

118TH CONGRESS  
1ST SESSION

**S.** \_\_\_\_\_

To promote low-carbon, high-octane fuels, to protect public health, and to improve vehicle efficiency and performance, and for other purposes.

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IN THE SENATE OF THE UNITED STATES

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Mr. GRASSLEY (for himself, Ms. KLOBUCHAR, Ms. ERNST, and Ms. DUCKWORTH) introduced the following bill; which was read twice and referred to the Committee on \_\_\_\_\_

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**A BILL**

To promote low-carbon, high-octane fuels, to protect public health, and to improve vehicle efficiency and performance, and for other purposes.

1       *Be it enacted by the Senate and House of Representa-*  
2       *tives of the United States of America in Congress assembled,*

3       **SECTION 1. SHORT TITLE.**

4       This Act may be cited as the “Next Generation Fuels  
5       Act of 2023”.

6       **SEC. 2. FINDINGS.**

7       Congress finds that—

1           (1) continued increases in new automobile effi-  
2           ciency are needed to improve consumer welfare and  
3           reduce carbon emissions;

4           (2) the widespread availability of low-carbon,  
5           high-octane fuel will allow continued cost-effective  
6           improvements in automobile efficiency by enabling  
7           increased engine compression ratios;

8           (3) high-octane automobiles and low-carbon  
9           fuels are readily available to consumers at little in-  
10          cremental cost;

11          (4) ethanol is a cost-effective and low-carbon  
12          octane enhancer;

13          (5) the widespread adoption of climate-smart  
14          practices and precision technologies by United  
15          States corn producers over the past decade have fur-  
16          ther reduced the carbon intensity of conventional  
17          ethanol;

18          (6) on average, ethanol has been estimated to  
19          have lifecycle greenhouse gas emissions that are 46  
20          percent lower than average gasoline, with some corn  
21          ethanol achieving a 61-percent reduction compared  
22          to gasoline; and

23          (7) ethanol has one of the highest blending oc-  
24          tane values available in the marketplace.

1   **SEC. 3. HIGH-OCTANE VEHICLES.**

2           Title II of the Clean Air Act (42 U.S.C. 7521 et seq.)  
3   is amended by adding at the end the following:

4           **“PART D—HIGH-OCTANE VEHICLES**

5   **“SEC. 261. DEFINITIONS; APPLICABILITY.**

6           “(a) DEFINITIONS.—In this part:

7               “(1) AUTOMOBILE.—The term ‘automobile’ has  
8           the meaning given to the term in section  
9           32901(a)(3) of title 49, United States Code.

10           “(2) MANUFACTURER.—The term ‘manufac-  
11           turer’ has the meaning given the term in section  
12           216.

13           “(3) RESEARCH OCTANE NUMBER.—The term  
14           ‘research octane number’ has the meaning given the  
15           term in section 201 of the Petroleum Marketing  
16           Practices Act (15 U.S.C. 2821).

17           “(b) APPLICABILITY.—This part applies with respect  
18           to any motor vehicle that is introduced into commerce  
19           that—

20               “(1) is an automobile;

21               “(2) uses gasoline for propulsion or any other  
22           operation of the motor vehicle, including the engine  
23           thereof; and

24               “(3) is a model year 2028 or later motor vehi-  
25           cle.

1   **“SEC. 262. HIGH-OCTANE TEST FUELS.**

2           “(a) E20 CERTIFICATION FUEL.—Except as pro-  
3   vided in subsections (b) and (c), manufacturers producing  
4   motor vehicles described in section 261(b) shall use a test  
5   fuel consisting of gasoline and 19.4 to 20 volume percent  
6   ethanol with a minimum 95 research octane number in—

7           “(1) emissions testing and certification under  
8       section 206(a); and

9           “(2) fuel economy testing and calculation proce-  
10   dures under section 32904(c) of title 49, United  
11   States Code.

12          “(b) E25 TO E30 CERTIFICATION FUEL.—As an al-  
13   ternative to the test fuel described in subsection (a), man-  
14   ufacturers producing motor vehicles described in section  
15   261(b) may use a test fuel consisting of gasoline and 24.3  
16   to 30 volume percent ethanol with a minimum 98 research  
17   octane number in—

18          “(1) emissions testing and certification under  
19       section 206(a); and

20          “(2) fuel economy testing and calculation proce-  
21   dures under section 32904(c) of title 49, United  
22   States Code.

23          “(c) MODEL YEAR 2033 AND LATER MODEL  
24   YEARS.—Notwithstanding subsections (a) and (b), begin-  
25   ning in model year 2033, manufacturers of motor vehicles

1 described in section 261(b) shall use the gasoline test fuel  
2 described in subsection (b) in—

3 “(1) emissions testing and certification under  
4 section 206(a); and

5 “(2) fuel economy testing and calculation proce-  
6 dures under section 32904(c) of title 49, United  
7 States Code.

8 “(d) FORMULATION.—The test fuels described in  
9 subsections (a) and (b) shall be produced by adding neat  
10 or denatured fuel ethanol to the gasoline criteria emissions  
11 test fuel required for use in model year 2022 and later  
12 motor vehicles.

13 “(e) TEST FUEL EQUATIONS.—For purposes of—

14 “(1) testing and calculation procedures under  
15 section 206(a), the emissions of motor vehicles using  
16 the test fuels described in subsection (a) or (b) shall  
17 be based exclusively on actual measured emissions;  
18 and

19 “(2) fuel economy testing and calculation proce-  
20 dures under section 32904(c) of title 49, United  
21 States Code, the fuel economy of motor vehicles  
22 using the test fuels described in subsection (a) or (b)  
23 shall be determined on an energy-equivalent basis,  
24 which shall be equal to the product obtained by mul-  
25 tiplying—

1 “(A) the measured fuel economy; and  
2 “(B) the quotient obtained by dividing—  
3 “(i) 114,086 British thermal units per  
4 gallon; by  
5 “(ii) the volumetric energy density of  
6 the test fuel.

