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DRAFT EAST AFRICAN STANDARD

Fresh pineapples — Specification

EAST AFRICAN COMMUNITY

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Foreword

Development of the East African Standards has been necessitated by the need for harmonizing requirements governing quality of products and services in the East African Community. It is envisaged that through harmonized standardization, trade barriers that are encountered when goods and services are exchanged within the Community will be removed.

In order to achieve this objective, the Community established an East African Standards Committee mandated to develop and issue East African Standards.

The Committee is composed of representatives of the National Standards Bodies in Partner States, together with the representatives from the private sectors and consumer organizations. Draft East African Standards are circulated to stakeholders through the National Standards Bodies in the Partner States. The comments received are discussed and incorporated before finalization of standards, in accordance with the procedures of the Community.

East African Standards are subject to review, to keep pace with technological advances. Users of the East African Standards are therefore expected to ensure that they always have the latest versions of the standards they are implementing.

EAS 6 was prepared by Technical Committee EAS/TC 016.

Fresh pineapples — Specification

1 Scope

This Draft East African Standard specifies the requirements and methods of sampling and test for commercial varieties of pineapples grown from *Ananas comosus* (L.) Merr. of the *Bromeliaceae* family, to be supplied fresh to the consumer. [Pineapples for ornamental use or industrial processing are excluded].

2 Normative references

The following referenced documents are indispensable for the application of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EAS 38, Labelling of prepackaged foods — Specification

ISO 874, Fresh fruits and vegetables – Sampling

ISO 6633, Fruits, vegetables and derived products -- Determination of lead content -- Flameless atomic absorption spectrometric method

CAC/RCP 53-2003 Code of Hygienic Practice for Fresh Fruits and Vegetables

ISO 7558:1988, Guide to the prepackaging of fresh fruits and vegetables

3 Terms and definitions

For the purposes of this standard, the following terms and definitions shall apply.

3.1

disease

any unhealthy condition caused by any fungus, bacterium virus or pest

3.2

injury

any defect which more than slightly affects the appearance or edible quality of the pineapple

3.3

Foreign matter

Any organic or inorganic substances which affects the appearance and typical smell of the avocado fruit.

3.4

sound

Not overripe, not soft and free from diseases or insect damage, or bruising or physical injuries affecting keeping quality of the fruit.

3.5

Food grade packaging material

Any material which when it comes in contact with food or if the area near food is unlikely to contaminate food with harmful materials

3.6

firm

not soft, flabby, or shriveled

4 Requirements

4.1 General requirements

4.1.1 The stalk shall be trimmed cleanly to the length range of 1 cm to 3 cm.

4.1.2 The crown shall be trimmed if deemed necessary.

4.1.3 The crown and a portion of the stem (without bracts) shall be typical in colour and attractive in appearance.

4.1.4 The cut section of the stalk may be disinfected with an approved fungicide.

4.1.5 The pineapples shall be

- a) clean,
- b) intact, with no unhealed injuries
- c) sound; produce affected by rotting or deterioration such as to make it unfit for consumption is excluded
- d) free from any damage caused by fungus, bacteria or pest.
- e) mature,
- f) well set with well-developed eyes.
- g) symmetrical in shape, unbruised, unblemished or sun scorched and shall have no deformity whatsoever
- h) practically free from any foreign matter,
- i) of typical odour,

4.1.6 The development and condition of the fresh mango shall be such that enable them to:

- a) reach the appropriate stage of physiological maturity corresponding to the particular characteristics of the variety, and
- b) to withstand transport and handling;
- c) arrive in a satisfactory condition at the place of destination in order to ripen satisfactorily.

4.1.7 For the case of pineapples with crowns, the fruit length shall not be less than 40 per cent of the total length. Each fruit shall have a single upright crown only and this shall be less than 60 per cent of the total length.

4.1.8 The total soluble solids content in the fruit flesh should be at least 12° Brix (twelve Brix degrees). For the determination of Brix degrees a representative sample of the juice of all the fruit shall be taken.

4.2 Specific requirements

4.2.1 Classification

The fresh pineapple fruits shall be graded into three classes.

4.2.2.1 “Extra” Class

Pineapples in this class shall be of superior quality. They shall be characteristic of the variety and/or commercial type. They shall be free of defects, with the exception of very slight superficial defects, provided these do not affect the general appearance of the produce, the quality, the keeping quality and presentation in the package.

