SRI LANKA STANDARD 716 : 1985

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SPECIFICATION FOR

COCONUT OILCAKES AND MEALS

SRI LANKA STANDARDS INSTITUTION

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SLS 716:1985

Gr. 5

SRI LANKA STANDARDS INSTITUTION
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Sri Lanka.

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This standard does not purport to include all the necessary provisions of a contract.

SRI LANKA STANDARD

SPECIFICATION FOR COCONUT OILCAKES AND MEALS

FOREWORD

This Sri Lanka Standard was authorized for adoption and publication by the Council of the Sri Lanka Standards Institution on 1985-11-20, after the draft, finalized by the Drafting Committee on Animal Feeds had been approved by the Agricultural and Food Products Divisional Committee.

Coconut oilcake is an important ingredient in compound animal feeds. This specification prescribes the limits for important quality characteristics of coconut oilcakes and meals which should be adhered to produce a product of proper quality.

All standard values given in this specification are in SI units.

For the purpose of deciding whether a particular requirement of this specification is complied with, the final value, observed or calculated, expressing the results of a test, shall be rounded off in accordance with CS 102. The number of significant figures to be retained in the rounded off value shall be the same as that of the specified value in this specification.

In the preparation of this specification, valuable assistance derived from the publications of the Indian Standards Institution is gratefully acknowledged.

1 SCOPE

This specification prescribes the requirements and methods of sampling and test for coconut oilcakes and meals used for animal feeds.

2 REFERENCES

CS 102 Presentation of numerical values

SLS 428 Random sampling methods

SLS 626 Methods of test for animal feeds.

3 DEFINITION

For the purpose of this specification, the following definition shall apply:

3.1 coconut oilcake or meal: The residue left after the partial or complete removal of oil from copra.

4 TYPES

The material shall be of the following types:

4.1 Expeller oilcake or meal

The product obtained by the expression of oil from copra by the expeller method.

4.2 Solvent extracted meal

The product obtained by extraction of oil from expeller oilcake or meal by means of a solvent.

4.3 Parings oilcake or meal

The product resulting from the expression of oil from dried coconut kernel parings (testa) which are a by-product of the desiccated coconut industry.

5 REQUIREMENTS

5.1 General

The material shall be free from dirt, adulterants and extraneous matter.

5.2 Physical form

The material shall be in the form of either cake or meal.

5.3 Odour

The material shall be free from musty and stale odour.

5.4 Freedom from moulds and insect infestation

The material shall be free from moulds and insect infestation to visual and microscopic examination.

5.5 Other requirements

The material shall also conform to the requirements prescribed in Table 1.

TABLE 1 - Requirements for coconut oilcakes and meals

Sl. No.	Characteristic	Requirements			Method of test Ref. to clause no. of SLS 626:1983
		Expeller oilcake or meal	Solvent extracted meal	Parings oilcake or meal	
(1)	(2)	(3)	(4)	(5)	(6)
i	Moisture per cent, by mass, max.	10.0	10.0	10.0	5
ii	Crude protein (Nx6.25) per cent by mass, min.	22.0	23.0	19.0	6
iii	Ammoniacal nitrogen per cent by mass, max.	0.5	0.5	0.5	6
iv	Crude fat per cent by mass	5.0 to 8.0	2.0 max	5.0 to 8.0	7
v	Crude fibre, per cent by mass max.	13.0	14.0	12.0	8
vi	Acid insoluble ash, per cent by mass, max.	1.5	1.5	1.5	9

NOTE - The values specified for the requirements (ii) to (vi) are on moisture free basis.

6 PACKAGING

Unless otherwise agreed to between the purchaser and the vendor, the material shall be packed in jute or polypropylene bags. The mouth of each bag shall be machine-stitched or rolled over and hand-stitched.

7 MARKING

7.1 Each bag shall be marked or labelled with the following information:

a) Description of the material;

b) Name and address of the manufacturer;

c) Batch or code number;

d) Net mass, in kg; and

e) Date of packaging.

7.2 The packages or containers may also be marked with the Certification Mark of the Sri Lanka Standards Institution illustrated below on permission being granted for such marking by the Sri Lanka Standards Institution.

NOTE — The use of the Sri Lanka Standards Institution Certification Mark (SLS Mark) is governed by the provisions of the Sri Lanka Standards Institution Act and the regulations framed thereunder. The SLS mark on products covered by a Sri Lanka Standard is an assurance that they have been produced to comply with the requirements of that standard under a well defined system of inspection, testing and quality control which is devised and supervised by the Institution and operated by the producer. SLS marked products are also continuously checked by the Institution for conformity to that standard as a further safeguard. Details of conditions under which a permit for the use of the Certification Mark may be granted to manufacturers or processors may be obtained from the Sri Lanka Standards Institution.

8 SAMPLING

8.1 Lot

The quantity of coconut oilcakes or meals obtained under similar conditions of manufacture or belonging to one batch of supply shall constitute a lot.

8.2 General requirements of sampling

In drawing, preparing, storing and handling samples, the following precautions and directions shall be observed.

8.2.1 Samples shall be taken in a protected place not exposed to damp air, dust or soot.

8.2.2 The sampling instrument shall be clean and dry when used.

8.2.3 Precautions shall be taken to protect the samples, the material being sampled, the sampling instrument and the containers for samples from adventitious contamination.