7 **“SEC. 263. HIGH-OCTANE VEHICLES.**

8 “(a) WARRANTY REQUIREMENTS.—Manufacturers of  
9 motor vehicles described in section 261(b) shall warrant  
10 to the ultimate purchaser and each subsequent purchaser  
11 that each such motor vehicle is designed—

12 “(1) for model years 2028 through 2032—

13 “(A) to operate with gasoline containing  
14 10 and up to and including 25 percent ethanol  
15 by volume; and

16 “(B) to meet the design requirements  
17 under subsection (b)(1); and

18 “(2) for model year 2033 and later model  
19 years—

20 “(A) to operate with gasoline containing  
21 10 and up to and including 30 percent ethanol  
22 by volume; and

23 “(B) to meet the design requirements  
24 under subsections (b)(1) and (c)(1).

1       “(b) DESIGN REQUIREMENTS BEFORE MODEL YEAR  
2 2033.—

3               “(1) MANUFACTURERS.—The manufacturer of  
4 a motor vehicle described in section 261(b) shall de-  
5 sign each such motor vehicle—

6                       “(A) to use gasoline with a 95 research oc-  
7 tane number or higher; and

8                       “(B) to incorporate such devices or ele-  
9 ments of design (including physical or other  
10 barriers, devices, or technological systems) as  
11 are determined by the Administrator to be—

12                               “(i) necessary to prevent the introduc-  
13 tion of gasoline with a research octane  
14 number that is lower than 95 into that  
15 motor vehicle; and

16                               “(ii) technically and economically fea-  
17 sible.

18               “(2) FUEL RETAILERS.—Any fuel retailer sell-  
19 ing gasoline for use in a motor vehicle described in  
20 section 261(b) shall incorporate into the dispensing  
21 equipment of the fuel retailer such devices or ele-  
22 ments of design (including physical or other barriers,  
23 devices, or technological systems) as are determined  
24 by the Administrator to be—

1                   “(A) necessary to ensure compatibility with  
2                   the motor vehicle design requirements under  
3                   paragraph (1); and

4                   “(B) technically and economically feasible.

5           “(c) DESIGN REQUIREMENTS FOR MODEL YEAR  
6 2033.—

7                   “(1) MANUFACTURERS.—Subject to paragraph  
8                   (3)(B), beginning in model year 2033, the manufac-  
9                   turer of a motor vehicle described in section 261(b)  
10                  shall design each such motor vehicle—

11                   “(A) to use gasoline with a 98 research oc-  
12                   tane number or higher; and

13                   “(B) to incorporate such devices or ele-  
14                   ments of design (including physical or other  
15                   barriers, devices, or technological systems) as  
16                   are determined by the Administrator to be—

17                   “(i) necessary to prevent the introduc-  
18                   tion of gasoline with a research octane  
19                   number that is lower than 98 into that  
20                   motor vehicle; and

21                   “(ii) technically and economically fea-  
22                   sible.

23                   “(2) FUEL RETAILER.—Subject to paragraph  
24                   (3)(B), any fuel retailer selling gasoline for use in a  
25                   motor vehicle described in section 261(b) that is



1 model year 2033 or later shall incorporate into the  
2 dispensing equipment of the fuel retailer such de-  
3 vices or elements of design (including physical or  
4 other barriers, devices, or technological systems) as  
5 are determined by the Administrator to be—

6 “(A) necessary to ensure compatibility with  
7 the motor vehicle design requirements under  
8 paragraph (1); and

9 “(B) technically and economically feasible.

10 “(3) EPA DETERMINATION OF NATIONWIDE  
11 AVAILABILITY.—

12 “(A) DETERMINATION REQUIRED.—Not  
13 later than December 31, 2031, and not later  
14 than each December 31 thereafter until the Ad-  
15 ministrator determines that 98 research octane  
16 number gasoline can be made readily available  
17 nationwide, the Administrator shall—

18 “(i) determine whether 98 research  
19 octane number gasoline can be made read-  
20 ily available nationwide; and

21 “(ii) publish that determination in the  
22 Federal Register.

23 “(B) EFFECT.—The requirements of this  
24 subsection shall not take effect until the date  
25 on which the Administrator—

1 “(i) determines under subparagraph  
2 (A)(i) that 98 research octane number gas-  
3 oline can be made readily available nation-  
4 wide; and

5 “(ii) publishes that determination  
6 under subparagraph (A)(ii).

7 “(C) FAILURE TO MAKE DETERMINA-  
8 TION.—If the Administrator fails to make a de-  
9 termination under subparagraph (A) by the ap-  
10 plicable date under that subparagraph, the Ad-  
11 ministrator shall be deemed to have determined  
12 that 98 research octane number gasoline can be  
13 made readily available nationwide for purposes  
14 of subparagraph (B).

15 “(d) VIOLATIONS.—

16 “(1) MANUFACTURERS.—

17 “(A) IN GENERAL.—Any manufacturer  
18 who violates subsection (b)(1) or (c)(1) shall be  
19 subject to a civil penalty of not more than  
20 \$5,000 for each offense.

21 “(B) SEPARATE OFFENSES.—Any violation  
22 described in subparagraph (A) shall constitute  
23 a separate offense with respect to each motor  
24 vehicle.

25 “(2) FUEL RETAILER.—

1           “(A) IN GENERAL.—Any fuel retailer who  
2           violates subsection (b)(2) or (c)(2) shall be sub-  
3           ject to a civil penalty of not more than \$2,500  
4           for each offense.

