

Section 9

Pulses

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The following section details the procedures and standards to be used to classify Pulses received by ABB Grain Ltd and have been developed in conjunction with the Pulse SA and Pulse Australia Standards Subcommittee. The receival standards are based on Pulse Australia's standards.

These are Australian industry standards and do not take into account specific overseas country quarantine restrictions (such as prohibited weed seeds, disease status or contamination levels) or the requirements of the Export Control Act (1982) and its subordinate legislation. Individual commodity traders can obtain additional information on specific country requirements from the importing country's Quarantine Authority and AQIS.

9.1 Pulse Classification Procedures

The following procedure is to be used when classifying a load of Pulses (EXCEPT for Lentils and Broad Beans which have specific requirements). Refer to the Lentil and Broad Bean sections section for the classification procedure.

1. Sample the load presented for delivery according to the Receival Sampling procedure detailed in Section 1 of the CCM to produce a representative **Grower Load Composite (GLC)** sample.
2. From the GLC draw a subsample to be tested for **Moisture** content. The instrument and calibration to be used is listed in the table below. The operating instructions for the Kett and Marconi moisture meters are found elsewhere in the CCM.

| PULSE | METER | CALIBRATION |
|-------------|----------|---|
| Field peas | Kett | Peas conversion scale |
| Faba beans | Kett | Faba Beans conversion scale |
| Lupins | Kett | Oats conversion scale |
| Chick peas | Kett | Peas conversion scale |
| Vetches | Marconi | See tables attached to vetch receival standards |
| Lentils | Infratec | Lentil |
| Broad beans | Kett | Faba Beans conversion scale |

If the moisture is determined by the Kett:

If the moisture content exceeds the allowable limit by 1.0% then the load must be rejected and issued a Temporary Decline Notice.

If the moisture exceeds the allowable limits but not by 1.0% then retest 2 further samples and average the three results using the Kett's averaging function.

Should one of the repeats exceed the allowable limit by 1.0%, the load is to be declined and issued a Temporary Decline Notice.

Should the average moisture content be above the allowable limit the load must be declined and issued a Temporary Decline Notice.

If the average moisture content is below the allowable limit the classification can continue.

3. Weigh a 200 gram / 400 gram (depending on commodity) sample using the digital scales according to the Pulse Hand Screen and Balance Procedure in Section 2.
4. Place the sample into the appropriate screen and shake for 40 shakes or until the sample is clean. The sample will still need to be hand picked to separate the various fractions. A list of the screen sizes is given in the table below to assist you in the separation of the pulse materials from other material in the sample.

| PULSE | TOP SCREEN | BOTTOM SCREEN |
|----------------------------|--|--|
| Broad Beans | 14.00mm round hole | 11.00mm round hole & 6.00mm slotted |
| Faba Beans | 3.75mm slotted | 2.00mm |
| Peas | 3.75mm slotted | 2.00mm |
| Lupins | 3.75mm slotted | 2.00mm |
| Chickpeas Desi type | 3.97mm slotted | 2.00mm |
| Chickpeas Kabuli (small) | 5.00mm round hole | 2.00mm |
| Chickpeas Kabuli (Large) | 6.00mm round hole | 2.00mm |
| Vetch | 3.00mm slotted | 2.00mm |
| Aldinga Lentil Variety | 2.2mm slotted (Barley Agtator screen) | NA |
| All other Lentil varieties | 2.0mm slotted (Wheat Agtator screen) | NA |

5. Separate the three screens / tray and examine the contents for the presence of **NIL Tolerance Contaminants** such as live grain insects, pickle, sticks, storage moulds, rodents or animal excreta.
6. Pick out any **Damaged and Defective Grains** from the top and bottom tray and add to the middle tray. See each pulse type for a definition of defective grains.
 - For all Kabuli and Desi type Chickpeas, Faba Beans and Lentils
Whole sound pulses that fall through the screen are classified as defective and shall remain in the middle tray.
 - For Peas, Lupins and Vetch
Examine the middle screen for whole sound, non-defective pulses that have fallen through the top screen. Place these back onto the top screen. These are not counted as defective.
7. Examine the top and middle trays and pick out any **Foreign or Unmillable Material** and place into the bottom tray.
Foreign Material is defined as all the vegetable matter other than the seed material of the pulse being assessed and includes, but is not limited to, straw, pods (opened), foreign seeds, etc.
Unmillable Material is defined as all non-vegetable material in the sample and includes stones, metals, dirt (which should be captured in the bottom screen), and non-vegetable matter.
A limit for **Soil** contamination is applied for all pulses. Soil is defined as material from the top 2 metres of the earth's crust and includes **Stones, Soil, Sand and Earth**.
8. Examine the trays for the presence of **Nominated Foreign Seeds**. See later in this section for a list of nominated weed seeds and allowable levels.
9. Examine the bottom tray for any **Small Foreign Seeds**. Separate out any small foreign seeds from all the trays and weigh them. Calculate % Small Foreign Seeds.
10. Weigh the contents of the bottom tray. Calculate the **Foreign and Unmillable Material combined, this is recorded as the % Foreign Material**. Then extract the **Unmillable Material** and weigh separately. Calculate the % of **Unmillable Material**.
11. Weigh the contents remaining in the middle tray. Calculate the **% of Defective Pulses**.

12. Examine the top tray for the presence of **Poor Colour Grains**, if a tolerance is defined in the standard. Pick out the poor colour grains and weigh on the scales. Calculate the % of Poor Colour grains.
13. At Manual Load Entry (MLE) sites record the results of the quality tests along with the pay and bin grades in the quality section of the Grower Receival Transaction according to the instructions in the Commodity Document Manual. Ensure that the quality test data entered is compatible with the classification, otherwise the transaction will be held in error when it is entered at the Business Centre, delaying payment to the grower until the information is corrected.

At Operational Management System (OMS) sites enter the test results and the variety code onto the computer according to the instructions in the OMS User Guide. The computer can derive a list of the acceptable pay and bin grades in order of rank. However it is important to remember that this is only an aid for the classifier. The classifier will be required to select the appropriate combination for the load.

All the tests shall be performed and the results included on the transaction. In order to perform this quickly and efficiently, the codes listed below shall be used. These codes are also listed on each Pulse Receival Standards Reference Chart.

14. Draw the appropriate amount of sample from the GLC sample to add to the **Partition Quality** or **Bin Grade Composite** samples and collect any other samples requested by Head Office.

