

Regulations Text

DIVISION 4.5, CALIFORNIA CODE OF REGULATIONS, TITLE 22 CHAPTER 30. CALIFORNIA BRAKE FRICTION MATERIAL REQUIREMENTS

66387.1 Definitions

- (a) “Accredited laboratory” means a laboratory that meets the requirements of California Code of Regulations, title 22, section 66387.5.
- (b) “Alternative laboratory accreditation” means a laboratory accreditation standard that does not meet the requirements of ISO/IEC 17025:2005, or a laboratory accreditation program that is not recognized by the National Environmental Laboratory Accreditation.
- (c) “Alternative testing method” means a chemical analysis testing method or chemical analysis sample processing method that is not cited in testing protocol SAE J 2975:DEC2013.
- (d) “Brake friction material” means that part of a motor vehicle brake designed to retard or stop the movement of a motor vehicle through friction against a rotor made of a more durable material.
- (e) “Certification mark” means a mark that appears on the brake friction material packaging to self-certify the product is compliant with the requirements of either Health and Safety Code section 25250.51, 25250.51 and 25250.52, or 25250.51 and 25250.53.
- (f) “Department” means the Department of Toxic Substances Control.
- (g) “Environmental compliance level” means the single letter identified in California Code of Regulations, title 22, section 66387.8, subsections (b), (c), or (d) that specifies the constituent concentration levels for which a brake friction material formulation does not exceed concentrations levels in subsections (b), (c), or (d).
- (h) “Environmental compliance marking” means a three character alphanumeric identification code that meets the requirements of California Code of Regulations, title 22, section 66387.8. It is the environmental compliance level followed by the two-digit year of manufacture.
- (i) “Manufacturer,” except where otherwise specified, means both of the following:
 - (1) A manufacturer or assembler of motor vehicles or motor vehicle equipment.
 - (2) An importer of motor vehicles or motor vehicle equipment for resale.A “manufacturer” includes a vehicle brake friction materials manufacturer.
- (j) “Marked proof of certification” means:
 - (1) The unique identification code and environmental compliance marking marked on the brake friction material; and
 - (2) A certification mark that appears on the brake friction material packaging that provides attestation that the brake friction material has been tested and certified as compliant with the requirements in Health and Safety Code section 25250.51, 25250.51 and 25250.52, or 25250.51 and 25250.53.
- (k) “Motor vehicle” and “vehicle” means a device by which a person or property may be propelled, moved, or drawn upon a highway, excepting a device moved exclusively by human power or used upon stationary rails or tracks.
- (l) “Regulated constituents” means:
 - (1) Asbestiform fibers.
 - (2) Cadmium and its compounds.
 - (3) Chromium (VI)-salts.
 - (4) Lead and its compounds.
 - (5) Mercury and its compounds.

- (m) "Rotor" means the rotating portion of a motor vehicle brake system including, but not limited to, brake disks and brake drums.
- (n) "Secretary" means the California Secretary for Environmental Protection.
- (o) "Testing certification agency" means a third-party testing certification agency that is utilized by a vehicle brake friction materials manufacturer and that has an accredited laboratory program that provides testing in accordance with the certification agency requirements that are approved by the department. The term "registrar" and "industry-sponsored registrar" are used by the industry when referring to this entity.
- (p) "Unique identification code" means the combination of "Company Assigned ID" and "Formulation Identification" referenced in SAE J 866:JUL2012 section 3.

NOTE: Authority cited: Health & Safety Code sections 25250.50, 25250.55, and 58012. Reference: Health and Safety Code sections 25250.50, 25250.51, 25250.52, 25250.53, 25250.54, and 25250.60.

66387.2 References

- (a) When used in Chapter 25, the following publications are incorporated by reference:
 - (1) ILAC-P5:10:2013, "International Laboratory Accreditation Cooperation (ILAC) Multilateral Recognition Arrangement", dated 2013, available from the ILAC Secretariat, PO Box 7507, Silverwater, NSW 2128, Australia.
 - (2) ISO/IEC Guide 65:1996, "General requirement for bodies operating product certification systems," dated 1996, available from the International Organization for Standardization (ISO), ISO Central Secretariat, 1, ch. de la Voie-Creuse, CP 56, CH-1211 Geneva 20, Switzerland
 - (3) ISO/IEC 17011:2005, "General requirements for accreditation bodies accrediting conformity assessment bodies", dated 2005, available from International Organization for Standardization (ISO), ISO Central Secretariat, 1, ch. de la Voie-Creuse, CP 56, CH-1211 Geneva 20, Switzerland
 - (4) ISO/IEC 17025:2005, "General requirements for the competence of testing and calibration laboratories," dated 2005, available from International Organization for Standardization (ISO), ISO Central Secretariat, 1, ch. de la Voie-Creuse, CP 56, CH-1211 Geneva 20, Switzerland
 - (5) ISO/IEC 17065:2012, "Conformity assessment -- Requirements for bodies certifying products, processes and services," dated 2012, available from International Organization for Standardization (ISO), ISO Central Secretariat, 1, ch. de la Voie-Creuse, CP 56, CH-1211 Geneva 20, Switzerland
 - (6) NELAC Institute Standard, Environmental Laboratory Sector, Volume 1, "Management and Technical Requirements for Laboratories Performing Environmental Analysis," dated 2009, available from The NELAC Institute, P. O. Box 2439, Weatherford, TX 76086;
 - (7) SAE J 866:JUL2012, "Friction Coefficient Identification and Environmental Marking System for Brake Linings," dated July 2012, available from the Society of Automotive Engineers (SAE) Customer Service, 400 Commonwealth Drive, Warrendale, PA 15096-0001;
 - (8) SAE J 2975:DEC2013, "Measurement of Copper and Other Elements in Brake Friction Materials," dated December 2013, available from the Society of Automotive Engineers (SAE) Customer Service, 400 Commonwealth Drive, Warrendale, PA 15096-0001.