5           “(B) SEPARATE OFFENSE.—Any violation  
6           described in subparagraph (A) with respect to  
7           dispensing equipment shall constitute a sepa-  
8           rate offense with respect to each unit of dis-  
9           pensing equipment in violation of the applicable  
10          subsection described in that subparagraph.

11   **“SEC. 264. MISFUELING.**

12          “(a) PROHIBITIONS AGAINST TAMPERING AND DE-  
13   FEAT DEVICES FOR MOTOR VEHICLES.—In lieu of apply-  
14   ing section 203(a)(3) with respect to the requirements of  
15   this part, the following shall apply:

16          “(1) No person shall—

17               “(A) remove or render inoperative any de-  
18               vice or element of design installed on or in a  
19               motor vehicle pursuant to subsection (b)(1) or  
20               (c)(1) of section 263 prior to its sale and deliv-  
21               ery to the ultimate purchaser; or

22               “(B) knowingly remove or render inoper-  
23               ative any such device or element of design after  
24               such sale and delivery to the ultimate pur-  
25               chaser.

1           “(2) No person shall manufacture or sell, or  
2           offer to sell, or install, any part or component in-  
3           tended for use with, or as part of, any motor vehicle,  
4           where—

5                   “(A) a principal effect of the part or com-  
6           ponent is to bypass, defeat, or render inoper-  
7           ative any device or element of design installed  
8           on or in a motor vehicle pursuant to subsection  
9           (b)(1) or (c)(1) of section 263; and

10                   “(B) the person knows or should know  
11           that such part or component is being offered  
12           for sale or installed for such use or put to such  
13           use.

14           “(b) PROHIBITIONS AGAINST TAMPERING AND DE-  
15   FEAT DEVICES FOR DISPENSING EQUIPMENT.—No per-  
16   son shall—

17                   “(1) remove or render inoperative any device or  
18           element of design installed pursuant to subsection  
19           (b)(2) or (c)(2) of section 263; or

20                   “(2) sell, or offer to sell, or incorporate into,  
21           any part or component intended for use with, or as  
22           part of, any dispensing equipment, where—

23                   “(A) a principal effect of the part or com-  
24           ponent is to bypass, defeat, or render inoper-  
25           ative any device or element of design incor-

1           porated into dispensing equipment pursuant to  
2           subsection (b)(2) or (c)(2) of section 263; and

3           “(B) the person knows or should know  
4           that such part or component is being offered  
5           for sale or incorporated for such use or put to  
6           such use.

7           “(c) VIOLATIONS.—

8           “(1) IN GENERAL.—Any person who violates  
9           this section shall be subject to a civil penalty of not  
10          more than \$2,500.

11          “(2) SEPARATE OFFENSES.—Any violation de-  
12          scribed in paragraph (1) shall constitute a separate  
13          offense with respect to—

14               “(A) each motor vehicle or unit of dis-  
15               pensing equipment, for purposes of subsections  
16               (a)(1) and (b)(1); and

17               “(B) each part or component, for purposes  
18               of subsections (a)(2) and (b)(2).

19   **“SEC. 265. OCTANE STANDARD.**

20          “(a) OCTANE STANDARD.—

21               “(1) PROHIBITION.—

22               “(A) 95 RESEARCH OCTANE NUMBER MAR-  
23               KETING.—No person shall sell motor vehicle  
24               gasoline marketed as 95 research octane num-

1           ber unless that gasoline has a research octane  
2           number of 95 or greater.

3                 “(B) 98 RESEARCH OCTANE NUMBER MAR-  
4           KETING.—No person shall sell motor vehicle  
5           gasoline marketed as 98 research octane num-  
6           ber unless that gasoline has a research octane  
7           number of 98 or greater.

8                 “(C) DEEMED COMPLIANCE.—A person,  
9           including any distributor, blender, marketer, re-  
10          seller, carrier, retailer, or wholesaler, shall be  
11          deemed to be in full compliance with this para-  
12          graph if the person can demonstrate, through  
13          evidence deemed acceptable by the Adminis-  
14          trator, that the person had reason to believe in  
15          good faith that the motor vehicle gasoline com-  
16          plied with subparagraph (A) or (B).

17                 “(2) CONTROLS.—

18                 “(A) 95 RESEARCH OCTANE NUMBER  
19          AVAILABILITY.—Effective January 1, 2027, any  
20          person that owns, leases, operates, controls, or  
21          supervises—

22                         “(i) a retail outlet at which 200,000  
23                         or more gallons of gasoline were sold dur-  
24                         ing calendar year 2024 or any subsequent  
25                         calendar year, shall offer for sale motor ve-

1 hicle gasoline of not less than 95 research  
2 octane number at that retail outlet; or

3 “(ii) 6 or more retail outlets offering  
4 motor vehicle gasoline for sale, shall offer  
5 for sale motor vehicle gasoline of not less  
6 than 95 research octane number at not  
7 fewer than 60 percent of those retail out-  
8 lets.

9 “(B) 98 RESEARCH OCTANE NUMBER  
10 AVAILABILITY.—Effective January 1, 2032, any  
11 person that owns, leases, operates, controls, or  
12 supervises—

13 “(i) a retail outlet at which 200,000  
14 or more gallons of gasoline were sold dur-  
15 ing calendar year 2030 or any subsequent  
16 calendar year, shall offer for sale motor ve-  
17 hicle gasoline of not less than 98 research  
18 octane number at that retail outlet; or

19 “(ii) 6 or more retail outlets offering  
20 motor vehicle fuel for sale, shall offer for  
21 sale motor vehicle gasoline of not less than  
22 98 research octane number at no fewer  
23 than 60 percent of those retail outlets.