8.2.4 The samples shall be placed in clean and dry glass or any other suitable containers.

8.2.5 Each container shall be airtight after filling and marked with necessary details of sampling.

8.2.6 Samples shall be stored in such a manner that there will be no deterioration of the material.

8.3 **Sampling instruments**

Following sampling instruments or any other appropriate sampling instrument may be used:

a) Scoop ; and

b) Sampling tube.

8.4 **Scale of sampling**

8.4.1 Samples shall be tested for each lot for ascertaining conformity of the material to the requirements of this specification.

8.4.2 The number of bags to be selected from the lot shall be in accordance with Table 2.

TABLE 2 - Scale of sampling

Number of bags in the lot	Number of bags to be selected
Up to 50	2
51 to 100	3
101 to 300	4
301 to 500	5
501 to 1 000	7
1 001 and above	10

8.4.3 The bags shall be selected at random. In order to ensure randomness of selection, tables of random numbers as given in SLS 428 shall be used.

8.5 **Preparation of samples**

8.5.1 **Individual samples**

Equal quantities of material shall be drawn from top, middle, bottom and sides of each bag selected using an appropriate sampling instrument. All the portions of material of same bag shall be thoroughly mixed and reduced using a coning and quartering method or any other appropriate method to form an individual sample of not less than 0.25 kg which represents that particular bag sampled.

8.5.2 *Composite sample*

Equal quantities of material shall be drawn from top, middle, bottom and sides of each of the bags selected using an appropriate sampling instrument. All the portions of material so obtained shall be thoroughly mixed and reduced using a coning and quartering method or any other appropriate method to get a composite sample of not less than 0.25 kg.

8.6 Reference sample

If reference samples are required, the size, of each such individual sample or composite sample shall not be less than 0.75 kg. The individual samples so obtained shall be divided into three sets in such a way that each set has a sample representing each selected bag. One of these sets shall be marked for purchaser, another for the vendor and third for the reference. The composite sample shall be divided into three equal parts. One of these parts shall be marked for the purchaser another for the vendor and the third for reference.

8.7 Number of tests

8.7.1 Each bag selected as in 8.4.2 shall be examined for packaging and marking requirements. (This may be done at the place of inspection).

8.7.2 Each individual sample prepared as in 8.5.1 shall be examined for requirements given in 5.1 to 5.4 and tested for acid insoluble ash.

8.7.3 The composite sample prepared as in 8.5.2 shall be tested for the requirements given in 5.5 other than acid insoluble ash.

9 METHODS OF TEST

The tests shall be carried out by appropriate methods prescribed in Column 6 of Table 1.

10 CONFORMITY TO STANDARD

A lot shall be declared as conforming to the requirements of this specification, if the following conditions are satisfied.

10.1 Each bag examined as in 8.7.1 satisfies the relevant requirements.

10.2 Each individual sample examined as in 8.7.2 satisfies the requirements given in 5.1 to 5.4.

10.3 The value of the expression $(\bar{x} + 0.4\ R)$ calculated using test results on acid-insoluble ash is less than or equal to the requirements for acid insoluble ash specified in Table 1.

10.4 The composite sample tested as in 8.7.3 satisfies the relevant requirements.

SLS CERTIFICATION MARK

The Sri Lanka Standards Institution is the owner of the registered certification mark shown below. Beneath the mark, the number of the Sri Lanka Standard relevant to the product is indicated. This mark may be used only by those who have obtained permits under the SLS certification marks scheme. The presence of this mark on or in relation to a product conveys the assurance that they have been produced to comply with the requirements of the relevant Sri Lanka Standard under a well designed system of quality control inspection and testing operated by the manufacturer and supervised by the SLSI *which includes surveillance inspection of the factory, testing of both factory and market samples.*

Further particulars of the terms and conditions of the permit may be obtained from the Sri *Lanka Standards Institution, 17, Victoria Place, Elvitigala Mawatha, Colombo 08.*

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SRI LANKA STANDARDS INSTITUTION

The Sri Lanka Standards Institution (SLSI) is the National Standards Organization of Sri Lanka established under the Sri Lanka Standards Institution Act No. 6 of 1984 which repealed and replaced the Bureau of Ceylon Standards Act No. 38 of 1964. The Institution functions under the Ministry of Science & Technology.

The principal objects of the Institution as set out in the Act are to prepare standards and promote their adoption, to provide facilities for examination and testing of products, to operate a Certification Marks Scheme, to certify the quality of products meant for local consumption or exports and to promote standardization and quality control by educational, consultancy and research activity.

The Institution is financed by Government grants, and by the income from the sale of its publications and other services offered for Industry and Business Sector. Financial and administrative control is vested in a Council appointed in accordance with the provisions of the Act.

The development and formulation of National Standards is carried out by Technical Experts and representatives of other interest groups, assisted by the permanent officers of the Institution. These Technical Committees are appointed under the purview of the Sectoral Committees which in turn are appointed by the Council. The Sectoral Committees give the final Technical approval for the Draft National Standards prior to the approval by the Council of the SLSI.

All members of the Technical and Sectoral Committees render their services in an honorary capacity. In this process the Institution endeavours to ensure adequate representation of all view points.

In the International field the Institution represents Sri Lanka in the International Organization for Standardization (ISO), and participates in such fields of standardization as are of special interest to Sri Lanka.

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