Illustration of the
Sampling plan for tree nuts and dried produce

UNECE Recommendation
2015 Edition

in trial until November 2019
amendments proposed in 2020 are integrated

Slides 6 to 56 have been taken at the workshop in Naples May 2018.
Slides 57 to 118 have been taken at the workshop in Izmir in November 2018.
Slides 119 to 126 summarize the observations and clarification needed.

The text of the UNECE Recommendation is printed in blue bold, the explanatory notes in *black bold italics*.

2.3 Place of control

A conformity check may be carried out during the packing operation at the point of dispatch, during transport, at the point of destination.

Illustration: Sampling of produce at arrival or import. The produce is presented in the transport vehicle.

3.0 Sampling

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

The inspector selects at random the primary samples to be inspected.

Illustration: In order to allow at random sampling, the transport vehicle must be unloaded – at least to a degree that it is possible to take primary samples from each part of the lot.

This means, at the arrival point the produce must have been unloaded and at dispatch point the produce must be inspected before it is loaded onto the transport vehicle.

Workflow of sampling a lot

Primary samples — ***initial 5 (or 10) packages***

↓↓↓↓↓

Secondary samples — ***300-1000 g each***

↓↓↓↓↓

Composite sample — ***minimum 3 kg***

↓

Reduced sample — ***minimum:***

↓↓

2 x 100 nuts in shell

100 g dried grapes

1 kg nut kernels, dried apricots and other produce of equivalent size

2 kg dried peaches and other produce of equivalent size

~~***2 x 1 kg sticky and irregular dried produce***~~

Example 1

Inspection of Inshell Walnuts

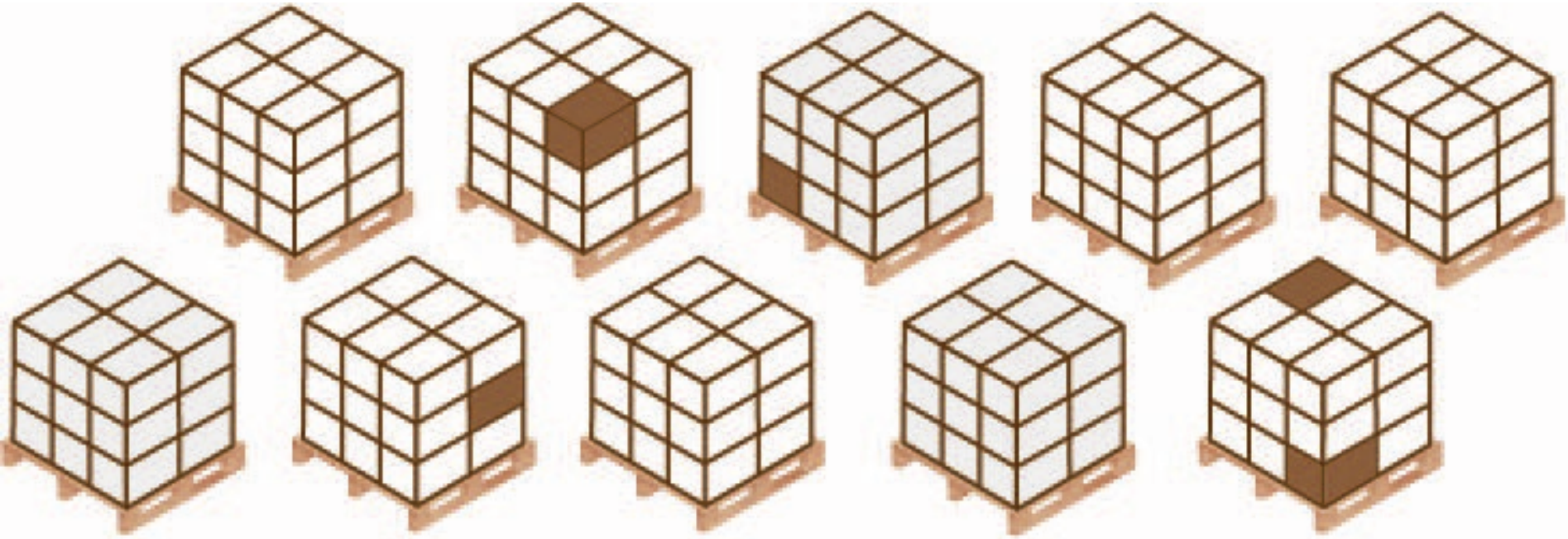
Size of the lot: 1,100 kg net weight
100 bags à 10 kg

The lot is checked for conformity with
UNECE STANDARD DDP-01 (2014) FOR INSHELL WALNUTS

2.5
Presentation of produce

The presentation of the lot is made by the trader as well as the supply of all information deemed necessary for the identification of the consignment or lot and for the inspection.

Illustration: Primary samples are presented by the trader and selected by the inspector.



3 Sampling

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

The inspector selects at random the primary samples to be inspected.

Illustration: Primary samples must be selected at random from the lot and they must be taken from different pallets of the lot.

3.1 Initial Sampling
The inspector shall determine the size of the bulk sample in such a way as to be able to assess the lot.

The inspector shall select a minimum of 5 samples for lots up to 1000 packages and a minimum of 10 samples for lots over 1000 packages to test conformity;

Illustration: 5 primary samples have been selected.

2.3 Place of inspection

A conformity check may be carried out during the packing operation at the point of dispatch, during transport, at the point of destination.

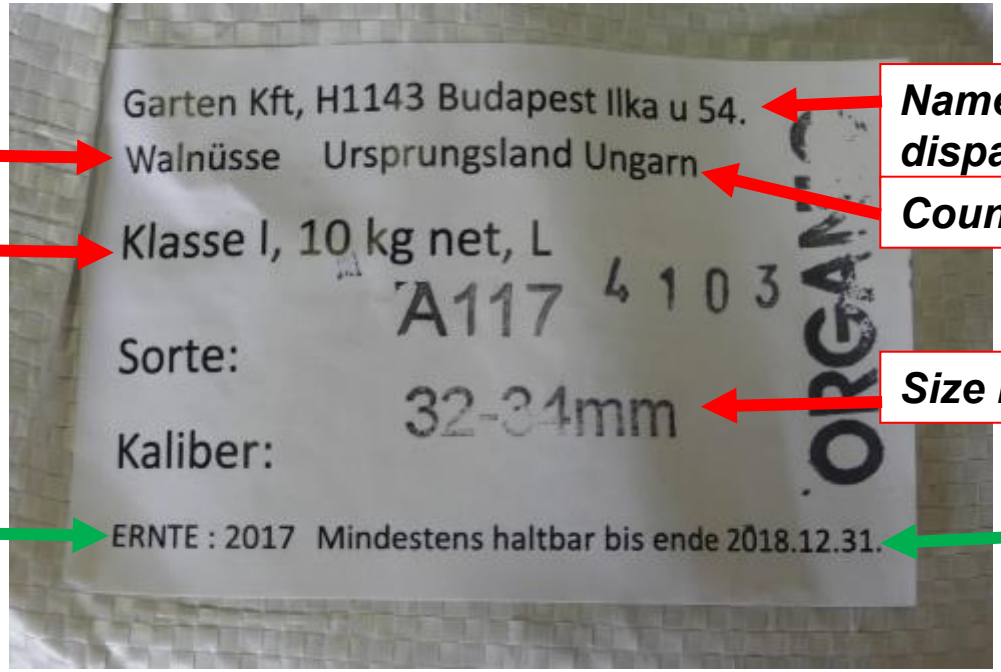
In cases where the authorised service does not carry out the conformity check in their own premises, the trader shall provide facilities enabling the conduct of a conformity check.

Ilustration: Example of place of inspection.

3.6.2 Verification of marking (1)

The marking shall be checked for correctness, completeness and readability according to the provisions of the standard. This shall be done on the basis of primary samples.

Illustration: The print on the bag provides the obligatory indications such as name and address of the dispatcher, the country of origin and the nature of produce. On a voluntary basis, the net weight and the information "of controlled production" are indicated.



Nature of produce

Class

Crop year

Name and address of dispatcher

Country of origin

Size range in mm

Best before

3.6.2 Verification of marking (2)

The marking shall be checked for correctness, completeness and readability according to the provisions of the standard. This shall be done on the basis of primary samples.

Illustration: The obligatory indications are highlighted in red, the optional indications in green. Result of inspection: All obligatory indications are present.

3.3 Size of the secondary sample

In the case of packed produce, secondary samples have to be taken from each primary sample to constitute the composite sample. The minimum size of the secondary sample taken from each primary sample shall be between 300 g and 1 kilo, in case the produce is packed loose in the package.

Illustration: A secondary sample of about 1 kg is taken from the first bag and the four other bags taken as primary samples.

3.4 Size of the composite sample (1)
The composite sample should be at least 3 kg in case of produce of a 100 units-weight of 1 kg or less.

Illustration: This carton contains the composite samples made of the five secondary samples. The size of the composite sample was about 5 kg.