9.1.1 Commodity Codes

| TEST | CODE | TEST | CODE |
|------------------------------|------|--------------------------------|------|
| Commodity - Peas | PE | Commodity - Chick Peas, Kabuli | CP |
| Commodity - Faba Beans | FB | Commodity - Lupins | LU |
| Commodity - Broad Beans | BB | Commodity - Vetch | VE |
| Commodity - Chick Peas, Desi | CP | Commodity - Lentils | LE |

9.1.2 Test Codes

| TEST | CODE | TEST | CODE |
|------------------------------|-------------|--|------|
| Moisture | MO* | Weed seed contaminants type 1 | S1 |
| Foreign material | TF* | Weed seed contaminants type 2 | S2 |
| Defective grains | DG* | Weed seed contaminants type 3a | 3A |
| Stones | SE | Weed seed contaminants type 3b | 3B |
| Unmillable material | SA* | Weed seed contaminants type 3c | 3C |
| Earth | EA* | Weed seed contaminants type 4 | S4 |
| Poor colour | PC | Weed seed contaminants type 5 | S5 |
| Poor Colour Kernel | PCK* | Weed seed contaminants type 6 | S6 |
| Poor Colour SeedCoat | PCS* | Weed seed contaminants type 7a | 7A |
| Bitter dark seeded lupins | BD | Weed seed contaminants type 7b | 7B |
| Discoloured lupins | DI | Weed seed contaminants type 7c | 7C |
| Blackened lentils | BL | Weed seed contaminants type 8 | S8 |
| Snails - Round | SNR | Small foreign seeds | SS |
| Snails - Conical | SNC | Other cereal grains vetch | OC |
| Phomopsis infected lupins | PL | Broad Beans > 14.00mm screen | 140 |
| Variety | VR* | Broad Beans > 11.00mm screen | 110 |
| Total Defective Seeds | TDG* | Broad Beans > 6.00mm screen (Small Beans) | SB |
| Varietal admixture | VA | Broad Bean material below 6.00mm screen | SC |

* Refer to mandatory Tests

9.2 Nominated Weed Seed Contaminants

Tolerances for weed seed contaminants apply to whole seeds or the equivalent in pieces per 200 gram sample (above or below the screen) of the following species. Any seed pods detected must be opened and the seeds counted for inclusion in the tolerances as specified, except where pods have a specified tolerance.

The tolerances listed below are maximums and refer to the total of all seeds named in each type, except for Type 1 in which the maximum applies on an individual seed basis.

9.2.1.1 Grouped by Type

| TYPE 1 INDIVIDUAL SEED BASIS | |
|---|---------------------------------|
| Colocynth | <i>Citrullus colocynthis</i> |
| Double gees / Spiny Emex Three corner jack | <i>Emex australis</i> |
| Jute | <i>Corchorus olitorius</i> |
| Long head poppy | <i>Papaver dubium</i> |
| Mexican poppy | <i>Argemone mexicana</i> |
| New Zealand spinach | <i>Tetragonia tetragonoides</i> |
| Parthenium weed | <i>Parthenium hysterophorus</i> |
| Poppy (Field) | <i>Papaver rhoeas</i> |
| Poppy (Horned) | <i>Glaucium flavum</i> |
| Wild Poppy | <i>Papaver hybridum</i> |

| TYPE 2 | |
|----------------------------|--------------------------------|
| Castor Oil plant | <i>Ricinus communis</i> |
| Coriander | <i>Coriandrum sativum</i> |
| Crow garlic or Wild garlic | <i>Allium vineale</i> |
| Darling pea | <i>Swainsona spp</i> |
| Opium poppy | <i>Papaver somniferum</i> |
| Ragweed | <i>Ambrosia spp</i> |
| Rattlepods | <i>Crotalaria spp</i> |
| Starburr | <i>Acanthospermum hispidum</i> |
| St. Johns wort | <i>Hypericum perforatum</i> |

| TYPE 3 (A) | |
|----------------------------------|----------------------------|
| Bathurst Burr | <i>Xanthium spinosum</i> |
| Caltrop / Cats Head / Bulls Head | <i>Tribulus terrestris</i> |
| Cape tulip | <i>Homeria spp</i> |
| Cottonseed | <i>Gossypium spp</i> |
| Dodder | <i>Cuscuta spp</i> |
| Noogoora Burr | <i>Xanthium pungens</i> |
| Thornapple | <i>Datura spp</i> |

| | |
|--------------------|---------------------|
| TYPE 3(B) | |
| Vetch (Tare) | <i>Vicia sativa</i> |
| Vetch (Commercial) | <i>Vicia spp</i> |

| | |
|---------------------|----------------------------------|
| TYPE 3(C) | |
| Heliotrope (Blue) | <i>Heliotropium amplexicaule</i> |
| Heliotrope (Common) | <i>Heliotropium europaeum</i> |

| | |
|---------------------------------------|-----------------------------|
| TYPE 4 | |
| Bindweed (Field) | <i>Convolvulus arvensis</i> |
| Cutleaf mignonette | <i>Reseda lutea</i> |
| Darnel (Drake Seed) | <i>Lolium temulentum</i> |
| *Hexham Scent / Melilot (King Island) | <i>Melilotus indicus</i> |
| Hoary cress | <i>Cardaria draba</i> |
| Mintweed | <i>Salvia reflexa</i> |
| Nightshades | <i>Solanum spp</i> |
| Paddy Melon | <i>Cucumis myocarpus</i> |
| Skeleton weed | <i>Chondrilla juncea</i> |
| Variegated thistle | <i>Silybum marianum</i> |

***Hexham Scent (*Melilotus indicus*) may only be received if there is no discernable tainting odour imparted to the grain**

| | |
|-----------------------------------|----------------------------|
| TYPE 5 | |
| Knapweed (Creeping / Russian) | <i>Acroptilon repens</i> |
| Salvation Jane / Pattersons Curse | <i>Echium plantagineum</i> |
| Sesbania pea | <i>Sesbania cannabina</i> |

| | |
|--|------------------------------|
| TYPE 6 | |
| Colombus grass | <i>Sorghum almum</i> |
| Johnson grass | <i>Sorghum halepense</i> |
| Saffron thistle | <i>Carthamus lanatus</i> |
| Clover Pods | <i>Trifolium spp</i> |
| Lucerne (Pods) | <i>Medicago spp</i> |
| Marshmallow (Pods) | <i>Malva parviflora</i> |
| Medic (Pods) | <i>Medicago spp</i> |
| Muskweed (Pods) | <i>Myagrum perfoliatum</i> |
| Wild radish (Pods) | <i>Raphanus raphnaistrum</i> |
| Trefoil (Pods) | <i>Medicago spp</i> |
| PODS refers to whole pods or part thereof | |

