No. 6 of 1887.

(As amended by No. 1 of 1893.)

An Ordinance to regulate the Importation, Possession, Transport, and Hawking of Petroleum and other Fluids of a like nature.

WHEREAS it is expedient to amend the law relating to the importation, possession, and transport of petroleum and other fluids of a like nature, and to provide regulations for hawking the same: It is hereby enacted by the Governor of Ceylon, by and with the advice and consent of the Legislative Council thereof, as follows:

Preamble.

1 This Ordinance may be cited as "The Petroleum Ordinance, 1887," and it shall come into operation at such time as the Governor shall appoint by Proclamation to be published in the Government Gazette.

Short title. Commencement,

2 There shall be repealed, as from and after the date of this Ordinance coming into operation, the Ordinance No. 3 of 1878, intituled "An Ordinance for the safe keeping of Petroleum and other substances of a like nature," and all regulations heretofore made thereunder: Provided that such repeal shall not affect any liability, penalty, forfeiture, or punishment incurred under the last-mentioned Ordinance, or any regulations made thereunder, or any investigation, legal proceeding, or remedy in respect of any such liability, penalty, forfeiture, or punishment; and any such investigation, legal proceeding, or remedy may be carried on as if this Ordinance had not passed.

Repeal of Ordinance No. 3 of 1878.

3 In this Ordinance, unless the subject or context otherwise requires—

Definition clause:

"Petroleum" includes also the liquids commonly known by the names of rock oil, Rangoon oil, Burmah oil, kerosine, paraffin oil, mineral oil, petroline, gasoline, benzol, benzoline, benzine, and any inflammable liquid that is made from petroleum, coal, schist, shale, peat, or any other bituminous substance, or from any products of petroleum; but

" Petrol um."

it does not include any oil ordinarily used for lubricating purposes, and having its flashing point at or above two hundred degrees of Fahrenheit's thermometer:

"Dangerous petroleum." "Dangerous petroleum" means petroleum having its flashing point below seventy-six degrees of Fahrenheit's thermometer. Provided that when all or any of the petroleum on board a ship or in the possession of a dealer is declared by the master of the ship or the consignee of the cargo, or by the dealer, as the case may be, to be of one uniform quality, the petroleum shall not be deemed to be dangerous if the samples selected from the petroleum have their flashing points, on an average, at not less than seventy-six degrees of Fahrenheit's thermometer, and if no one sample has its flashing point below seventy-three degrees of that thermometer;

" Flashing point."

"Flashing point" means the lowest temperature at which the petroleum yields a vapour which will furnish a momentary flash or flame when tested, in accordance with the directions in the schedule to this Ordinance, with an Abel's test apparatus which has been stamped and certified as provided by this Ordinance within a period of five years immediately preceding the date on which the apparatus is used for the testing, and after the corrections, if any, which the certificate declares are to be applied to the results of the testing, have been made;

" Person."

"Person" includes a body corporate;

"Ship."

"Ship" includes anything made for the conveyance by water of human beings or property;

" Master."

"Master" includes every person, except a pilot or harbour master, having for the time being the charge or control of a ship;

"Transport."

"Transport" means to remove from one place to another within this island:

"Carriage,"

"Carriage" means any carriage, wagon, cart, truck, vehicle, or other means of conveyance by land, in whatever manner the same may be drawn or propelled, but does not include any carriage, wagon, or truck employed on the railway;

"To hawk."

A person shall be deemed for the purposes of this Ordinance to "hawk" petroleum, if by himself or his servants he goes about carrying petroleum to sell, whether going from district to district, or town to town, or village to village, or to other men's houses; or selling it in the streets of the place of his residence or otherwise, and whether with or without any horse or other beast bearing or drawing burden;

" Local authority." "Local authority" means any public officer appointed by the Governor to issue licenses under this Ordinance.

Dangerous Petroleum.

4 No quantity of dangerous petroleum exceeding forty gallons shall be imported, or transported, or kept by any one person, or on the same premises, except under and in accordance with the conditions of a license from the local authority; and such license shall be granted as next hereinafter provided.

