



Government  
of Canada

Gouvernement  
du Canada

Canada

**FOOD QUALITY SPECIFICATIONS -  
FOOD PURCHASED BY FEDERAL GOVERNMENT  
DEPARTMENTS**

**Grains**

**April 1, 2018**

The following specifications are used by federal government departments purchasing the items listed below for their departmental food requirements

## FQS-24 – Grains

Any items listed in all Food Quality Specification that are **bolded and in brown** are part of the current National Standard Cycle Menu (NSCM) Standing Offer. Other items that are not on the NSCM but are on the Standing Offer may not be listed in **bolded and in brown**.

**FQS 24-01 – Barley (*Hordeum Vulgare*)**

FQS-24-02 – Buckwheat: (*Fagopyrum esculentum*)

**FQS-24-03 – Bulgur: (*Triticum ssp*)**

**FQS-24-04 – Cornmeal**

**FQS-24-05 – Couscous, Regular and Whole Wheat**

**FQS-24-06 – Farro/Emmer (*Triticum turgidum dicoccum*)**

FQS-24-07 – Freekeh

FQS-24-08 – Kamut® Wheat {(Khorasan Grain - *triticum turgidum turanicum*)}

**FQS-24-09 – Millet (*Panicum miliaceum*)**

FQS-24-10 – Oats (*Avena Sativa*)

**FQS-24-11 – Quinoa (*Chenopodium quinoa*)**

FQS-24-12 – Rye (*Secale cereale*)

FQS-24-13 – Sorghum/Milo (*Sorghum spp*)

FQS-24-14 – Spelt (*Triticum aestivum spelta*)

FQS-24-15 – Triticale (*triticosecale rimpau*)

FQS-24-16 – Wheat (*Triticum aestivum; Triticum turgidum*)

**FQS-24-17 – Wheatberries**

[Applicable Regulations and Resources for Grains](#)

### Description

1. All true grains are the fruits of certain grasses; whole grain berries are sometimes called kernels. The seed, or kernel, is made up of three parts: the bran, the endosperm and the germ—all of which contain valuable nutrients.
2. There are many types of grains, including cereal grains such as wheat, rice, oats, barley, corn, wild rice, and rye, as well as pseudo cereals such as quinoa, spelt, Kamet and buckwheat. These grains can be either whole or refined.
3. It is common practice when processing grain to extend the shelf life by removing the bran and germ leaving only the endosperm. Grains may be enriched with B vitamins and Iron to replace what is lost in processing but the Vitamin E and fibre found in whole grains are not typically replaced. Nutritionally whole grains are the best choice.
4. Whole grains contain all three parts of the kernel. Examples include rolled oats and brown rice. Whole grains can be consumed on their own or as ingredients in recipes.
5. Many kinds of grains are grown throughout Canada. Under the [Canada Grain Act \(R.S.C., 1985, c. G-10\)](#), some of them are designated as official grains of Canada and, as such, are organized into the following categories (depending on the type of grain):
  - a. Cereals:
    - (1) Barley, oats, rye, triticale and wheat.
  - b. Oilseeds:

(1) Canola, flaxseed, mustard, rapeseed, safflower seed, soybeans and sunflower seeds.

c. Pulses:

(1) Beans, chickpeas, fababeans, lentils and peas.

d. Mixed grains:

(1) Mixture of wheat, rye, barley, oats, triticale, wild oats and domestic or wild oat groats.

e. Other crops:

(1) Buckwheat and corn.

6. Any other grains are not considered official grains and are, therefore, not regulated by the [Canada Grain Act \(R.S.C., 1985, c. G-10\)](#). The Canadian Grain Commission provides information about these grains for informational purposes only: Canadian solin, Canary seed, Kamut, spelt and quinoa.

7. Most grains have similar nutritional and cooking properties.

### **FQS 24-01 – Barley (*Hordeum Vulgare*)**

#### **Description**

8. All cultivated barley belongs to *Hordeum vulgare*. Cultivated barley selected for the food market have either the 2-row or 6-row head type on which either covered or hulless (naked) seeds develop.

9. Canadian Grading:

a. All Canadian barley selected for food purposes are graded according to the specification list in the Barley Canada Western/Canada Eastern Food (CW/CE) primary grade determinant tables.

