

SECTION .0200 - QUALITY OF LIQUID FUEL PRODUCTS

02 NCAC 42 .0201 STANDARD SPECIFICATIONS

(a) The Board hereby adopts by reference, including subsequent amendments and editions, ASTM D 4814, "Standard Specification for Automotive Spark-Ignition Engine Fuel" as standard specification for gasoline with the following modifications:

- (1) applications for temporary exceptions to vapor pressure and vapor-liquid ratio specifications as provided in this Subparagraph shall be made to the Director. Said applications shall contain evidence that outlets marketing gasoline in North Carolina cannot be supplied from bulk terminals furnishing specified volatility level gasoline or that customary sources of supply have been temporarily interrupted by product shortage and alternate sources furnishing specified volatility level gasoline are not available. Such temporary exceptions granted shall apply only until the next meeting of the Board at which time the Board shall establish the duration of the exception;
- (2) the minimum lead content for gasoline registered or labeled as "leaded" shall be as defined in 02 NCAC 42 .0102;
- (3) vapor pressure and vapor-liquid ratio seasonal specifications as listed in this Subparagraph may be extended for a maximum period of 15 days to allow for the disbursement of old stocks. However, new stocks of a higher volatility classification shall not be offered for retail sale prior to the effective date of the higher volatility classification.

(b) The Board hereby adopts by reference, including subsequent amendments and editions, ASTM D 4814, "Standard Specification for Automotive Spark-Ignition Engine Fuel" as standard specification for alcohol blends with the following modifications:

- (1) a vapor pressure tolerance not exceeding one pound per square inch (1 psi) for ethanol blends of 9 percent to 15 percent by volume;
- (2) vapor pressure seasonal specifications as listed in this Subparagraph may be extended for a maximum period of 15 days to allow for the disbursement of old stocks. However, new stocks of a higher volatility classification shall not be offered for retail sale prior to the effective date of the higher volatility classification;
- (3) applications for temporary exceptions to vapor pressure specifications as provided in this Subparagraph shall be made to the Director. Said applications shall contain evidence that outlets marketing gasoline in North Carolina cannot feasibly be supplied from bulk terminals furnishing specified volatility level gasoline or that customary sources of supply have been temporarily interrupted by product shortage and alternate sources furnishing specified volatility level gasoline are not available. Such temporary exceptions granted shall apply only until the next meeting of the Board at which time the Board shall establish the duration of the exception;
- (4) the minimum temperature at 50 percent evaporated shall be 150 degrees F (66 degrees C) as determined by ASTM Test Method D 86 for ethanol blends of 1 percent to 15 percent by volume;
- (5) the minimum lead content for gasoline and alcohol blends registered or labeled as "leaded" shall be as defined in 02 NCAC 42 .0102;
- (6) octane rating shall not be less than the octane index certified on the brand name registration as required by 02 NCAC 42 .0500;
- (7) all blends, both leaded and unleaded, shall be blended according to the EPA "Substantially Similar" rule found in the Clean Air Act, CAA Section 211(f)(1)(B), or an EPA waiver for unleaded fuel;
- (8) water tolerance shall be such that no phase separation occurs when subjected to a temperature equal to the temperatures specified in the table for "Maximum Temperature for Phase Separation, C," ASTM D 4814;
- (9) the vapor-liquid ratio specification shall be waived for ethanol blends of up to 10 percent.

(c) The Board hereby adopts by reference, including subsequent amendments and editions, ASTM D 975, "Standard Specification for Diesel Fuel Oils" as standard specification for diesel motor fuels and renewable diesel fuels with the following modification: For diesel motor fuel grade 2-D, the minimum flash point as determined by ASTM Test Method D 56 shall be 115 degrees F (46 degrees C).

(d) The Board hereby adopts by reference, including subsequent amendments and editions, ASTM D 396, "Standard Specification for Fuel Oils" as standard specification for fuel oils and blends of biodiesel and fuel oil.

(e) The Board hereby adopts by reference, including subsequent amendments and editions, ASTM D 3699, "Standard Specification for Kerosene" as standard specification for kerosenes with the following modification: For

grade 2-K, the presence or absence of coloring matter shall in no way be determinative of whether a substance meets the requirements of this grade of kerosene.

(f) The Board hereby adopts by reference, including subsequent amendments and editions, ASTM D 6751, "Standard Specification for Biodiesel (B100) Blend Stock for Distillate Fuels" as standard specification for biodiesel (B100) and for B99 (a blend of 99 percent biodiesel and one percent petroleum diesel).

(g) The Board hereby adopts by reference, including subsequent amendments and editions, ASTM D 5798, "Standard Specification for Ethanol Fuel Blends for Flexible Fuel Automotive Spark-Ignition Engines" as standard specification for Ethanol Flex Fuel.

(h) The Board hereby adopts by reference, including subsequent amendments and editions, NIST Handbook 130, "Uniform Engine Fuels, Petroleum Products and Automotive Lubricants Regulation," section 2.2.1 "Premium Diesel Fuel" as the standard specification of premium diesel fuels in addition to ASTM D 975. Copies of this document may be obtained at no cost from the NIST Web site - <https://www.nist.gov/pml/weights-and-measures/publications/nist-handbooks/other-nist-handbooks/other-nist-handbooks-2-1>

(i) In addition to meeting all specification requirements as set forth in this Rule, each fuel must be suitable for the intended use. Motor fuels shall not contain concentrations of methyl tertiary butyl ether (MTBE) in violation of G.S. 119-26.3.

(j) ASTM documents adopted by reference herein are available for inspection in the office of the Director of the Standards Division and may be obtained from ASTM International, 100 Barr Harbor Drive, PO Box C700, West Conshohocken, PA 19428-2959 or their Web site - www.astm.org, at the following cost for each document: D 396, fifty-eight dollars (\$58.00); D 975, seventy-five dollars (\$75.00); D 3699, fifty-two dollars (\$52.00); D 4814, seventy-five dollars (\$75.00); D 5798, fifty-two dollars (\$52.00); and D 6751 fifty-eight dollars (\$58.00).

*History Note: Authority G.S. 119-26; 119-26.1;
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