Dangerous petroleum in quantities exceeding forty gallons,

Application for

transport, or

possess such petroleum.

license to import,

- 5 Every application for such a license shall be in writing. and shall declare -
 - (a) The quantity of such petroleum which it is desired to import, transport, or possess, as the case may be ;
 - (b) The premises at and the vessels in which such petroleum is to be stored;
 - (c) The purpose for which the applicant believes such petroleum will be used; and
 - (d) That petroleum other than dangerous petroleum cannot be used for such purpose.
- 6 If the local authority sees reason to believe that such petroleum will be used for such purpose, and that no petroleum other than dangerous petroleum can be used for such purpose, he may grant such license for the importation, transport, or possession, as the case may be, of such petroleum, absolutely or subject to such conditions as he thinks fit.

Power to grant

7 No quantity of dangerous petroleum equal to or less than forty gallons shall be kept or transported without a license from the local authority: Provided that nothing in this section shall apply in any case where the quantity of such petroleum kept by any one person, or on the same premises, or transported, does not exceed three gallons, and such petroleum is placed in separate glass, earthenware, or metal vessels, each of which contains not more than a pint, and is securely stopped.

Dangerous petroleum in quantities not exceeding forty gallons. Proviso.

- 8 All dangerous petroleum—
- (a) Which is kept at any place after seven days from the date on which it is imported; or
- (b) Which is transported; or
- (c) Which is exposed for sale;

shall be contained in vessels which shall bear a label in conspicuous characters in the English, Sinhalese, and Tamil languages, stating the nature of the contents thereof, with the addition of the words "highly inflammable," and with the addition-

- (d) In the case of a vessel kept, of the name and address of the consignee or owner;
- (e) In the case of a vessel transported, of the name and
- (f) In the case of a vessel sold or exposed for sale, of the name and address of the vendor.

address of the sender; and

license.

Vessels containing dangerous petroleum to be labelled.

Petroleum Generally.

Owner or master of ship carrying petroleum to give notice on entering into port.

Power to make rules as to the importation of petroleum.

- 9 The owner or master of every ship carrying a cargo, any part of which consists of petroleum, on entering any port of this island shall give notice of the nature of the cargo to the principal officer of customs of such port.
- 10 The Governor in Executive Council may from time to time make rules consistent with this Ordinance to regulate the importation of petroleum, and in particular—
 - (a) To determine the ports at which only petroleum may be imported;
 - (b) To ascertain the quantity and description of any petroleum on board any ship;
 - (c) To determine the places at which, and the conditions on and subject to which, petroleum may be discharged into boats, landed, transhipped, or stored;
 - (d) To provide for the selection by an officer specially appointed thereto by the Governor in this behalf, and for the delivery to him, either after or before petroleum has been landed, of samples of all petroleum landed or intended to be landed;
 - (e) To provide, in the case of each consignment which is stated to be of one uniform quality, for the number of samples to be selected, and for the averaging of the results of the testing of those samples;
 - (f) To provide, where the results of the testing of the samples raise a doubt as to the uniformity of the quality of the petroleum in any such consignment, for the division of the consignment into lots, and for the selection and testing of samples of each lot, and for the treatment of the lot in accordance with the results of the testing of those samples;
 - (g) To fix fees for the sampling and testing of petroleum; and
 - (h) To fix fees for the storage of petroleum.

Procedure after petroleum has been discharged or landed. Testing of samples. 11 Petroleum discharged into boats or landed in accordance with rules made under section 10 shall not be removed from the boats or places in or at which it is stored until the samples selected therefrom in accordance with those rules have been tested by an officer appointed by the Governor in this behalf in the manner described in the schedule to this Ordinance, with an apparatus which has been stamped and certified as provided by this Ordinance, and until the officer has given a certificate that the petroleum is not dangerous petroleum.

Governor may allow consignee to apply for a new license, or to rectify, or re-export.

- 12 If the officer, after testing the samples, refuses to give the certificate in respect of any petroleum, the Governor may permit the consignee, within a time to be fixed by him in this behalf—
 - (a) To rectify the petroleum ;

- (b) To apply for a license to import the petroleum as dangerous petroleum; or
- (c) To re-export the petroleum.
- 13 If the consignee does not within the time fixed under section 12 avail himself of the permission granted under that section, the petroleum may be disposed of as the Governor directs.

When Governor may dispose of petroleum.

Provided, however, that the Governor may, in his discretion, when the officer has refused the certificate, direct that the petroleum be re-tested by another officer appointed by him in this behalf, and may, if that officer advises that the petroleum is not dangerous petroleum, authorize its removal from the boats or places in or at which it is stored. Proviso.