10. Covered: Select Food CW/CE Two-row and Select Food CW/CE Six-row:

a. The term covered refers to varieties of barley with the outer hull still attached after harvesting. Covered barley varieties may be two-row or six-row.

11. Hulless: Select Food CW/CE Two-row and Select Food CW/CE Six-row:

a. The term hulless refers to varieties of barley in which the outer hull is loosely adhered to the kernel. The outer hull is so loose, that when this barley is harvested in the field, the outer hull is usually removed. Processors often refer to this type of barley as “naked” barley. Hulless barley varieties may be two-row or six-row; and

b. Barley is sold three ways: pearl, Scotch and hulled.

12. **Pearl barley** is a white oval kernel that has been processed to remove the tough inedible husk, bran and germ leaving only the starchy endosperm. It is then pearled or polished further by an abrasive scouring process. Barley may be pearled to varying degrees and labeled as regular, medium, fine or baby pearl. This process strips the grain of nutrients but makes it faster cooking and gives it a smother texture than the Scotch or hulled barley varieties.

13. Scotch or pot barley has more of the bran left on and therefore more fibre, potassium and B vitamins are maintained. It has a chewier texture than Pearl Barley and should be pre-soaked.

14. Hulled, whole or hull-less barley is the most nutritious with only the inedible outer husk removed. It can be pre-soaked and requires a longer cooking time than Pearl barley. It is chewier and grittier than Pearl or Scotch barley.

15. Barley is also processed into two quick-cooking forms; barley grits and quick cooking barley flakes, which look like rolled oats and can be cooked the same way. These are generally used to make breakfast cereal.

16. Barley’s roasted nut flavour and chewy bite make it a good grain for soups, salads and side dishes.

### **FQS-24-02 – Buckwheat (*Fagopyrum esculentum*)**

#### **Description**

17. Buckwheat is not a cereal grain, but rather a fruit or nut. Buckwheat is a broad leaf plant that grows well under a wide range of soil conditions. Buckwheat is milled into flour and is used to make bread, pancakes and pasta or processed into groats and grits. Buckwheat is gluten-free and can be a good substitute for gluten-containing grains.

18. Varieties Grading:

- a. Many varieties of buckwheat registered for production in Canada are eligible for the grade of No. 1 Canada (cool and sweet).

### **FQS-24-03 – Bulgur (*Triticum ssp*)**

#### **Description**

19. Bulgur is the result of wheat kernels that are boiled, dried, cracked, and then sorted into distinct sizes. This wheat product is sometimes referred to as “Middle Eastern pasta” for its versatility as a base for all sorts of dishes. Bulgur is most often made from durum wheat, but almost any wheat, hard or soft, red or white, can be made into bulgur.

20. As a whole grain, it is a naturally high fibre, low fat, low calorie vegetarian and vegan food ingredient.

21. Bulgur has a pleasant, nut-like flavour and an extended shelf-life that allows it to be stored for long periods.

22. In North America, bulgur is produced from white wheat in four distinct grinds or sizes (#1 Fine, #2 Medium, #3 Coarse and #4 Extra Coarse). The highest quality bulgur has particle sizes that are uniform thus allowing a more consistent cooking time and result.

#### **Size**

23. #1 Fine: Makes a nutritious breakfast cereal and is perfect for breads, desserts and also used in tabouli salad, pilaf, and in any recipe as a substitute for rice. Can sometimes be referred to as “instant” and cooks in less than 5 minutes.

24. #2 Medium: An all-purpose size used in tabouli, salads, pilaf, stews, soups, multi-grain bakery goods, and especially in meatless burgers, chili and in any recipe as a substitute for rice.

25. #3 Coarse: For low-fat stuffing, casseroles and vegetarian tacos, and in pilafs, soups, salads and artisan breads.

26. #4 Extra coarse: For hearty soups, pilafs and bread.

27. #5 Half Cuts: Extra large grind. For use in soups, pilafs and specialty recipes.

### **FQS-24-04 – Cornmeal**

#### **Description**

28. Dent corn, named for the indentation in each kernel, is raised for drying and processing as cornmeal. It is starchier and less sugary than sweet corn, which is eaten off the cob. Cornmeal is the dried meal or flour made from dent corn. Most cornmeal is hulled and de-germinated before grinding, then enriched to replace the nutrients removed during processing.