4.2.2.2 Class I

Pineapples in this class shall be of good quality. They shall be characteristic of the variety and/or commercial type. The following slight defects, however, may be allowed, provided these do not affect the general appearance of the produce, the quality, the keeping quality and presentation in the package:

- slight defects in shape;
- slight defects in colouring, including sun spots;
- slight skin defects (i.e., scratches, scars, scrapes and blemishes) not exceeding 4% of the total surface area.

The defects shall not, in any case, affect the pulp of the fruit.

4.2.2.3 Class II

This class includes pineapples which do not qualify for inclusion in the higher classes, but satisfy the minimum requirements specified in 4.1. The following defects, however, may be allowed, provided the pineapples retain their essential characteristics as regards the quality, the keeping quality and presentation:

- defects in shape;
- defects in colouring, including sun spots;
- skin defects (i.e., scratches, scars, scrapes, bruises and blemishes), not exceeding 8% of the total surface area.

The defects shall not, in any case, affect the pulp of the fruit.

4.2.2 Sizing

Size is determined by the average weight of the fruit with a minimum weight of 700 g, except for small size varieties, which can have a minimum weight of 250 g, in accordance with table 1.

Table 1: classification by size

Size Code	Weight, g	
	With crown	Without crown
A	≥2751	≥2281
B	2301 - 2750	1911 - 2280
C	1901 - 2300	1581 - 1910
D	1601 - 1900	1331 - 1580
E	1401 - 1600	1161 - 1330
F	1201 - 1400	1001 - 1160
G	1001 - 1200	831 - 1000
H	801 - 1000	661 - 830
I	≤800	≤660

5 TOLERANCES

Tolerances in respect of quality and size shall be allowed in each inspection lot for produce not satisfying the requirements of the class indicated.

5.1 QUALITY TOLERANCES

5.1.1 "Extra" Class

Five percent by number or weight of pineapples not satisfying the requirements of the class, but meeting those of Class I or, exceptionally, coming within the tolerances of that class.

5.1.2 Class I

Ten percent by number or weight of pineapples not satisfying the requirements of the class, but meeting those of Class II or, exceptionally, coming within the tolerances of that class.

5.1.3 Class II

Ten percent by number or weight of pineapples satisfying neither the requirements of the class nor the minimum requirements, with the exception of produce affected by rotting or any other deterioration rendering it unfit for consumption.

5.2 SIZE TOLERANCES

For all classes, 10% by number or weight of pineapples corresponding to the size immediately above or below that indicated on the package.

6 Contaminants

6.1 Pesticide residues

Fresh Pineapple shall comply with those maximum residue limits established by the Codex Committee on Pesticide Residues for this commodity.

6.2 Metal contaminants

When tested in accordance with ISO 6633, the Lead content in fresh pineapples shall not exceed 0.1 mg/kg.

7 Hygiene

Fresh pineapples shall be prepared and handled in accordance with CAC/RCP 53-2003.

8 Packaging

8.1 Fresh pineapples shall be packed in such a way as to protect the produce properly. The food grade packaging material used inside the package shall be clean and of a quality such as to avoid causing any external or internal damage to the produce. The use of materials, particularly of paper or stamps bearing trade specifications is allowed, provided the printing or labelling has been done with non-toxic ink or glue. Packages must be free from any foreign matter and the material shall be recyclable.

8.2 Fresh pineapples shall also be packed in containers in accordance with ISO 7558.

8.3 The contents of each package shall be uniform and consist exclusively of fresh mangoes of the same origin, variety and/or commercial type, and quality. The visible part of the content of the package shall be representative of the entire contents.

9 Labeling

In addition to the requirements of the EAS 38; the following specific provisions apply for each package; legibly and indelibly marked.

- i) Name, postal and physical address of the packer or dispatcher
- ii) Name of the produce as " Fresh pineapples ",
- iii) Name of the variety or commercial type.
- iv) Origin of produce
- v) Harvest date
- vi) Net weight (kg).
- vii) Size code
- viii) Class
- ix) Identification code and/or batch number
- x) storage instructions

10 Sampling

Representative samples of pineapples shall be sampled in accordance with ISO 874

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Bibliography

- [1] *CODEX STANDARD FOR PINEAPPLES (CODEX STAN 182-1993)*
- [2] *ASEAN STANDARD FOR PINEAPPLE*
- [3] *UNECE STANDARD FFV-49 concerning the marketing and commercial quality control of PINEAPPLES*

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