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## ANNEX

Annex I to Regulation (EU) No 1272/2009 is amended as follows:

- Parts II to V are replaced by the following:

### PART II

#### Minimum quality requirements referred to in Part I

	<b>Durum wheat</b>	<b>Common wheat</b>	<b>Barley</b>	<b>Maize</b>	<b>Sorghum</b>
<b>A. Maximum moisture content</b>	14,5 %	14,5 %	14,5 %	13,5 %	13,5 %
<b>B. Maximum percentage of matter which is not basic cereal of unimpaired quality</b>	12 %	12 %	12 %	12 %	12 %
<b>1. Broken grains</b>	6 %	5 %	5 %	5 %	5 %
<b>2. Grain impurities</b>	8,5 %	7 %	12 %	5 %	5 %
<b>2.1. Impurities other than mottled grains</b>	5 %	7 %	12 %	5 %	5 %
<b>(a) shrivelled grains</b>	X	X	X	n.a.	n.a.
<b>(b) other cereals</b>	3 %	X	5 %	X	X
<b>(c) grains damaged by pests</b>	X	X	X	X	X
<b>(d) grains in which the</b>	X	X	n.a.	n.a.	n.a.

**a** of which maximum 3 % for impurities other than grains affected by fusariosis.

**b** As a percentage of dry matter.

“X” indicates analysis required without specific limit but content to be taken into account for maximum limits set in points 2 and 4 of the table.

“n.a.”: not applicable, not requiring analysis.

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<b>germ is discoloured</b>					
<b>(e) grains overheated during drying</b>	0,5 %	0,5 %	3 %	0,5 %	0,5 %
<b>2.2. Mottled grains</b>	3,5 %	n.a.	n.a.	n.a.	n.a.
<b>3. Sprouted grains</b>	4 %	4 %	6 %	6 %	6 %
<b>4. Miscellaneous impurities</b>	4,5 % <sup>a</sup>	3 %	3 %	3 %	3 %
<b>of which:</b>					
<b>(a) extraneous seeds:</b>					
— <b>noxious</b>	0,1 %	0,1 %	0,1 %	0,1 %	0,1 %
— <b>other</b>	X	X	X	X	X
<b>(b) damaged grains</b>					
— <b>grains damaged by spontaneous heating or too extreme heating during drying</b>	0,05 %	0,05 %	X	X	X
— <b>grains affected with fusariosis</b>	1,5 %	X	X	X	X
— <b>other</b>	X	X	X	X	X
<b>(c) extraneous matter</b>	X	X	X	X	X

**a** of which maximum 3 % for impurities other than grains affected by fusariosis.

**b** As a percentage of dry matter.

“X” indicates analysis required without specific limit but content to be taken into account for maximum limits set in points 2 and 4 of the table.

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<b>(d) husks (cob fragments in the case of maize)</b>	X	X	X	X	X
<b>(e) ergot</b>	0,05 %	0,05 %	n.a.	n.a.	n.a.
<b>(f) decayed grains</b>	X	X	n.a.	n.a.	n.a.
<b>(g) impurities of animal origin</b>	X	X	X	X	X
<b>C. Maximum percentage of wholly or partially mitadiné grains</b>	27 %	n.a.	n.a.	n.a.	n.a.
<b>D. Maximum tannin content<sup>b</sup></b>	n.a.	n.a.	n.a.	n.a.	1 %
<b>E. Minimum specific weight (kg/hl)</b>	78	73	62	n.a.	n.a.
<b>F. Minimum protein content<sup>b</sup></b>	11,5 %	10,5 %	n.a.	n.a.	n.a.
<b>G. Hagberg falling number (seconds)</b>	220	220	n.a.	n.a.	n.a.
<b>H. Minimum Zeleny index (ml)</b>	n.a.	22	n.a.	n.a.	n.a.

**a** of which maximum 3 % for impurities other than grains affected by fusariosis.

**b** As a percentage of dry matter.

“X” indicates analysis required without specific limit but content to be taken into account for maximum limits set in points 2 and 4 of the table.

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Matter other than basic cereals of unimpaired quality is defined in Part III of this Annex.

Grains of basic cereals and other cereals which are damaged or decayed are classified as “miscellaneous impurities” even if they have defects which belong to other categories.

**PART III 1. DEFINITION OF MATTER OTHER THAN BASIC CEREALS OF UNIMPAIRED QUALITY**

**1.1. Broken grains**

For durum wheat, common wheat and barley, the definition of “broken grains” is that contained in standard EN 15587.

For maize, “broken grains” means pieces of grain or grains which pass through a sieve with a circular mesh 4,5 mm in diameter.

For sorghum, “broken grains” means pieces of grain or grains which pass through a sieve with a circular mesh 1,8 mm in diameter.

**1.2. Grain impurities**

**(a) Shrivelled grains**  
For durum wheat, common wheat and barley, the definition of “shrivelled grains” is that contained in standard EN 15587. However, for barley from Estonia, Latvia, Finland and Sweden, “shrivelled grains” means grains with a specific weight of at least 64 kilograms per hectolitre offered for, or placed in, intervention in those Member States, grains which, after elimination of all other matter referred to in this Annex, pass through sieves with apertures of 2,0 mm.