29. **Whole grain cornmeal** contains some or all of both the bran and the germ. It has a higher fibre and mineral content and richer flavour than de-germinated cornmeal. It is usually stone ground.

30. Coarse, **medium**, and fine cornmeal is available and can be used interchangeably in any recipe unless otherwise specified, as can yellow, white and blue cornmeal. Very finely ground cornmeal is often referred to as corn flour.

### **FQS-24-05 – Couscous, Regular and Whole Wheat**

#### **Description**

31. Couscous is tiny pasta typically made from coarsely ground semolina, the hard wheat flour typically used for dry pasta, but it can be made from other flours including whole wheat and spelt. Although not a grain, couscous is interchangeable with bulgur and other tiny grains in many recipes.
32. The couscous commonly available has been pre-steamed and dried before packaging. It is simply reconstituted in boiling water. It may be labelled quick-cooking, pre-cooked or instant.
33. Couscous that is not pre-cooked comes in different granulations and requires cooking.
34. Israeli couscous, also called pearl pasta, is roughly the size of barley. It is cooked in salted, boiling water (the same as other pastas).
35. Whole-wheat couscous is made from the whole grains of durum flour which has its endosperm, germ and bran intact. When grains are refined, at least a portion of the endosperm, germ or bran is removed. It has a typical whole wheat flavour.

#### **FQS-24-06 – Farro/Emmer (*Triticum turgidum dicoccum*)**

##### **Description**

36. Farro is an Italian strain of spelt (whose English name is Emmer), called *triticum turgidum dicoccum*. Farro has a wheaty flavour and is softer, faster-cooking and stickier than spelt.
37. Farro also known grano farro or farro medio (“medium faro”) is staging a comeback as a gourmet specialty. Semolina flour made from farro is still used today for special soups and other dishes in Tuscany and Umbria, and farro is thought, by some, to make the best pasta.
38. Farro is also available in three forms. Whole faro - which must be soaked overnight prior to use. Pearled farro - where the bran layer has been removed completely. The most commonly available form is **semi-pearled farro**, which retains some of its bran and nutrients. Although the whole farro is highest in fibre, the semi-pearled farro is high in fibre as well. Most recipes are written for the semi-pearled farro. Farro comes in three grades – long, medium and cracked.
39. There is some confusion as to what farro is. Einkorn (*Triticum monococcum*), emmer (*Triticum dicoccum*), and spelt (*Triticum spelta*) are called farro in Italy, sometimes (but not always) distinguished as farro medio, farro grande, and farro piccolo, respectively.
40. Farro is sold dried and is prepared by cooking in water until soft, but still crunchy (many recommend first soaking overnight). It may be eaten plain, though it is often used as an ingredient in dishes such as salads and soups. Pearled farro takes less time than semi-pearled farro to cook, while whole farro takes the longest time and should be pre-soaked.

#### **FQS-24-07 – Freekeh**

##### **Description**

41. Freekeh is a cereal food made from green wheat that goes through a roasting process. The wheat is harvested while the grains are yellow and the seeds are still soft. Then it is piled and sun-dried. The roasted wheat undergoes further sun-drying to make the flavour, texture, and colour uniform. The seeds are then cracked into smaller pieces so they look like a green bulgur.

#### **FQS-24-08 – Kamut® Wheat {(Khorasan Grain - *triticum turgidum turanicum*)}**

##### **Description**

42. KAMUT® wheat is trademarked wheat that can only be marketed as such if it has been grown on certified organic farms, and is exclusively grown under full production contracts with KAMUT® Brand wheat buyers.
43. Khorasan wheat (*Triticum turgidum, ssp. turanicum*) is an ancient wheat variety that originated in the Fertile Crescent in Western Asia. It is a relative of durum wheat. In 1990, khorasan wheat was first sold under the trademark KAMUT® in the United States.

#### **FQS-24-09 – Millet (*Panicum miliaceum*)**

**Description**

44. Millets are a group of highly variable small-seeded grasses, widely grown around the world as cereal crops or grains. Unlike the millet sold as birdseed, millet sold for human consumption has been hulled. Tiny, rounded, and pale gold or red, cooked millet makes a fluffy side dish that resembles couscous with a delicate flavour and slightly crunchy texture. Its flavour becomes richer when it is toasted.