24 “(b) VIOLATIONS.—Any person that violates—

1           “(1) subsection (a)(1), (a)(2)(A)(i), or  
2           (a)(2)(B)(i) shall be subject to a civil penalty of not  
3           more than \$25,000 for each day on which the viola-  
4           tion continues; and

5           “(2) subsection (a)(2)(A)(ii) or (a)(2)(B)(ii)  
6           shall be subject to a civil penalty of not more than  
7           \$2,500 per day for each retail outlet owned, leased,  
8           operated, controlled, or supervised by that person.

9   **“SEC. 266. REGULATIONS.**

10          “The Administrator shall—

11               “(1) not later than 1 year after the date of en-  
12               actment of the Next Generation Fuels Act of 2023,  
13               propose regulations to carry out this part; and

14               “(2) not later than 2 years after that date of  
15               enactment, finalize regulations to carry out this  
16               part.

17   **“SEC. 267. LIABILITY LIMITATION AND PREEMPTION.**

18          “(a) LIMITATION OF LIABILITY.—A manufacturer of  
19          a motor vehicle, or a gasoline retailer, that is in compli-  
20          ance with the requirements of this part and the require-  
21          ments of sections 203(e) and 206 of the Petroleum Mar-  
22          keting Practices Act, shall not be liable under any provi-  
23          sion of this Act or any other Federal, State, or local law,  
24          including common law, for damages—



1 “(1) to or caused by a motor vehicle described  
2 in section 261(b); and

3 “(2) that would not have occurred but for the  
4 introduction of gasoline with a research octane num-  
5 ber required by this part.

6 “(b) PREEMPTION.—No State or any political sub-  
7 division of a State may adopt, continue in effect, or en-  
8 force, any provision of law or regulation—

9 “(1) requiring motor vehicles to operate using  
10 gasoline with a certain octane content, or the cor-  
11 responding design of equipment for dispensing such  
12 gasoline into such motor vehicles, unless the provi-  
13 sion of that law or regulation is the same as the cor-  
14 responding provision under this part; or

15 “(2) limiting the concentration of ethanol in  
16 motor vehicle gasoline.

17 **“SEC. 268. CIVIL ACTIONS; ADMINISTRATIVE ASSESSMENT**  
18 **OF CERTAIN PENALTIES.**

19 “The provisions of subsections (b) and (c) of section  
20 205 shall apply with respect to a violation of section 263  
21 or 264 to the same extent and in the same manner as  
22 such provisions apply with respect to a violation of section  
23 203(a)(3).”.

1   **SEC. 4. OCTANE DISCLOSURE.**

2           (a) **HIGH-EFFICIENCY FUELS.**—Title II of the Petro-  
3   leum Marketing Practices Act (15 U.S.C. 2821 et seq.)  
4   is amended by adding at the end the following:

5   **“SEC. 206. HIGH-EFFICIENCY FUEL AND VEHICLE MAR-**  
6                           **KETING REQUIREMENTS.**

7           “(a) **RULE.**—The Federal Trade Commission shall,  
8   by rule, and in consultation with persons to be regulated  
9   under this section, consumer advocates, and other stake-  
10  holders, as appropriate—

11                   “(1) prescribe or revise requirements under this  
12   title relating to the certification, display, and rep-  
13   resentation of the automotive fuel rating of an auto-  
14   motive fuel as necessary to carry out—

15                           “(A) the requirement under subsection (b);  
16                   and

17                           “(B) any determination made under sub-  
18   section (c);

19                   “(2) make the determination required under  
20   subsection (c); and

21                           “(3) prescribe requirements under subsection  
22   (d).

23           “(b) **REQUIREMENT.**—The Federal Trade Commis-  
24   sion shall require that, for purposes of this title, beginning  
25   on the date that is 180 days after the date on which the  
26   Federal Trade Commission issues a final rule under sub-

1 section (a), the automotive fuel rating of an automotive  
2 fuel with a research octane number of 95 or higher be  
3 determined only by the research octane number of such  
4 automotive fuel.

5 “(c) LABELING.—

6 “(1) IN GENERAL.—The Federal Trade Com-  
7 mission shall prescribe requirements—

8 “(A) as the Federal Trade Commission de-  
9 termines necessary with respect to a display at  
10 the point of sale to ultimate purchasers of auto-  
11 motive fuel and a display on a motor vehicle  
12 to—

13 “(i) inform such ultimate purchaser of  
14 such automotive fuel and any purchaser or  
15 user of such motor vehicle that—

16 “(I) a model year 2028 or later  
17 motor vehicle is only warrantied to  
18 use automotive fuel with a research  
19 octane number of 95 or higher; and

20 “(II) a model year 2033 or later  
21 motor vehicle is only warrantied to  
22 use automotive fuel with a research  
23 octane number of 98 or higher;

24 “(ii) provide a warning to such ulti-  
25 mate purchaser of such automotive fuel

1 and any such purchaser or user of such  
2 motor vehicle, that the use of automotive  
3 fuel with a research octane number that—

4 “(I) is lower than 95 in a model  
5 year 2028 or later motor vehicle will  
6 result in reduced fuel economy, in-  
7 creased exhaust emissions, and pos-  
8 sibly engine damage; and

9 “(II) is lower than 98 in a model  
10 year 2033 or later motor vehicle will  
11 result in reduced fuel economy, in-  
12 creased exhaust emissions, and pos-  
13 sibly engine damage; and

14 “(iii) inform such ultimate purchaser  
15 of such automotive fuel and any purchaser  
16 or user of such motor vehicle that—

17 “(I) a model year 2028 or later  
18 motor vehicle is warrantied to use  
19 gasoline containing up to and includ-  
20 ing 25 percent ethanol by volume; and

21 “(II) a model year 2033 or later  
22 motor vehicle is warrantied to use  
23 gasoline containing up to and includ-  
24 ing 30 percent ethanol by volume; and

25 “(B) that are applicable to—

1 “(i) a manufacturer of a new motor  
2 vehicle (or an entity making a representa-  
3 tion in connection with the sale of such  
4 motor vehicle) with respect to a display on  
5 such motor vehicle; and

6 “(ii) an automotive fuel retailer, with  
7 respect to a display at the point of sale to  
8 an ultimate purchaser of automotive fuel.