“Shrivelled grains” does not apply to maize or sorghum.

**(b) Other cereals**

For durum wheat, common wheat and barley, the definition of “other cereals” is that contained in standard EN 15587.

For maize and sorghum, “other cereals” means all grains of cultivated cereals which do not belong to the species of grain sampled.

**(c) Grains damaged by pests**

For durum wheat, common wheat and barley, the definition of “grains damaged by pests” is that contained in standard EN 15587.

For maize and sorghum, “grains damaged by pests” means all grains showing a visible deterioration attributable to attack by insects, rodents, mites or other grain pests.

**(d) Grains in which the germ is discoloured**

For durum wheat and common wheat, the definition is that contained in standard EN 15587.

“Grains in which the germ is discoloured” does apply to barley, maize or sorghum.

**(e) Grains overheated during drying**

For durum wheat, common wheat and barley, the definition of “grains overheated during drying” is that contained in standard EN 15587.

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For maize and sorghum, “grains overheated during drying” are those which show external signs of scorching but which are not damaged grains.

(f) Mottled grains

For durum wheat, the definition of “mottled grains” is that contained in standard EN 15587.

“Mottled grains” does not apply to common wheat, barley, maize or sorghum.

1.3. Sprouted grains

For durum wheat, common wheat and barley, the definition of “sprouted grains” is that contained in standard EN 15587.

For maize and sorghum, “sprouted grains” are those in which the radicle or plumule is clearly visible to the naked eye. However, account must be taken of the general appearance of the sample when its content of sprouted grains is assessed. Sprouted grains are only those where the germ has undergone clearly visible changes which make it easy to distinguish the sprouted grain from the normal grain.

1.4. Miscellaneous impurities (a) Extraneous seeds

For durum wheat, common wheat and barley, the definition of “extraneous seeds” is that contained in standard EN 15587.

For maize and sorghum, “extraneous seeds” are seeds of plants, whether or not cultivated, other than cereals. They include seeds not worth recovering, seeds which can be used for livestock but which are not cereals, and noxious seeds.

“Noxious seeds” means seeds which are toxic to humans and animals, seeds hampering or complicating the cleaning and milling of cereals and seeds affecting the quality of products processed from cereals.

(b) Damaged grains

For durum wheat, common wheat and barley, the definition of “damaged grains” is that contained in standard EN 15587.

For maize and sorghum, “damaged grains” means grains which have become unusable for livestock feed on account of putrefaction, mildew (including fusariosis), or bacterial or other causes.

“Damaged grains” also includes grains damaged by spontaneous heat generation or too extreme heating during drying; such grains are fully-grown grains in which the tegument is coloured greyish brown to black, while the cross-section of the kernel is coloured yellowish-grey to brownish-black.

In standard EN 15587, for durum wheat, common wheat and barley, the definition of “grains affected by fusariosis” is included in that of “damaged grains”.

(c) Extraneous matter

For durum wheat, common wheat and barley, the definition of “extraneous matter” is that contained in standard EN 15587.

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For maize and sorghum, all matter in a sample which passes through a sieve with apertures of 1 mm, with the exception of live and dead insects, is considered to be extraneous matter.

(d) Husks (cob fragments in the case of maize). (e) Ergots (f) Decayed grains

For durum wheat and common wheat, the definition of “decayed grains” is that contained in standard EN 15587.

“Decayed grains” does not apply to barley, maize or sorghum.

(g) Impurities of animal origin. 1.5. Live pests 1.6. Mitadiné grains

Mitadiné grains of durum wheat are grains whose kernels cannot be regarded as entirely vitreous. They are also defined in standard EN 15585.

## 2. SPECIFIC FACTORS TO TAKE INTO CONSIDERATION FOR EACH TYPE OF CEREAL FOR THE DEFINITION OF IMPURITIES

### 2.1. Durum wheat

“Grain impurities” means shrivelled grains, grains of other cereals, grains damaged by pests, grains in which the germ is discoloured, mottled grains and grains overheated during drying.

“Miscellaneous impurities” means extraneous seeds, damaged grains (including grains affected by fusariosis), extraneous matter, husks, ergot, decayed grains and impurities of animal origin.

### 2.2. Common wheat

“Grain impurities” means shrivelled grains, grains of other cereals, grains damaged by pests, grains in which the germ is discoloured (only where the content exceeds 8 %) and grains overheated during drying.

“Miscellaneous impurities” means extraneous seeds, damaged grains (including grains affected by fusariosis), extraneous matter, husks, ergot, decayed grains and impurities of animal origin.

### 2.3. Barley

“Grain impurities” means shrivelled grains, grains of other cereals, grains damaged by pests and grains overheated during drying.

“Miscellaneous impurities” means extraneous seeds, damaged grains (including grains affected by fusariosis), extraneous matter, husks and impurities of animal origin.