14 No quantity of petroleum exceeding fifty gallons shall be kept by any one person or on the same premises, or shall be transported, except under and in accordance with the conditions of a license from the local authority. Possession and transport of petroleum.

15 The Governor in Executive Council may from time to time make rules consistent with this Ordinance as to the granting of licenses to possess or transport petroleum in cases where such licenses are herein required. Such rules may provide for the following among other matters; that is to say, in the case of licenses to possess petroleum—

Power to make rules as to such possession and transport.

- (a) The nature and situation of the premises for which they may be granted; and
- (b) The inspection of such premises, and the testing of petroleum found thereon;

in the case of licenses to transport petroleum-

- (c) The manner in which the petroleum shall be packed, the mode and time of transit, and the route by which it is to be taken; and
- (d) The stoppage and inspection of it during transit;

in the case of both such licenses-

- (e) The fee to be charged for it;
- (f) The quantity of petroleum it is to cover;
- (g) The conditions which may be inserted in it;
- (h) The time during which it is to continue in force; and
- (i) The renewal of the license.

16 Any officer specially authorized, by name or by virtue of his office in this behalf, by the local authority, may require any dealer in petroleum to show him any place and any of the vessels in which any petroleum in his possession is stored or contained, to give him such assistance as he may require for examining the same, and to deliver to him samples of such petroleum on payment of the value of such samples.

Power to inspect and require dealers to sell samples.

17 When any such officer has, in exercise of the powers conferred by section 16, obtained a sample of petroleum in the possession of a dealer, he may give a notice in writing to such dealer informing him that he is about to test such

Notice to be given when officer proposes to test samples.

sample, or cause the same to be tested, with the apparatus and in the manner described in the schedule hereto annexed, at a time and place to be fixed in such notice, and that such person or his duly authorized agent may be present at such testing.

Certificate as to result of such testing. 18 On any such testing, if it appears to the officer or other person so testing that the petroleum from which such sample has been taken is or is not dangerous petroleum, such officer or other person may certify such fact, and the certificate so given shall be receivable as evidence in any proceedings which may be taken under this Ordinance against the dealer in whose possession such petroleum was found, and shall, until the contrary is proved, be evidence of the fact stated therein; and a certified copy of such certificate shall be given gratis to the dealer at his request.

Power to hawk petroleum. 19 Any person who is licensed to keep petroleum may, subject to any enactment for the time being in force with respect to hawkers and peddlers, hawk such petroleum by himself or his servants, provided he observes the following regulations:

Regulations for hawking petroleum.

[§ 3, 1 of 1893]

- (a) The quantity of petroleum conveyed at one time in any one carriage shall not exceed twenty-four gallons, except when conveyed in a cart specially constructed for the purpose, which has been licensed by writing under the hands of the local authority for the conveyance of petroleum;
- (b) The petroleum shall be conveyed in a closed vessel or cart so constructed as to be free from leakage;
- (c) Proper care shall be taken to prevent any petroleum escaping into any part of a house or building, or of the curtilage thereof, or into a drain or sewer;
- (d) All due precautions shall be taken for the prevention of accidents by fire or explosion, and for preventing unauthorized persons having access to the vessels containing the petroleum, and every person concerned in hawking the petroleum shall abstain from any act whatever which tends to cause fire or explosion, and is not reasonably necessary for the purpose of such hawking;
- (e) No article or substance of an explosive or inflammable character other than petroleum, nor any article liable to cause or communicate fire or explosion, shall be in the carriage while such carriage is being used for the purpose of hawking petroleum.

Penalties.

Penalty for illegal importation, &c., of petroleum. 20 Any person who in contravention of this Ordinance, or of any rules made hereunder, imports, possesses, or transports any petroleum, and any person who otherwise contravenes any such rules or any conditions contained in a

license granted hereunder, shall be punished with simple or rigorous imprisonment for a term which may extend to one month, or with fine which may extend to five hundred rupees, or with both.

21 Any person keeping, transporting, selling, or exposing for sale petroleum in vessels not marked or labelled, as prescribed by section 8, shall be punished with a fine which may extend to five hundred rupees.

Penalty for keeping, transporting, selling, &c., petroleum in contravention of section 8.

22 Any owner or master of a ship who fails to give the notice required by section 9 shall be punished with a fine not exceeding five thousand rupees, unless it is shown to the satisfaction of the court before which the case is tried that he did not know the nature of the goods to which the proceedings relate, nor could with reasonable diligence have obtained such knowledge.