3.4 Size of the composite sample (2)
Produce in the composite sample must be evenly mixed.

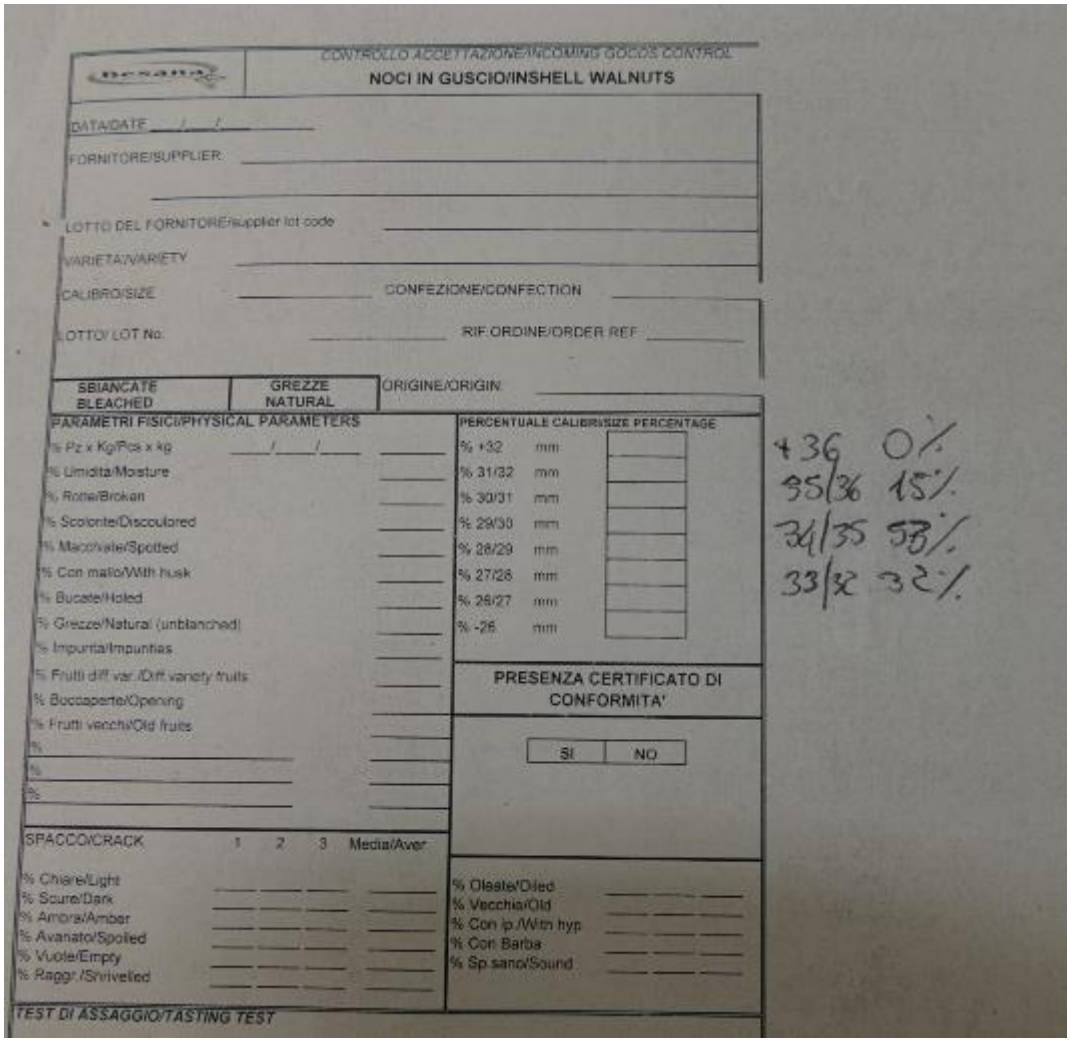
Illustration: The composite sample is mixed by means of a laboratory tray.

3.6.4 Verification of the size (1)

Illustration: The indicated size is 32-34 mm. A reduced sample of 200 nuts in shell is checked for uniformity in size. The check is done by means of round-hole sieves of 32, 33, 34, 35 and 36 mm stacked one on top of the other.

3.6.4 Verification of the size (2)

Illustration: The reduced sample is shaken and the number of nuts meeting the size of the respective sieve is determined.



CONTROLLO ACCETTAZIONE/INCOMING GOODS CONTROL

NOCI IN GUSCIO/INSHELL WALNUTS

DATA/DATE ___/___/___

FORNITORE/SUPPLIER

LOTTO DEL FORNITORE/supplier lot code

VARIETA'/VARIETY

CALIBRO/SIZE

CONFEZIONE/CONFECTION

LOTTO/ LOT No.

RIF.ORDINE/ORDER REF.

SBIANCATE / BLEACHED | GREZZE / NATURAL

ORIGINE/ORIGIN

PARAMETRI FISICI/PHYSICAL PARAMETERS

% Pz x Kg/Pcs x kg ___/___/___

% Umidità/Mosture

% Rotte/Broken

% Scolorite/Discoulored

% Macchiate/Spotted

% Con mallo/With husk

% Bucate/Holed

% Grezze/Natural (unblanched)

% Impurità/Impurities

% Frutti diff var./Diff variety fruits

% Boccaperte/Opening

% Frutti vecchi/Old fruits

%

%

%

PERCENTUALE CALIBRI/SIZE PERCENTAGE

% +32	mm	
% 31/32	mm	
% 30/31	mm	
% 29/30	mm	
% 28/29	mm	
% 27/28	mm	
% 26/27	mm	
% -26	mm	

+36 0%
35/36 15%
34/35 53%
33/32 32%

PRESENZA CERTIFICATO DI CONFORMITA'

SI | NO

SPACCO/CRACK 1 2 3 Media/Aver

% Chiare/Light
% Scure/Dark
% Ambra/Amber
% Avariate/Spoiled
% Vuote/Empty
% Raggr./Shriveled

% Oleate/Oiled
% Vecchie/Old
% Con ip./With hyp
% Con Barba
% Sp sano/Sound

TEST DI ASSAGGIO/TASTING TEST

3.6.6 Determination of inspection result (1)

Illustration: Example of an inspection sheet.
In this case: 15 % of the nuts are larger than 34 mm. The uniformity of the indicated size (32-34 mm) is not met and the tolerance of 10 % is exceeded.

3.5 Size of the reduced sample (analytical sample)
The reduced sample is taken from the composite sample and must comprise at least:
2 x 100 nuts in case of nuts in shell

Illustration: The nuts are placed in 2 trays with 100 depressions / indentations each.

3.6.5 Verification of characteristics of the produce (1)

Illustration: The reduced sample of inshell walnuts are assessed for defects of the shell. In one tray 11 out of 100 nuts are set aside for defects of the shell. These 11 nuts are checked, whether the defects are within the limits allowed.

3.6.5 Verification of characteristics of the produce (2)

Illustration: 5 out of the 11 walnuts with defects of the shell are exceeding the tolerances for external defects.

3.6.5 Verification of characteristics of the produce (3)

Illustration: In the second tray 8 out of 100 nuts are exceeding the tolerances for defects of the shell. These 8 nuts are checked, whether the defects are within the limits allowed.

3.6.5 Verification of characteristics of the produce (4)

Illustration: In the reduced sample of 200 inshell nuts, 13 nuts are exceeding the limits for skin defects defined in the minimum requirements. The next photo will show the details

3.6.6 Determination of inspection result (2)

Illustration
4 units misshapen
6 units dirty; adhering foreign matter exceeding 10 % of the surface area
1 unit cracked; missing portion of the shell exceeding in aggregate an area of a circle one-fourth inch (6 mm)
2 units blemishes; exceeding in aggregate 25 per cent of the surface of the shell

Class I: Tolerances for defects affecting the external appearances of the shell such as shells with adhering husk/hull, dirt and blemishes, open, broken or damaged shells: 10 %

In this reduced sample: 13 out of 200 nuts are affected by these defects affecting the external appearance of the shell = 6.5 %

The lot is in conformity with respect to external defects.

3.6.5 Verification of characteristics of the produce (5)

Illustration: The reduced sample is cracked to assess possible defects affecting the edible part. Care must be taken, that the kernel remains more or less intact. It is Recommended to crack the nuts with a hammer and to strike on the convex side of the nut.

3.6.5 Verification of characteristics of the produce (6)

Illustration: A cracked nut with a kernel largely unbroken.

3.6.5 Verification of characteristics of the produce (7)

Illustration: First step: The cracked nuts (kernel and shells) are placed in the tray. Second step: one by one, the shells are eliminated and the kernels are checked. Kernels are placed in an empty tray – the kernels without any defect are placed in the tray from the bottom line to the top, the defective kernels are placed from the top row to the bottom.

3.6.6 Determination of inspection result (3)

11 units mouldy
8 units shriveled; i.e. dried tough portions affecting more than 25 per cent of the kernel

3.6.5 Verification of characteristics of the produce (8)

Illustration:
Left: "mould filaments visible to the naked eye"
Right: "duvet"

3.6.6 Determination of inspection result

The result of inspection is representative for the lot, as all samples (primary, secondary and reduced sample) are taken at random.

In the case where defects are detected, the inspector shall determine the respective percentage of the produce not in conformity with the standard by number or weight – as specified in the standard.

If the percentage of defects found is close +/- 10 percent to the tolerance another bulk sample, equal in number to the first sample, must be checked. The overall result is reported as an average of the two checks.

The final result is given as a rounded integer.

3.6.6 Determination of inspection result (5)

Result of inspection:

Defect	Bulk sample = 5 packages; reduced sample = 200 nuts	In conformity with Class I	
Defects of the shell	13 = 6.5% ≡ 7 %	Ok (10% allowed)	
Mouldy kernels	8 = 4 %	Ok (4% allowed)	10% mouldy and shrivelled = ok as a maximum of 10% of kernels not satisfying the minimum requirements are allowed in Class I
Shrivelled kernels	11 = 5.5% ≡ 6 %	Ok (10% allowed)	
Sizing	30 = 15 %	No (10% allowed)	

The lot is not in conformity for sizing.

2. Sample size in case of non-conformity

The bulk sample shall comprise the following minimum quantities whenever a lot is declared unsatisfactory: 7 packages in case of lots consisting of 101 to 300 packages.

Explanatory note: The lot in the given example consists of 110 packages. 5 packages have been taken for the initial inspection. Another 2 packages have to be taken in order to base a possible non-conformity of the lot on 7 packages.

3.6.6 Determination of inspection result (5)

Final inspection result:

Defect	1. Bulk sample = 5 packages; reduced sample = 200 nuts	2. Bulk sample = 2 packages; reduced sample = 200 nuts	Total bulk sample = 9 packages; reduced sample = 400 nuts	In conformity with Class I	
Defects of the shell	13	4	17 = 4.25% ≡ 4%	Ok (10% allowed)	
Mouldy kernels	8	4	12 = 3 %	Ok (4% allowed)	7% mouldy and shrivelled = ok as a maximum of 10% of kernels not satisfying the minimum requirements are allowed in Class I
Shrivelled kernels	11	6	17 = 4.25% ≡ 4%	Ok (10% allowed)	
Sizing	30	18	48 = 12%	No (10% allowed)	

The lot is in conformity with Class I for defects of the shell, for mouldy kernels and defects affecting the edible part. The lot is not in conformity for sizing. A non-conformity report must be issued. The final result is given as a rounded integer.