45. As a gluten-free whole grain, millet provides another grain option for those in need of alternatives.

46. Millet can be ground and used as flour (as in Indian roti) or prepared as polenta in lieu of corn meal. Millet can be found in white, gray, yellow or red. The delicate flavour is enhanced by toasting the dry grains before cooking.

**FQS-24-10 – Oats (*Avena Sativa*)****Description**

47. The oat plant has a flowering and fruiting structure known as in-florescence and is made up of many branches bearing florets that produce the caryopsis or one-seeded fruit. Unique among grains, oats almost never have their bran and germ removed in processing.

48. Canadian Grading:

- a. All Canadian oats selected for food purposes are graded according to the specification list in the Oats Canada Western (CW) and Canada Eastern (CE) primary grade determinant tables;
- b. No.1 CW (Good colour, 98% sound groats); and
- c. No.1 CE (Well matured, good natural colour, 97% sound groats).

**FQS-24-11 – Quinoa (*Chenopodium quinoa*)****Description**

49. Quinoa, pronounced “keen-wa” is not truly a grain (botanically it is related to Swiss Chard and beets) but it is cooked and eaten as a grain. Quinoa is a small, light-coloured round granule, similar in appearance to sesame seeds. Quinoa cooks fast, is high in minerals and is one of the best forms of plant protein.

50. Quinoa can be prepared like whole grains (such as rice and barley) and milled into flour for use in gluten-free baked goods. Quinoa is also available as cereal flakes and other processed foods. It can also be incorporated into soups, salads and baked goods.

51. Available in other colours, including red, purple and black. Quinoa must be rinsed well before cooking, to remove the bitter residue of saponins, a plant-defense that wards off insects.

**FQS-24-12 – Rye (*Secale cereale*)****Description**

52. Rye is unusual among grains for the high level of fibre in its endosperm – not just in its bran. Because of this, rye products generally have a lower glycemic index than products made from wheat and most other grains, making them especially healthy for diabetics.

53. Canadian Grading:

- a. All Canadian rye selected for food purposes is graded according to the specification list in the Rye Canada Western/Canada Eastern (CW/CE) food primary grade determinant tables; and
- b. No. 1 CW/CE: Well matured, practically free from weather-damaged kernels.

**FQS-24-13 – Sorghum/Milo (*Sorghum spp*)****Description**

54. Sorghum is a large grass. Although one type of grass is raised for grain, it is more commonly used as a sweetener. The liquid sweetener of the same name is a syrup produced from the juice of this grass. It is also called sorghum molasses. It is thinner and sourer in flavour than sugar cane molasses. Sorghum can be substituted for molasses.

55. Sorghum used as a whole grain provides many other nutritional benefits. Sorghum, which does not have an inedible hull like some other grains, is commonly eaten with all its outer layers, thereby retaining the majority of its nutrients.

56. Sorghum has come into increasing use in homemade and commercial breads and cereals made specifically for the gluten free diet. Sorghum flour can be substituted for wheat flour in a variety of baked goods. Its neutral, sometimes sweet, flavour and light colour make it easily adaptable to a variety of dishes. Its texture is less gritty than other wheat flour substitutes such as rice flour.

#### **FQS-24-14 – Spelt (*Triticum aestivum spelta*)**

##### **Description**

57. Spelt is similar to wheat in appearance, but it has a tougher husk, which helps protect the nutrients inside the grain.

58. Spelt can be milled for flour. White spelt flour is lighter in colour and texture because it is milled more finely. Spelt flour has a nutty, slightly sweet flavour and can replace whole wheat flour or whole grain flour in recipes for breads and pastries. Spelt pasta is available in regular and white varieties.

#### **FQS-24-15 – Triticale (*x triticosecale rimpai*)**

##### **Description**

59. Triticale is a hybrid of durum wheat and rye that's been grown commercially for only thirty-five years. The word triticale is derived by combining the Latin words for wheat (*triticum*) and rye (*secale cereale*). It is an excellent source of fibre, B vitamins and magnesium.