Penalty for owner or master of a ship failing to give the required notice.

23 Any dealer in petroleum who refuses or neglects to show to any officer authorized under section 16 any place or any of the vessels in which petroleum in his possession is stored or contained, or to give him such assistance as he may require for examining the same, or to give him samples of such petroleum on payment of the value of such samples, shall be punished with a fine which may extend to two hundred rupees.

Penalty for refusing to comply with section 16.

24 In the event of any contravention of section 19 with reference to any petroleum, the licensee, by whom or by whose servants the petroleum was being hawked, shall be liable, on summary conviction, to a penalty not exceeding two hundred rupees: Provided that—

Penalty for hawking in breach of section 19.

(a) Where some servant of the licensee or other person has in fact committed the offence, such servant or other person shall be liable to the same penalty as if he were the licensee;

Proviso.

- (b) Where the licensee is charged with a contravention of section 19, he shall be entitled, upon information duly laid by him, to have any other person whom he charges as the actual offender brought before the court at the time appointed for hearing the charge; and if the licensee proves to the satisfaction of the court that he had used due diligence to enforce the requirements of the said section, and that the said other person had committed the offence in question without his knowledge, consent, or connivance, the said other person shall be summarily convicted of such offence, and the licensee shall be exempt from any penalty.
- 25 Every prosecution under this Ordinance or for the breach of any rules made hereunder may be instituted before the police magistrate of the district in which the offence was committed, wholly or in part, or where the offender is found; and it shall be lawful for such magistrate to impose the full

Prosecution to be instituted in police court.

fine or penalty provided herein or in any rule made under the provisions of this Ordinance, notwithstanding that such fine or penalty may exceed the sum which it is competent for him in the exercise of his summary jurisdiction to award.

Confiscation of petroleum.

- 26 In any case in which an offence under section 19, 20, or 21 has been committed, the convicting police magistrate may direct that—
 - (a) The petroleum in respect of which the offence has been committed; or
 - (b) Where the offender is importing, transporting, hawking, or is in possession of any petroleum exceeding the quantity, if any, which he is permitted to import, transport, hawk, or possess, as the case may be, the whole of the petroleum which he is importing, transporting, hawking, or is in possession of;

shall, together with the tins or other vessels in which it is contained, be confiscated.

Confiscations to be sold, &c., as magistrate may direct. 27 All confiscations may be sold or otherwise disposed of in such manner as the police magistrate may direct.

Test Apparatus.

Model test apparatus. 28 A model of the apparatus for testing petroleum under this Ordinance, constructed substantially in accordance with the description contained in the schedule hereto, shall be deposited in the office of the Government Analyst at Colombo, and be marked with the words "Model Test Apparatus."

Verification of test apparatus. 29 The Government Analyst shall, on payment of such fee, if any, as the Governor in Executive Council may from time to time by notification in the Government Gazette prescribe, compare with the said model test apparatus and verify every apparatus for testing petroleum which is submitted to him for the purpose.

Stamping and certifying.

30 If any apparatus for testing petroleum, when compared and verified as provided by section 29, is found correct, or correct subject to certain corrections to be applied to the results of the tests, the Government Analyst shall stamp the same with a special number, and with the date of the verification, and shall further give a certificate in writing under his hand to the effect that on the date aforesaid the apparatus was compared and verified by him and found to be correct, or correct subject to certain specified corrections to be applied to the results of the tests. A certificate granted under this section shall, until the contrary is proved, be conclusive proof of the matters stated therein.

Register of certificates. 31 The Government Analyst shall keep a register, in a form to be prescribed by the Governor in Executive Council, of the certificates granted under section 30; and subject to the payment of such fees as the Governor may from time to time prescribe in this behalf by notification in the Government Gazette, the said model test apparatus shall be at all reasonable times open to inspection by any person desiring to inspect it.

Miscellaneous.

32 All rules made by the Governor in Executive Council under this Ordinance shall be published in the Government Gazette, and shall, on the expiry of one month from the date of such publication, have the force of law. Such rules may from time to time be altered, amended, or repealed by the Governor in Executive Council, and notice of such alteration, amendment, or repeal shall likewise be published in the Government Gazette.

Rules when to have force of law.