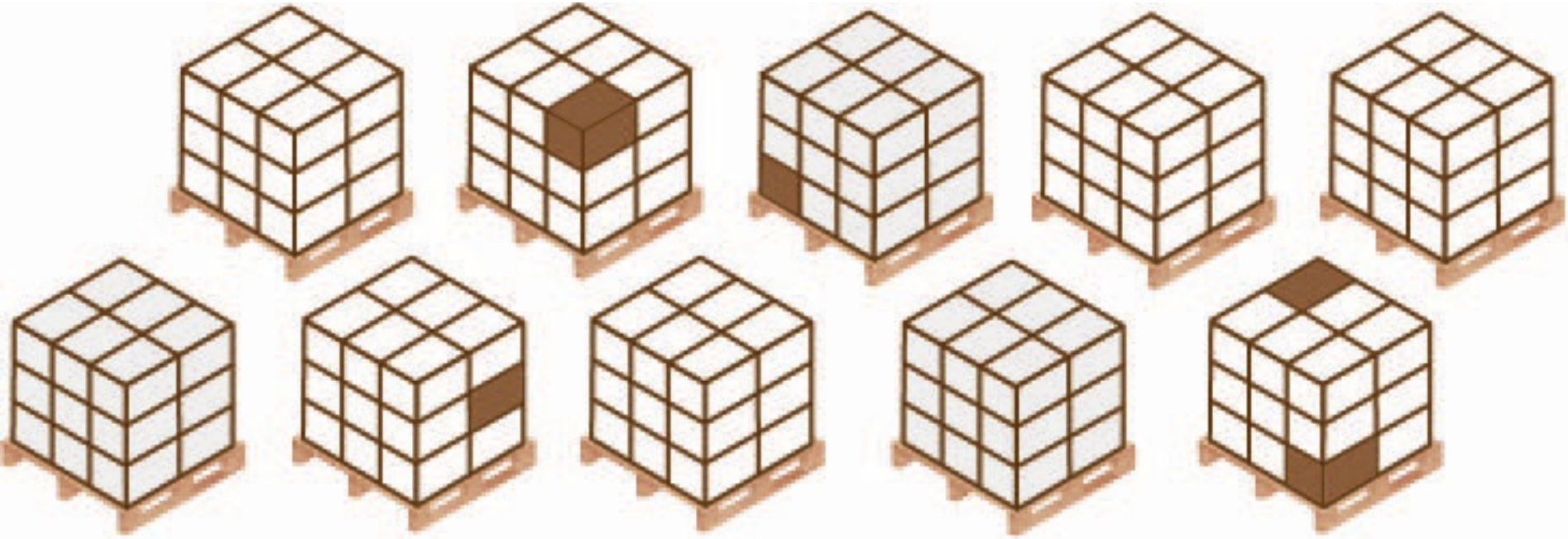
Possible follow-up: The lot is resized to eliminate the oversizes or the indication of the size is changed to "32 mm and above".

Example 2

Inspection of Almond Kernels

Size of the lot: 19,960 kg net weight
20 big bags à 998 kg each

The lot is checked for conformity with
UNECE STANDARD DDP-06 (2016) FOR ALMOND KERNELS



3 Sampling

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

The inspector selects at random the primary samples to be inspected.

Illustration: Primary samples must be selected at random from the lot. In case of big bags, these big bags are the primary samples. Different big bags have to be selected.

3 Sampling

The inspector shall determine the size of the bulk sample in such a way as to be able to assess the lot.

The inspector shall select a minimum of 5 samples for lots up to 1,000 packages and a minimum of 10 samples for lots over 1,000 packages to test conformity;

Illustration: 5 big bags out 20 in the lot are selected as primary samples.

3.6.1 Verification of packaging and presentation

The packaging, including the material used within the package, shall be checked for suitability and cleanliness according to the provisions of the relevant standard. This shall be done on the basis of primary samples, in case of packed produce.

Illustration: The overall appearance of the content of the primary samples is checked.

2.8.2 Verification of marking (1)

The marking shall be checked for correctness, completeness and readability according to the provisions of the standard. This shall be done on the basis of primary samples.

Illustration: One label on the big bag provides handling advice for the big bag. The country of origin "China" does not refer to the produce contained in the bag but to the bag.

Crop year

Country of origin

Name of Dispatcher

Nature of produce

Size

Class

2.8.2 Verification of marking (2)

The marking shall be checked for correctness, completeness and readability according to the provisions of the standard. This shall be done on the basis of primary samples.

Illustration: The obligatory indications are highlighted in red, the optional indications in green. Result of inspection: Missing indications: class and address of the dispatcher.

2.3 Place of inspection

A conformity check may be carried out during the packing operation at the point of dispatch, during transport, at the point of destination.

In cases where the authorised service does not carry out the conformity check in their own premises, the trader shall provide facilities enabling the conduct of a conformity check.

2.4 Inspector's equipment

With respect to the range of produce covered by conformity checks, the inspector must be provided with adequate equipment.

Illustration: Equipment to take samples from a big bag:

3 Sampling (1)

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

Illustration: Taking the secondary samples at random, i.e. from different parts of the big bag.

3 Sampling (2)

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

Illustration: The big bag has carefully to be sealed after the secondary sample has been taken.

3 Sampling (3)

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

Illustration: Taking the secondary samples at random, i.e. from different parts of the big bag.

3 Sampling (4)

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

Illustration: Taking the secondary samples at random, i.e. from different parts of the big bag.

3.4 Size of the composite sample (1)

The composite sample should be at least 3 kg. Produce in the composite sample must be evenly mixed.

Illustration: The composite sample is evenly mixed by shaking in a bag.

3.4 Size of the composite sample (2)

The composite sample should be at least 3 kg.

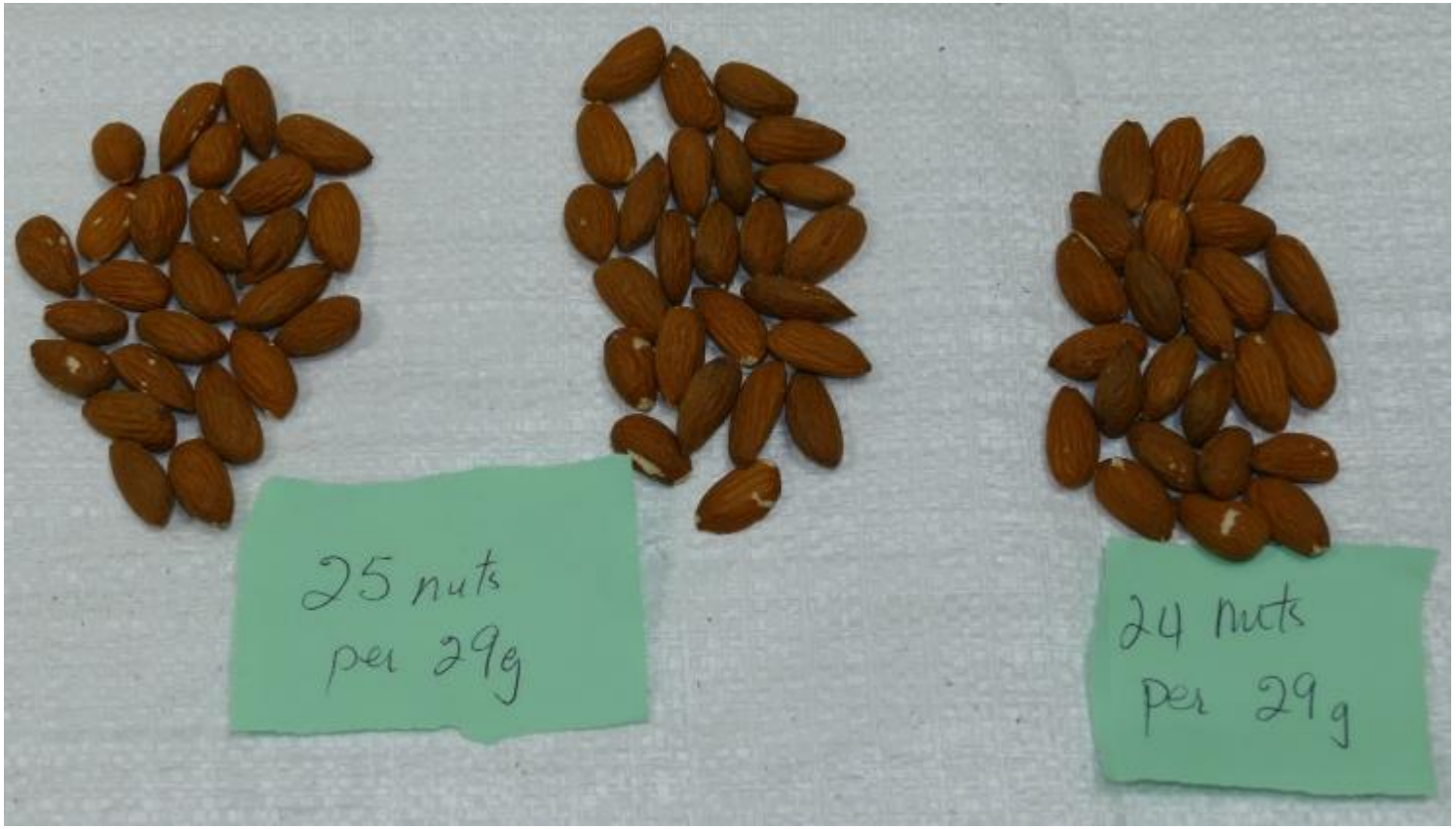
Illustration: The composite sample is poured into a bowl.

3.5 Size of the reduced sample (analytical sample)

The reduced samples is the quantity of produce taken at random from the bulk or composite sample whose size is restricted to the minimum quantity necessary but sufficient to allow the assessment of certain individual criteria.

Several reduced samples may be taken from a bulk or composite sample in order to check the conformity of the lot against different criteria.

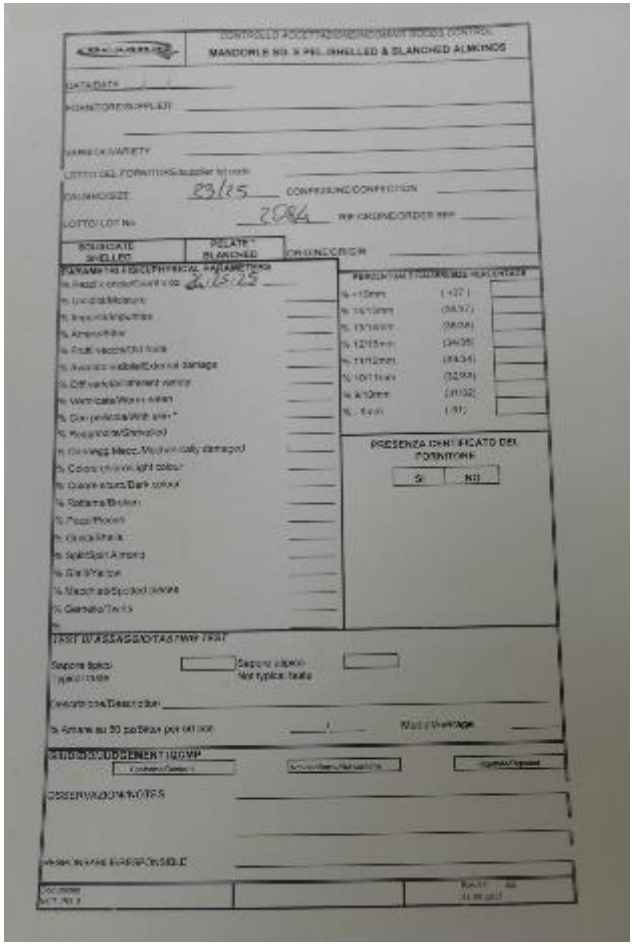
Illustration: In order to check the size, the reduced sample of 3 x 30 g (≈ 1 ounce) is taken from the composite sample. This sample size is determined by the industry.



