
177 department and the gas companies regulated under this chapter towards achieving the targets and
178 benchmarks mandated by chapter 21N.

179 (4) The annual service quality standards report shall be posted electronically and publicly
180 by March 1 by the department in spreadsheet format.

181 (5) The department shall post a map of all leaks by grade classification, including those
182 identified as having a significant environmental impact, updated quarterly, showing the location
183 of such leaks throughout the commonwealth.

184 SECTION 21. Section 144(f) of Chapter 164 is hereby amended by inserting after the last
185 sentence the following:-: As part of such oversight and monitoring, the department shall require
186 an annual audit of leaks reported to the department by gas companies, such audit to be conducted
187 by a qualified independent contractor chosen jointly by the department and the attorney general.
188 Such audit shall include a statistically significant random selection of reported leaks and shall
189 include for each leak (i) the leak classification; (ii) the leak extent measurement; and (iii) the
190 success of any repairs of such leak. The department shall make such audit available to the public
191 by July 1 of each year.

192 SECTION 22. Section 144 of Chapter 164 is hereby amended by inserting, after the last
193 sentence of the Section 144(f), the following subsection:-

194 (g) The department shall promulgate regulations establishing uniform standards for
195 winter surveillance and patrol of cast iron pipes subject to hazardous frost cap conditions. Such
196 standards shall meet or exceed federally mandated standards for integrity management
197 requirements for distribution pipelines and shall include criteria to determine the conditions of
198 weather, the duration and oscillation of temperatures around and below 32 degrees Fahrenheit,
199 the type and size of cast iron pipe segments that are prone to cracks and leaks as a result of
200 extended frost cap conditions, and the frequency of surveillance and patrol necessary to ensure
201 public safety from hazardous leaks caused by such cracks. Such winter surveillance and patrol
202 standards shall be in effect from December 15 to March 15 unless weather conditions warrant an

203 earlier start or later end date. Such regulations shall be promulgated by the department within 6
204 months of the effective date of this subsection.

205 SECTION 23. Chapter 164 is hereby amended by striking all words in Section 145(b)
206 and inserting thereof the following:

207 (b) A gas company shall file with the department a plan to address aging or leaking gas
208 infrastructure within the commonwealth in the interest of public health and public safety and
209 reducing lost and unaccounted for natural gas through a reduction in gas system leaks by number
210 and by volume.

211 SECTION 24. Section 145(b) of Chapter 164 is hereby amended by deleting the word
212 “may” both times it appears” and inserting thereof: -“shall”

213 SECTION 25. Section 145(b) of Chapter 164 is hereby amended by deleting the word
214 “natural” both times it appears”

215 SECTION 26. Section 145(b) of Chapter 164 is hereby amended by inserting, after the
216 first use of the word “public,” the following: - health and public

217 SECTION 27. Section 145(c) of Chapter 164 is hereby amended by striking the first use
218 of the words “any plan,” and inserting thereof the following: -

219 (1) For the purposes of this subsection, a Grade 3 leak identified as having a significant
220 environmental impact shall be defined by the department as set forth in section 144(c)(1) of this
221 chapter.

222 (2) Any plan

223 SECTION 28. Section 145(c) of Chapter 164 is hereby amended by inserting after the
224 first use of the phrase “under the plan;” the following:-

225 (vi) work plans including location by street segments of leak-prone infrastructure
226 scheduled to be replaced as required by this section; and (vii)

227 SECTION 29. Section 145(c) of Chapter 164 is hereby amended by inserting after the
228 first use of the phrase “evaluate the plan” the following:

229 Such improvement of existing infrastructure may include repair rather than replacement
230 of a pipe having a Grade 3 leak identified as having a significant environmental impact as
231 classified by section 144 (c), provided, however that such repair shall be cost effective and shall
232 comply with applicable safety regulations related to pipeline infrastructure.

233 SECTION 30. Section 145(c) of Chapter 164 is hereby amended by inserting after the
234 first use of the phrase “next 5 years,” the following:- a report of any remaining leak-prone
235 infrastructure by street segment remaining in the service territory of the gas company

236 SECTION 31. Section 145(d) of Chapter 164 is hereby amended by inserting, after the
237 first use of the word “public,” the following:- health and public

238 SECTION 32. Section 145 of Chapter 164 is hereby amended by adding the following
239 subsection:

240 SECTION 33. Section 144 of Chapter 164 is hereby amended by inserting, after the last
241 sentence of the Section 144(h), the following subsection:-

242 (i) Within 30 days of receipt of any plan submitted to the department by a gas company
243 for replacement or improvement of any existing infrastructure pursuant to this section, the

244 department shall send such plan to the municipality whose service territory is covered by such
245 plan. Within 30 days of approval of such plan, the department shall send such approval to the
246 municipality whose service territory is covered by such plan.

247 SECTION 34. Chapter 164 is hereby amended by inserting after section 148 the
248 following section:-

249 Section 149. Upon the undertaking of any planned project involving excavation for
250 purposes of performing maintenance or construction involving gas mains or services by gas
251 company employees, including any blasting work, in advance of any excavation, a gas company
252 shall ensure that employees first locate, identify and mark any gas critical valve, shutoff valve,
253 gate valve, and valve box covers and verify that all such valves are cleared, operational and
254 accessible in clear sight at ground level; and following any such project, that such valves are left
255 cleared, operational, and visible. A gas company shall further ensure that any gas critical valve,
256 shutoff valve, and gate valve in the significant project area has a gate box installed upon it.

257 SECTION 35. Chapter 164 is hereby amended by inserting after section 148 the
258 following section:-

259 Section 150. A gas company shall establish for each service territory a program to lend
260 without charge a combustible gas indicator to municipal officials to enable such officials to
261 determine the proximity of a gas leak in an area where such officials intend to plant trees or other
262 vegetation and shall provide training without charge to such officials in the effective use of a
263 combustible gas indicator to detect a gas leak A gas company shall determine with a combustible
264 gas indicator the proximity of a gas leak to trees or other vegetation in any area where it has

265 received permission from the municipality for construction on pipelines and shall report such
266 results to the municipality.

267 SECTION 36. Chapter 164 is hereby amended by inserting after section 148 the
268 following section:-

269 Section 151. (a) Each gas company shall maintain a central control room within its
270 service territory with trained staff sufficient to monitor its pipelines and respond to fluctuations
271 in pressurization, reportable incident, and infrastructure failures.

272 (b) Notwithstanding any general or special law to the contrary, the department shall
273 develop, promulgate, and maintain regulations to ensure that gas pressure is monitored by
274 qualified personnel on each site where work is being performed that involves the pressurization
275 or depressurization of transmission lines, as is necessary to protect public safety and to prevent
276 damage to property. The department shall promulgate initial regulations pursuant to this section
277 not later than 180 days following the passage of this Act.