NOTE: Authority cited: Health and Safety Code sections 25250.50, 25250.60, and 58012. Reference: Health and Safety Code section 25260.60.

66387.3 Self-certification of compliance

For the purposes of this section, self-certification means the process where the brake friction material manufacturer registers their brake friction material with a testing certification agency. The testing certification agency verifies the brake friction material is tested by an analytical laboratory accredited in accordance with California Code of Regulations, title 22, section 66387.5, subsection (a) and is analyzed using testing protocol SAE J 2975:DEC2013 or an alternative testing method approved under section 66387.6, subsection (l). The testing certification agency assigns the environmental compliance level and publicly posts the following on its website: the registered unique identification code(s), the assigned environmental compliance level for each registered unique identification code, and the self-certification documentation. This section provides detailed steps on the self-certification process.

- (a) Manufacturers of brake friction material shall certify the formulation of any brake friction material that is sold or offered for sale in California complies with the requirements of either Health and Safety Code sections 25250.51, 25250.51 and 2550.52, or 25250.51 and 25250.53 using the following process:
- (1) Step 1: Submit a sample of each manufactured brake friction material for laboratory testing. A manufacturer of brake friction material shall submit a sample of brake friction material to a laboratory approved by the testing certification agency to perform testing in accordance with California Code of Regulations, title 22, section 66387.5.
 - (2) Step 2: Receive confirmation from the laboratory that all required laboratory testing results specified in section 66387.6(g) for each brake friction material were submitted to the testing certification agency. If the manufacturer does not receive confirmation from the laboratory, then the manufacturer of the brake friction material shall contact the testing certification agency and confirm that all laboratory testing results required to certify a given friction material formulation were received by the testing certification agency. The manufacturer of brake friction material may review the testing results prior to the laboratory sending the results to the testing certification agency. All testing and reporting of results must be carried out in accordance with California Code of Regulations, title 22, section 66387.6.
 - (3) Step 3: Ensure that each brake friction material that complies with the requirements of either Health and Safety Code sections 25250.51, 25250.51 and 25250.52, or 25250.51 and 25250.53 is assigned by the manufacturer of the brake friction material a unique identification code ending in the appropriate environmental compliance marking as described in California Code of Regulations, title 22, section 66387.7.
 - (4) Step 4: Submit self-certification documentation to a testing certification agency. Self-certification documentation must include:
 - (A) The contact information for the manufacturer of brake friction material(s) including but not limited to:
 1. The contact person's name; and
 2. The contact person's job title; and
 3. The contact person's e-mail address; and
 4. The business's name; and
 5. The business's address; and
 6. The business's phone number or the contact person's phone number.

- (B) A signed and dated statement by an authorized representative of the brake friction material manufacturer declaring that all brake friction materials bearing the listed unique identification codes are of the same composition as those submitted to the laboratory, are of the same composition as those testing results submitted to the testing certification agency, and meet all of the requirements of Health and Safety Code section 25250.60 subdivision (c), subdivision (e), and subdivision (g).

The statement shall include, but is not limited, to language identical or similar to that specified in California Code of Regulations, title 22, section 66387.3, subsection (a)(4)(B)1.

1. I, the undersigned, on behalf of the above named Company, approve, assert, and certify as true and accurate all information shown in this document. I hereby assert that the friction materials bearing the marked proof of certification set forth in this certification document are substantially identical to the products submitted for testing and meet the requirements of all applicable codes, regulations, rules, and laws including those specified in the addendum below. I hereby authorize [testing certification agency name] to publicly post all information required to be made public by any United States laws in accordance with the law and any written contracts between [testing certification agency name] and the Company specified above. I hereby assert that all test results used to issue this self-certification comply with all requirements of the law and any contracts between [testing certification agency name] and the Company specified above. Company agrees that [testing certification agency name] shall have no liability to Company or any third party with respect to release of the above referenced Company data to any government agency with the legal authority to receive such data. I hereby assert that I have the authority to make this authorization and assertion on behalf of the Company specified above. Any written modifications to this Affidavit section are not acceptable and invalidate this self-certification. This document shall serve as proof of self-certification as required by Health and Safety Code sections 25250.60 subdivision (c), subdivision (e), and subdivision (g).
- (5) Step 5: Receive confirmation from the testing certification agency that each brake friction material that complies with the requirements of this chapter is posted on the Internet in a publicly accessible and searchable database or list.
- (A) The testing certification agency shall notify the Department either in writing or electronically of the URL where the information was publicly posted on the Internet.
1. For an electronic submittal, a person shall send the notification to the Department via electronic mail (brakepad@dtsc.ca.gov) on the Department's website at <http://www.dtsc.ca.gov> with the subject line "Attention: California Brake Pad Certification Notification" displayed in the subject line of the electronic mail; or
 2. For a written submittal, a person shall send the notification to the Department via certified mail, return receipt requested, at the following address: Department of Toxic Substances Control, Safer Products and Workplaces Program, P.O. Box 806, Sacramento, CA 95812-0806, with the words "Attention: California Brake Pad Certification Notification" prominently displayed on the front of the envelope.