| TYPE 7(A) | |
|------------------|--------------------------|
| Chickpeas | <i>Cicer arietinum</i> |
| Corn | <i>Zea mays</i> |
| Cowpea | <i>Vigna unguiculata</i> |
| Faba Beans | <i>Vicia faba</i> |
| Lentils | <i>Lens culinaris</i> |
| Lupin | <i>Lupinus spp</i> |
| Maize | <i>Zea mays</i> |
| Peas (Field) | <i>Pisum sativum</i> |
| Soybean | <i>Glycine max</i> |

| TYPE 7(B) | |
|-----------------------|-------------------------------|
| Barley (2 row) | <i>Hordeum vulgare</i> |
| Barley (6 row) | <i>Hordeum distichon</i> |
| Bindweed (Australian) | <i>Convolvulus erubescens</i> |
| Bindweed (Black) | <i>Polygonum convolvulus</i> |
| Durum | <i>Triticum durum</i> |
| Oats (common) | <i>Avena sativa</i> |
| Oats (Black or wild) | <i>Avena fatua</i> |
| Oats (Sand) | <i>Avena strigosa</i> |
| Rice | <i>Oryza sativa</i> |
| Rye (Cereal) | <i>Secale cereale</i> |
| Sorghum (Grain) | <i>Sorghum bicolor</i> |
| Triticale | <i>Triticosecale spp</i> |
| Turnip weed (ball) | <i>Rapistrum rugosum</i> |
| Wheat | <i>Triticum aestivum</i> |

| TYPE 7(C) | |
|------------------|-----------------------------|
| Safflower | <i>Carthamus tinctorius</i> |
| Sunflower | <i>Helianthus annuus</i> |

| TYPE 8 | |
|---------------|------------------------|
| Bellvine | <i>Ipomoea plebera</i> |

| SMALL FOREIGN SEEDS | | | |
|----------------------------|------------------------------|--------------------------------|------------------------------|
| Amsinckia | <i>Amsinckia spp</i> | Marshmallow (seeds) | <i>Maalva palviflora</i> |
| Australian phalaris | <i>Phalaris aquatica</i> | Medics (seeds) | <i>Medicago sp</i> |
| Ball clover | <i>Trifolium glomeratum</i> | Muskweed (seeds) | <i>Myagrurn perfoliatum</i> |
| Bladder soap wort | <i>Vaccaria hispanica</i> | Milk thistle (seeds) | <i>Sonchus oleraceus</i> |
| Burrweed (yellow) | <i>Amsinckia spp</i> | Mustard | <i>Sisymbrium spp</i> |
| Canary Grass (Wild) | <i>Phalaris canariensis</i> | Mustard (Indian Hedge) | <i>Sisymbrium orientale</i> |
| Canola / Rapeseed | <i>Brassica rapa</i> | Paradoxa Grass (seed) | <i>Phalaris paradoxa</i> |
| Celery (slender) | <i>Apium leptophyllum</i> | Peppercress | <i>Lepidium spp</i> |
| Charlock | <i>Sinapis arvensis</i> | Phalaris (Australian) | <i>Phalaris aquatica</i> |
| Clover (Ball) | <i>Trifolium glomeratum</i> | Ryegrass | <i>Lolium spp</i> |
| Dock | <i>Rumex spp</i> | Sage (wild) | <i>Salvia verbenaca</i> |
| Fat Hen | <i>Chenopodium album</i> | Salt Bush | <i>Atriplex spp</i> |
| Fescue | <i>Festuca spp</i> | Sorrel | <i>Rumex acetosella</i> |
| Hares ear | <i>Conringia orientalis</i> | Sowthistle | <i>Sonchus spp</i> |
| Hedge mustard | <i>Sisymbrium officinale</i> | Thistle Milk (seed) | <i>Sonchus oleraceus</i> |
| Horehound | <i>Marrubium vulgare</i> | Turnip (Wild or Mediterranean) | <i>Brassica tournefortii</i> |
| Knotweed/Wireweed | <i>Polygonum aviculare</i> | Urochloa Grass | <i>Urochloa panicoides</i> |
| Lesser Canary Grass | <i>Phalaris minor</i> | Verbena | <i>Verbena spp</i> |
| Lettuce | <i>Lactuca spp</i> | Wild canary grass | <i>Phalaris canariensis</i> |
| Lucerne (seeds) | <i>Medicago sativa</i> | Wild radish (seed) | <i>Raphanus raphanistrum</i> |
| Maltese cockspur | <i>Centaurea melitensis</i> | Wireweed | <i>Polygonum aviculare</i> |

9.2.2.1 Grouped by Alphabetical Order

| COMMON NAME | BOTANICAL NAME | TYPE |
|----------------------|-------------------------------|------|
| Australian bindweed | <i>Convolvulus erubescens</i> | 7B |
| Australian carrot | <i>Daucus glochidiatus</i> | 7B |
| Australian Phalaris | <i>Phalaris aquatica</i> | S |
| Ball clover | <i>Trifolium glomeratum</i> | S |
| Barley (2 row) | <i>Hordeum distichon</i> | 7B |
| Barley (6 row) | <i>Hordeum vulgare</i> | 7B |
| Barley grass | <i>Hordeum leporinum</i> | 7B |
| Barnyard grass | <i>Echinochloa crus-galli</i> | 7B |
| Bathurst burr | <i>Xanthium spinosum</i> | 3A |
| Bellvine | <i>Ipomoea plebera</i> | 8 |
| Bifora (monkey face) | <i>Bifora testiculata</i> | 7B |
| Bindweed (field) | <i>Convolvulus arvensis</i> | 4 |
| Bindy-eye | <i>Calotis hispidula</i> | 7B |
| Black bindweed | <i>Polygonum convolvulus</i> | 7B |
| Black or wild oats | <i>Avena fatua</i> | 7B |
| Bladder soap wort | <i>Vaccaria hispanica</i> | S |
| Brome (soft) | <i>Bromus mollis</i> | 7B |
| Brome (sterile) | <i>Bromus sterilis</i> | 7B |
| Buchan weed | <i>Hirschfeldia incana</i> | 7B |
| Caltrop | <i>Tribulus terrestris</i> | 3A |
| Canola | <i>Brassica rapa</i> | S |
| Cape tulip | <i>Homeria spp</i> | 3A |
| Castor oil plant | <i>Ricinus communis</i> | 2 |
| Cereal rye | <i>Secale cereale</i> | 7B |
| Charlock | <i>Sinapis arvensis</i> | S |
| Chickpeas | <i>Cicer arietinum</i> | 7A |
| Clover (pods) | <i>Trifolium spp</i> | 6 |
| Colocynth | <i>Citrullus colocynthis</i> | 1 |
| Colombus grass | <i>Sorghum alnum</i> | 6 |
| Coriander | <i>Coriandrum sativum</i> | 2 |
| Corn | <i>Zea mays</i> | 7A |
| Corn gromwell | <i>Buglossoides arvensis</i> | 7B |
| Cottonseed | <i>Gossypium spp</i> | 3A |
| Cowpea | <i>Vigna unguiculata</i> | 7A |
| Creeping knapweed | <i>Acroptilon repens</i> | 5 |
| Crow garlic | <i>Allium vineale</i> | 2 |
| Cutleaf mignonette | <i>Reseda lutea</i> | 4 |
| Darling pea | <i>Swainsona spp</i> | 2 |
| Darnel | <i>Lolium temulentum</i> | 4 |
| Dock | <i>Rumex spp</i> | S |