60. Canadian Grading:

- a. No.1 Canada: Reasonably well matured and reasonably free from damage kernels.

#### **FQS-24-16 – Wheat (*Triticum aestivum*; *Triticum turgidum*)**

##### **Description**

61. Cultivated wheat selected for the food market has two main varieties; durum wheat (*Triticum turgidum durum*) is made into pasta, while common wheat (*Triticum aestivum vulgare*) is used for most other wheat containing foods. The whole grain can be milled to leave just the endosperm for white flour. Cultivated wheat grains are larger, and the seeds (inside the spikelets) remain attached to the ear by a toughened rachis during harvesting. Wheat contains large amounts of gluten.

62. There are six wheat classifications: 1) hard red winter, 2) hard red spring, 3) soft red winter, 4) durum (hard), 5) Hard white, 6) soft white wheat. The hard wheats have the most amount of gluten and are used for making bread, rolls and all-purpose flour. The soft wheats are used for making flat bread, cakes, pastries, crackers, muffins, and biscuits.

63. Raw wheat can be ground into flour or, using hard durum wheat only, can be ground into semolina; germinated and dried creating malt; crushed or cut into cracked wheat; parboiled (or steamed), dried, crushed and de-branned into bulgur also known as groats. If the raw wheat is broken into parts at the mill, as is usually done, the outer husk or bran can be used several ways.

64. In addition to being used in cereals, most wheat is milled into flour. Although there are many types of flour, all-purpose flour is used most frequently. Bread flour is higher in protein. Unbleached flour is simply not as white as bleached.

65. Whole-wheat flour is brown in colour, and is derived from the complete wheat kernel (the bran and germ). When used in bread baking, it gives a nutty flavour and a denser texture when compared to all-purpose flour. Bread does not rise as high in whole-wheat breads, which is why a mixture of both whole-wheat and white flour is often used when baking.

66. Cake flour has the least amount of gluten of all wheat flours, making it best for light, delicate products such as sponge cakes, genoise, and some cookie batters. Cake flour often comes bleached, which gives it a bright, white appearance.
67. Pastry flour also has a low gluten content, though it contains a bit more than cake flour. Made from a soft wheat flour, it is used for making tart and pie doughs, some cookie batters, and muffins.
68. High-gluten flour is milled from hard wheat and has a high protein content, making it high in gluten.
69. All Canadian wheat selected for food purposes is graded according to the specification list of the [Canadian Grain Commission](#).

#### **FQS-24-17 – Wheatberries**

##### **Description**

70. Wheatberry is the entire wheat kernel (except for the hull), composed of the bran, germ, and endosperm. Wheatberries have a tan to reddish brown colour and are available as either a hard or soft processed grain. When wheat berries are milled, whole-wheat flour is produced.

##### **Size**

71. The usual retail and commercial standard size available in the market applicable to grain unless otherwise specified.

##### **Packaging**

72. Grain products shall be packaged in normal retail and commercial packaging, packing, labelling and marking. The packaging must safeguard the hygienic, nutritional, technological and organoleptic qualities of the food. The packaging material must be made of substances which are safe and suitable for their intended use and does not impart any toxic substance or undesirable odour or flavour to the product. When bags are used for packaging these must be clean, sturdy and sealed. When the product is packaged in sacks, these must be clean, sturdy and strongly sewn or sealed.

73. All grain products procured in Canada must:

- a. comply with relevant sections of Acts and Regulations listed under [the Food and Drugs Act \(R.S.C., 1985, c. F-27\)](#), [Food and Drug Regulations \(C.R.C., c. 870\)](#), [Canada Agricultural Products Act \(R.S.C., 1985, c. 20 \(4th Supp.\)\)](#), [Processed Products Regulations \(C.R.C., c. 291\)](#), [Canadian Food Inspection Agency Act \(S.C. 1997, c. 6\)](#), [Canada Grain Act \(R.S.C., 1985, c. G-10\)](#), and the [Canada Grain Regulations \(C.R.C., c. 889\)](#);
- b. comply with all requirements listed under the [Canadian Grain Commission](#);
- c. be a minimum of Canada No. 1 according to [The Official Grain Grading Guide of the Canadian Grade Commission](#) or [Canada Grain Regulations \(C.R.C., c. 889\)](#) Schedule 3, Tables 24-26 and 30-37;
- d. comply with fundamental principles related to Health and Safety listed under [The Official Grain Grading Guide of the Canadian Grade Commission](#);
- e. comply with the relevant sections listed under the [Canadian Food Inspection Agency - Food Safety, Agriculture and Agri - Food Canada – Acts and Regulations](#), and [Industry Canada – Office of Consumer Affairs \(OCA\)](#);
- f. comply with Pesticide and Pesticide Management Program listed under [Agriculture and Agri-Food Canada's Pest Management Centre \(PMC\)](#) and [Health Canada Pest Management Regulatory Agency \(PMRA\)](#);
- g. comply with food additive regulations listed under [Food and Drug Regulations \(C.R.C., c. 870\)](#), [Division 16, Food Additives](#);