Governor may

petroleum from

Ordinance, may

operation of this

other fluids, and

and local boards.

limit operation

of enactments

relating to municipalities

exempt

apply this Ordinance to

33 The Governor in Executive Council may from time to time, by notification in the Government Gazette-

(a) Exempt from the operation of all or any of the rules made under this Ordinance any petroleum which has its flashing point at one hundred and twenty degrees of Fahrenheit's thermometer, and is imported as ordinary cargo, and in quantity not exceeding that specified in the notification;

(b) Apply the whole or any portion of this Ordinance to any inflammable fluid other than petroleum, and fix in substitution for the quantities of petroleum fixed by sections 4, 7, and 14 the quantities of the fluid

to which those sections shall apply;

(c) Limit in any manner he deems fit the operation of any enactment for the time being in force relating to municipalities or local boards, and the exercise of any powers conferred by any such enactment in so far as it relates to the possession or transport of petroleum.

Power to revoke

- 34 A notification made by the Governor in Executive Council under this Ordinance may be revoked or varied by a like notification published in the same manner as the notification so revoked or varied.
- 35 When any police magistrate is satisfied, by information on oath or affirmation, that there is reasonable ground to believe that any petroleum is being imported, kept, transported, sold, or exposed for sale within his jurisdiction in contravention of this Ordinance or of any rules made thereunder, at any place, whether a building or not, or in any ship or carriage, such police magistrate shall grant a search warrant, by virtue whereof it shall be lawful for any person named in such warrant to enter the place, ship, or carriage named in such warrant, and every part thereof, and examine the same and search for petroleum therein, and take samples of any petroleum found therein; and if any petroleum be found therein which is imported, kept, transported, sold, or exposed for sale in contravention of this Ordinance or of any rules made thereunder, to seize and remove such petroleum and the vessel containing the same, and to detain such petroleum and vessel until the court having jurisdiction in the matter has determined whether the same shall or shall not be confiscated, the proceedings for which confiscation shall be commenced forthwith after the seizure. Any person

or vary notification.

magistrates may grant search warrants for petroleum.

seizing any petroleum in pursuance of this section shall not be liable to any suit for detaining the same, or for any loss or damage incurred in respect of such petroleum, otherwise than by any wilful act or neglect.

Power of police officers to seize and detain petroleum for breach of section 19. 36 Where a police officer has reasonable cause to believe that a contravention of section 19 is being committed in relation to any petroleum, he may seize and detain such petroleum and the vessels and carriage containing the same until the court has determined whether there was or was not a contravention of the said section, and section 35 shall apply to such officer as if he were the person named in the warrant mentioned in that section, and as if the seizure were a seizure in pursuance of that section.

Burden of proof as to exceptions, exemptions, &c. 37 Any exception, exemption, proviso, excuse, or qualification, whether it does or does not accompany the description of the offence in this Ordinance, may be proved by the defendant, but need not be specified or negatived in the plaint or information, and if so specified or negatived, no proof in relation to the matters so specified or negatived shall be required on the part of the informant or prosecutor.

SCHEDULE.

I.—Nature of the Test Apparatus.

The apparatus consists of the following parts:

(1) The oil-cup;

(2) The cover, with slide test-lamp and clockwork arrangement for opening and closing the holes in the cover and for dipping the test-flame;

(3) The water-bath or heating vessel;

- (4) The tripod stand, with jacket and spirit-lamp for heating the water-bath;
- (5) The thermometer for indicating the temperature of the oil in the oil-cup;
- (6) The thermometer for indicating the temperature of the water in the water-bath;
- (7) The thermometer for indicating the temperature of the oil before it is poured into the oil-cup;
- (8) The dropping bottle or pipette for replenishing the test-lamp; and
- (9) A barometer standardised at the Surveyor-General's Office, or at any other place appointed by the Governor.

The oil-cup is a cylindrical flat-bottomed vessel, made of gun-metal or brass, and tinned or silvered inside. A gauge is fixed to the inside of the cup to regulate the height to which it is to be filled with the sample under examination.

The cup is provided with a close-fitting overlapping cover, which carries the thermometer, the test-lamp, and the adjuncts thereto. The test-lamp is suspended upon two supports by means of trunnious, which allow it to be easily inclined to a particular angle and restored to its original position. The socket in the cover, which is to hold a round bulb thermometer for indicating the temperature of the oil during the testing operation, is so adjusted that the bulb of the latter is always inserted in a definite position below the surface of the liquid.