| COMMON NAME | BOTANICAL NAME | TYPE |
|--------------------------|----------------------------------|------|
| Dodder | <i>Cuscuta spp</i> | 3A |
| Durum | <i>Triticum durum</i> | 7B |
| Faba beans | <i>Vicia faba</i> | 7A |
| Fat hen | <i>Chenopodium album</i> | S |
| Fescue | <i>Festuca spp</i> | S |
| Galvanised burr | <i>Sclerolaena birchii</i> | 7B |
| Grain sorghum | <i>Sorghum bicolor</i> | 7B |
| Great brome | <i>Bromus diandrus</i> | 7B |
| Hares ear | <i>Conringia orientalis</i> | S |
| Hedge mustard | <i>Sisymbrium officinale</i> | S |
| Heliotrope (blue) | <i>Heliotropium amplexicaule</i> | 3C |
| Heliotrope (common) | <i>Heliotropium europaeum</i> | 3C |
| Hexham scent (Melilotus) | <i>Melilotus indicus</i> | 4 |
| Hoary cress | <i>Cardaria draba</i> | 4 |
| Horehound | <i>Marrubium vulgare</i> | S |
| Horned poppy | <i>Glaucium flavum</i> | 1 |
| Indian weed | <i>Sigesbeckia orientalis</i> | 7B |
| Johnson grass | <i>Sorghum halepense</i> | 6 |
| Jute | <i>Corchorus olitorius</i> | 1 |
| Khaki weed | <i>Alternanthera pungens</i> | 7B |
| Knotweed | <i>Polygonum aviculare</i> | S |
| Lentils | <i>Lens culinaris</i> | 7A |
| Lesser canary grass | <i>Phalaris minor</i> | S |
| Lettuce | <i>Lactuca spp</i> | S |
| Linseed | <i>Linum usitatissimum</i> | 7B |
| Long headed poppy | <i>Papaver dubium</i> | 1 |
| Lucerne (pod) | <i>Medicago sativa</i> | 6 |
| Lucerne (seed) | <i>Medicago sativa</i> | S |
| Lupin | <i>Lupinus spp</i> | 7A |
| Maize | <i>Zea mays</i> | 7A |
| Mallow | <i>Malva spp</i> | 7B |
| Maltese cockspur | <i>Centaurea melitensis</i> | S |
| Marshmallow (seeds) | <i>Malva parviflora</i> | S |
| Marshmallow (pods) | <i>Malva parviflora</i> | 6 |
| Medics (pods) | <i>Medicago sp</i> | 6 |
| Medics (seeds) | <i>Medicago sp</i> | S |
| Mexican poppy | <i>Argemone mexicana</i> | 1 |
| Milk thistle (seeds) | <i>Sonchus oleraceus</i> | S |
| Millet (Japanese) | <i>Echinochloa utilis</i> | 7B |
| Mintweed | <i>Salvia reflexa</i> | 4 |
| Muskweed (pods) | <i>Myagrum perfoliatum</i> | 6 |
| Muskweed (seed) | <i>Myagrum perfoliatum</i> | S |
| Mustard | <i>Sisymbrium spp</i> | S |

| COMMON NAME | BOTANICAL NAME | TYPE |
|-------------------------|-----------------------------------|-------------|
| New Zealand spinach | <i>Tetragonia tetragonoides</i> | 1 |
| Nightshades | <i>Solanum spp</i> | 4 |
| Noogoora burr | <i>Xanthium pungens</i> | 3A |
| Oats (common) | <i>Avena sativa</i> | 7B |
| Onion weed | <i>Asphodelus fistulosus</i> | 7B |
| Opium poppy | <i>Papaver somniferum</i> | 2 |
| Paddy melon | <i>Cucumis myocarpus</i> | 4 |
| Paradoxa grass (glumed) | <i>Phalaris paradoxa</i> | 7B |
| Paradoxa grass (seed) | <i>Phalaris paradoxa</i> | S |
| Parthenium weed | <i>Parthenium hysterophorus</i> | 1 |
| Peas (field) | <i>Pisum sativum</i> | 7A |
| Peppercress | <i>Lepidium spp</i> | S |
| Poached egg daisy | <i>Calocephalus platycephalus</i> | 7B |
| Poppy (field) | <i>Papaver rhoeas</i> | 1 |
| Ragweed | <i>Ambrosia spp</i> | 2 |
| Rapeseed | <i>Brassica rapa</i> | S |
| Rattlepods | <i>Crotalaria spp</i> | 2 |
| Rice | <i>Oryza sativa</i> | 7B |
| Russian knapweed | <i>Acroptilon repens</i> | 5 |
| Ryegrass | <i>Lolium spp</i> | S |
| Safflower | <i>Carthamus tinctorius</i> | 7C |
| Saffron thistle | <i>Carthamus lanatus</i> | 6 |
| Saltbush | <i>Atriplex muelleri</i> | S |
| Salvation jane | <i>Echium plantagineum</i> | 5 |
| Sand oats | <i>Avena strigosa</i> | 7B |
| Sesbania pea | <i>Sesbania cannabina</i> | 5 |
| Sheepweed | <i>Buglossoides arvensis</i> | 7B |
| Skeleton weed | <i>Chondrilla juncea</i> | 4 |
| Slender celery | <i>Apium leptophyllum</i> | S |
| Small burrgrass | <i>Tragus australianus</i> | 7B |
| Sorrel | <i>Rumex acetosella</i> | S |
| Sowthistle | <i>Sonchus spp</i> | S |
| Soybean | <i>Glycine max</i> | 7A |
| Spear grass | <i>Bromus diandrus</i> | 7B |
| Spear thistle | <i>Cirsium vulgare</i> | 7B |
| Spiny burr grass | <i>Cenchrus tribuloides</i> | 7B |
| St. Johns Wort | <i>Hypericum perforatum</i> | 2 |
| Starburr | <i>Acanthospermum hispidum</i> | 2 |
| Sunflower | <i>Helianthus annuus</i> | 7C |
| Thornapple | <i>Datura spp</i> | 3A |
| Three cornered jack | <i>Emex australis</i> | 1 |
| Threehorn bedstraw | <i>Galium tricornutum</i> | 7B |
| Tick grass | <i>Tragus australianus</i> | 7B |

