

---

---

**Raw ostrich skins — Description of  
defects, guidelines for presentation and  
grading on basis of defects**

*Peaux brutes d'autruche — Description des défauts, lignes directrices  
pour la présentation et classement sur la base des défauts*



STANDARDSISO.COM : Click to view the full PDF of ISO 11398:2012



**COPYRIGHT PROTECTED DOCUMENT**

© ISO 2012

All rights reserved. Unless otherwise specified, no part of this publication may be reproduced or utilized in any form or by any means, electronic or mechanical, including photocopying and microfilm, without permission in writing from either ISO at the address below or ISO's member body in the country of the requester.

ISO copyright office  
Case postale 56 • CH-1211 Geneva 20  
Tel. + 41 22 749 01 11  
Fax + 41 22 749 09 47  
E-mail [copyright@iso.org](mailto:copyright@iso.org)  
Web [www.iso.org](http://www.iso.org)

Published in Switzerland

## Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

International Standards are drafted in accordance with the rules given in the ISO/IEC Directives, Part 2.

The main task of technical committees is to prepare International Standards. Draft International Standards adopted by the technical committees are circulated to the member bodies for voting. Publication as an International Standard requires approval by at least 75 % of the member bodies casting a vote.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights.

ISO 11398 was prepared by Technical Committee ISO/TC 120, *Leather*, Subcommittee SC 1, *Raw hides and skins, including pickled pelts*.

STANDARDSISO.COM : Click to view the full PDF of ISO 11398:2012

# Raw ostrich skins — Description of defects, guidelines for presentation and grading on basis of defects

## 1 Scope

This International Standard provides descriptions of defects in raw ostrich skins and guidelines for the presentation and grading of ostrich skins based on these defects.

## 2 Terms related to external parasites and diseases which cause defects in ostrich skins

The following terms and definitions deal with parasites and diseases that contribute to defects (such as rashes, grown-in feathers, pit marks and marks from inoculation) in ostrich skins.

### 2.1 External parasites

#### 2.1.1 mite

small arthropod belonging to the subclass Acarina (also known as Acari) and the class Arachnida

NOTE This parasite lodges on the body of ostrich and suck the blood, causing small punctures or wounds. Mites are also vectors for numerous diseases.

#### 2.1.2 tick

small arachnid in the order Ixodida, subclass Acarina

NOTE Ticks are ectoparasites (external parasites), living by hematophagy on the blood of mammals, birds, and occasionally reptiles and amphibians. This parasite lodges on the body of ostrich and sucks the blood, causing small punctures or wounds. Ticks are also vectors of numerous diseases.

### 2.2 Bacterial diseases

#### 2.2.1 omphalitis yolk sacculitis

condition characterized by infected yolk sacs, often accompanied by unhealed navels in young birds

NOTE Omphalitis is infectious and is caused by opportunistic bacteria such as *coliforms*, *staphylococci*, *pseudomonas* specie and *proteus* specie.

#### 2.2.2 botulism

food poisoning caused by ingesting the toxins of *clostridium botulinum*

NOTE Flaccid paralysis is usually seen in the legs, wings, necks and eyelid of the birds affected by botulism.

#### 2.2.3 anthrax

acute infectious disease caused by *bacillus anthracis* and characterized by rapidly fatal septicaemia

#### 2.2.4 campylobacteriosis

semi-acute to chronic disease caused by gram negative bacterium *campylobacter jejuni* and resulting in inflammation, cramps, and progressive weakness

### 2.2.5

#### **necrotic enteritis**

acute disease that may affect ostriches at any age and which is caused mainly by *Clostridium perfringens*

NOTE This disease spreads quickly through droppings and by direct contact. It is sometimes related to mud eating.

### 2.2.6

#### **ulcerative enteritis**

acute disease that may affect ostriches at any age and which is caused mainly by *Clostridium colinum*

NOTE This disease spreads quickly through droppings and by direct contact. It is sometimes related to mud eating.

## 2.3 Viral diseases

### 2.3.1

#### **newcastle disease**

highly contagious and destructive disease caused by the newcastle virus of genus *avulavirus* which causes gasping, coughing, nervous depression, muscular tremor, dropping wings, twisting of head and neck, complete paralysis

### 2.3.2

#### **avian pox**

slow spreading disease, characterized by wart-like lesions on the skin of the head, eyelids, around the external ear opening, on the beak and on the skin of the neck

### 2.3.3

#### **avian influenza**

illness caused by many different strains of influenza virus that have adapted to a specific host

NOTE Avian influenza is characterized by respiratory signs, rales, excessive lacrimation, sinusitis, and oedema of the head and face.

## 2.4 Mycotic diseases

### 2.4.1

#### **aspergillosis**

respiratory disease caused by the fungus *aspergillus fumigatus*

NOTE These are characterized by gross lesions in the lung, decreased appetite and stunting.

### 2.4.2

#### **candidiasis**

disease, caused by the fungus *candida moniliformis*, which affects the mucus of the mouth and esophagus, causing norexia, dehydration and death

## 2.5

#### **nutritional disorder**

nutritional deficiency of an ostrich which affects the general condition of the body and skin of ostrich

## 3 Terms related to defects in ostrich skins

### 3.1 Ante-mortem defects

#### 3.1.1

##### **hole**

<ante-mortem defect> empty space, resulting from an unhealed scar, that goes through the skin

NOTE Holes are normally classified according to size, i.e. 40 mm, 80 mm and 120 mm.