The cover is provided with three holes, one in the centre and two smaller ones close to the sides. These are closed and opened by means of a pivoted slide. When the slide is moved so as to uncover the holes, the suspended lamp is caught by a projection fixed on the slide, and tilted in such a way as to bring the end of the spout just below the surface of the lid. As the slide moves back so as to cover the holes, the lamp returns to its original position. Upon the cover, in front of and in a line with the nozzle of the lamp, is fixed a white bead, the diameter of which represents the size of the test-flame to be used.

The water-bath or heating vessel is so constructed that, when the oil-cup is placed in position in it, an air-space or air-chamber intervenes between the two; consequently, in applying the test under ordinary circumstances, the heat is transmitted gradually to the oil from the hot water through the air-space. The water-bath is fitted with a socket for receiving a long bulb thermometer, to indicate the temperature of the water. It is also provided with a funnel, an overflow-pipe, and two handles.

The water-bath rests upon a tripod stand, which is fitted with a copper cylinder or jacket, so that the bath is surrounded by an enclosed air-space, which retains and regulates the heat. One of the legs of the stand serves as a support for a spirit-lamp, which is attached to it by a small swing bracket.

The clockwork arrangement, by which during the operation of testing the slide is withdrawn, and the test-flame dipped into the cup and raised again as the slide is replaced, is provided with a ratchet key for setting it in action for each test, and with a trigger for starting it each time that the test-flame is applied.

II.—Directions for Drawing the Sample and preparing it for Testing.

 Drawing the Sample.—In all cases the testing officer or some person duly authorized by him shall personally superintend the drawing of the sample from an original unopened tin or other vessel.

An opening sufficiently large to admit of the oil being rapidly poured

or syphoned from the tin or other vessel shall be made.

Two bottles, each of the capacity of about forty fluid ounces, are to be filled with the oil. One of these, the contents of which is intended to be preserved for reference in case of need, is to be carefully corked, the cork being well driven home, cut off level with the neck, and melted sealing-wax worked into it. The other bottle may be either stoppered or corked.

Preparing the Sample for Testing.—About ten fluid ounces of the oil, sufficient for three tests, are transferred from the bottle into which the sample has been drawn to a pint flask or bottle, which is to be immersed in water artificially cooled until a thermometer, introduced into the oil, indicates a temperature not exceeding fifty degrees Fahrenheit.

III.—Directions for Preparing and Using the Test Apparatus.

1. Preparing the Water-bath .- The water-bath is filled by pouring water into the funnel until it begins to flow out at the overflow-pipe. The temperature of the water at the commencement of each test, as indicated by the long bulb thermometer, is to be one hundred and thirty degrees Fahrenheit, and this is attained in the first instance by mixing hot and cold water, either in the bath or in a vessel from which the bath is filled, until the thermometer which is provided for testing the temperature of the water gives the proper indication; or the water is heated by means of the spirit-lamp (which is attached to the stand of the apparatus) until the required temperature is indicated.

- 2. Preparing the Test-lamp.—The test-lamp is fitted with a piece of cylindrical wick of such thickness that it fills the wick-holder, but may readily be moved to and fro for the purpose of adjusting the size of the flame. In the body of the lamp, upon the wick, which is coiled within it, is placed a small tuft of cotton wool, moistened with petroleum, any oil not absorbed by the wool being removed. When the lamp has been lighted, the wick is adjusted by means of a pair of forceps until the flame is of the size of the bead fixed on the cover of the oil-cup; should a particular test occupy so long a time that the flame begins to get smaller, through the supply of oil in the lamp becoming exhausted, three or four drops of petroleum are allowed to fall upon the tuft of wool in the lamp from the dropping bottle or pipette provided for that purpose. This can be safely done without interrupting the test.
- 3. Filling the Oil-cup.—The oil-cup having been previously cooled, by placing it bottom downwards in water at a temperature not exceeding fifty degrees Fahrenheit, is to be rapidly wiped dry, placed on a level surface in a good light, and the oil to be tested is poured in very slowly, without splashing, until its surface is level with the point of the gauge which is fixed in the cup. The round bulb thermometer is inserted into the lid of the cup, care being taken that the projecting rim of the collar touches the edge of the socket; the test-lamp, prepared as already described, is placed in position, and the cover is then put on to the cup and pressed down so that its edge rests on the rim of the cup.
- 4. Application of the Test.—The water-bath, with its thermometer in position, is placed in some locality where it is not exposed to currents of air, and where the light is sufficiently subdued to admit of the size of the entire test-flame being compared with that of the bead on the cover. The cup is carefully lifted without shaking it and placed in the bath, the test-lamp is lighted, and the clockwork wound up by turning the key. The thermometer in the oil-cup is now watched, and when the temperature has reached lifty-six degrees Fahrenheit the clockwork is set in motion by pressing the trigger.