3.6.4 Verification of the size

The characteristics of the produce shall be checked for conformity with the minimum requirements, classification, sizing, and uniformity according to the provisions of the standard. This shall be done on the basis of the reduced sample.

Illustration: The indicated size is 23/25. The size checked is 24/25. The lot is in conformity.



3.6.6 Determination of inspection result (1)

Illustration: Example of an inspection sheet.
In this case: The indicated size is 23/25. The size checked is 24/25/25.

3.5 Size of the reduced sample (2)

The reduced sample is taken from the composite sample and must comprise at least:

- **2 x 1 kg but at least 2 x 100 units in case of nut kernels**

Illustration: In order to check the size, the reduced sample 1000g (1 kg) is taken from the composite sample.

3.6.5 Verification of characteristics of the produce (1)

The general appearance of the produce shall be checked for conformity with the minimum requirements, classification and uniformity according to the provisions of the standard. This shall be done on the basis of the reduced sample.

Illustration: The almond kernels are checked for defects.

3.6.5 Verification of characteristics of the produce (2)

The general appearance of the produce shall be checked for conformity with the minimum requirements, classification and uniformity according to the provisions of the standard. This shall be done on the basis of the reduced sample.

Illustration: The defective almond kernels are set aside.

3.6.6 Determination of inspection result (2)

Illustration

16 or 20 g doubles and twins
2 or 3 g = shrivelled; i.e. tough portions exceeding 25 % of the kernel
3 pieces, i.e. more than 1/8 missing
4 dark kernels, i.e. discolouration exceeding 20 % of the surface
5 mechanical damage; i.e. less than 1/8 missing = no defect
32 scratched kernels; i.e. less than1/8 missing = no defect

3.6.6 Determination of inspection result

The result of inspection is representative for the lot, as all samples (primary, secondary and reduced sample) are taken at random.

In the case where defects are detected, the inspector shall determine the respective percentage of the produce not in conformity with the standard by number or weight – as specified in the standard.

If the percentage of defects found is close +/- 10 percent to the tolerance another bulk sample, equal in number to the first sample, must be checked. The overall result is reported as an average of the two checks.

The final result is given as a rounded integer.

3.6.6 Determination of inspection result (3)

Result of the inspection of one bulk sample:

	Reduced Sample 1000 g		
Defect	**Weight**	**Percentage**	**Conform with Class I**
Doubles, twins	*20 g*	*2 %*	*Yes*
Splits, broken	*2 g*	*0.2 % ≡ 0 %*	*Yes*
Shrivelled kernels	*3 g*	*0.3 % ≡ 0 %*	*Yes*
Dark colour	*6 g*	*0.6 % ≡ 1 %*	*Yes*

3.6.6 Determination of inspection result (4)

Result of the inspection:

100 % incomplete labelling (address of dispatcher and class are missing)

2 % doubles and twins – in conformity (standard 15 % for Class I)
0 % split and broken kernels – in conformity (standard 3 % for Class I)
0 % shrivelled kernels – in conformity (standard 2 % for Class I)
1 % dark kernels – in conformity (standard 3 % for Class I)

The lot is not in conformity with the standard. As the bulk sample of 5 primary samples is of the appropriate size to state a non-conformity. A non-conformity report must be issued.

Possible follow-up:

Correction of the labelling – add address and class.

Example 3

Inspection of Dried Grapes

Size of the lot: 22,000 kg net weight
1,760 cartons à 12.5 kg each

The lot is checked for conformity with
UNECE STANDARD DDP-11 (2016) FOR DRIED GRAPES

2.5 Presentation of produce

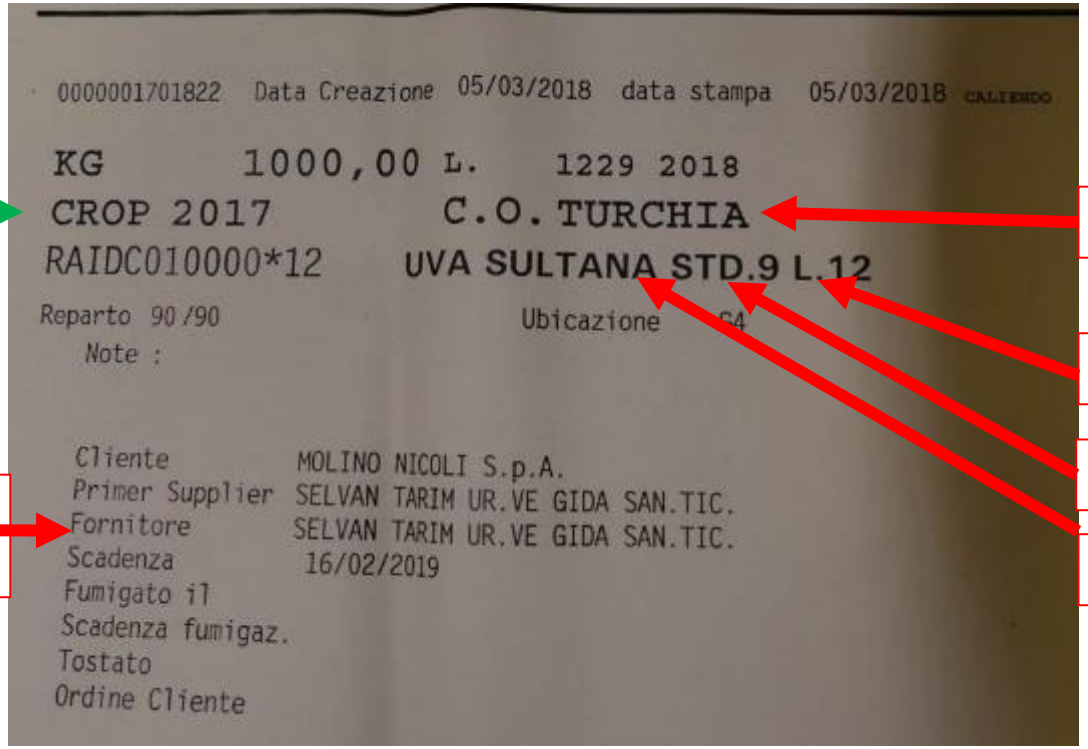
The presentation of the lot is made by the trader as well as the supply of all information deemed necessary for the identification of the consignment or lot and for the inspection.

Illustration: Primary samples are selected by the inspector and presented by the trader.

3 Sampling

The inspector selects at random primary samples to be selected

Illustration: Primary samples must be taken from different pallets of the lot and from different places within the pallet. – Cartons are restacked to take the primary samples from different parts of the pallet.



Crop year

Name of dispatcher

Country of origin

Size

Class: Standard

Nature of produce

3.6.2 Verification of marking (1)

The marking shall be checked for correctness, completeness and readability according to the provisions of the standard. This shall be done on the basis of primary samples.

Illustration: The obligatory indications on the label of the pallet are highlighted in red, the optional indications in green.

Result of inspection: Missing indications: class and address of the dispatcher.

Name of dispatcher ***Nature of produce*** ***Country of origin***

3.6.2 Verification of marking (2)

The marking shall be checked for correctness, completeness and readability according to the provisions of the standard. This shall be done on the basis of primary samples.

Illustration: The obligatory indications on the package are highlighted in red.

Result of inspection: Missing indications: class and size.

3.1 Bulk sample in case of initial sampling

The inspector shall determine the size of the bulk sample in such a way as to be able to assess the lot.

The inspector shall select a minimum of 5 samples for lots up to 1000 packages and a minimum of 10 samples for lots over 1000 packages to test conformity;

Illustration: In this case the inspector decided to take 3 samples only – as because of previous inspection results he/she did see a low risk for non-conformity.

3.6.1 Verification of packaging and presentation

The packaging, including the material used within the package, shall be checked for suitability and cleanliness according to the provisions of the relevant standard. This shall be done on the basis of primary samples, in case of packed produce. If only certain types of packaging or presentation are permitted, the inspector checks whether these are being used. Moreover, this check is used to get a general impression of the lot.

Illustration: The overall appearance of the content of the primary samples is checked.

3.3 Size of the secondary sample (1)

In the case of packed produce, secondary samples have to be taken from each primary sample to constitute the composite sample.

Illustration: The secondary sample has to be taken at randomly from the primary sample. In case of sticky produce such as dried grapes, the produce must be loosened before the secondary sample can be taken. – An other option would be to open some of the primary samples on the bottom side to get secondary samples from those parts as well.

3.3 Size of the secondary sample (2)

In the case of packed produce, secondary samples have to be taken from each primary sample to constitute the composite sample.

Illustration: The content of the primary sample has been loosened. The secondary sample can be taken at randomly.

3.3 Size of the secondary sample (3)

In the case of packed produce, secondary samples have to be taken from each primary sample to constitute the composite sample. The minimum size of the secondary sample taken from each primary sample shall be

- **between 300 g and 1 kilo, in case the produce is packed loose in the package.**

Illustration: The size of the secondary sample must be such that all secondary samples taken from all primary samples, finally make a composite sample of at least 3 kg.

3.4 Size of the composite sample

The composite sample should be at least 3 kg. Produce in the composite sample must be evenly mixed.

Illustration: Mixing the composite sample evenly.

Note:
originally 2 x 1 kg was the reduced sample size for dried grapes. With the proposal from Turkey, it would be 100 g.
We would need a new photo.

3.5 Size of the reduced sample (analytical sample) (1)
The reduced sample is taken from the composite sample and must comprise at least 1000 g in case of dried grapes.

Illustration: Two bowls are filled with 1 kg of dried grapes making the reduced sample.

3.6.4 Verification of the size

~~From the composite sample , the reduced sample as determined in section 3.5 is taken and the~~ The number of units making this reduced sample are counted. The result is – when necessary – given as an equivalent to 1,000 g.