**3.1.2****cut**

<ante-mortem defect> opening, resulting from an unhealed scar, that goes through the skin

**3.1.3****scar**

mark remaining as the result of a wound

NOTE Scars are typically manifest as kick marks, brand marks, holes, chemical burns, white spots and scabs.

**3.1.4****wound**

injury to living tissue caused by an impact

NOTE Wounds may be categorized as raw, partially healed or healed.

**3.1.5****kick mark**

big mark or healed wound resulting from birds injuring each other

**3.1.6****brand mark**

mark caused by branding in the useful area of the skin

**3.1.7****chemical burn**

damage to the skin surface due to incorrect or excessive application of dipping which results in a shrunken appearance or damaged grain

**3.1.8****white spot**

spot occurring in the crown area

NOTE 1 White spots can vary in size from a few millimetres to a few centimetres in diameter.

NOTE 2 The grain pattern of the leather is typically not affected.

NOTE 3 White spots are probably caused by the healing of small injuries or pitting.

**3.1.9****scab**

result of the healing or partially healing of an open wound

**3.1.10****scratch**

slight wound typically occurring as distinct thin white scars on a skin

NOTE 1 Scratches may be categorized as raw, partially healed or healed.

NOTE 2 Scratches are mostly observed as healed defects and probably were caused by thorns or toenails of chicks.

**3.1.11****rough grain**

rough skin texture resulting from e.g. chafing, feather picking or sunburn and manifested as a rough area on the skin, sometimes with associated callosity

**3.1.12****bacterial damage**

damage which causes pinholes and an extensive occurrence in at least two or more quarters

NOTE Pinholes that are extensive in occurrence in at least two or more quarters will result in a downgrade by one grade.

**3.1.13**

**tick bite**

puncture wound caused by ticks and manifested as a small hole in the skin, typically at the base of a quill mark

**3.1.14**

**pitting**

small (about 1 mm) indents in the crown area where the grain layer has been removed

NOTE Pitting can be caused by mites.

**3.2 Post-mortem defects**

**3.2.1**

**hole**

<post-mortem defect> empty space, resulting from a scar caused during slaughtering or during processing, that goes through the skin

NOTE Holes are normally classified according to size, i.e. 40 mm, 80 mm and 120 mm.

**3.2.2**

**cut**

<post-mortem defect> opening, resulting from a scar caused during slaughtering or during processing, that goes through the skin

**3.2.3**

**torn skin**

skin with a tear extending approximately 5 cm into the crown area

NOTE The piece with more than 50 % of the crown area is the "torn" and the remaining part the "piece". If a skin is torn into two or more parts, these are reclassified as pieces.

**3.2.4**

**defect due to opening lines**

defect caused by the wrong opening, where the length of the upper flank is visually not equal to the lower flank

NOTE This defect results in a downgrading of the skin.

**3.3 Genetically caused defects**

**3.3.1**

**abnormal grain definition**

grain definition that does not resemble what is normally associated with farmed ostriches, and which is taken into account for grading purposes.

**3.3.2**

**hair follicle**

occurrence of extended hair roots in an area that is considered unnatural

NOTE If this type of defect is found extensively in two (or more) quarters of the quill area, it will result in a downgrade of one grade.

**4 Quill development**

The acceptable norm for a normal quill is a full-bodied round quill from which a ripe feather was harvested.

Green feather quills tend to be opened/flat/prolonged.

A sunken quill is a quill with no body and a distinctive hole in centre; it is the opposite of a green feather quill.

Extensive occurrence of under-developed quills in more than two quarters will be reason for a downgrade of one grade.

## 5 Presentation of ostrich skins

**5.1** Trimming of the neck should be carried out by cutting off the smooth area approximately 170 mm from the distinctive line where the quill area ends. The leg may be trimmed through the last distinctive line above the middle of the knee.

**5.2** Reference may be made to Figure 1 for the presentation of an ostrich skin.

**5.3** The crown is the area with quill markings on the skin, excluding both the neck area down to the wing fold and the flank areas.

**5.4** The lines dividing the crown area into the four quarters may be 25 mm wide. The vertical line "A-B" on the diagram (see Figure 1) may stretch from the base of the neck between the wing folds, down to the bottom of the crown. The horizontal line "C-D" on the diagram may stretch between the widest quill markings on either side of the crown area.

**5.5** *Skin sizes*: The skin areas for different size groups are as follows:

- a) A size = 130 to 155 square decimetres;
- b) B size = 120 to 129 square decimetres;
- c) C size = 100 to 119 square decimetres;
- d) D size = 80 to 99 square decimetres.

## 6 Grading on the basis of defects

**6.1** Defects occur in various sizes. For the purpose of grading, standard sizes larger than 44 mm may be regarded as defects.

**6.2** For grading purposes, the crown area is divided into four quarters as shown in Figure 1. Healed wounds that blend in with the surrounding natural grain should not be considered as defects.

### 6.2.1 Grade 1

At least four quarters shall be free from defects.

NOTE A small number of visible defects outside the crown area might be allowed.

### 6.2.2 Grade 2

Skins classified as grade 2 shall have at least two of the quarters free of any defects.

### 6.2.3 Grade 3

Skins classified as grade 3 shall have at least one of the quarters free of any defects.

NOTE Number of visible defects outside the crown areas might be allowed.

### 6.2.4 Grade 4, Grade 5 and rejects

To determine grade 4, grade 5 and rejects, the following panel may be used.

**Panel:** A rectangular panel (imaginary or physical) to be fitted onto the crown area of the skin for determining if the skin should be classified as grade 4, grade 5 or reject skin. The panel may be fitted over the cutting lines. The panel sizes to be used for evaluation of the different skin size categories are as follows.