If no flash takes place the clockwork is at once re-wound, and the trigger pressed at fifty-seven degrees Fahrenheit, and so on, at every degree rise of temperature, until the flash occurs, or until a temperature of ninety-five degrees Fahrenheit has been reached.

If the flash takes place at any temperature below seventy-seven degrees Fahrenheit, the temperature at which it occurs is to be recorded. The fresh portions of the samples are then to be successively tested in a similar manner and the results recorded. If no greater difference than two degrees Fahrenheit exists between any two of the three recorded results, each result is to be corrected for atmospheric pressure, as hereafter described, and the average of the three corrected results is the flashing point of the sample. In the event of there being a greater difference than two degrees Fahrenheit between any two of the results, the series of tests is to be rejected, and a fresh series of three similarly obtained, and so on until a sufficiently concordant series is furnished, when the results are to be corrected and the average taken in the manner already described.

No flash which takes place within eight degrees of the temperature at which the testing is commenced shall be accepted as the true flashing point of the sample tested. In the event of a flash occurring at or below sixty-four degrees when the test is applied in the manner above described the next testing shall be commenced ten degrees lower than the temperature at which the flash had been previously obtained (that is to say, at fifty-four degrees or thereunder), and this procedure shall be continued until the results of three consecutive tests do not show a greater difference than two degrees.

If a temperature of seventy-six degrees Fahrenheit has been reached without a flash occurring, the application of the test-flame is to be continued at every degree rise of temperature until a temperature of ninety-five degrees Fahrenheit has been reached. If no flash has occurred up to this point, and if the petroleum is declared to be imported subject to the provisions of the Ordinance, the tests shall not be continued, and the testing officer shall certify that the petroleum has a flashing point over ninety-five degrees and is not dangerous. But if the petroleum is oil ordinarily used for lubricating purposes, and is declared to have its flashing point at or above two hundred degrees, or is oil to which a notification of the Governor in Executive Council exempting it from the operation of the Ordinance will be applicable in the event of the flashing point being found to be at or above one hundred and twenty degrees, the test shall be continued as follows :- The oil-cup is to be removed from the water-bath, and the temperature of the water in the water-bath is to be reduced to ninety-five degrees Fahrenheit by pouring cold water into the funnel (the hot water escaping by the overflow-pipe). The air-chamber is then to be filled to a depth of 11 in., with water at a temperature of about ninety-five degrees Fahrenheit, the oil-cup is to be replaced in the water-bath, and the spirit-lamp attached to the water-bath is to be lighted and placed underneath. The test-flame is then to be again applied, from ninety-six degrees Fahrenheit, at every degree rise of temperature as indicated by the thermometer in the oil-cup until a flash takes place, or until a temperature of two hundred degrees Fahrenheit, or one hundred and twenty degrees Fahrenheit, as the case may be, has been reached. If during this operation the test-flame appears to diminish in size, the lamp is to be replenished in the manner prescribed at (2) without interrupting the test.

If a flash occurs at any temperature between seventy-six degrees and two hundred degrees Fahrenheit, the temperature at which it occurs, subject to correction for atmospheric pressure, is the flashing point of the sample.

In repeating a test a fresh sample of oil must always be used, the tested sample being thrown away, and the cup must be wiped dry from any adhering oil, and cooled, as already described, before receiving the fresh sample.

5. Correction for Atmospheric Pressure.—As the flashing point of an oil is influenced by changes in atmospheric pressure to an average extent of sixteen degrees Fahrenheit for every inch of the barometer, a correction of the observed flashing point may become necessary. The height of the barometer must, therefore, be determined at the time of making the test for the flashing point. The true height of the barometer for the purpose of the test shall be considered to be the height of the column of mercury measured at thirty-two degrees Fahrenheit, which is supported by the air pressure at the time of the experiment; that is, the actual height of the barometer at the time of observation duly corrected for any error of the instrument and for its temperature if necessary. For the purpose of applying the correction to the flashing point of the oil obtained by the test, a table is appended to this schedule, giving the flashing points of oils ranging from sixty-five degrees to eighty degrees Fahrenheit under pressure ranging from twenty-seven to thirty-one inches of mercury.