Illustration: To check for correct sizing, the number of dried grapes per 100 g are counted. Result 223 units per 100 g.

Note:
originally 1 kg was the reduced sample size for dried grapes. With the proposal from Turkey, it would be 100 g.
We could delete this photo as already covered by slide 68.

3.5 Size of the reduced sample (analytical sample) (2)

The reduced sample is taken from the composite sample and must comprise at least 1000 g in case of dried grapes.

Illustration: The reduced sample consists of 2 x 1 kg. The first kg is checked for defects.

Note:
originally 1 kg as part of the reduced sample should be checked for quality defects. With the proposal from Turkey, it would be 100 g.
We would need a new photo as the sample on the tray is more than 100 g and the inspection results would have to be replaced.

3.6.5 Verification of characteristics of the produce

Illustration: The defects found in the first kg are set a side.

3.6.6 Determination of inspection result

The result of inspection is representative for the lot, as all samples (primary, secondary and reduced sample) are taken at random.

In the case where defects are detected, the inspector shall determine the respective percentage of the produce not in conformity with the standard by number or weight – as specified in the standard.

If the percentage of defects found is close +/- 10 percent to the tolerance another bulk sample, equal in number to the first sample, must be checked. The overall result is reported as an average of the two checks.

The final result is given as a rounded integer.

3.6.6 Determination of inspection result (1)

Result of the inspection of the bulk sample made of three primary samples:

Defect	*Reduced sample*		*Percentage*
Sugared	*10 g*	*14 g*	*2.4 ≡ 2 %*
Shrivelled	*6 g*	*8 g*	*1.4 ≡ 1 %*
Damaged	*7 g*	*7 g*	*0.7 ≡ 1 %*
Sunburn	*5 g*	*9 g*	*0.7 ≡ 1 %*
Sample size	*1,000 g*	*1,000 g*	

3.6.6 Determination of inspection result (2)

Result of the inspection:

100 % incomplete labelling (address of dispatcher, class and size are missing)

2 % sugared dried grapes – in conformity (standard 2 % for Class I)

1 % shrivelled dried grapes – in conformity (standard 3 % for Class I)

1 % damaged – in conformity (standard 3 % for Class I)

1 % sunburn– in conformity (standard 3 % for Class I)

The lot is not in conformity with the standard. As the bulk sample of 5 primary samples is of the appropriate size to state a non-conformity. A non-conformity report must be issue.

Possible follow-up: Correction of the labelling – add address and class. In case the lot is going to be re-packed in sales packages, the inspector may decide that the correct labelling must only be done after re-packing.

Example 4

Inspection of Dried Grapes in Izmir

Size of the lot: xx kg net weight
xx bags à xx kg

The lot is checked for conformity with
UNECE STANDARD DDP-11 (2016) FOR DRIED GRAPES

2.3 Place of inspection

A conformity check may be carried out during the packing operation at the point of dispatch, during transport, at the point of destination.

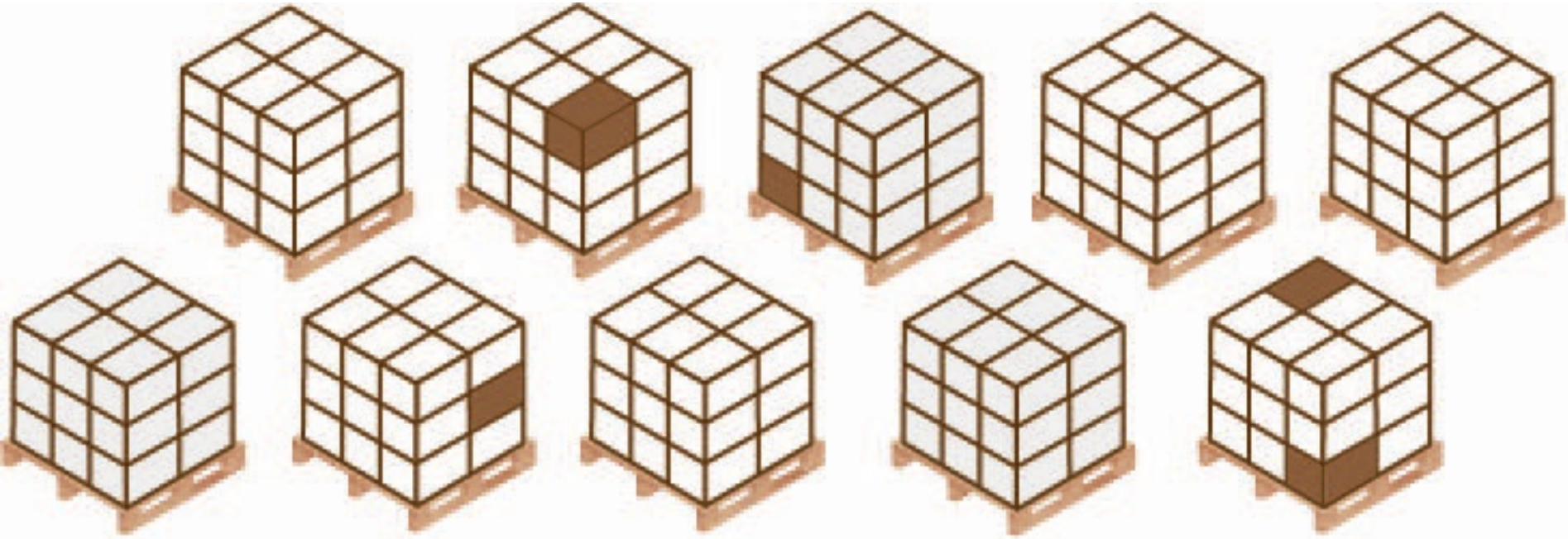
In cases where the authorised service does not carry out the conformity check in their own premises, the trader shall provide facilities enabling the conduct of a conformity check.

Ilustration: Example of place of inspection.

2.5 Presentation of produce

The presentation of the lot is made by the trader as well as the supply of all information deemed necessary for the identification of the consignment or lot and for the inspection.

Illustration: Primary samples are presented by the trader and selected by the inspector.



3 Sampling (1)

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

The inspector selects at random the primary samples to be inspected.

Illustration: Primary samples must be selected at random from the lot and they must be taken from different pallets of the lot.

3 Sampling (2)

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

The inspector selects at random the primary samples to be inspected.

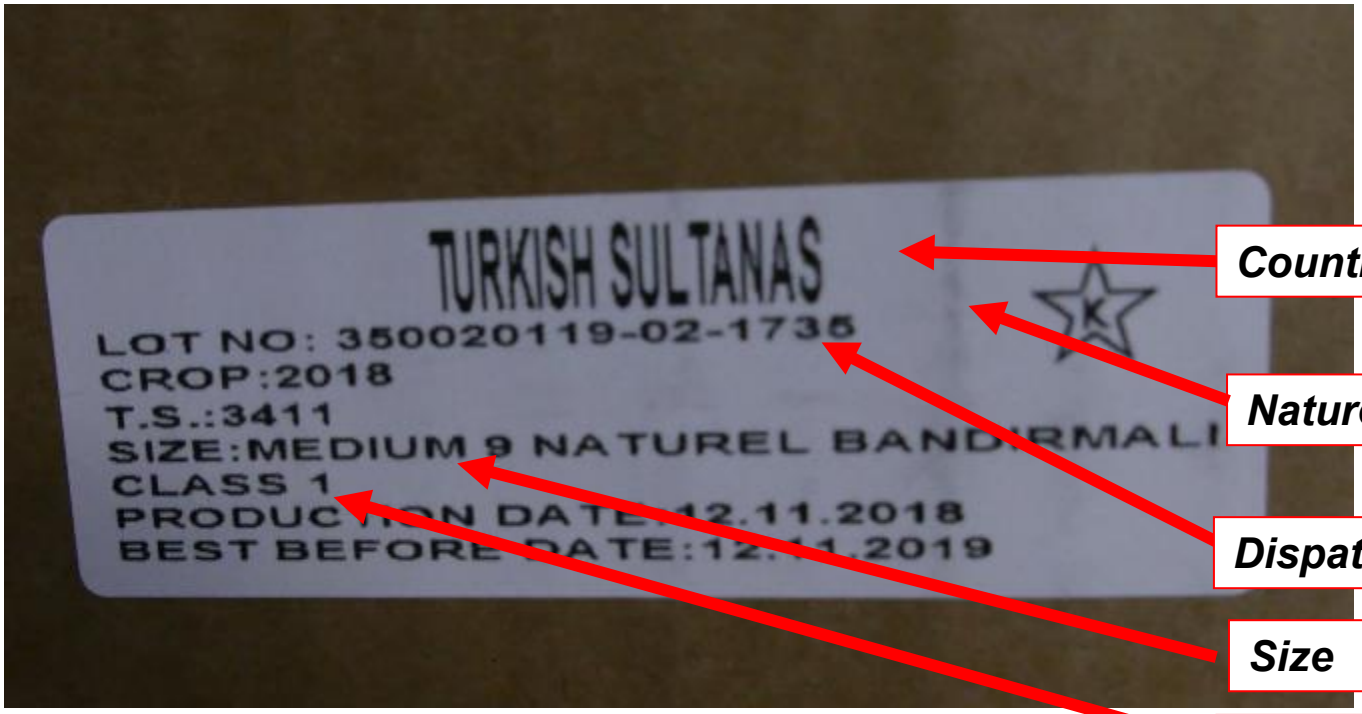
Illustration: The inspector marks the cartons to be taken as primary samples

3 Sampling (3)

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

The inspector selects at random the primary samples to be inspected.

Illustration: Primary samples must be selected at random from the lot and they must be taken from different pallets of the lot. – Cartons are restacked to take the primary samples from different parts of the pallet.



3.6.2 Verification of marking

The marking shall be checked for correctness, completeness and readability according to the provisions of the standard. This shall be done on the basis of primary samples.

Illustration: The obligatory indications on the label of the pallet are highlighted in red, the optional indications in green.

