STATUTORY INSTRUMENTS

1965 No. 1555

FOOD AND DRUGS

MILK AND DAIRIES

The Milk (Special Designation) (Amendment) Regulations 1965

Made - - - -	3*rd August* 1965
Laid before Parliament	12*th August* 1965
Coming into Operation	1*st October* 1965

The Minister of Agriculture, Fisheries and Food and the Minister of Health, acting jointly, in exercise of the powers conferred on them by sections 35, 43(3), 87 and 123 of the Food and Drugs Act 1955**(a)** and of all other powers enabling them in that behalf, hereby make the following regulations after consultation with such organisations as appear to them to be representative of interests substantially affected by the regulations :—

Citation and commencement

1. These regulations may be cited as the Milk (Special Designation) (Amendment) Regulations 1965 ; and shall come into operation on 1st October 1965.

Interpretation

2.—(1) In these regulations, unless the context otherwise requires—

" the principal regulations " means the Milk (Special Designation) Regulations 1963**(b)**.

(2) The Interpretation Act 1889**(c)** applies to the interpretation of these regulations as it applies to the interpretation of an Act of Parliament.

Amendment of the Milk (Special Designation) Regulations 1963

3. The principal regulations shall be amended as follows :—

(*a*) by substituting for regulation 4 thereof the following regulation :—

" 4. The special designations which may be used in accordance with these regulations in relation to milk are ' Pasteurised ', ' Sterilised ', ' Ultra Heat Treated ' and ' Untreated '.";

(*b*) by substituting in regulation 7 thereof for the words and numerals " Parts I, II and III " the words and numerals " Parts I, II, III and IV ";

(*c*) by substituting in regulation 13(1)(*a*) thereof for the word " sterilised " the words " sterilised, treated by the ultra high temperature method " ;

(*d*) by substituting in regulation 13(1)(*c*) thereof for the words " ' Pasteurised ' or ' Sterilised ' " the words " ' Pasteurised ', ' Sterilised ' or ' Ultra Heat Treated ' " and by substituting for the word " Schedule " at the end of that sub-paragraph the words " Schedule, or treated by him by the ultra high temperature method in accordance with the provisions of Part IV of that Schedule ; " ;

(a) 4 & 5 Eliz. 2. c. 16. (b) S.I. 1963/1571 (1963 III, p.2937).
(c) 52 & 53 Vict. c. 63.

(*e*) by substituting in regulation 13(1)(*d*)(i) thereof for the words "'Untreated', 'Pasteurised' or 'Sterilised'" the words "'Untreated', 'Pasteurised', 'Sterilised' or 'Ultra Heat Treated'";

(*f*) by substituting in regulation 13(1)(*d*)(ii) thereof for the words "pasteurised or sterilised" the words "pasteurised, sterilised or treated by the ultra high temperature method";

(*g*) by substituting in paragraph A 3(*b*) of Part I of Schedule 2 thereto for the words "shall be suitably labelled with the words 'Untreated Milk'" the words "shall be conspicuously and legibly labelled or marked with the words 'Untreated Milk'";

(*h*) by substituting in paragraph C(1) of Part I of Schedule 2 thereto for the words "and the words 'Untreated Milk'" the words "and shall be conspicuously and legibly labelled or marked with the words 'Untreated Milk'";

(*i*) by substituting in paragraph C(2) of Part I of Schedule 2 thereto for the words "shall be suitably labelled with the words 'Untreated Milk'" the words "shall be conspicuously and legibly labelled or marked with the words 'Untreated Milk'";

(*j*) by adding after Part III of Schedule 2 thereto the Part set out in Schedule 1 to these regulations;

(*k*) by substituting in paragraph 1(*a*) of Part I of Schedule 3 thereto for the words "of the licensed producer or the pasteuriser or the steriliser," the words "of the licensed producer or the pasteuriser or the steriliser or the person treating milk by the ultra high temperature method,";

(*l*) by substituting for paragraph 2 of Part I of Schedule 3 thereto the following paragraph:—

"2. When the milk is in containers not exceeding one quart in capacity, or when milk has been treated by the ultra high temperature method whether or not such milk is in containers exceeding one quart in capacity, the sample shall consist of one such container which shall be delivered intact to the testing laboratory.";

(*m*) by substituting in paragraph 3 of Part I of Schedule 3 thereto for the words "When the milk is in containers" the words "When the milk (other than milk which has been treated by the ultra high temperature method) is in containers";

(*n*) by adding after Part IV of Schedule 3 thereto the Part set out in Schedule 2 to these regulations;

(*o*) by substituting for Form E in Schedule 5 thereto the Forms set out in Schedule 3 to these regulations.