| COMMON NAME | BOTANICAL NAME | TYPE |
|------------------------|------------------------------|-------------|
| Trefoil (pods) | <i>Medicago spp</i> | 6 |
| Triticale | <i>Triticosecale spp</i> | 7B |
| Turnip (Mediterranean) | <i>Brassica tournefortii</i> | S |
| Turnip weed (ball) | <i>Rapistrum rugosum</i> | 7B |
| Urochloa grass | <i>Urochloa panicoides</i> | S |
| Variiegated thistle | <i>Silybum marianum</i> | 4 |
| Verbena | <i>Verbena spp</i> | S |
| Vetch (commercial) | <i>Vicia spp</i> | 3B |
| Vetch (wild tare) | <i>Vicia sativa</i> | 3B |
| Wards weed | <i>Carrichtera annua</i> | 7B |
| Wheat | <i>Triticum aestivum</i> | 7B |
| Wheatgrass | <i>Agropyron spp</i> | 7B |
| Wild canary grass | <i>Phalaris canariensis</i> | S |
| Wild garlic | <i>Allium vineale</i> | 2 |
| Wild poppy | <i>Papaver hybridum</i> | 1 |
| Wild radish (seed) | <i>Raphanus raphanistrum</i> | S |
| Wild Radish (pods) | <i>Raphanus raphnaistrum</i> | 6 |
| Wild sage | <i>Salvia verbenace</i> | S |
| Wild turnip | <i>Brassica rapa</i> | S |
| Wireweed | <i>Polygonum aviculare</i> | S |
| Yellow Burrweed | <i>Amsinckia spp</i> | S |
| Yellow poverty weed | <i>Calocephalus sonderi</i> | 7B |

9.3 Field Pea Standards

9.3.1.1 Pea Varieties

While there are no varietal requirements for peas, the following codes need to be noted on the receival transaction

| VARIETY | CODE | COLOUR CLASS |
|-----------------|------|--------------|
| Alma | APE | Dun |
| Bluey | BPE | Blue |
| Bohatyr | HPE | White |
| Bonzar | NPE | White |
| Buckley | YPE | White |
| Collegia | CPE | Maple |
| Cressy blue | SPE | Blue |
| Derrimut | TPE | Dun |
| Dinkum | KPE | White |
| Dundale | DPE | Dun |
| Dunwa | DUPE | Dun |
| Early dun | EPE | Dun |
| Excell | EXPE | Blue |
| Glenroy | GPE | Dun |
| Jupiter | JPE | Blue |
| Kaspa | KAS | Dun |
| Laura | LPE | White |
| Maitland | MPE | Dun |
| Moonlight | MON | White |
| Morgan | MOPE | Dun |
| Mukta | UPE | White |
| Parafield | PAPE | Dun |
| Paravic | PVPE | Dun |
| Pennant | PPE | White |
| Primo | PRPE | Dun |
| Santi | SAPE | White |
| Snowpeak | SNPE | White |
| Soupa | OPE | Blue |
| Sturt | STPE | White |
| Trevi | TRPE | Dun |
| White Brunswick | WHPE | White |
| Wirrega | WPE | White |
| Unknown | XPE | |

9.3.2.1 Australian Field Peas

The following receival standard applies to the ABB Grain Ltd classification of Australian Field Peas (PEAS), and is equivalent to the Pulse Australia Standard for Peas - Field No. 2 Grade Minimum Receival Standard Farmer Dressed, CSP 10.2.1

Refer to the Pulse Receival Standards Reference Chart for details on tolerances and grades.

PEAS Grade consists of DUN type varieties ONLY.

PEAK Grade consists of Kaspera variety ONLY.

PEAW Grade consist of WHITE pea varieties ONLY.

9.3.2.1 Objectionable Material

There is a **NIL tolerance** for

- Animal excreta, rodents, live grain and stored product pests (including live adult Pea Weevil), or animal carcasses.
- Sticks, stones and mineral matter in excess of tolerances. (If excess sticks and stones are detected at the classification platform or at the grid, but not in the 200 gram sample the load is still rejectable).
- Pickling compounds / seed dressings, any chemical not registered for use on stored pulses or in excess of legal tolerances or any fungicide added to the pulse as a seed dressing, any tainting agents and / or other contaminants imparting an odour not normally associated with the pulse.
- Toxic and / or Noxious weed seeds which are prohibited by state laws against inclusion in stock feeds.

The peas shall be hard and well filled.

9.3.2.2 Moisture

The amount of water measured in a sample of Peas. Moisture is measured on the Kett Moisture meter using the Conversion scale.

Measured as a %.

9.3.2.3 Purity

The sample shall contain a minimum of 97% by weight of pea seed material (whole peas, defective peas and skins).

9.3.2.4 Defective Peas

Defective peas are those not of the specified variety. Field Pea kernels that are broken, heat damaged, hail damaged, insect damaged, frosted, shriveled, split, chipped, sprouted, caked, bin burnt affected by mould (field or storage). Includes pods that contain Field Peas, whether broken or unbroken and loose seed coats.

Measured as a % by weight.

9.3.2.5 Foreign Material

Foreign Material refers to unmillable material and all vegetable matter other than Field pea seed material (whole peas, defective peas and skins).

Foreign Material includes, but is not limited to, unmillable material, cereal grains, wild oats, oil seeds, other pulses, weed seeds not otherwise specified and any vegetable matter other than pea seed material.

Measured as a % by weight.

9.3.2.6 Unmillable Material

Refers to soil, stones, metals and all non-vegetable matter. Soil is defined as clumps of 2mm diameter or greater. There is a maximum tolerance for soil within the unmillable category and needs to be assessed separately. Measured as a % by weight.

9.3.2.7 Nominated Foreign Seeds

Refer to **Nominated Weed Seed Contaminants** earlier in this section.