The table is used in the following manner:-

Example.—An oil has given a flashing point of seventy-one degrees, the barometer being at 28.6; take the nearest number to seventy-one degrees in the vertical column headed 28.6. This number is 70.8. Substitute for this the number in the same horizontal line in the column headed 30 (the normal height of the barometer). The substituted number, that is, the true flashing point of the oil, is seventy-three degrees.

Table for Correction of Flashing Points indicated by the Test for Variations in Barometric Pressure on either side of Thirty Inches.

Barometer in Inches.

30.8

9.06 3.06

30.3

8

29.2 29.4 29.6 29.8

29

28.2 28.4 28.6 28.8

8

27.8

27.6

27.4

27.2

27

Flushing Point in Degrees Fuhrenheit.

	P	et.	ro	lei	u	ı.
	67.6	9.89	9-69	9-02	9.11	72.6
1	67.3	683	69.3	70.3	71.3	75.3
	67	438	69	20	7	72
	9.93	67.6	9.89	9-69	9.02	9.11
	646.3	67/3	683	69-3	70-3	71.3
-	99	67	18	69	20	7
	-				-	-

_	5.05	809	?! ??	6.13	3.5	1.59	\$5.4	62.8	63.1	63.4	63.7	7	7.19	64-7	55	2	9.69	99	200	9.90
_	9.15	61.8	62-2	62.5	62.8	63-1	63.4	63-8	64-1	4.19	2:19	65	65.4	65-7	99	6.03	9.99	67	67.3	67.6
-	55.5	8-79	63-2	63-5	63.8	64-1	7.19	8:19	65-1	65.4	2.69	3	199	5.5	67	67.3	9.29	4.8	68.3	9.89
-	500	63.8	64-2	94.5	8.79	65.1	4.99	65-8	1.99	7.99	66.7	67	67.4	67.7	48	683	9.89	69	69.3	9-69
_	34.5	8.19	655-2	6.55	8.99	665-1	199	8.99	67-1	67.4	2.19	3	7:89	68.7	63	69-3	9-69	20	70.3	20-6
-	85.5	8.29	66.2	9.99	8.99	67.1	4.19	67.8	68-1	68.4	68.7	69	4.62	2-69	20	70-3	9-02	7	71.3	71.6
_	99.98	8,99	67-2	67.5	67.8	68-1	1.89	68.8	69-1	69-4	2-69	20	70.4	70.7	77	71.3	9.11	72	72.3	72.6
_	27.5	67.8	68-2	68.5	68.8	1-69	69-4	8-69	70-1	70.4	70.7	17	71.4	717	75	72.3	72.6	73	73.3	73.6
-	28.0	8-89	69-5	9.69	8-69	70-1	10.4	8-02	71-1	71.4	711-7	7.5	72.4	72.7	73	73-3	73-6	14	74.3	74.6
-	39.5	8-69	20.5	70-5	70.8	71-17	71.4	71.8	72-1	72.4	72.7	53	73-4	73-7	74	74-3	74.6	75	75.3	75.6
	5.02	70-x	71-2	211.5	71.8	72.1	72.4	72.8	73-1	73.4	73.7	7.4	74.4	74.7	75	75.3	9.92	92	76.3	76.6
	21.5	71.8	72.5	72-5	25.8	73.1	73.4	73.8	74-1	74.4	7.47	75	75.4	75.7	92	76.3	9.92	17	77.3	277.6
	12-5	72.8	73-2	73.5	73.8	74-1	7:12	74.8	75-1	75.4	75.7	26	76-4	7.97	77	77.3	9.11	78	78.3	28.6
	73.5	73.8	74-2	74.5	74.8	75-1	75.4	75.8	76-1	76.4	76-7	22	77.4	77.7	78	78.3	78.6	79	79.3	9.61
	74.5	74.8	75-2	75.5	75.8	1.92	76.4	8.92	77-1	777-4	7.77	18	78-4	78-7	79	79-3	9-62	8	80.3	9.08
•	75.5	75.8	76.2	2.91	8-91	777-1	4.11	77.8	78-1	78.4	78-7	62	79-4	79.7	80	80-3	9.08	81	81.3	9.18

24th January, 1887.