- h. comply with all the requirements listed under the [Plant Protection Act \(S.C. 1990, c. 22\)](#) and [Plant Protection Regulations \(SOR/95-212\)](#),
  - i. comply with food packaging and labelling requirements listed under the [Consumer Packaging and Labelling Act \(R.S.C., 1985, c. C-38\)](#), and [Consumer Packaging and Labelling Regulations \(C.R.C., c. 417\)](#);
  - j. comply with the relevant sections listed under the [Industry Labelling Tool \(replaces the Guide to Food Labelling and Advertising\)](#);
  - k. be prepared and handled in accordance with essential principles of food hygiene applicable throughout the food chain (including primary production through to the final consumer), ensuring that food is safe and suitable for human consumption listed under the [Codex Alimentarius - General Principles of Food Hygiene](#), including Annex on Hazard Analysis and Critical Control Point (HACCP) system and guidelines;
  - l. comply with others relevant Codes of Hygienic Practice and Codes of Practice recommended by the Codex Alimentarius Commission relevant to pulses (grain legumes);
  - m. comply with any microbiological criteria established in accordance with the [Principles for the Establishment and Application of Microbiological Criteria for Foods \(CAC/GL 21-1997\)](#).
74. All grain products procured outside Canada must:
- a. only be procured from countries that meet federal acts and regulations that govern the importation of food under the [Canadian Food Inspection Agency - Guide to Importing Food Products Commercially](#);
  - b. comply with [Codex Alimentarius - General Principles for Food Import and Export Certification and Inspection](#);
  - c. comply with relevant sections of Acts and Regulations (or the equivalent in the country where procured) listed under the [Food and Drugs Act \(R.S.C., 1985, c. F-27\)](#), [Food and Drug Regulations \(C.R.C., c. 870\)](#), [Canada Agricultural Products Act \(R.S.C., 1985, c. 20 \(4th Supp.\)\)](#), [Processed Products Regulations \(C.R.C., c. 291\)](#), [Canadian Food Inspection Agency Act \(S.C. 1997, c. 6\)](#), [Canada Grain Act \(R.S.C., 1985, c. G-10\)](#), and the [Canada Grain Regulations \(C.R.C., c. 889\)](#);
  - d. comply with fundamental principles related to Health and Safety listed under [Agriculture and Agri - Food Canada – Acts and Regulations](#);
  - e. comply with the relevant sections listed under the [Canadian Food Inspection Agency - Food Safety, Agriculture and Agri - Food Canada – Acts and Regulations](#), and [Industry Canada – Office of Consumer Affairs \(OCA\)](#);
  - f. comply with all the requirements listed under the [Codex Alimentarius - General Standard for Certain Pulses](#);
  - g. comply with Pesticide and Pesticide Management Program listed under [Agriculture and Agri-Food Canada's Pest Management Centre \(PMC\)](#) and [Health Canada Pest Management Regulatory Agency \(PMRA\)](#);
  - h. comply with food additive regulations listed [Food and Drug Regulations \(C.R.C., c. 870\)](#), [Division 16, Food Additives](#); and/or
  - i. comply with food additive classes listed under [Codex Alimentarius - General Standard for Food Additives](#);
  - j. comply with all the requirements listed under [Plant Protection Act \(S.C. 1990, c. 22\)](#) and [Plant Protection Regulations \(SOR/95-212\)](#) (or the equivalent in the country where procured);