- (B) The publicly accessible and searchable database or list must include the manufacturer's name, the unique identification code, and the full URL address to the certification document.
- (C) The testing certification agency shall notify the Department within thirty (30) days whenever the Internet address of this database or list changes using the notification procedures in subsection (A)1 and (A)2 of this section.
- (6) Step 6: Ensure that brake friction material is marked with the marked proof of certification in accordance with California Code of Regulations, title 22, section 66387.7.
- (b) Manufacturers of brake friction material may use one set of testing results and self-certification documentation, and a single unique identification code for multiple products using an identical brake friction material formulation.
- (c) Manufacturers of brake friction material may use one set of testing results to register multiple unique identification codes for products using an identical brake friction material formulation.
- (d) Manufacturers of brake friction material are responsible for the accuracy of all information transmitted to the testing certification agency.

NOTE: Authority cited: Health and Safety Code sections 25250.60 and 58012. Reference: Health and Safety Code section 25250.60.

66387.4 Testing Certification Agency for Brake Friction Material

The testing certification agency shall serve as the official registration source for self-certified brake friction materials. The testing certification agency shall post and maintain the self-certification of brake friction materials on the Internet which includes the unique identification code and the manufacturer name. The Department shall approve the certification requirements used by the testing certification agency to facilitate the acceptance of the marked proof of certification in all 50 states and United States territories in accordance with Health and Safety Code section 25250.60, subdivision (j).

(a) **What accreditation does the testing certification agency need to meet?**

The testing certification agency shall use accredited laboratories that meet the requirements of California Code of Regulations, title 22, section 66387.5. The testing certification agency shall be accredited in accordance with the requirements of either the ISO/IEC 17065:2012 standard or the ISO/IEC Guide 65:1996 standard. The accreditation must be issued by an accreditation body, operating in accordance with ISO/IEC 17011:2005. The accreditation body shall be a signatory to the International Laboratory Accreditation Cooperation (ILAC) Arrangement for testing (ISO/IEC 17025) for accreditation of testing organizations or the International Accreditation Forum (IAF) Arrangement for product certification (ISO/IEC 17065) for accreditation of certification agencies. A testing certification agency shall be responsible for performing the following tasks:

- (1) Use chemical analysis data from an accredited laboratory that meets the requirements of California Code of Regulations, title 22, section 66387.5. If a testing certification agency uses an analytical laboratory that is accredited by a program not listed in California Code of Regulations, title 22, section 66387.5, subsection (a), then the testing certification agency shall follow the process outlined in California Code of Regulations, title 22, section 66387.5, subsection (b) through (d) and obtain approval from the Department prior to using test results from that analytical laboratory for the brake friction material;
- (2) Receive confirmation from the analytical laboratory that the chemical analysis for each brake friction material formulation was conducted using the testing methodology in

- accordance with California Code of Regulations, title 22, section 66387.6, subsection (a). If an analytical laboratory or manufacturer of brake friction material uses a chemical analysis testing method or chemical analysis sample processing not listed in California Code of Regulations, title 22, section 66387.6, subsection (a)(2), then the testing certification agency shall request the analytical laboratory or manufacturer of the brake friction material provide the approval letter issued by the Department stating the alternative testing method was approved pursuant California Code of Regulations, title 22, section 66387.6, subsection (l);
- (3) Issue a self-certification of compliance to the brake friction material manufacturer for its formulation(s) and unique identification code(s) that comply with Health and Safety Code sections 25250.51, 25250.52, or 25250.53.
 - (4) Publish all self-certifications on the Internet in accordance with Health and Safety Code section 25250.60, subdivision (h);
 - (5) Assign the environmental compliance level in accordance with California Code of Regulations, title 22, section 66387.7, subsection (c)(3); and
 - (6) Post on the Internet the environmental compliance level and unique identification code(s) marked on the brake friction material that follows the process outlined in California Code of Regulations, title 22, section 66387.7, subsection (c), with or without the two digits that indicate the year the brake friction material is produced.
- (b) **What is the process for obtaining the Department's approval for a testing certification agency's requirements?**

An organization interested in being a testing certification agency shall submit a request for approval to the Department on their brake friction material certification requirements in writing or electronically. The request shall include all of the following information:

- (1) Contact information for the organization requesting the approval including but not limited to the:
 - (A) Contact person's name; and
 - (B) Contact person's job title; and
 - (C) Contact person's e-mail address; and
 - (D) Business name; and
 - (E) Business address; and
 - (F) Business phone number.
- (2) The organization's brake friction material certification request for approval must include copies of the organization's:
 - (A) Certificate of Conformity Accreditation for either:
 1. ISO/IEC 17065:2012; or
 2. ISO/IEC Guide 65:1996
 - (B) Standard Operating Procedures for Material and/or Product Certification;
 - (C) Proposed brake friction material certification process including but not limited to:
 1. Copy of the chemical analysis testing method and chemical analysis sampling process that meets the requirements in California Code of Regulations, title 22, section 66387.6;
 2. Copy of the procedures describing the quality assurance procedures for checking testing results and rejecting testing results that are not within the quality control limits;
 3. Recertification cycle for each certified brake friction material is performed at least every 3 years under this program. When recertifying brake friction materials, manufacturers of brake friction materials must submit updated self-certification

documentation and new laboratory testing results. However, brake friction materials containing more than five percent copper, but that meet the requirements for the constituents listed in California Health and Safety Code section 25250.51, subdivisions (a)(1) through (a)(5), do not need to be submitted for new testing to be recertified prior to 2021;

4. Copy of the procedure used to ensure every self-certified brake friction material formulation has a unique identification code;
5. Copy of the proposed manufacturer declaration of Self-Certification of Compliance;
6. Copy of the proposed format for the marked proof of certification that meets the requirements in California Code of Regulations, title 22, section 66387.7;
7. Copy of the procedure regarding self-certification information on brake friction materials on their website. This includes, but is not limited to, the list of self-certified materials, description of the registration procedures, date of the last update of the list of registered materials, description and graphics illustrating the marked proof of certification on the pad and packaging logo.
8. Internet address where all self-certification documentation will be published and available to the public at no cost; and
9. Copy of the trademark for a packaging logo if one is issued by the testing certification agency.