### 2.4. Maize

“Grain impurities” means grains of other cereals, grains damaged by pests and grains overheated during drying.

“Miscellaneous impurities” means extraneous seeds, damaged grains (including grains affected by fusariosis), extraneous matter, cob fragments and impurities of animal origin.

### 2.5. Sorghum

“Grain impurities” means grains of other cereals, grains damaged by pests and grains overheated during drying.

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“Miscellaneous impurities” means extraneous seeds, damaged grains (including grains affected by fusariosis), extraneous matter, husks and impurities of animal origin.

PART IV Methods used for determining the quality of cereals offered for, or placed in, intervention

Pursuant to Article 7, the following methods are to be used to determine the quality of cereals offered for, or placed in, intervention:

- (a) the reference method for determining matter other than basic cereals of unimpaired quality:
  - for common wheat, durum wheat and barley: standard EN 15587,
  - for maize and sorghum: the method set out in Part V of this Annex;
- (b) the reference method for determining the moisture content:
  - for maize: standard EN ISO 6540,
  - for cereals other than maize: standard EN ISO 712, or
  - an infrared technology-based method.

In the event of a dispute, only the results of standard EN ISO 6540 for maize and EN ISO 712 for cereals other than maize are to be considered valid;

- (c) the reference method for determining the tannin content of sorghum: standard ISO 9648;
- (d) the reference method for determining the non-stickiness and machinability of the dough obtained from common wheat: that set out in Part VII of this Annex;
- (e) the reference method for determining the protein content in durum wheat and ground common wheat: that set out in:
  - standard EN ISO 20483, or
  - standard CEN ISO/TS 16634-2.

In the event of a dispute, only the results obtained from applying standard EN ISO 20483 are to be considered valid;

- (f) the reference method for determining the Zeleny index of ground common wheat: that set out in standard EN ISO 5529;
- (g) the reference method for determining the Hagberg falling number (amylase activity test): that set out in standard EN ISO 3093;
- (h) the reference method for determining the rate of loss of the vitreous aspect of durum wheat: that set out in standard EN 15585;
- (i) the reference method for determining the specific weight: that set out in standard EN ISO 7971/3;
- (j) the sampling and analysis methods for establishing the rate of mycotoxins: those referred to in the Annex to Regulation (EC) No 1881/2006 and set out in Annexes I and II to Commission Regulation (EC)<sup>(1)</sup> No 401/2006

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PART V Reference method for determining matter other than basic cereals of unimpaired quality in the case of maize and sorghum. Shake an average sample of 500 g in the case of maize and 250 g in the case of sorghum for half a minute in a sieve which has slotted perforations of 1,0 mm. Check for live pests and dead insects in the fraction passed through the sieve.

Using tweezers or a spatula, extract from the matter retained by the sieve with slotted perforations of 1,0 mm stones, sand, fragments of cob or straw and other extraneous matter.

Add the extraneous matter thus extracted to the matter which has passed through the sieve with slotted perforations of 1,0 mm and weigh them together.

Using a separator, separate the fraction retained by the sieve with slotted perforations of 1,0 mm to obtain a subsample of 100 to 200 g in the case of maize or 25 to 50 g in the case of sorghum. Weigh this subsample. Spread it out in a thin layer on a table. Using tweezers or a spatula, extract the other cereals, grains damaged by pests, grains overheated during drying, sprouted grains, extraneous seeds, damaged grains, husks and impurities of animal origin. In the case of sorghum, grains still attached to the husk must be separated from the husk, the latter constituting miscellaneous impurities. Then assess the state of the grain.

Sieve the subsample from which all impurities have been removed for 30 seconds in a sieve with circular mesh 4,5 mm in diameter in the case of maize and 1,8 mm in diameter in the case of sorghum. The matter which passes through this sieve is to be considered as broken grains.

2. Groups of matter other than basic cereals of unimpaired quality, determined according to the method referred to in point 1 must be weighed very carefully to the nearest 0,01 g and distributed according to percentage over the average sample. The particulars should be entered in the analysis report to the nearest 0,1 %. Indicate the presence of live pests.

As a general rule, two analyses must be made for each sample. They must not differ by more than 10 % in respect of the total of the abovementioned matter.

3. The apparatus to be used for the operations referred to in points 1 and 2 is as follows:

- (a) sample separator, for example a conical or riffle apparatus;
- (b) precision balance capable of weighing to an accuracy of 0,01 g (i.e. with a display precision of 0,001 g);
- (c) sieves with slotted perforations of 1,0 mm and sieves with a circular mesh 1,8 mm and 4,5 mm in diameter. The sieves may be fitted to a vibrating table. Sieves must conform to standard ISO 5223..

2. Parts VI and VIII are deleted.

3. In Part XII, point 3 is replaced by the following:



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3. The reference methods to be used for determining the quality of cereals offered for, or placed in, intervention are those set out in Parts III, IV, V and VII of this Annex.

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(1) [OJ L 70, 9.3.2006, p. 12.](#)'.