

PHILIPPINE NATIONAL STANDARDS FOR COCONUT SAP SUGAR

ANGELINA A. BONDAD

**Chief Science Research Specialist V and
OIC-Director**

**Bureau of Agriculture and Fisheries Product Standards
BPI Compound, Visayas Avenue, Diliman, Quezon City**

BAFPS

Bureau of Agriculture & Fisheries Product Standards



website: www.bafps.da.gov.ph

email: bafpsda@yahoo.com

Tel/Fax No.: (02) 920 6131

The Creation of BAFPS

**specifically provided for by the
Agriculture and Fisheries
Modernization Act (AFMA) of 1997
or Republic Act (RA) 8435**

AFMA (RA 8435)

Ch. 7 - Product Standardization and Consumer Safety

Section 60. Declaration of Policy

“It is the policy of the State that all sectors involved in the production, processing, distribution and marketing of food and non-food agriculture and fisheries products shall ... *use of product standards in order to ensure consumer safety and promote the competitiveness ...*”

BAFPS' Three (3) Major Functions

❖ Formulate and enforce standards of quality in the processing, preservation, packaging, labeling, importation, exportation, distribution and advertising of agricultural and fisheries products;

BAFPS' Three (3) Major Functions

❖ Conduct research on product standardization, alignment of the local standards with international standards;

Establish scientific basis for food safety standards and codes of practice

BAFPS' Three (3) Major Functions

- ❖ **Conduct regular inspection of processing plants, storage facilities, abattoirs, as well as public and private markets to ensure freshness, safety and quality of products.**

BAFPS' Fourth (4) Major Functions (under RA 10068)

- ❖ National Administrative and Technical Secretariat of the National Organic Agriculture Program.**
- ❖ Licensing and registration of organic food and organic inputs producers.**

Other BAFPS' Functions: Standards Promotion and Dissemination

- ❖ Monitors and disseminates information on international developments in food safety standards and guidelines.**

Trainings/Conferences Conducted

- ❖ Food Safety and Quality**
- ❖ Organic Agriculture Standards and Certification**
- ❖ Good Agricultural Practices (GAP) for Fruits and Vegetables**
- ❖ Aflatoxin Prevention and Control**
- ❖ Food Certification System**
- ❖ Traceability and Recall**

Trainings/Conferences Conducted

- ❖ **Risk Analysis**
- ❖ **Understanding Codex**
- ❖ **SPS and Postharvest Requirements for Export**
- ❖ **Expanding Exports of Horticultural Produce**

**PHILIPPINE NATIONAL
STANDARDS
FOR
COCONUT SAP SUGAR
(PNS/BAFPS 76: 2010)**

1 Scope

This standard establishes a system of grading and classifying commercial Coconut Sap Sugar obtained from fresh sap tapped from an unopened inflorescence of coconut trees, *Cocos nucifera* Linn.

2 Definitions

2.1 coconut sap

**liquid oozing out from the tapped
unopened inflorescence of the coconut
palm**

2 Definitions

2.2 coconut sap sugar

**a sweetener in solid form, derived
from pure fresh coconut sap
obtained by boiling**

3 Minimum requirements

3.1 Physical Characteristics

Parameter	Quality Characteristics
Color	Light yellow/Cream to dark brown
Odor	Sweet scent; pleasant nutty aroma
Taste	Sweet
Others	Free from filth and extraneous matters

3.2 Chemical Properties

Parameter	Values (%)
Water Activity, a_w	< 0.35 – 0.45
Glucose*	2.0 – 3.0
Fructose*	1.0 - 4.0
Sucrose*	78.0 - 89.0
Ash	≤ 2.4

*Analyses were done by Sugar Regulatory Administration (SRA)

3.3 Microbiological Characteristics

Parameter	Values
Salmonella (/25g)	Negative
E. Coli (MNP/100g) or (cfu/g)	Negative
Coliform Count	< 10 cfu/g
Total Plate Count	< 10 cfu/g
Mold and Yeast	< 10 cfu/g

4 Classification

Class	Specification
Premium Class (Superior quality)	Color: Light yellow to cream Water Activity, a_w < 0.35
Class I (Good quality)	Color: Light brown to brown Water Activity, a_w 0.35 – 0.45
Class II	This class includes coconut sap sugar which does not qualify for inclusion in the higher classes, but satisfy the minimum requirements specified in Section 3.

5 Contaminants

5.1 The coconut sap sugar should be free from filth and extraneous matters.

5.2 Coconut sap sugar should conform with heavy metals in amount not hazardous to human health.

5.3 No additives permitted.

6 Hygiene

Coconut Sap Sugar should be prepared and handled in accordance with the appropriate sections of the Recommended International Code of Practice – General Principles of Food Hygiene (CAC/RCP 1 – 1969, Rev. 2 - 1985, Codex Alimentarius Vol. 1B) and other relevant Codes of Hygienic Practices and BFAD AO No. 153 series of 2004.

6 Hygiene

Revised Guidelines on Current Good Manufacturing, Packing, Repacking, or Holding Food and Codes of Practice recommended by the Codex Alimentarius Commission which are relevant to this product. The containers must be free of all foreign matter and smell.

7 Packaging

7.1 Coconut Sap Sugar should be packed in suitable containers which will safeguard the integrity of the product.

7.2 The packaging materials should be made of substances which are safe and food grade suitable for the intended use.

8 Marking and Labeling

8.1 Brand and Trade Names

**8.2 Specific Name of the Product –
Coconut Sap Sugar**

8.3 Net content, in metric system

**8.4 Name and address of the
Manufacturer/Importer/Distributor**

8 Marking and Labeling

8.5 Lot Identification Code

8.6 Date of Manufacture

8.7 Best Before Date

**8.8 Nutrition Facts – specify the
nutrients**

8.9 Product of the Philippines

9 Other Information

- ❖ Coconut Sap Sugar is a high value commercial product which has promising health benefits to humans especially for diabetics.**
- ❖ Coconut sap sugar has a low glycemic index (GI) of 35.**

9 Other Information

- ❖ Low GI food is good for proper control and management of diabetes mellitus and may lower the total, HDL and LDL cholesterol.**
- ❖ It may also be good for weight maintenance thus prevent overweight and obesity.**

9 Other Information

- ❖ The importance of the product led to increase the demand for both domestic and international markets.**
- ❖ The product is a good substitute for commercial sweeteners which are available in the market.**

THANK YOU!

And

Good day!