9 “(2) CONSIDERATIONS.—In prescribing require-  
10 ments under paragraph (1), the Federal Trade Com-  
11 mission shall ensure that such requirements are de-  
12 signed to be—

13 “(A) understandable to—

14 “(i) the ultimate purchaser of auto-  
15 motive fuel; and

16 “(ii) any purchaser or user of a model  
17 year 2028 or later motor vehicle; and

18 “(B) cost effective for automotive fuel re-  
19 tailers.

20 “(d) DEADLINES.—The Federal Trade Commission  
21 shall—

22 “(1) not later than January 1, 2026, issue a  
23 proposed rule under subsection (a); and

24 “(2) not later than July 1, 2027, issue a final  
25 rule under subsection (a).”.

1 (b) ENFORCEMENT.—Section 203(e) of the Petro-  
2 leum Marketing Practices Act (15 U.S.C. 2823(e)) is  
3 amended—

4 (1) by striking “or a rule prescribed” and in-  
5 serting “a rule prescribed”; and

6 (2) by striking “of such section.” and inserting  
7 “of section 202, or a rule prescribed under section  
8 206.”.

9 (c) TABLE OF CONTENTS AMENDMENT.—The table  
10 of contents for the Petroleum Marketing Practices Act (15  
11 U.S.C. 2801 et seq.) is amended by inserting after the  
12 item relating to section 205 the following:

“Sec. 206. High-efficiency fuel and vehicle marketing requirements.”.

13 **SEC. 5. ADVERTISEMENT OF PRICE OF HIGH-OCTANE**  
14 **AUTOMOTIVE FUEL.**

15 (a) IN GENERAL.—It shall be unlawful for any per-  
16 son to sell or offer for sale, at retail, automotive fuel with  
17 a research octane number (as such terms are defined in  
18 section 201 of the Petroleum Marketing Practices Act (15  
19 U.S.C. 2821)) of 95 or greater unless such person dis-  
20 plays, in a manner specified in the rules promulgated  
21 under subsection (b), the total price per gallon of such  
22 fuel on any sign on which such person displays the price  
23 of the most-sold grade of automotive fuel of such person.

24 (b) RULEMAKING.—

1           (1) IN GENERAL.—Not later than 24 months  
2           after the date of enactment of this Act, the Federal  
3           Trade Commission shall promulgate, in accordance  
4           with section 553 of title 5, United States Code, any  
5           rules necessary for the implementation and enforce-  
6           ment of this section.

7           (2) CONTENTS.—Such rules—

8                   (A) shall define “retail” and “most-sold”  
9                   for the purposes of this section;

10                   (B) shall specify the manner in which the  
11                   price of automotive fuel with a research octane  
12                   number of 95 or greater must be displayed in  
13                   order to comply with subsection (a); and

14                   (C) shall be consistent with the require-  
15                   ments for declaring unfair acts or practices in  
16                   section 5(n) of the Federal Trade Commission  
17                   Act (15 U.S.C. 45(n)).

18           (c) ENFORCEMENT.—A violation of subsection (a)  
19           shall be treated as a violation of a rule defining an unfair  
20           or deceptive act or practice prescribed under section  
21           18(a)(1)(B) of the Federal Trade Commission Act (15  
22           U.S.C. 57a(a)(1)(B)). The Federal Trade Commission  
23           shall enforce this section in the same manner, by the same  
24           means, and with the same jurisdiction, powers, and duties  
25           as though all applicable terms and provisions of the Fed-

1 eral Trade Commission Act (15 U.S.C. 41 et seq.) were  
2 incorporated into and made part of this section.

3 **SEC. 6. E40 RETAIL INFRASTRUCTURE STANDARD.**

4 Section 9003 of the Solid Waste Disposal Act (42  
5 U.S.C. 6991b) is amended by adding at the end the fol-  
6 lowing:

7 “(k) E40-COMPATIBLE RETAIL INFRASTRUCTURE  
8 SYSTEMS.—

9 “(1) DEFINITIONS.—In this subsection:

10 “(A) AUTOMOTIVE FUEL.—The term  
11 ‘automotive fuel’ has the meaning given the  
12 term in section 201 of the Petroleum Marketing  
13 Practices Act (15 U.S.C. 2821).

14 “(B) COMPATIBLE.—The term ‘compat-  
15 ible’ means, to the extent feasible, certified by  
16 a nationally recognized testing laboratory recog-  
17 nized by the Occupational Safety and Health  
18 Administration in accordance with section  
19 1910.7 of title 29, Code of Federal Regulations  
20 (or any successor regulations) to maintain sys-  
21 tem performance throughout the operational life  
22 of the dispenser system.

23 “(C) DISPENSER SYSTEM.—The term ‘dis-  
24 penser system’ has the meaning given the term  
25 in section 280.12 of title 40, Code of Federal



1 Regulations (as in effect on the date of enact-  
2 ment of this subsection).

3 “(2) PERFORMANCE STANDARDS.—The Admin-  
4 istrator shall, not later than January 1, 2026, issue  
5 or revise, as necessary, performance standards for  
6 underground storage tank systems and dispenser  
7 systems that are brought into use on or after Janu-  
8 ary 1, 2026, to require that those systems be com-  
9 patible with automotive fuel consisting of gasoline  
10 and at least 40 percent ethanol by volume.