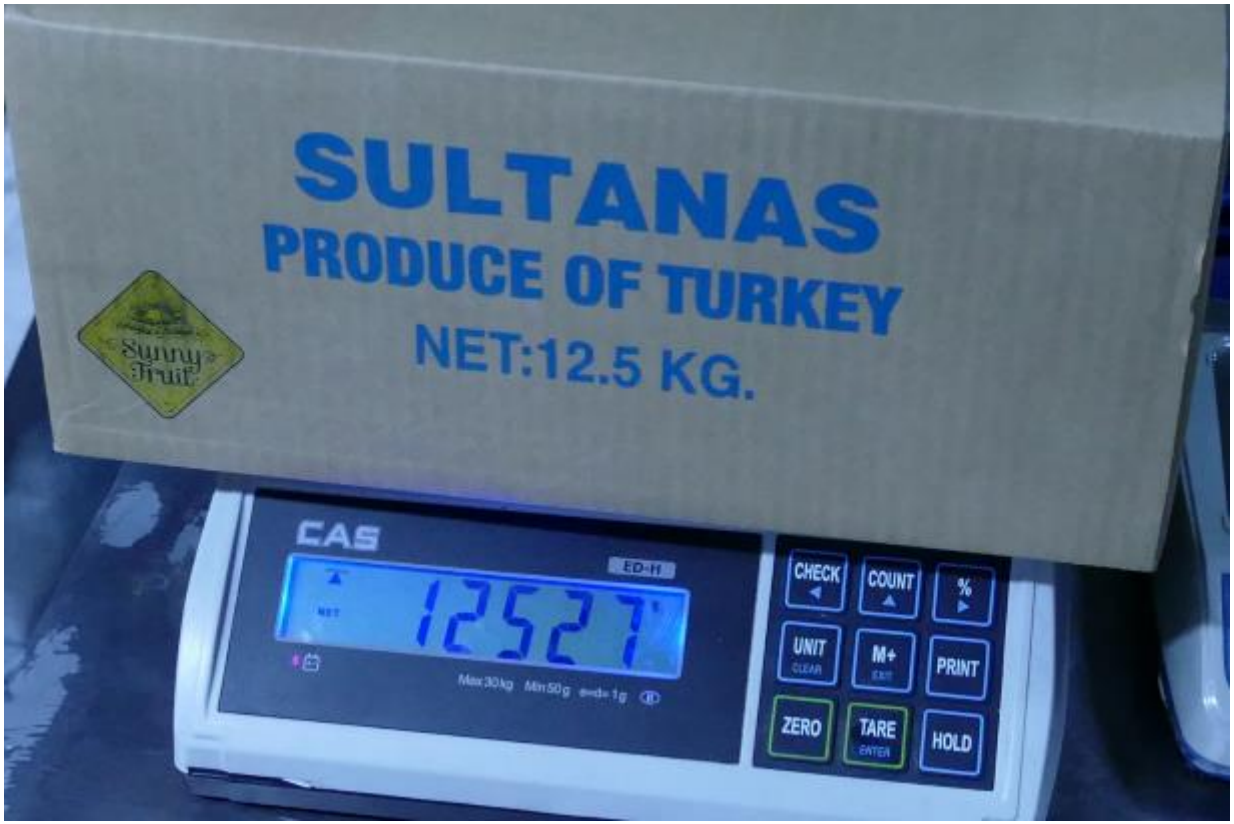
Result of inspection: The name and physical address of the dispatcher are missing, but they may be replaced by an official code. This is the case on this example: Turkey issues an official lot number and provides the respective information in the UNECE code mark registry (http://www.unece.org/trade/agr/codemarkregistry.html). Thus, the labelling is in conformity with the standard.

3.1 Bulk sample in case of initial Sampling

The inspector shall determine the size of the bulk sample in such a way as to be able to assess the lot.

The inspector shall select a minimum of 5 samples for lots up to 1000 packages and a minimum of 10 samples for lots over 1000 packages to test conformity;

Illustration: Due to the size of the lot, the inspector decides to select 9 primary samples.



3.6.1 Verification of packaging and presentation (1)

The packaging, including the material used within the package, shall be checked for suitability and cleanliness according to the provisions of the relevant standard. This shall be done on the basis of primary samples, in case of packed produce.

Illustration: After fixing the tare weight, the net weight of each primary sample is checked.

3.6.1 Verification of packaging and presentation (2)

The packaging, including the material used within the package, shall be checked for suitability and cleanliness according to the provisions of the relevant standard. This shall be done on the basis of primary samples, in case of packed produce.

Illustration: The overall appearance of all primary samples is checked.

3.3 Size of the secondary sample (1)

In the case of packed produce, secondary samples have to be taken from each primary sample to constitute the composite sample.

Illustration: In case of sticky produce such as dried grapes, the produce must be loosened before the secondary sample can be taken. – The primary sample is completely emptied and loosened.

3.3 Size of the secondary sample (2)

In the case of packed produce, secondary samples have to be taken from each primary sample to constitute the composite sample.

Illustration: The content of the primary sample has been loosened. The content is checked for foreign material loose in the package.

3.3 Size of the secondary sample (3)

In the case of packed produce, secondary samples have to be taken from each primary sample to constitute the composite sample. The minimum size of the secondary sample taken from each primary sample shall be between 300 g and 1 kilo, in case the produce is packed loose in the package.

Illustration: From each of the first two primary samples a secondary sample of about 1 kg has been taken and placed in the corner of the inspection table. On the photo, the inspector is checking the third primary sample.

3.4 Size of the composite sample

The composite sample should be at least 3 kg. Produce in the composite sample must be evenly mixed.

Illustration: The composite sample consisting of 9 secondary samples is mixed.

3.5 Size of the reduced sample (analytical sample) (1)

The composite sample should be at least 3 kg. Produce in the composite sample must be evenly mixed.

Illustration: To allow a good mixture, from the composite sample, about 1000 g of dried grapes are taken at random. From this 1000 g, the reduced sample of 100 g is taken.

3.5 Size of the reduced sample (analytical sample) (2)

The reduced sample is taken from the composite sample and must comprise at least 100 g in case of dried grapes.

Illustration: The reduced sample weighed to verify that at least 100 g is taken.

Example 4

3.6.4 Verification of the size

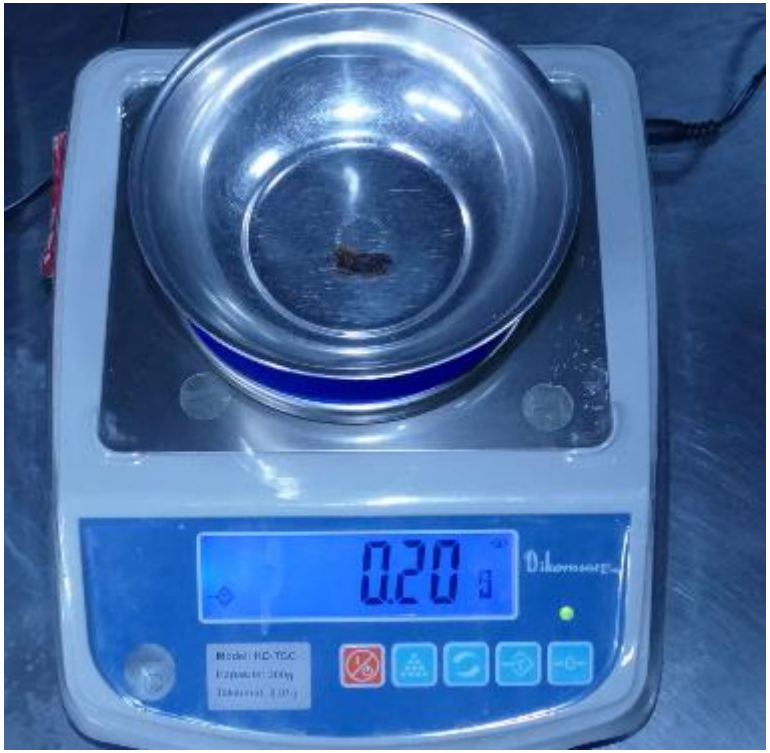
The number of units making this reduced sample are counted. The result is – when necessary – given as an equivalent to 1,000 g.

Illustration: Verifying the correct sizing, by counting the number of dried grapes in the reduced sample of 100 g. Result: 348 units per 100 g;
Indication on the label: Medium = 320-380 units per 100 g; the size is in conformity

3.6.5 Verification of characteristics of the produce (1)

The characteristics of the produce shall be checked for conformity with the minimum requirements, classification, sizing, and uniformity according to the provisions of the standard. This shall be done on the basis of the reduced sample.

Illustration: Verifying the correct quality, by checking the defective units in the reduced sample of 100 g



3.6.5 Verification of characteristics of the produce (2)

Illustration: Defective dried grapes found in 100 g are weighed. Here 0,2 g mouldy.

3.6.6 Determination of inspection result

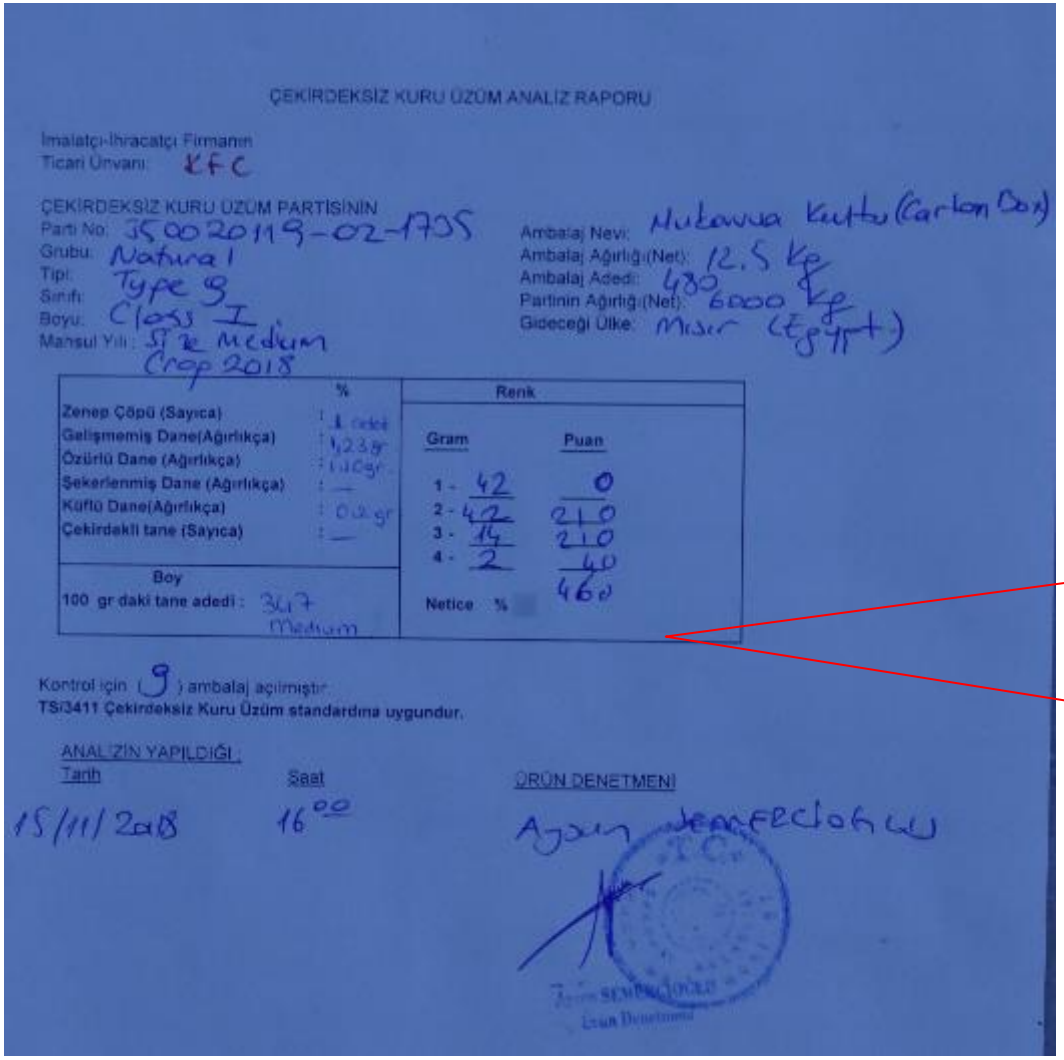
The result of inspection is representative for the lot, as all samples (primary, secondary and reduced sample) are taken at random.