In Witness whereof the Official Seal of the Minister of Agriculture, Fisheries and Food is hereunto affixed on 30th July 1965.

(L.S.)

Frederick Peart,
Minister of Agriculture, Fisheries and Food.

Given under the Official Seal of the Minister of Health on 3rd August 1965.

(L.S.)

Kenneth Robinson,
Minister of Health.

SCHEDULE 1 Regulation 3(j)

PART IV.—ULTRA HEAT TREATED

Special conditions subject to which licences to use the special designation "Ultra Heat Treated" are granted

1. The milk shall be treated by the ultra high temperature method, that is to say retained at a temperature of not less than 270°F. for not less than one second.

2. Any apparatus in which the milk is to be heated to and maintained at a temperature of not less than 270°F. shall be provided with a device which shall automatically divert the flow of any milk which is not raised to the authorised temperature.

3.—(1) Such indicating and recording thermometers as the licensing authority shall reasonably consider necessary shall be installed in suitable places in the apparatus in which the milk is treated by the ultra high temperature method so as to indicate the temperatures to which the milk is heated.

(2) The records of recording thermometers shall be marked with graduations of 2°F. adequately spaced to give clear readings, and they shall be dated and shall be preserved for a period of not less than three months.

4. A sample of the milk taken in accordance with Part I of Schedule 3 to these regulations after treatment by the ultra high temperature method and before delivery to the consumer shall satisfy the colony count test prescribed in Part V of that Schedule.

5.—(1) Milk which is treated by the ultra high temperature method shall immediately after such treatment be put into the sterile containers in which it is to be supplied to the consumer. Such containers shall be filled and sealed at the premises at which the treatment has been carried out with such aseptic precautions as will ensure the protection of the milk from risk of contamination.

(2) Every container in which milk treated by the ultra high temperature method is transported, exposed or offered for sale shall be so closed and securely fastened, either with a cap overlapping the lip of the container or in some other suitable manner approved by the licensing authority, that the container is airtight.

(3)(*a*) Every cap closing a container of milk treated by the ultra high temperature method shall be conspicuously and legibly labelled or marked with the words " Ultra Heat Treated Milk " or " U.H.T. Milk ", and shall also bear the address of the premises at which the milk was put into the container. Such cap may bear also the name of the licence holder who has treated the milk.

(*b*) Except with the approval of the licensing authority the cap shall bear no other words.

(*c*) If there is no cap on which the wording can suitably be placed, it shall be placed within a surrounding line in a prominent position elsewhere upon the container, and the foregoing provisions shall apply to the words within the surrounding line in the same way as they apply to words on the cap.

Regulation 3(n) SCHEDULE 2

PART V.—THE COLONY COUNT TEST FOR MILK TREATED BY THE ULTRA HIGH TEMPERATURE METHOD

Apparatus

1. The following apparatus shall be used:—

(*a*) McCartney bottles of 1 fl. oz. capacity.

(*b*) Test tubes plugged with cotton wool or covered with closely fitting aluminium caps or stored in such a way as to prevent contamination.

(*c*) A standard iridium platinum loop of 4 mm. internal diameter made from gauge wire conforming to British Standard 19 and containing 10 per cent. iridium. The loop, when used as directed, should transfer about 0.01 ml. of milk to the molten medium in a tube or a McCartney bottle.

(*d*) An incubator capable of operating at a preselected temperature within the range 30°C. to 37°C. and of maintaining the preselected temperature within ± 1°C.

(*e*) A water bath capable of maintaining the water at a temperature of not less than 45°C. and not more than 50°C.