11 “(3) COMPATIBILITY.—An owner or operator  
12 may demonstrate the compatibility of an under-  
13 ground storage tank system with automotive fuel  
14 containing any concentration of ethanol through the  
15 use of a secondary containment system that is  
16 able—

17 “(A) to contain regulated substances  
18 leaked from the primary containment system  
19 until the regulated substances are detected and  
20 removed; and

21 “(B) to prevent the release of regulated  
22 substances to the environment at any time dur-  
23 ing the operational life of the underground stor-  
24 age tank system.”.

1 **SEC. 7. REGISTRATION TESTING, REID VAPOR PRESSURE,**  
2 **AND SUBSTANTIALLY SIMILAR WAIVERS.**

3 (a) REGISTRATION TESTING WAIVER.—Section  
4 211(e) of the Clean Air Act (42 U.S.C. 7545(e)) is amend-  
5 ed by adding at the end the following:

6 “(4) Fuels consisting of gasoline and no more than  
7 30 percent ethanol by volume that meet the requirements  
8 of subsection (f)(3) shall be deemed—

9 “(A) to have satisfied any testing regulations  
10 promulgated under this subsection; and

11 “(B) to be immediately eligible for registration  
12 under subsection (b) without further testing.”.

13 (b) REID VAPOR PRESSURE WAIVER.—

14 (1) EXISTING WAIVERS.—Section 211(f)(4) of  
15 the Clean Air Act (42 U.S.C. 7545(f)(4)) is amend-  
16 ed—

17 (A) by striking “(4) The Administrator,  
18 upon” and inserting the following:

19 “(4) WAIVERS.—

20 “(A) IN GENERAL.—The Administrator,  
21 on”;

22 (B) in subparagraph (A) (as so des-  
23 ignated)—

24 (i) in the first sentence—

25 (I) by striking “of this sub-  
26 section” each place it appears; and

1 (II) by striking “if he deter-  
2 mines” and inserting “if the Adminis-  
3 trator determines”; and  
4 (ii) in the second sentence—

5 (I) by striking “such an applica-  
6 tion” and inserting “an application  
7 described in subparagraph (A)”; and

8 (II) by striking “The Adminis-  
9 trator” and inserting the following:

10 “(B) FINAL ACTION.—The Adminis-  
11 trator”; and

12 (C) by adding at the end the following:

13 “(C) REID VAPOR PRESSURE.—A fuel or  
14 fuel additive may be introduced into commerce  
15 if—

16 “(i)(I) the Administrator determines  
17 that the fuel or fuel additive is substan-  
18 tially similar to a fuel or fuel additive uti-  
19 lized in the certification of any model year  
20 vehicle pursuant to paragraph (1)(A); or

21 “(II) the fuel or fuel additive has  
22 been granted a waiver under subpara-  
23 graph (A) and meets all of the condi-  
24 tions of that waiver other than any  
25 limitation of the waiver with respect

1 to the Reid Vapor Pressure of the fuel  
2 or fuel additive; and  
3 “(ii) the fuel or fuel additive meets all  
4 other applicable Reid Vapor Pressure re-  
5 quirements under subsection (h).”.

6 (2) REID VAPOR PRESSURE LIMITATION.—Sec-  
7 tion 211(h) of the Clean Air Act (42 U.S.C.  
8 7545(h)) is amended—

9 (A) by striking “vapor pressure” each  
10 place it appears and inserting “Vapor Pres-  
11 sure”;

12 (B) in paragraph (4), in the matter pre-  
13 ceding subparagraph (A), by inserting “or  
14 more” after “10 percent”; and

15 (C) in paragraph (5)(A)—

16 (i) by striking “Upon notification, ac-  
17 companied by” and inserting “On receipt  
18 of a notification that is submitted before  
19 January 1, 2022, or after the date of en-  
20 actment of the Next Generation Fuels Act  
21 of 2023, and is accompanied by appro-  
22 priate”; and

23 (ii) by inserting “or more” after “10  
24 percent”.

1 (c) SUBSTANTIALLY SIMILAR WAIVER.—Section  
2 211(f) of the Clean Air Act (42 U.S.C. 7545(f)) is amend-  
3 ed—

4 (1) by striking the subsection designation and  
5 all that follows through “Effective upon” in sub-  
6 paragraph (B) and inserting the following:

7 “(f)(1) Effective upon”;

8 (2) by striking paragraph (3) and inserting the  
9 following:

10 “(3) Fuels consisting of gasoline and ethanol may be  
11 introduced into commerce under this subsection for use  
12 in motor vehicles described in section 261(b), provided  
13 that the finished fuel—

14 “(A) does not exceed the warranted ethanol lev-  
15 els described in section 263(a);

16 “(B) meets the physical and chemical criteria  
17 specified by ASTM International Standard D4814—  
18 20 for gasoline with 15 percent ethanol; and

19 “(C) consists solely of carbon, hydrogen, oxy-  
20 gen, and sulfur, excepting any impurities present at  
21 trace levels that are gaseous upon combustion.”; and

22 (3) in subparagraph (A) of paragraph (4) (as  
23 designated by subsection (b)(1)(A)), in the first sen-  
24 tence, by striking “or (3)”.

1 **SEC. 8. CLEAN OCTANE STANDARD.**

2 Section 211 of the Clean Air Act (42 U.S.C. 7545)  
3 is amended—

4 (1) in subsection (d)—

5 (A) in paragraph (1), by striking “or (o)”  
6 each place it appears and inserting “(o), or  
7 (w)”;

8 (B) in paragraph (2), by striking “and  
9 (o)” each place it appears and inserting “(o),  
10 and (w)”;

11 (2) by adding at the end the following:

12 “(w) CLEAN OCTANE STANDARD.—

13 “(1) DEFINITIONS.—In this subsection:

14 “(A) BASELINE LIFECYCLE GREENHOUSE  
15 GAS EMISSIONS.—The term ‘baseline lifecycle  
16 greenhouse gas emissions’ means the average  
17 lifecycle greenhouse gas emissions, as deter-  
18 mined by the Administrator, in consultation  
19 with the Director of the Argonne National Lab-  
20 oratory, for unblended gasoline sold or distrib-  
21 uted as transportation fuel in 2023.