In the case where defects are detected, the inspector shall determine the respective percentage of the produce not in conformity with the standard by number or weight – as specified in the standard.

If the percentage of defects found is close +/- 10 percent to the tolerance another bulk sample, equal in number to the first sample, must be checked. The overall result is reported as an average of the two checks.

The final result is given as a rounded integer.

Example 4



ÇEKİRDEKSİZ KURU ÜZÜM ANALİZ RAPORU

İmalatçı-İhracatçı Firmanın
Ticari Ünvanı: KFC

ÇEKİRDEKSİZ KURU ÜZÜM PARTİSİNİN
Parti No: 35002019-02-1735
Grubu: Natural
Tipi: Type 9
Sınıfı: Class I
Boyu: Size Medium
Mahsul Yılı: Crop 2018

Ambalaj Nevi: Mukavva Kutu (Carton Box)
Ambalaj Ağırlığı(Net): 12.5 Kg
Ambalaj Adedi: 480
Partinin Ağırlığı(Net): 6000 Kg
Gideceği Ülke: Misir (Egypt)

	%
Zenep Çöpü (Sayıca)	1 adet
Gelişmemiş Dane(Ağırlıkça)	1,23 gr
Özürlü Dane (Ağırlıkça)	1,1 gr
Şekerlenmiş Dane (Ağırlıkça)	—
Küflü Dane(Ağırlıkça)	0,2 gr
Çekirdekli tane (Sayıca)	—

Boy
100 gr daki tane adedi: 367 Medium

Renk

Gram	Puan
1 - 42	0
2 - 42	210
3 - 14	210
4 - 2	40
	460

Netice %

Kontrol için (9) ambalaj açılmıştır.
TS/3411 Çekirdeksiz Kuru Üzüm standardına uygundur.

ANALİZİN YAPILDIĞI:
Tarih: 15/11/2018
Saat: 16.00

ÜRÜN DENETMENİ
Ayşen [illegible]

List of defects:

1. ***Uniformity of colour; not covered by the UNECE standard***
2. ***Undeveloped berries***
3. ***Mechanical damage***
4. ***Mouldy***

3.6.6 Determination of inspection result (1)

The result is presented in the inspection report.

3.6.6 Determination of inspection result (2)

Result of the inspection of the reduced sample:

Defect	*Reduced sample of 100 g*	*Percentage calculated on the basis of 100 g*	*In conformity with Class I*
Underdvelopped	*1.23 g*	*1.2 ≡ 1 %*	*Yes*
Mechanical damage	*1.4 g*	*1.4 ≡ 1 %*	*Yes*
Mouldy	*0.2 g*	*0.2 ≡ 0 %*	*Yes*
Captsem	*1*	*1 in 100 g*	*Yes*

3.6.6 Determination of inspection result (3)

Result of the inspection:

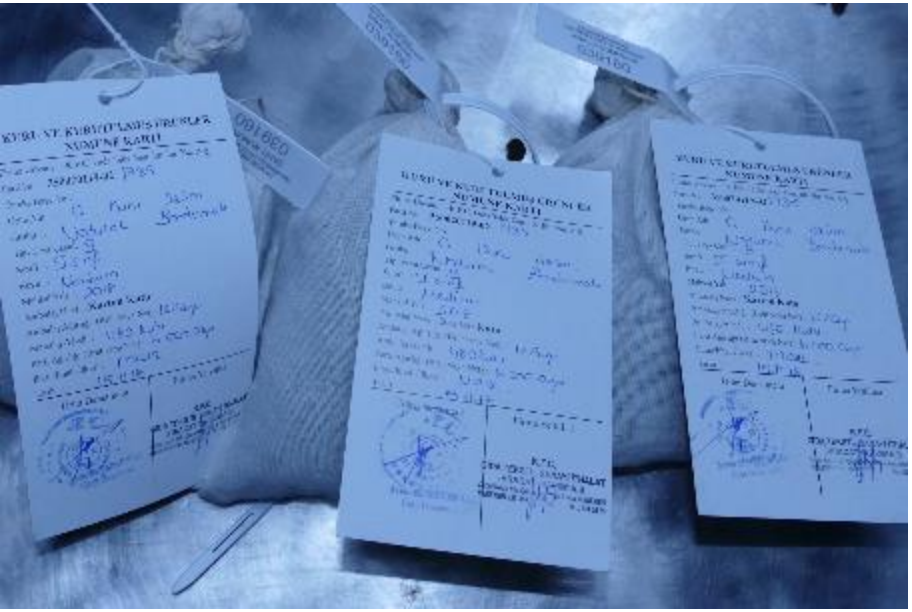
100 % correct labelling
100 % correct size
0 % mouldy – in conformity (standard 3 % for Class I)
1 % mechanical damage – in conformity (standard 3 % for Class I)
1 % underdeveloped – in conformity (standard 3 % for Class I)
1 capstem attached – in conformity (standard 4 in 100 g)

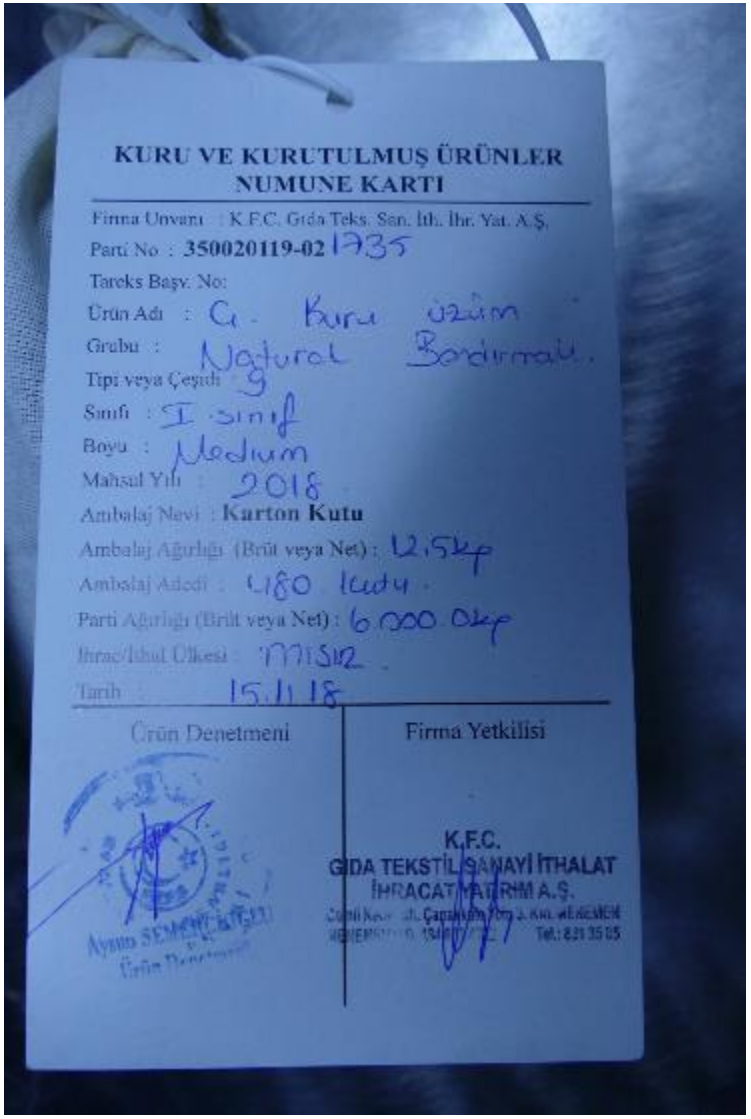
The lot is in conformity with the standard. A conformity certificate may be issued.