9.3.2.8 Snails

Refers to Snails Dead or Alive, Whole or substantially whole (more than half) including bodies per a 200 gram sample.

Measured as a count per 200 grams.

9.3.2.9 Field Insects

Refers to insect contaminants that do not cause damage to stored grain products. Tolerances are for Dead or Alive per 200 grams.

Refer to the full listing of Field Insects in the Wheat section - **Note: Pea Weevil tolerances.**

Measured as a count per 200 grams.

9.3.2.10 Pea Weevil

There is a NIL tolerance for live Pea Weevil during harvest receivals.

NOTE: Pea Weevil contaminated loads, within normal receival tolerances, may be accepted at selected sites at the end of harvest. This would be conditional on suitable facilities being available, and with no possibility of cross infestation of other commodities.

9.3.2.11 Ryegrass Ergot

Ryegrass Ergot is measured as the total length of all pieces laid end to end per 200 grams.

9.4 Faba Bean Standards

The following receival standard applies to the classification of Faba Beans No.1 Grade and is equivalent to Pulse Australia's Faba Beans No. 1 grade Minimum Receival Standards Farmer Dressed CSP 5.2.1.

Refer to the Pulse Receival Standards Reference Chart for details on tolerances and grades.

FAB1 / FAB2 All varieties of Faba Beans EXCEPT Icarus are considered to be of the specified type.

FIE1 / FIE2 Are varietal specific grades. ONLY Fiesta, Manafest, Farah and Nura varieties are acceptable into these grades.

9.4.1 Faba Bean Varieties

While the only varietal requirement for Faba Bean Grade is they contain no Icarus Beans, the variety of the Faba Bean needs to be noted on the Grower Receival Transaction.

Varieties and codes are as follows.

| VARIETY | CODE |
|----------|------|
| Ascot | AFB |
| Barkool | BFB |
| Cairo | CFB |
| Farah | FAR |
| Fiord | FFB |
| Fiesta | EFB |
| Icarus | IFB |
| Manafest | MFB |
| Nura | NUR |
| Unknown | XFB |

9.4.2 Objectionable Material

There is a **NIL tolerance** for

- Animal excreta, rodents, live grain and stored product pests (including live adult Pea Weevil), or animal carcasses.
- Sticks, stones and mineral matter in excess of tolerances. (If excess sticks and stones are detected at the classification platform or at the grid, but not in the 400 gram sample the load is still rejectable).
- Pickling compounds / seed dressings, any chemical not registered for use on stored pulses or in excess of legal tolerances or any fungicide added to the pulse as a seed dressing, any tainting agents and / or other contaminants imparting an odour not normally associated with the pulse.
- Toxic and / or Noxious weed seeds which are prohibited by state laws against inclusion in stock feeds.

The Faba Beans shall be sound, dry and fresh and light to medium brown or pale green in colour.

9.4.3 Moisture

The amount of water measured in a sample of Faba Beans. Moisture is measured on the Kett Moisture meter using the Conversion scale.

Measured as a %.

9.4.4 Purity

The sample may contain a minimum by weight of **97%** Faba Bean seed material, including whole Faba Beans, defective Faba Beans and seed coats.

9.4.5 Total Defective Seeds

Total Defective Seeds includes a maximum tolerance for defective Faba Beans and poor colour seeds. It is calculated as a % by the addition of defective and poor colour.

9.4.5.1 Defective Faba Beans

Defective Faba Beans include Faba Beans not of the specified variety*. Faba Beans that are broken, heat damaged, hail damaged, insect damaged, frosted, shriveled, split, chipped, caked, bin burnt, sprouted and / or affected by mould (field and storage). Includes pods that contain Faba Bean, whether broken or unbroken and loose seed coat and screenings.

*All varieties of Faba Beans, except Icarus are considered to be of the specified type for FAB1 / FAB2 grades. The Grades FIE1 / FIE2 are variety specific grades and only FIESTA, MANAFEST, FARAH and NURA Faba Bean varieties are acceptable into these grades.

Measured as a % by weight. Includes a maximum tolerance for Defective and Poor Colour seeds.

Screen Size

3.75mm slotted: Faba Bean seed material is defective if passes through the screen.

9.4.5.2 Poor Colour

Faba Beans with excessive discolouration of the seed coat as per the Pulse Australia Faba Bean photographic charts. Includes Ascochyta lesions.

Measured as a % by weight.

9.4.6 Foreign Material

Foreign Material includes unmillable material and all vegetable matter other than Faba Bean seed material. This includes stalks and plant material that may be connected with the plant.

Foreign Material includes, but is not limited to, unmillable material, cereal grains, wild oats, oil seeds, other pulses, weed seeds not otherwise specified and any vegetable matter other than Faba Bean seed material.

Measured as a % by weight.

9.4.7 Unmillable Material

Refers to soil, stones, metals and all non-vegetable matter. Soil is defined as clumps of 2mm diameter or greater.

There is a maximum tolerance for soil within the unmillable category and needs to be assessed separately.

Measured as a % by weight.

9.4.8 Nominated Foreign Seeds

Refer to Nominated Weed Seed Contaminants earlier in this section.

9.4.9 Snails

Refers to Snails Dead or Alive, Whole or substantially whole (more than half) including bodies per a 400 gram sample.

Measured as count per 400 grams.

9.4.10 Field Insects

Refers to insect contaminants that do not cause damage to stored grain products. Tolerances are for Dead or Alive per 400 grams.

Refer to the full listing of Field insects in the Wheat section - **Note: Pea Weevil tolerances.**

Measured as count per 400 grams.

9.4.11 Pea Weevil

There is a NIL tolerance for live Pea Weevil during harvest receivals.

NOTE: Pea Weevil contaminated loads, within normal receival tolerances, may be accepted at selected sites at the end of harvest. This would be conditional on suitable facilities being available, and with no possibility of cross infestation of other commodities.

9.4.12 Ryegrass Ergot

Ryegrass Ergot is measured as the total length of all pieces laid end to end per 400 grams.

9.5 Lupin Standards

The following receival standard applies to the classification of Australian Lupins and is equivalent to Pulse Australia's Lupins - Angustifolius Minimum Receival Standard farmer Dressed CSP 8.1.1.

There are no varietal restrictions in Lupin grades. Refer to the list of acceptable Lupin varieties in this section.