(D) Copy of the certification credentials for the chemical analysis laboratory(ies) used by the testing certification agency

(3) An organization may submit a request for approval of certification agency requirements by either of the following methods:

(A) For an electronic submittal, a person shall send the request to the Department via electronic mail (brakepad@dtsc.ca.gov) on the Department's website at <http://www.dtsc.ca.gov> with the words "Attention: California Brake Pad Testing Certification Agency Request" displayed in the subject line of the electronic mail; or

(B) For written submittal, a person shall send the request to the Department via certified mail, return receipt requested, at the following address: Department of Toxic Substances Control, Safer Products and Workplaces Program, P.O. Box 806, Sacramento, CA 95812-0806, with the words "Attention: California Brake Pad Testing Certification Agency Request" prominently displayed on the front of the envelope.

(c) **How will the Department notify a testing certification agency that their certification agency requirements have been approved by the Department?**

The Department shall notify the testing certification agency in writing of its determination of approval or denial within 90 days of receipt of the request. If the Department finds the testing certification agency requirements meet California Code of Regulations, title 22, section 66387.4, subsection (a), then a letter will be sent to the testing certification agency that provides details on the basis of the approval. If the Department does not find the testing certification agency requirements meet subsection (a) of this section, then the letter will list the reasons the certification agency requirements did not meet subsection (a) of this section. Testing certification agencies approved by the Department shall be posted on the Department's Web page at <http://www.dtsc.ca.gov> .

After a testing certification agency has been approved by the Department, the testing certification agency does not need to resubmit the document specified by the California Code of Regulations, title 22 section 66387.4, subsection (b)(2)(D) for additional laboratories to be used

by the testing certification agency, if the additional analytical laboratories comply with the requirements in subsection 66387.5, subsection(c)(2). The testing certification agency does not need to resubmit changes to the documentation and procedures described in the California Code of Regulations, title 22, 66387.4, subsections(b)(2)(B) and (b)(2)(C) provided those changed documents continue to comply with all requirements of the California Code of Regulations, title 22, section 66387.4.

NOTE: Authority cited: Health and Safety Code sections 25250.60 and 58012. Reference: Health and Safety Code section 25250.60.

66387.5 Accredited laboratories for testing brake friction materials

(a) **What accreditation does the analytical laboratory need to meet?**

To certify compliance, a manufacturer of brake friction material shall ensure that its brake friction material is tested by a laboratory that is qualified and equipped for testing products in accordance with the SAE J 2975:DEC2013, and maintains accreditation to one of the following:

(1) ISO/IEC 17025:2005 from a laboratory accreditation body that is a signatory to the International Laboratory Accreditation Cooperation Multilateral Recognition Arrangement, as of the effective date of this chapter. The laboratory's scope of accreditation to ISO/IEC 17025:2005 shall encompass one of the following:

(A) Test method(s) listed in SAE J 2975:DEC2013; or

(B) An alternate testing method approved under California Code of Regulations, title 22, section 66387.6, subsection (l); or

(2) Any accreditation body that is recognized by the National Environmental Laboratory Accreditation Program, as of the effective date of this chapter.

(b) **May an alternative laboratory accreditation not listed in California Code of Regulations, title 22, section 66387.5, subsection (a) be used?**

A manufacturer of brake friction material, laboratory, or laboratory accreditation body may certify compliance with Health and Safety Code section 25250.51, 25250.51 and 25250.52, or 25250.51 and 25250.53 using testing results generated by a laboratory accredited to an alternative laboratory accreditation not listed in subsection (a) of this section if the alternative laboratory accreditation is approved by the Department in advance of testing results being used for certification. The manufacturer of brake friction material, laboratory, or laboratory accreditation body that requests the Department consider an alternative laboratory accreditation not listed in subsection (a) of this section shall be responsible to demonstrate to the Department that the alternative laboratory accreditation is equivalent to or better than the standards or laboratory accreditation programs listed in subsection (a) of this section. Once an alternative laboratory accreditation has been approved by the Department in accordance with California Code of Regulations, title 22, section 66387.5, subsection (d), any brake friction material manufacturer, laboratory, or laboratory accreditation body may use the alternative laboratory accreditation for certification.