(*f*) A refrigerator fitted with a reliable automatic thermo-regulator capable of maintaining a temperature of between 3°C. and 5°C.

Culture medium

2. A culture medium prepared as follows should be used:—

(*a*) Yeastrel milk agar constituted as follows:—

Yeastrel ..... 3g.

Peptone ..... 5g.

Agar .....15g.

(If New Zealand agar is used 12g. is normally sufficient.)

Fresh whole milk .....10 ml.

Distilled water .....1,000 ml.

(*b*) The yeastrel and peptone shall be dissolved in the distilled water in a steamer and the reaction at room temperature adjusted to pH 7.4, using phenol red as an idicator or using a pH meter. When phenol red is used, a brightness screen must be employed with Lovibond phenol red disc 2/IJ. The agar and the milk shall then be added to the broth and autoclaved at 121°C. for 25 minutes. If shredded agar is used, it shall be wrapped in muslin and washed in running water for 15 minutes, the excess water being squeezed out before the agar is added to the broth. To ensure thorough mixing and that heat treatment of the bulk at this stage is equivalent to the final sterilisation of the tubed medium, quantities of not more than 2 litres shall be autoclaved in 3-litre conical flasks. The hot medium shall then be filtered through paper pulp in a Buchner funnel.

(*c*) The pulp shall be prepared by mashing up small pieces of filter paper in water and boiling. The funnel shall be inserted into an Erlenmeyer flask fitted with a side piece and a single layer of filter paper laid on the top of the Buchner funnel to prevent the pulp being sucked through. The hot pulp shall then be poured on to the filter paper and a filter pump applied to suck through the excess water, which shall then be poured away. The pulp should be firmly packed down just before the last of the water is sucked through. At this stage a layer of filter paper shall be laid on the filter bed, so that the hot medium can subsequently be poured on to it without disturbing the pulp. The filter when ready for use should have a total depth of about 1.5 mm. (A pulp layer of suitable and approximately the same depth for any size of funnel is obtained by pulping an area of filter paper equal to four times the square of the diameter of the funnel. With ordinary grade filter paper 1g. of the dry paper will be required for every 20 sq. cm. of filtering area.)

(*d*) The flask and funnel shall be thoroughly hot before filtering commences and these and the medium shall be kept hot during filtering. The medium shall be taken direct from the autoclave, poured on to the pulp where the filter paper is laid and the vacuum pump connected.

(*e*) The reaction of the filtrate shall be tested at 50°C. and adjusted if necessary to pH 7.0. Adjustment at this stage should not normally be necessary, and if it is needed at all frequently, the method of preparation should be checked.

(*f*) The medium shall be distributed in 5 ml. quantities in 6 × $\frac{5}{8}$ in. test-tubes or in 1 oz. McCartney bottles and autoclaved at 121°C. for 15 minutes.

(*g*) The final reaction of the medium at room temperature shall be pH 7.2.

Alternative medium

3. A dehydrated medium of the same composition may be used provided that it has been shown to give similar results.

Incubation of sample

4. On arrival at the laboratory the sample shall be placed unopened in the incubator at a temperature of between 30°C. and 37°C. and retained at that temperature for 24 hours.

Mixing of sample prior to examination

5. At the end of the 24-hour incubation period, the sample shall be removed from the incubator and shall be mixed thoroughly by inverting the container and shaking it.

Method of carrying out the test

6. (*a*) After the sample has been thoroughly mixed as described above, it shall be opened with aseptic precautions as follows:—

(i) If the sample is contained in a carton, one of the corners or edges of the carton shall be thoroughly swabbed with alcohol and the excess burnt off. The carton shall then be opened by cutting off this corner or edge using a pair of sterile scissors.

(ii) If the sample is contained in a bottle, the closure and neck of the bottle shall be thoroughly swabbed with alcohol and the excess burnt off. The closure shall then be removed by means of a sterile opener.

(iii) If the sample is in a container other than a carton or bottle a suitable surface of the container shall be thoroughly swabbed with alcohol and the excess burnt off. A hole in that sterile surface shall then be punched using a sterile tool.