Example 4

3 samples for laboratory analysis are taken

Example 4





3 samples for laboratory analysis are taken

Example 5

Inspection of Dried Apricots in Izmir

Size of the lot: 200 cartons à 12.7 kg = 2,540 kg total weight

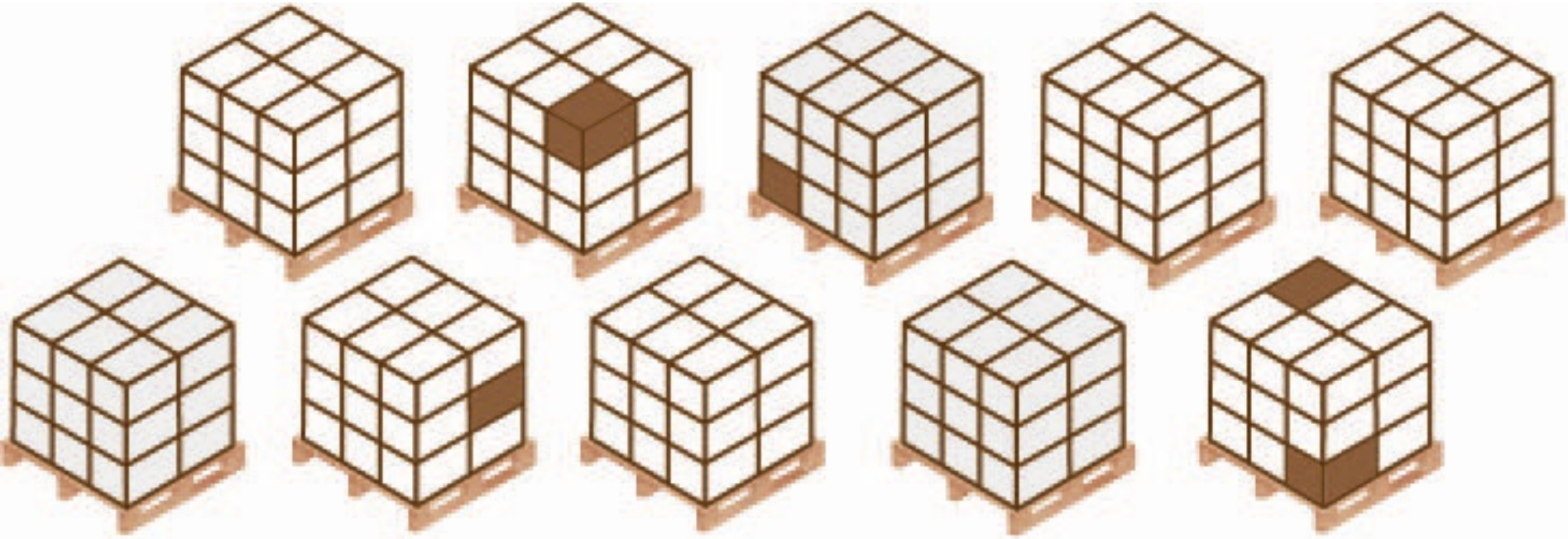
7 cartons are taken as bulk sample.
Note: With respect to the lot size, a minimum of 7 packages must have been examined before a can be declared unsatisfactory.

The lot is checked for conformity with
UNECE STANDARD DDP-15 (2016) FOR DRIED APRICOTS

2.5 Presentation of produce

The presentation of the lot is made by the trader as well as the supply of all information deemed necessary for the identification of the consignment or lot and for the inspection.

Illustration: Primary samples are presented by the trader and selected by the inspector.



3 Sampling (1)

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

The inspector selects at random the primary samples to be inspected.

Illustration: Primary samples must be selected at random from the lot and they must be taken from different pallets of the lot.

Example 5

3 Sampling (2)

A conformity check shall be made by assessing bulk or composite samples. It is based on the principle that the quality of the randomly taken samples is representative of the quality of the lot.

The inspector selects at random the primary samples to be inspected.

Illustration: Primary samples must be selected at random from the lot and they must be taken from different pallets of the lot. – Cartons are restacked to take the primary samples from different parts of the pallet.

Example 5

Nature of produce

Dispatcher Code is integrated in the lot-number (first 9 digits) and Turkey is registered in the UNECE code mark registry.

Crop year

Class

Best before

Size & colour

Country of origin

3.6.2 Verification of marking

Illustration: The obligatory indications on the label of the pallet are highlighted in red, the optional indications in green.

Result of inspection: The name and physical address of the dispatcher are missing, but they may be replaced by an official code. This is the case on this example: Turkey issues an official lot number and provides the respective information in the UNECE code mark registry (http://www.unece.org/trade/agr/codemarkregistry.html). Thus, the labelling is in conformity with the standard.

Example 5

3.1. Bulk sample in case of initial sampling

The inspector shall determine the size of the bulk sample in such a way as to be able to assess the lot.

Illustration: Due to the size of the lot (200 packages), the inspector decides to select 7 primary samples. Thus, in case of non-conformity an additional sampling will not be necessary.

Example 5

3.6.1 Verification of packaging and presentation (1)

The packaging, including the material used within the package, shall be checked for suitability and cleanliness according to the provisions of the relevant standard. This shall be done on the basis of primary samples, in case of packed produce.

Illustration: After fixing the tare weight, the net weight of each primary sample is checked.

Example 5

3.6.1 Verification of packaging and presentation (2)

The packaging, including the material used within the package, shall be checked for suitability and cleanliness according to the provisions of the relevant standard. This shall be done on the basis of primary samples, in case of packed produce.

Illustration: The general appearance of all primary samples is checked.

3.3 Size of the secondary sample

In the case of packed produce, secondary samples have to be taken from each primary sample to constitute the composite sample.

Illustration: In case of sticky produce such as dried apricots, the produce must be loosened before the secondary sample can be taken. – The primary sample is completely emptied and loosened. In the corner of the inspection table: The secondary sample set aside from the first primary sample – about 2 kg.

3.4 Size of the composite sample (1)

The composite sample should be at least 1 kg in case of dried apricots and products of equivalent size.

Illustration: The composite sample is made of the secondary samples (here about 2 kg each) of 7 primary samples – composite sample about 14 kg.

3.4 Size of the composite sample (2)

The composite sample should be at least 3 kg. Produce in the composite sample must be evenly mixed.

Illustration: The composite sample consisting of 7 secondary samples is evenly mixed.

Example 5

3.5 Size of the reduced sample

The reduced sample is taken from the composite sample and must comprise at least:

- ***1,000 g when these 1,000 g contain more than 100 units***
- ***2,000 g when these 2,000 g contain more than 100 units.***

Illustration: The reduced sample of 997 g is taken from the composite sample.

3.6.4 Verification of the size

The number of units making this reduced sample are counted. The result is – when necessary – given as an equivalent to 1,000 g.

Illustration: Verifying the correct size, by counting the number of dried apricots in the reduced sample of 997 g. Result: 155 units per 997 g
(indicated on the label: size = 4 = 141-160 units per kg)

3.6.5 Verification of characteristics of the produce (1)

The characteristics of the produce shall be checked for conformity with the minimum requirements, classification, sizing, and uniformity according to the provisions of the standard. This shall be done on the basis of the reduced sample.

Illustration: Verifying the correct quality, by counting the number of dried apricots in the reduced sample of 997 g.

3.6.5 Verification of characteristics of the produce (2)

Illustration: Defective dried apricots found in 1,000 g are weighed; here 41 g dried apricots affected by serious sunburn.

3.6.6 Determination of inspection result

The result of inspection is representative for the lot, as all samples (primary, secondary and reduced sample) are taken at random.

In the case where defects are detected, the inspector shall determine the respective percentage of the produce not in conformity with the standard by number or weight – as specified in the standard.

If the percentage of defects found is close +/- 10 percent to the tolerance another bulk sample, equal in number to the first sample, must be checked. The overall result is reported as an average of the two checks.

The final result is given as a rounded integer.

3.6.6 Determination of inspection result (1)

Result of the inspection of the reduced sample:

The tolerances may be determined by weight or by number

	By weight		By number	
Defect	***Reduced sample of 997 g***	***Percentage***	***Reduced sample 155 units***	***Percentage***
Substantial defects in colour or texture, heat injury and sunburn	***41 g***	***4.1 ≡ 4 %***	***7***	***4.5 ≡ 5 %***
Spotted	***17 g***	***1.7 ≡ 2 %***	***3***	***1.9 ≡ 2 %***
Lesion and calluses	***8 g***	***0.8 ≡ 1 %***	***1***	***0.6 ≡ 1 %***

3.6.6 Determination of inspection result (2)

Result of the inspection – tolerances determined by weight:
4 % substantial defects in colour or texture, heat injury and sunburn – in conformity (standard 8 % for Class I)
2 % spotted – in conformity (standard 5 % for Class I)
1 % lesions and calluses – in conformity (standard 6 % for Class I)

Result of the inspection – tolerances determined by number:
5 % substantial defects in colour or texture, heat injury and sunburn – in conformity (standard 8 % for Class I)
2 % spotted – in conformity (standard 5 % for Class I)
1 % lesions and calluses – in conformity (standard 6 % for Class I)

The lot is in conformity with Class I. A conformity certificate may be issued.

Example 5

3 samples à 1,000 g are taken for laboratory analysis

Open Questions

Interpretation of the standard for walnuts:

1) In case of inshell walnuts: An explanatory note should be developed to differentiate between “mould filaments visible to the naked eye” and “duvet” and to define on how to assess these defects when evaluating the sample. (see photos below)
2) The standard says: “In the calculation of tolerances, whatever the class, two half-empty walnuts or four quarter-empty walnuts are counted as one empty walnut.” Does this apply to shriveled kernels as well?

3.5 Size of reduced sample (analytical sample)

If the proposal form Turkey is accepted: 100g for dried grapes. We have to check whether and how to amend examples 3 and 4.

3.6.4 Verification of the size

"If size is by size range, from the composite sample the triple amount of the reduced sample is taken and the sieved in accordance with the size range indicated."

In case of example 1 (inshell walnuts) the size range is checked for conformity by taking exactly the reduced sample of 200 nuts. Pursuant to the sampling plan it should have been 600 nuts.

Do we have to amend the sampling plan or to do the sampling or at least the calculation for walnuts (based on 600 instead of 200) again?

3.6.4 Verification of the size

"The size indicated on the package may be checked by one of the following methods. If size is by count:
Option2: From the composite sample, the reduced sample as determined in section 3.5 is taken and the number of units making this reduced sample are counted. The result is – when necessary – given as an equivalent to 1,000 g."

In case of example 2 (almond kernels) the size is checked for conformity by taking 3 x 30 g. This is not in line exactly with the provisions. 1 kg is the reduced sample for nut kernels.

Do we have to amend the sampling plan or to re-do the example on checking the size in example for almond kernels?

3.6.5 Verification of the size

"The size indicated on the package may be checked by one of the following methods. If size is by count:
Option2: From the composite sample, the reduced sample as determined in section 3.5 is taken and the number of units making this reduced sample are counted. The result is – when necessary – given as an equivalent to 1,000 g."

In case of example 2 (almond kernels) the size is checked for conformity by taking 3 x 30 g. This is not in line exactly with the provisions. 1 kg is the reduced sample for nut kernels.

Do we have to amend the sampling plan or to re-do the example on checking the size in example for almond kernels?

3.5 Size of the reduced sample (analytical sample)
"The reduced sample is taken from the composite sample and must comprise at least:
e.g. 1000g for dried apricots"

In example 5: We need an explanatory note, why 997 g can be accepted as reduced (analytical) sample while the sampling plan requires at least 1000g. Is there a certain percentage above and below the defined sample size acceptable? If yes, we should define this in the sampling plan.

How to determine the percentage of foreign matter or extraneous vegetable material in a package? Empty each primary sample (which could be a big bag)?

2.8.1 Verification of packaging and presentation

The packaging, including the material used within the package, shall be checked for suitability and cleanliness according to the provisions of the relevant standard. This shall be done on the basis of primary samples.