(c) **What is the process for requesting the Department to approve an alternative laboratory accreditation not listed in California Code of Regulations, title 22, section 66387.5, subsection (a)?**

A manufacturer of brake friction materials, laboratory, or laboratory accreditation body may submit a request for approval on an alternative laboratory accreditation in writing or electronically. The request shall include the following information:

- (1) Contact information for the organization requesting the approval including but not limited to the:
 - (A) Contact person's name; and
 - (B) Contact person's job title; and
 - (C) Contact person's e-mail address; and
 - (D) Business name; and
 - (E) Business address; and
 - (F) Business phone number.
- (2) A copy of the alternative laboratory accreditation standard or the proficiency testing procedures for the laboratory accreditation program.
- (3) A manufacturer of brake friction material, laboratory, or laboratory accreditation body may submit a request for an approval of an alternate laboratory accreditation by either of the following methods:
 - (A) For an electronic submittal, a person shall send the request to the Department via electronic mail (brakepad@dtsc.ca.gov) on the Department's website at <http://www.dtsc.ca.gov> with the words "Attention: California Brake Pad Alternative Laboratory Accreditation Request" displayed in the subject line of the electronic mail; or
 - (B) For a written submittal, a person shall send the request to the Department via certified mail, return receipt requested, at the following address: Department of Toxic Substances Control, Safer Products and Workplaces Program, P.O. Box 806, Sacramento, CA 95812-0806, with the words "Attention: California Brake Pad Alternative Laboratory Accreditation Request" prominently displayed on the front of the envelope.
- (d) **How will the Department notify a manufacturer of brake friction material, laboratory, or laboratory accreditation body that an alternative laboratory accreditation has been approved?**

The Department shall notify the manufacturer of brake friction material, the laboratory, or the laboratory accreditation body in writing as to whether the alternative laboratory accreditation has been approved within 90 days of receipt of the request. If the Department finds the alternative laboratory accreditation is equivalent to or better than those listed in California Code of Regulations, title 22, section 66387.5, subsection (a), the Department shall provide the basis of the approval. If the Department does not find the alternative laboratory accreditation equivalent to or better than those listed in subsection (a) of this section, the Department shall provide the reasons in writing for the denial. The alternative laboratory accreditation approved by the Department shall be posted on the Department's Web page at <http://www.dtsc.ca.gov>.

NOTE: Authority cited: Health and Safety Code sections 25250.60 and 58012. Reference: Health and Safety Code section 25250.60.

66387.6 Testing methodology and maximum concentrations of regulated constituents and copper for brake friction materials

- (a) The manufacturer of brake friction material offered for sale in California shall ensure that its brake friction materials sold or offered for sale in California are tested:
 - (1) By a laboratory accredited in accordance with California Code of Regulations, title 22, section 66387.5; and
 - (2) Using the testing protocol SAE J 2975:DEC2013 or an alternative testing method approved under subsection (l) of this section.

- (b) Manufacturers of brake friction material shall ensure that brake friction material is tested for each of the following:
- (1) Asbestiform fibers;
 - (2) Cadmium and its compounds;
 - (3) Chromium (VI)-salts;
 - (A) The total chromium in a brake friction material may be tested and assumed to be entirely composed of chromium (VI)-salts. Therefore if the amount of total chromium is within the chromium (VI)-salts allowable range, speciated Chromium (VI)-salts testing is not required.
 - (4) Copper and its compounds;
 - (5) Lead and its compounds; and
 - (6) Mercury and its compounds.
- (c) **Who is responsible for the accuracy of laboratory testing results?**
The analytical laboratory is responsible for the accuracy of the test results reported to the testing certification agency. The manufacturer of brake friction material is responsible to confirm the concentrations of regulated constituents and copper reported correspond to the concentrations known to be in their brake friction material formulations prior to the analytical laboratory reporting these testing results to the testing certification agency.
- (d) **What are the maximum concentrations for the regulated constituents and copper in brake friction materials that must be certified?**
To be used for certification, the cumulative average of all testing data must show that the brake friction material does not exceed the following concentrations:
- (1) 0.01 percent by weight for cadmium and its compounds;
 - (2) 0.1 percent by weight for each of these individual constituents:
 - (A) Asbestiform fibers.
 - (B) Chromium(VI)-salts.
 - (C) Lead and its compounds.
 - (D) Mercury and its compounds.
 - (3) 5.0 percent by weight of copper and its compounds after January 1, 2021; and
 - (4) 0.5 percent by weight of copper and its compounds after January 1, 2025.
- (e) **How many times does each friction material need to be tested?**
All testing for the regulated constituents and copper must be done at least in triplicate.
- (1) Due to the margin of error in the test method, additional testing may be required to demonstrate that the brake friction material does not exceed the concentrations listed for each of the regulated constituents and copper in Health and Safety Code sections 25250.51, 25250.52, and 25250.53. Cumulative average of all testing results conducted on a specific brake friction material must meet the applicable requirements of the subsection (d) of this section.
 - (A) For example, if a pad contains 4.9 percent copper, the first round of testing results could come back showing the average testing result is greater than 5.0 percent copper by weight. Consequently, these results would not be suitable for demonstrating compliance and the brake friction material would need to be retested in accordance with SAE J 2975:DEC2013.
 - (2) If an approved alternative testing method or protocol is used, all testing must be done in accordance with the alternative testing method and must be done at least in triplicate.
- (f) **How must laboratory testing results be reported to the Department?**
No results are reported to the Department.

(g) **What information must be reported to the testing certification agency?**

The analytical laboratories shall transmit all laboratory testing results for a brake friction material directly to a testing certification agency.

(1) Test results determined to be laboratory error as specified in section 66387.6 subsection (h) do not have to be reported to the testing certification agency. All test results derived from a single set of friction material samples must be reported to the testing certification agency at the same time on a single report.

(A) Any reporting which does not meet the specifications of section 66387.6, subsection (g)(1) would be considered a modification to the testing method in subsection (a)(2) of this section and require approval under section 66387.6, subsection (k) prior to using it for self-certification.

(2) Testing reports transmitted from the laboratory to the testing certification agency must include the minimum information specified in SAE J 2975:DEC2013.