22 “(B) LIFECYCLE GREENHOUSE GAS EMIS-  
23 SIONS.—The term ‘lifecycle greenhouse gas  
24 emissions’ means the aggregate quantity of  
25 greenhouse gas emissions as determined by the  
26 Secretary of Energy using the most recent

1 version of the Argonne National Laboratory  
2 Greenhouse gases, Regulated Emissions, and  
3 Energy use in Technologies (GREET) model.

4 “(C) RESEARCH OCTANE NUMBER.—The  
5 term ‘research octane number’ has the meaning  
6 given the term in section 201 of the Petroleum  
7 Marketing Practices Act (15 U.S.C. 2821).

8 “(2) AROMATICS.—

9 “(A) ANNUAL AVERAGE LIMITATION.—Ef-  
10 fective beginning on January 1, 2027, it shall  
11 be unlawful for refiners or importers to sell  
12 motor vehicle gasoline that contains, on an av-  
13 erage annual basis, an aromatic hydrocarbon  
14 concentration in excess of 17.5 percent by vol-  
15 ume.

16 “(B) 2027 CAP.—Effective beginning on  
17 January 1, 2027, it shall be unlawful for refin-  
18 ers or importers to sell motor vehicle gasoline  
19 that contains an aromatic hydrocarbon con-  
20 centration in excess of 30 percent by volume.

21 “(C) 2032 CAP.—Effective beginning on  
22 January 1, 2032, it shall be unlawful for refin-  
23 ers or importers to sell motor vehicle gasoline  
24 that contains an aromatic hydrocarbon content  
25 in excess of 25 percent by volume.

1 “(D) OXYGENATE ADJUSTMENT FOR GASO-  
2 LINE BLENDSTOCK.—

3 “(i) IN GENERAL.—For purposes of  
4 compliance with this paragraph, the aro-  
5 matics volume of motor vehicle gasoline  
6 produced as blendstock for oxygenate  
7 blending may be adjusted based on the  
8 specified type and amount of oxygenate re-  
9 quired to be added downstream.

10 “(ii) REQUIREMENTS.—Any adjust-  
11 ment under clause (i) shall be made  
12 through—

13 “(I) the preparation of a hand  
14 blend containing oxygenate; or

15 “(II) any other method deemed  
16 acceptable to the Administrator.

17 “(E) REGULATIONS.—

18 “(i) IN GENERAL.—The Administrator  
19 shall promulgate regulations to implement  
20 this paragraph.

21 “(ii) CONTENTS.—Regulations pro-  
22 mulgated under clause (i) shall allow for  
23 the generation of tradeable credits to meet  
24 the requirement of subparagraph (A), but



1 any credits shall expire after not more  
2 than 5 years.

3 “(iii) INITIAL REGULATIONS.—Not  
4 later than January 1, 2027, the Adminis-  
5 trator shall promulgate final regulations  
6 under clause (i).

7 “(3) LOW-CARBON OCTANE.—

8 “(A) PROHIBITION.—Effective beginning  
9 on January 1, 2027, no refiner or importer  
10 shall introduce into commerce motor vehicle  
11 gasoline with a research octane number of 95  
12 or higher except through the use of a fuel addi-  
13 tive that has average lifecycle greenhouse gas  
14 emissions that (as determined by the Secretary  
15 of Energy using the most recent version of the  
16 Argonne National Laboratory Greenhouse  
17 gases, Regulated Emissions, and Energy use in  
18 Technologies (GREET) model) are at least 40  
19 percent less than baseline lifecycle greenhouse  
20 gas emissions.

21 “(B) REGULATIONS.—

22 “(i) IN GENERAL.—The Administrator  
23 shall promulgate regulations to implement  
24 this paragraph.

1 “(ii) CONTENTS.—Regulations pro-  
2 mulgated under clause (i) shall—

3 “(I) determine the baseline  
4 lifecycle greenhouse gas emissions for  
5 purposes of this paragraph;

6 “(II) determine the average  
7 lifecycle greenhouse gas emissions of  
8 sources of octane value for purposes  
9 of this paragraph; and

10 “(III) ensure that the require-  
11 ments of this paragraph are met.

12 “(iii) INITIAL REGULATIONS.—Not  
13 later than January 1, 2026, the Adminis-  
14 trator shall promulgate final regulations  
15 under clause (i).”.

16 **SEC. 9. NEW FUEL EFFECTS STUDY.**

17 (a) FUEL EFFECTS STUDY.—

18 (1) STUDY REQUIRED.—Subject to subsection  
19 (b), the Administrator of the Environmental Protec-  
20 tion Agency (referred to in this section as the “Ad-  
21 ministrator”) shall carry out a study of the emis-  
22 sions effects of ethanol-blended fuels in light-duty  
23 vehicles and light-duty trucks, for the purpose of up-  
24 dating the Motor Vehicle Emission Simulator mod-  
25 eling system.