9.5.1 Lupin Varieties

While there are no varietal requirements for Lupins, the variety needs to be noted on the Grower Receival transaction. Only Lupins of the Angustifolius type are received into Lupin segregations. Varieties and codes to be used are below.

| VARIETY | CODE | VARIETY | CODE |
|-----------|------|------------|------|
| Belara | BELU | Myallie | ELU |
| Chittick | CLU | Quilnock | QLU |
| Danja | DLU | Tallerack | TALU |
| Geebung | BLU | Tanjil | TLU |
| Gungurru | GLU | Unicrop | ULU |
| Illyarrie | ILU | Uniharvest | NLU |
| Jindalee | JLU | Wandoo | WALU |
| Kalya | LLU | Warrah | WLU |
| Mandelup | MAN | Wonga | OLU |
| Marri | RLU | Yandee | ALU |
| Mason | MALU | Yorrel | YLU |
| Merrit | MLU | Unknown | XLU |
| Moonah | MOLU | | |

Albus, Yellow or Rough Seeded Lupins are not accepted into the LUPIN segregations.

| TYPE | VARIETY | CODE |
|------------|-------------|------|
| Albus spp. | Kiev Mutant | KLU |
| | Hamburg | HLU |
| Yellow spp | Wodjil | |

9.5.2 Objectionable Material

There is a **NIL tolerance** for:

- Animal excreta, rodents, live grain and stored product pests (including live adult Pea Weevil), or animal carcasses.
- Sticks, stones and mineral matter in excess of tolerances. (If excess sticks and stones are detected at the classification platform or at the grid, but not in the 200 gram sample the load is still rejectable).
- Pickling compounds / seed dressings, any chemical not registered for use on stored pulses or in excess of legal tolerances or any fungicide added to the pulse as a seed dressing, any tainting agents and / or other contaminants imparting an odour not normally associated with the pulse.
- Toxic and / or Noxious weed seeds which are prohibited by state laws against inclusion in stock feeds.

The Lupins shall be of current season and be dry and mature.

9.5.3 Moisture

The amount of water measured in a sample of Lupins. Moisture is measured on the Kett Moisture meter using the Oat Conversion scale.

Measured as a %.

9.5.4 Purity

The sample may contain a minimum by weight of **97%** Minimum of Whole Angustifolius Lupins, defective Angustifolius Lupins and seed coats.

9.5.5 Defective Lupins

Defective Lupins are those not of the specified type. Angustifolius Lupin kernel that are broken, heat damaged, hail damaged, frosted, insect damaged, shriveled, split, chipped, sprouted, affected by mould (field or storage). Includes pods that contain Angustifolius lupins whether broken or unbroken and loose seed coat.

Includes a maximum tolerance for Poor Colour.

Also includes the following specifications on bitter dark seeds and discoloured Lupins.

| MAXIMUM TOLERANCES IN DEFECTIVE LUPINS | |
|---|---|
| Bitter Dark Seeded Lupins | 2 seeds in a 200 gram sample |
| Discoloured lupins (reddish / tan colour) | 36 seeds of which no more than 17 seeds shall be affected with the disease Phomopsis (grey mould discolouration of the seed coat) |

Measured as a % by weight.

9.5.6 Poor Colour

Includes seeds that are Yellow Reddish / Tan coloured Lupins.

The tolerance is measured in seed count per 200 grams.

9.5.7 Foreign Material

Foreign Material includes unmillable material and all vegetable matter other than Angustopholius Lupin seed material. This includes stalks and plant material that may be connected with the plant.

Foreign Material includes, but is not limited to, unmillable material, cereal grains, wild oats, oil seeds, other pulses, weed seeds not otherwise specified and any vegetable matter other than Lupin seed material.

Measured as a % by weight.

9.5.8 Unmillable Material

Includes soil, stones, metal, and non vegetable matter. Soil is defined as clumps of 2 mm diameter or greater.

There is a maximum tolerance for soil within the unmillable category and needs to be assessed separately.

Measured as a % by weight.

9.5.9 Nominated Foreign Seeds

Refer to Nominated Weed Seed Contaminants earlier in this section.

9.5.10 Snails

Refers to Snails Dead or Alive, Whole or substantially whole (more than half) including bodies per a 200 gram sample.

Measured as count per 200 grams.

9.5.11 Field Insects

Refers to insect contaminants that do not cause damage to stored grain products. Tolerances are for Dead or Alive per 200 grams.

Refer to the full listing of Field insects in the Wheat section - **Note: Pea Weevil tolerances.**

Measured as count per 200 grams.

9.5.12 Pea Weevil

There is a NIL tolerance for live Pea Weevil during harvest receivals.

Note: Pea Weevil contaminated loads, within normal receival tolerances, may be accepted at selected sites at the end of harvest. This would be conditional on suitable facilities being available, and with no possibility of cross infestation of other commodities.

9.5.13 Ryegrass Ergot

Ryegrass Ergot is measured as the total length of all pieces laid end to end per 200 grams.

9.6 Chick Peas Standards

9.6.1 Chick Pea Varieties and Codes

There is a distinct requirement for varietal segregation in chickpeas; Desi cannot be stored with Kabuli's and vice versa. The codes listed below must be noted on the receival weighnote to confirm the variety.

| VARIETY | CODE | CHICKPEA TYPE |
|-------------|------|---------------|
| Almaz | ALM | Large Kabuli |
| Amethyst | ACP | Desi |
| Barwon | BCP | Desi |
| Bumper | BUCP | Kabuli |
| Desavic | VCP | Desi |
| Dooen | DCP | Desi |
| Flipper | FLIP | Desi |
| Garnet | GCP | Kabuli |
| Genesis 090 | GENE | Small Kabuli |
| Genesis 508 | GEN8 | Desi |
| Genesis 509 | GEN9 | Desi |
| Heera | HCP | Desi |
| Howzat | HOCP | Desi |
| Jimbour | JCP | Desi |
| Lasseter | LCP | Desi |
| Nafice | NAF | Large Kabuli |
| Norwin | NCP | Desi |
| Senson | SCP | Desi |
| Sona | SOCP | Desi |
| Tyson | TCP | Desi |
| Unknown | XCP | Call QTS |

9.6.2 Australian Desi Type Chick Peas (CHIC)

The following receival standard applies to the classification of Australian Desi Type Chick Peas and is equivalent to Pulse Australia's Chick Peas Desi Type Minimum Receival Standard Farmer Dressed CSP 4.1.1.

Chick Pea segregations are variety based.

Only Desi type varieties can be accepted into the Desi Chick Pea segregation.

9.6.2.1 Objectionable Material

There is a **NIL tolerance** for

- Animal excreta, rodents, live grain and stored product pests (including live adult Pea Weevil), or animal carcasses.
- Sticks, stones and mineral matter in excess of tolerances. (If excess sticks and stones are detected at the classification platform or at the grid, but not in the 200 gram sample the load is still rejectable).