(A) If an alternate method of testing approved under subsection (l) of this section is used to perform testing and that alternate method specifies the minimum reporting information, then test reports transmitted from the laboratory to the testing certification agency shall include the minimum information specified in the alternate method of testing utilized.

(3) In addition to reporting the cumulative average for each regulated constituent and copper listed in this subsection, the testing laboratory shall perform a comparison between the cumulative average and the concentrations listed under this subsection and specify the environmental compliance level indicated by the report. This comparison shall report whether the cumulative average concentration does not exceed the following concentrations:

(B) 0.01 percent by weight for cadmium and its compounds;

(C) 0.1 percent by weight for chromium (VI)-salts, lead and its compounds, mercury and its compounds, and asbestiform fibers;

(D) 5.0 percent by weight of copper on and after January 1, 2021, and

(E) 0.5 percent by weight of copper on and after January 1, 2025.

(h) **What happens if laboratory error occurs?**

If laboratory error is suspected, the laboratory may, at its discretion and in accordance with its standard operating procedures, choose to retest the brake friction material. The results from the testing in which the error occurred do not need to be included in the testing results transmitted to the testing certification agency.

(1) Laboratory error may include incorrect samples being initially submitted to the laboratory for testing.

(2) If the laboratory previously submitted results to a testing certification agency and later determines any of those results were laboratory error, then the laboratory shall inform the testing certification agency within four (4) calendar days of the determination that the test results were laboratory error. The testing certification agency shall withdraw registration of specific unique identification codes until such time as new testing without laboratory error is properly provided to the testing certification agency which warrants the unique identification codes being properly registered.

(i) **How long must a manufacturer of brake friction material retain copies of laboratory testing results used for self-certification?**

A manufacturer of brake friction materials shall maintain copies of laboratory testing results for a period of at least ten (10) years after the date of self-certification.

(j) **May a manufacturer of brake friction material self-certify compliance using testing results derived using an alternative testing method?**

A manufacturer of brake friction material may use an alternative testing method if the alternative testing method is approved by the Department under subsection (k) of this section, in advance of use for self-certification. Once an alternative testing method has been approved by the Department, any manufacturer of brake friction material may use the approved alternative testing method for certification. The Department shall only approve an alternative testing method:

- (1) When an alternative testing method is proposed by at least one of the following:
 - (A) Manufacturer of brake friction material; or
 - (B) Testing certification agency approved by the Department under California Code of Regulations, title 22, section 66387.4 subsection (c); or
 - (C) A testing laboratory used by a testing certification agency approved by the Department under California Code of Regulations, title 22, section 66387.4 subsection (c).
- (2) When the entity proposing an alternative testing method has submitted information to the Department in accordance with subsection (k);
- (3) When the alternative testing method does not involve alterations to the sample preparation method outlined in SAE J 2975:DEC2013 section 4.1, and
- (4) When the proposed alternative testing method is publicly available.

(k) **What is the process for requesting the Department to approve an alternative testing method for chemical analysis testing or chemical analysis sampling processing?**

An entity may submit a request for approval on an alternative testing method in writing or electronically. The request must include the following information:

- (1) Contact for:
 - (A) The entity requesting the approval; and
 - (B) The manufacturer(s) of brake friction materials whose products were used to gather evidence proving the alternate proposed method is equivalent or better than SAE J 2975:DEC2013; and
 - (C) The laboratory(ies) which performed the testing; and
 - (D) The laboratory accreditation body(ies) which accredited the lab under the California Code of Regulations, title 22, section 66387.5 subsection (a).
- (2) A copy of the proposed alternative testing method
- (3) A copy of the Standard Operating Procedure for the alternative testing method
 - (A) If the alternative testing method is a standard or reference method, a demonstration of capability package must be submitted as outlined in the NELAC Institute Standard, Module 4: Quality Systems for Chemical Testing.
 - (B) If the testing method is a non-standard or reference method, then a validation package must be submitted as outlined in the NELAC Institute Standard, Module 4: Quality Systems for Chemical Testing.
- (4) A certificate signed by the Laboratory Director that the proposed alternative testing method(s):
 - (A) Is equivalent or better than SAE J 2975:DEC2013; and
 - (B) Is suitable for analyzing the components identified in Health and Safety Code sections 25250.51, 25250.52, and 25250.53.
- (5) A copy of the data used by the Laboratory Director to determine that the proposed alternative testing method is equivalent or better than SAE J 2975:DEC2013.

- (6) A manufacturer of brake friction material, the testing certification agency, or the testing laboratory may submit a request for approval of an alternate testing method by either of the following methods:
- (A) For an electronic submittal, a person shall send the request to the Department via electronic mail (brakepad@dtsc.ca.gov) on the Department’s website at <http://www.dtsc.ca.gov> with the words “Attention: California Brake Pad Alternative Testing Method Request” displayed in the subject line of the electronic mail; or
 - (B) For a written submittal, a person shall send the request to the Department via certified mail, return receipt requested, at the following address: Department of Toxic Substances Control, Safer Products and Workplaces Program, P.O. Box 806, Sacramento, CA 95812-0806, with the words “Attention: California Brake Pad Alternative Testing Method Request” prominently displayed on the front of the envelope.

(l) **How will the Department notify a requestor that an alternative testing method has been approved?**

The Department shall notify the manufacturer of brake friction material, testing certification agency, or testing laboratory in writing whether the alternative testing method was approved within 90 days of receiving the request. If the Department finds the alternative testing method is equivalent to or better than SAE J 2975:DEC2013 the Department shall provide the basis of the approval. If the Department does not find the alternative testing method equivalent to or better than SAE J 2975:DEC2013 the Department shall provide the basis for the denial. The alternative testing method approved by the Department shall be posted on the Department’s Web page at <http://www.dtsc.ca.gov> .