1           (2) REQUIREMENTS.—In designing and con-  
2           ducting the study under paragraph (1), the Adminis-  
3           trator shall—

4                   (A) select test fuels that—

5                           (i) reflect a range of ethanol con-  
6                           centrations between 0 and at least 25 per-  
7                           cent by volume; and

8                           (ii) are representative of fuels that are  
9                           widely available on the date of enactment  
10                          of this Act or reasonably could be available  
11                          regionally or nationally, taking into ac-  
12                          count fuel refinery operations and econom-  
13                          ics, including the cost of reformat;

14                   (B) select test vehicles that are representa-  
15                   tive of vehicles of recent model years as of the  
16                   date of enactment of this Act that include rel-  
17                   evant technologies that are, or reasonably may  
18                   come to be, in widespread use;

19                   (C) measure emission products of combus-  
20                   tion including, at a minimum—

21                           (i) particulate matter of 2.5 microm-  
22                           eters in diameter or less;

23                           (ii) ultrafine particulate matter of 0.1  
24                           micrometers in diameter or less;

25                           (iii) nitrogen oxides;

- 1 (iv) total hydrocarbons;
- 2 (v) nonmethane organic gas;
- 3 (vi) carbon monoxide;
- 4 (vii) benzene;
- 5 (viii) toluene;
- 6 (ix) ethylbenzene;
- 7 (x) xylene;
- 8 (xi) 1,3-butadiene;
- 9 (xii) ethanol; and

10 (xiii) polycyclic aromatic hydro-  
11 carbons, including at a minimum  
12 benzo(a)pyrene;

13 (D) measure the tendency of measured  
14 emissions to form secondary organic aerosols  
15 and any other relevant secondary air pollution;  
16 and

17 (E) consult with the Secretary of Energy,  
18 the Secretary of Agriculture, and the Secretary  
19 of Transportation (or their delegates).

20 (b) CERTIFICATION BY SECRETARY OF ENERGY.—

21 The Administrator shall—

22 (1) provide the proposed design of the study  
23 under subsection (a) to the Secretary of Energy for  
24 review; and

1           (2) not commence the study under subsection  
2           (a) until the Secretary of Energy certifies in writing  
3           that the design of the study complies with the re-  
4           quirements of subsection (a).

5   **SEC. 10. DUAL-FUELED AUTOMOBILE DEFAULT UTILIZA-**  
6                   **TION FACTOR.**

7           (a) IN GENERAL.—Section 32905 of title 49, United  
8   States Code, is amended by striking subsection (b) and  
9   inserting the following:

10          “(b) DUAL-FUELED AUTOMOBILES.—

11               “(1) FUEL ECONOMY.—Except as provided in  
12          subsection (d) or section 32904(a)(2)—

13                   “(A) for any model of dual-fueled auto-  
14          mobile manufactured by a manufacturer in  
15          model years 1993 through 2020, the Adminis-  
16          trator of the Environmental Protection Agency  
17          shall measure the fuel economy for that model  
18          by dividing 1.0 by the sum of—

19                       “(i) 0.5 divided by the fuel economy  
20                       measured under section 32904(c) when op-  
21                       erating the model on gasoline or diesel  
22                       fuel; and

23                       “(ii) 0.5 divided by the fuel econ-  
24                       omy—

1 “(I) measured under subsection  
2 (a) when operating the model on al-  
3 ternative fuel; or

4 “(II) measured based on the fuel  
5 content of B20 when operating the  
6 model on B20, which is deemed to  
7 contain 0.15 gallon of fuel; and

8 “(B) subject to paragraph (3), for any  
9 model of dual-fueled automobile manufactured  
10 by a manufacturer in model year 2025 or later,  
11 the Administrator of the Environmental Protec-  
12 tion Agency shall measure the fuel economy for  
13 that model by dividing 1.0 by the sum of—

14 “(i) 0.79 divided by the fuel economy  
15 measured under section 32904(c) when op-  
16 erating the model on gasoline or diesel  
17 fuel; and

18 “(ii) 0.21 divided by the fuel economy  
19 measured under subsection (a) when oper-  
20 ating the model on alternative fuel, which  
21 is deemed to contain 0.15 gallon of fuel.

22 “(2) GREENHOUSE GAS EMISSIONS.—For any  
23 model of dual-fueled automobile manufactured by a  
24 manufacturer in model year 2025 or later, the Ad-  
25 ministrator of the Environmental Protection Agency

1       shall measure the greenhouse gas emissions for that  
2       model, which shall be the sum obtained by adding—

3               “(A) the product obtained by multi-  
4       plying—

5               “(i) the measured greenhouse gas  
6       emissions on the alternative fuel;

7               “(ii) the fuel content of the alternative  
8       fuel, which is deemed to be 0.15; and

9               “(iii) 0.21; and

10              “(B) the product obtained by multiplying  
11       0.79 and the measured greenhouse gas emis-  
12       sions on gasoline or diesel fuel, as applicable.

13              “(3) HIGHER UTILIZATION FACTOR FOR NEW  
14       MODELS.—A manufacturer may demonstrate that a  
15       higher utilization factor applies to any model of  
16       dual-fueled automobile manufactured by the manu-  
17       facturer in model year 2025 or later.”.

18       (b) TESTING PROCEDURES.—Section 206 of the  
19       Clean Air Act (42 U.S.C. 7525) is amended by adding  
20       at the end the following:

21              “(i) REQUIREMENT TO UPDATE TEST PROCE-  
22       DURES.—Not later than July 1, 2024, the Administrator  
23       shall amend the test procedures promulgated under this  
24       section to be in accordance with section 32905(b)(1)(B)  
25       of title 49, United States Code.”.

1   **SEC. 11. TRANSFERS OF CREDITS FOR EXCEEDING AVER-**  
2                   **AGE FUEL ECONOMY STANDARDS.**

3           Section 32903(g) of title 49, United States Code, is  
4   amended by striking paragraph (3) and inserting the fol-  
5   lowing:

6                   “(3) MAXIMUM INCREASE.—The maximum in-  
7           crease in any compliance category attributable to  
8           transferred credits is—

9                           “(A) for model year 2023, 4.0 miles per  
10           gallon; and

11                           “(B) for model year 2024 and subsequent  
12           model years, 6.0 miles per gallon.”.