- k. comply with food packaging and labelling requirements listed under [Consumer Packaging and Labelling Act \(R.S.C., 1985, c. C-38\)](#), and [Consumer Packaging and Labelling Regulations \(C.R.C., c. 417\)](#); and/or
- l. comply with all the requirements listed under [Codex Alimentarius - General Standard for the Labelling of Prepackaged Foods](#); and/or
- m. comply with the relevant sections listed under the [Industry Labelling Tool \(replaces the Guide to Food Labelling and Advertising\)](#);
- n. be prepared and handled in accordance with essential principles of food hygiene applicable throughout the food chain (including primary production through to the final consumer), ensuring that food is safe and suitable for human consumption listed under [Codex Alimentarius - General Principles of Food Hygiene](#), including the Annex on Hazard Analysis and Critical Control Point (HACCP) system and guidelines;
- o. meet all requirements of applicable local food legislation whenever those requirements are stricter. All grains shall be obtained by sources approved by the applicable local and international laws, regulations, procedures and requirements; must comply with other relevant Codes of Hygienic Practice and Codes of Practice recommended by the Codex Alimentarius Commission relevant to pulses (grain legumes) [Codex Alimentarius - General Standard for Certain Pulses](#);
- p. comply with those maximum residue limits and maximum mycotoxin limits established by the Codex Alimentarius Commission relevant to pulses (grain legumes) [Codex Alimentarius - General Standard for Certain Pulses](#); and
- q. comply with any microbiological criteria established in accordance with the [Principles for the Establishment and Application of Microbiological Criteria for Foods \(CAC/GL 21-1997\)](#).

## **Applicable Regulations and Resources for Grains**

[Food and Drug Regulations \(C.R.C., c. 870\)](#)

[Food and Drug Regulations \(C.R.C., c. 870\), Division 16, Food Additives](#)

[Canadian Food Inspection Agency Act \(S.C. 1997, c. 6\)](#)

[Food and Drugs Act \(R.S.C., 1985, c. F-27\)](#)

[Consumer Packaging and Labelling Act \(R.S.C., 1985, c. C-38\)](#)

[Consumer Packaging and Labelling Regulations \(C.R.C., c. 417\)](#)

[Canada Grain Act \(R.S.C., 1985, c. G-10\)](#)

[Canada Grain Regulations \(C.R.C., c. 889\)](#)

[Codex Alimentarius - General Principles of Food Hygiene](#)

[Codex Alimentarius - General Standard for the Labelling of Prepackaged Foods](#)

[Codex Alimentarius - General Standard for Certain Pulses](#)

[Codex Alimentarius - General Principles for Food Import and Export Certification and Inspection](#)

[Codex Alimentarius - General Standard for Food Additives](#)

[Codex Alimentarius - Standard for Wheat Flour](#)

[Codex Alimentarius – Standard for Oats](#)

[Principles for Food Import and Export Certification \[Codex Alimentarius\]](#)

[Plant Protection Act \(S.C. 1990, c. 22\)](#)

[Plant Protection Regulations \(SOR/95-212\)](#)

[Processed Products Regulations \(C.R.C., c. 291\)](#)

[The Official Grain Grading Guide of the Canadian Grade Commission](#)

[Canada Grain Regulations \(C.R.C., c. 889\) – Schedule 3 Tables 24-26 and 30-37](#)

[Canadian Food Inspection Agency - Food Safety](#)

[Agriculture and Agri - Food Canada – Acts and Regulations](#)

[Industry Canada – Office of Consumer Affairs \(OCA\)](#)

[Canadian Grain Commission](#)

[Agriculture and Agri-Food Canada's Pest Management Centre \(PMC\)](#)

[Health Canada Pest Management Regulatory Agency \(PMRA\)](#)

[Industry Labelling Tool \(replaces the Guide to Food Labelling and Advertising\)](#)

[Canadian Food Inspection Agency - Guide to Importing Food Products Commercially](#)

[Buckwheat - Agriculture and Agri-Food Canada \(AAFC\)](#)

[Canada Agricultural Products Act \(R.S.C., 1985, c. 20 \(4th Supp.\)\)](#)

[Principles and Guidelines for the Establishment and Application of Microbiological Criteria Related to Foods \[CAC/GL 21-1997\]](#)