NOTE: Authority cited: Health & Safety Code sections 25250.60 and 58012. Reference: Health and Safety Code section 25250.60.

66387.7 Marked proof of certification

(a) **What is marked proof of certification?**

Marked proof of certification is the unique identification code and environmental compliance marking that is marked on the brake friction material, described in SAE J 866:JUL2012, and the certification mark that appears on the brake friction material packaging. The certification mark on the brake friction material packaging serves to notify end users that the product is compliant with the law. While the unique identification code and environmental compliance marking is used to link the product to laboratory testing results and self-certification documentation, together, the unique identification code, environmental compliance marking, and certification mark provide proof that the brake friction material meets the requirements of Health and Safety Code sections 25250.51, 25250.51 and 25250.52, or 25250.51 and 25250.53. When a brake friction material manufacturer marks a brake friction material and its packaging with the marked proof of certification the manufacturer is certifying that:

- (1) The brake friction material meets the applicable criteria for the environmental compliance marking, described in California Code of Regulations, title 22, section 66387.8, with which it has been marked;
- (2) The brake friction material has been registered with testing certification agency; and
- (3) Self-certification documentation has been submitted to an approved testing certification agency and is available on the testing certification agency’s website.

The Department shall post certification marks recognized by the Department on the department's website at <http://www.dtsc.ca.gov>.

(b) **When must brake friction material and its packaging be marked?**

On the effective date of these regulations, brake friction material and its packaging sold or offered for sale in California shall be marked with the marked proof of certification.

(c) **How must brake friction material be marked?**

A manufacturer of brake friction material shall:

- (1) Mark its brake friction material in accordance with the SAE J 866:JUL2012. This chapter does not require brake friction material manufacturers to mark the hot and cold coefficients of friction as specified in the SAE J 866:JUL2012. Note: These markings are included in the SAE J 866:JUL2012 standard because other states have regulations that require brake friction materials to be marked with the hot and cold coefficients of friction.
- (2) Ensure the unique identification code reported to an approved testing certification agency is the same as the code marked on brake friction material in accordance with SAE J 866:JUL2012;
- (3) Ensure that the brake friction material's marked proof of certification includes a unique identification code and the appropriate environmental compliance marking for the requirements cited in Health and Safety Code sections 25250.51, 25250.51 and 25250.52, or 25250.51 and 25250.53. This marking is also described in SAE J 866:JUL2012;
- (4) Mark its brake friction material with the last two digits of the year the material was manufactured as described in SAE J 866:JUL2012; and
- (5) Ensure that the marking on the brake friction material is legible.

(d) **How shall the brake friction material packaging be marked?**

Brake friction material packaging shall be marked with a certification mark that is issued by an approved testing certification agency and provided in the proposed brake friction material certification process in accordance with California Code of Regulations, title 22, section 66387.4, subsection (b)(2)(C). This packaging mark self-certifies that the brake friction material contained in the package meets the requirements of Health and Safety Code section 25250.51, 25250.51 and 25250.52, or 25250.51 and 25250.53.

NOTE: Authority cited: Health and Safety Code sections 25250.60 and 58012. Reference: Health and Safety Code section 25250.60.

66387.8 Environmental compliance level

(a) **What is the environmental compliance level?**

The environmental compliance level is defined in California Code of Regulations, title 22, section 66387.1, subsection (g). It must be an "A," "B," or "N" and it allows a person to determine the level of environmental compliance of the brake friction material.

(b) **What does the environmental compliance level "A" indicate?**

An "A" indicates that the brake friction material manufacturer has submitted self-certification documentation and laboratory testing results showing the brake friction material does not contain any of the following regulated constituents in amounts exceeding the following concentrations:

| <u>Regulated Constituent</u> | <u>Concentration Not to Exceed</u> |
|----------------------------------|------------------------------------|
| <u>Asbestiform fibers</u> | <u>0.1 percent by weight</u> |
| <u>Cadmium and its compounds</u> | <u>0.01 percent by weight</u> |
| <u>Chromium (VI)-salts</u> | <u>0.1 percent by weight</u> |
| <u>Lead and its compounds</u> | <u>0.1 percent by weight</u> |
| <u>Mercury and its compounds</u> | <u>0.1 percent by weight</u> |

(c) What does the environmental compliance level "B" indicate?

A "B" indicates that the brake friction material manufacturer has submitted self-certification documentation and laboratory testing results showing the brake friction material does not contain any of the constituents listed in this subsection in amounts exceeding the following concentrations:

| <u>Constituent</u> | <u>Concentration Not to Exceed</u> |
|----------------------------------|------------------------------------|
| <u>Asbestiform fibers</u> | <u>0.1 percent by weight</u> |
| <u>Cadmium and its compounds</u> | <u>0.01 percent by weight</u> |
| <u>Chromium (VI)-salts</u> | <u>0.1 percent by weight</u> |
| <u>Copper and its compounds</u> | <u>5.0 percent by weight</u> |
| <u>Lead and its compounds</u> | <u>0.1 percent by weight</u> |
| <u>Mercury and its compounds</u> | <u>0.1 percent by weight</u> |

(d) What does the environmental compliance level "N" indicate?