(*b*) Immediately after opening the sample container, the cap from a sterile McCartney bottle shall be removed and approximately 10 ml. of the sample transferred by means of a sterile pipette to the bottle, the cap replaced and the McCartney bottle put in the refrigerator. A further 10 ml. (approximately) of the sample shall be transferred to a sterile test-tube after removing the plug. The plug shall then be replaced.

(*c*) With as little delay as possible, a loopful of milk from the test-tube sample shall be transferred to a sterile test-tube or 1 oz. McCartney bottle containing about 5 ml. of melted yeastrel milk agar medium at 45°C. to 50°C. The loop, after being flame-sterilised and cooled, shall be lowered into the milk about 1 inch below the surface and a loopful of milk withdrawn and transferred to the molten medium in the tube or McCartney bottle. The contents of the tube or bottle shall then be carefully mixed, the tube or bottle placed in a sloping position (the medium being at least half an inch from the closure) and the medium allowed to set. The tube or bottle shall then be incubated in a sloping position at a temperature of between 30°C. and 37°C. for 48 hours and at the end of that time it shall be examined for the presence of colonies.

Counting of colonies

7. Colonies shall be counted within 4 hours of the expiry of the incubation period.

Interpretation

8. The test shall be deemed to be satisfied by a sample if the number of colonies is found to be less than 10. If there is any doubt about the result, the test should be repeated using the sample in the McCartney bottle placed in the refrigerator.

Regulation 3(o)

SCHEDULE 3

FORM E

Milk (Special Designation) Regulations 1963 as amended

Dealer's (Ultra Heat Treated) Licence authorising the use of the special designation " Ultra Heat Treated "

The .....

hereby authorise ..... of .....

..... to use the special designation " Ultra Heat Treated " in relation to milk which has been treated by the ultra high temperature method at ..... in accordance with the conditions prescribed in the Milk (Special Designation) Regulations 1963 as amended, for the purpose of sale.

This licence is not transferable and is subject to the conditions prescribed in the above-named regulations, and, unless suspended or revoked, will operate until .....

Dated this ..... day of ..... 19....

Clerk to the ..... Council.

FORM F

Milk (Special Designation) Regulations 1963 as amended

Dealer's (Pre-packed Milk) Licence authorising the use of the special designation(s) (a) " Untreated "* (b) " Pasteurised "* (c) " Sterilised "* (d) " Ultra Heat Treated "*

The .....
hereby authorise ..... of .....
..... (referred to herein as " the dealer ") to use the special designation (a) " Untreated "* (b) " Pasteurised "* (c) " Sterilised "* (d) " Ultra Heat Treated "* in relation to milk which is—

† (i) obtained by the dealer pre-packed as (a) " Untreated "* (b) " Pasteurised "* (c) " Sterilised "* (d) " Ultra Heat Treated "* as the case may be from

† (ii) pasteurised,* sterilised* or treated by the ultra high temperature method* as the case may be, by the dealer in accordance with the conditions prescribed in the Milk (Special Designation) Regulations 1963 as amended, at

premises in respect of which a licence authorising the use of the appropriate designation in relation to the milk is in force and is sold or intended for sale at or from .....
.....

This licence is not transferable and is subject to the conditions prescribed in the above-named regulations, and, unless suspended or revoked, will operate until .....

Dated this ..... day of ..... 19....

Clerk to the ..... Council.

† * Strike out if inapplicable.

EXPLANATORY NOTE

(This Note is not part of the regulations.)

These regulations, which amend the Milk (Special Designation) Regulations 1963,–

(*a*) prescribe a new special designation, " Ultra Heat Treated ", in relation to milk which has been treated by the ultra high temperature method (regulation 3(*a*), (*c*), (*d*), (*e*) and (*f*));

(*b*) prescribe special conditions subject to which licences to use the new special designation are granted (Schedule 1), a test which must be satisfied (Schedule 2), and forms of licence to authorise use of the new special designation (Schedule 3);

(*c*) require the cap of any bottle, or any container other than a bottle, containing milk in relation to which the special designation " Untreated " is used, to be conspicuously and legibly labelled or marked with the words " Untreated Milk " (regulation 3(*g*), (*h*) and (*i*)).