An "N" indicates that the brake friction material manufacturer has submitted self-certification documentation and laboratory testing results showing the brake friction material does not contain any of the constituents listed in this subsection in amounts exceeding the following concentrations:

| <u>Constituent</u> | <u>Concentration Not to Exceed</u> |
|----------------------------------|------------------------------------|
| <u>Asbestiform fibers</u> | <u>0.1 percent by weight</u> |
| <u>Cadmium and its compounds</u> | <u>0.01 percent by weight</u> |
| <u>Chromium (VI)-salts</u> | <u>0.1 percent by weight</u> |
| <u>Copper and its compounds</u> | <u>0.5 percent by weight</u> |
| <u>Lead and its compounds</u> | <u>0.1 percent by weight</u> |
| <u>Mercury and its compounds</u> | <u>0.1 percent by weight</u> |

(e) Should a brake friction material manufacturer mark brake friction material that is exempt?

Exemption markings are not required. A brake friction material manufacturer may include additional information in the optional field of the certification marking format specified under SAE J866:JUL2012.

NOTE: Authority cited: Health and Safety Code sections 25250.60 and 58012. Reference: Health and Safety Code sections 25250.51, 25250.52, 25250.53, and 25250.60.

66387.9 Extension Process

(a) How does a manufacturer apply for an extension to the January 1, 2025, deadline established in Health and Safety Code section 25250.53?

- (1) To apply for an extension on or after January 1, 2019, a manufacturer shall submit an extension application, electronically or in writing, to the Department with the following information:
 - (A) Contact information for the manufacturer requesting an extension.
 - (B) Information on the affected vehicles including the vehicle model, class, platform, or other vehicle-based category that includes:
 1. Identification of the brake friction material associated with each vehicle model, class, platform, or other vehicle-based category on the extension application.
 - a. Identification of whether the brake friction material is intended for use in original equipment or replacement parts.
 2. Identification of the brake pads and brake drums associated with each vehicle model, class, platform, or other vehicle-based category on the extension application that includes:
 - a. Brand name(s) of the brake pad and/or brake drum; and
 - b. Part number(s) of the brake pad and/or brake drum; and
 - c. Identification on whether the brake pad and/or brake drum is original equipment or a replacement parts.
 - (C) The type and length of extension request (initial or renewal).
 1. For an initial extension request, the manufacturer shall indicate the length of time for the requested extension as either one (1), two (2), or three (3) years.
 2. For a renewal of an existing extension request, the amount of time shall be two (2) years.
 - (D) Documentation that supports the need for an extension. A manufacturer shall provide all of the following information:
 1. An estimate on the quantity of copper that would be emitted if the extension is granted in accordance with Health and Safety Code sections 25250.54, subdivision (a)(4), and
 2. The assessment of "safe and available" alternatives in accordance with Health and Safety Code section 25250.54, subdivision (e)(3).
- (2) The application process.
 - (A) The Department shall process the application in accordance with Health and Safety Code section 25250.54, subdivision (b) and (c).
 - (B) The advisory committee shall process the application in accordance with Health and Safety Code section 25250.54, subdivision (d) through (f); and
 - (C) The Secretary shall make a determination in accordance with Health and Safety Code section 25250.54, subdivision (g).
- (3) A manufacturer may submit a request for an extension by either of the following methods:
 - (A) For an electronic submittal, the person shall send the request to the Department via the electronic mailbox (brakepad@dtsc.ca.gov) on the Department's website at <http://www.dtsc.ca.gov> with the words "Attention: California Brake Pad Extension Request" displayed in the subject line for the electronic mail, or
 - (B) For a written submittal, the person shall send the request to the Department via certified mail, return receipt requested, at the following address: Department of Toxic Substances Control, Safer Products and Workplaces Program, P.O. Box 806, Sacramento, CA 95812-0806, with the words "Attention: California Brake Pad Extension Request" prominently displayed on the front of the envelope.

- (4) The department shall post the following information on its website at <http://www.dtsc.ca.gov> for all extension applications received:
- (A) The name of the applicant; and
 - (B) The vehicle model, class, platform, or other vehicle-based category; and
 - (C) The brand name of the brake pad and/or brake drum; and
 - (D) The part number of the brake pad and/or brake drum, and
 - (E) Whether the extension was approved or denied.
- (b) **How does a manufacturer renew an extension to the January 1, 2025 deadline established in Health and Safety Code section 25250.53?**
- The brake friction material manufacturer may submit another extension application in accordance with California Code of Regulations, title 22, section 66387.9, subsection (a). The documentation to renew an extension shall include information on the original extension that was approved by the Secretary along with a description and any additional documentation explaining the need for the extension.
- (c) **Who is eligible to apply for an extension to the January 1, 2025 deadline established in Health and Safety Code section 25250.53?**
- A manufacturer as defined in California Code of Regulations, title 22, section 66387.1, subsection (h) may apply for an extension to the January 1, 2025 deadline.
- (d) **Will the Department charge a processing fee? How will the fee be calculated?**
- Under Health and Safety Code section 25250.54, subdivision (j), the Department shall assess a fee for each extension application to cover actual costs incurred in implementing the extension process. The fee shall include costs incurred:
- (1) For appointing the advisory committee;
 - (2) By each advisory committee member for travel and meetings held;
 - (3) By the department overseeing, coordinating, reviewing, and preparing support documentation for an extension application;
 - (4) By California Air Resources Board reviewing an extension application and any support documentation;
 - (5) By the State Water Resources Control Board reviewing an extension application and any support documentation; and
 - (6) By the California Environmental Protection Agency reviewing, approving, or disapproving an extension application.

NOTE: Authority cited: Health and Safety Code sections 25250.54 and 58012. Reference: Health and Safety Code section 25250.54.