- Pickling compounds / seed dressings, any chemical not registered for use on stored pulses or in excess of legal tolerances or any fungicide added to the pulse as a seed dressing, any tainting agents and / or other contaminants imparting an odour not normally associated with the pulse.
- Toxic and / or Noxious weed seeds which are prohibited by state laws against inclusion in stock feeds.

The Desi type Chickpeas should be sound, dry, fresh and light to medium brown in colour (a slight greenish tinge is allowed). Black is excluded as the predominating class.

9.6.2.2 Moisture

The amount of water measured in a sample of Lupins. Moisture is measured on the Kett Moisture meter using the Pea Conversion scale.

Measured as a %.

9.6.2.3 Purity

The sample will contain a minimum of **97%** by weight of whole Desi type chickpeas, defective Desi type Chickpeas and seed coats.

9.6.2.4 Defective Chick Peas

Defective Desi Type Chick Peas are those Desi type Chickpea kernels that are split, chipped, broken, shriveled, insect damaged, haled damaged, heat damaged, frosted, caked, bin burnt, sprouted, fully green and / or affected by mould (storage and field). Includes pods that contain Desi type Chickpeas, whether broken or unbroken and loose seed coats and screenings.

*For receival into this grade Chickpeas must be Desi -Type (see list above)

Includes Poor Colour and Ascochyta lesions.

Screen size

3.97mm slotted hole: Chickpea material defective if passing through.

9.6.2.5 Poor Colour Chick Peas

Poor colour Chick Peas are those where the kernel is distinctly blemished and / or off colour from the characteristic yellow of the predominating class. Must comply with the physical characteristic detailed earlier and the 1% visible Ascochyta detailed below.

Measured as a % by weight.

9.6.2.6 Visible Ascochyta

Visible Ascochyta means that an ascochyta lesion is visible on the kernel. Classifiers are required to break through the seed coat of they are not confident that the lesion has penetrated to the seed.

Measured as a % by weight.

9.6.2.7 Foreign Material

Foreign Material includes unmillable material and all vegetable matter other than Desi type chickpea seed material including not more than 2% Field Peas.

Foreign Material includes, but is not limited to, unmillable material, cereal grains, wild oats, oil seeds, other pulses, weed seeds not otherwise specified and any vegetable matter other than Desi Chick Pea seed material.

Measured as a % by weight.

9.6.2.8 Unmillable Material

Includes soil, stones, metal and non-vegetable matter. Soil is defined as clumps of 2mm diameter or greater.

There is a maximum tolerance for soil within the unmillable category and needs to be assessed separately.

Measured as a % by weight.

9.6.2.9 Nominated Foreign Seeds

Refer to Nominated Weed Seed Contaminants earlier in this section.

9.6.2.10 Snails

Refers to Snails Dead or Alive, Whole or substantially whole (more than half) including bodies per a 200 gram sample.

Measured as count per 200 grams.

9.6.2.11 Field Insects

Refers to insect contaminants that do not cause damage to stored grain products. Tolerances are for Dead or Alive per 200 grams.

Refer to the full listing of Field insects in the Wheat section - **Note: Pea Weevil tolerances.**

Measured as count per 200 grams.

9.6.2.12 Pea Weevil

There is a NIL tolerance for live Pea Weevil during harvest receivals.

NOTE: Pea Weevil contaminated loads, within normal receival tolerances, may be accepted at selected sites at the end of harvest. This would be conditional on suitable facilities being available, and with no possibility of cross infestation of other commodities.

9.6.2.13 Ryegrass Ergot

Ryegrass Ergot is measured as the total length of all pieces laid end to end per 200 grams.

9.6.3 Australian Kabuli Chick Peas Small (CHKS) / Large (CHKL)

The following receival standard applies to the classification of Australian Kabuli Chick Peas I and is equivalent to Pulse Australia's Chickpeas Kabuli Type Minimum Receival Standard Farmer Dressed CSP 4.3.3 (Small, CHKS) / CSP 4.3.1 (Large, CHKL).

Chick Pea segregations are variety based.

Only Kabuli type varieties can be accepted into the Kabuli Chick Pea segregation.

9.6.3.1 Physical Characteristics

There is a **NIL tolerance** for

- Animal excreta, rodents, live grain and stored product pests (including live adult Pea Weevil), or animal carcasses.
- Sticks, stones and mineral matter in excess of tolerances. (If excess sticks and stones are detected at the classification platform or at the grid, but not in the 200 gram or 400 gram sample the load is still rejectable).
- Pickling compounds / seed dressings, any chemical not registered for use on stored pulses or in excess of legal tolerances or any fungicide added to the pulse as a seed dressing, any tainting agents and / or other contaminants imparting an odour not normally associated with the pulse.
- Toxic and / or Noxious weed seeds which are prohibited by state laws against inclusion in stock feeds.

The Kabuli Chickpeas should be sound, dry, fresh and cream to light brown in colour. Dark brown to black is excluded as the predominating class.

9.6.3.2 Moisture

The amount of water measured in a sample of Lupins. Moisture is measured on the Kett Moisture meter using the Pea Conversion scale.

Measured as a %.

9.6.3.3 Purity

The sample will contain a minimum of **97%** by weight of whole Kabuli type Chickpeas, defective Kabuli type Chickpeas and seed coats.

9.6.3.4 Defective Chick Peas

Defective Kabuli Type Chick Peas are those not of the specified variety and Kabuli type Chickpea kernels that are broken, split, insect damaged, hail damaged, heat damaged, shriveled, sprouted, frosted, caked, bin burnt and / or affected by mould (storage and field). Includes whole pods containing seed and those passing through a 5.00mm round hole screen for Kabuli Small type and a 6.00mm round hole screen for Kabuli Large type.

*For receival into this grade Chickpeas must be Kabuli Type (see list above)

Includes Poor Colour

Screen sizes

Kabuli Small 5.00mm Round Hole: Chickpea material defective if falls through.

Kabuli Large 6.00mm Round Hole: Chickpea material defective if falls through.

9.6.3.5 Poor Colour Chick Peas

Poor Colour Chick Peas are those where the kernel is distinctly blemished and / or off colour from the characteristic yellow colour of the predominating class. Must comply with the physical characteristic detailed earlier and the 1% visible Ascochyta detailed below.

Measured as a % by weight.

9.6.3.6 Visible Ascochyta

Visible Ascochyta means that an ascochyta lesion is visible on the kernel. Classifiers are required to break through the seed coat if they are not confident that the lesion has penetrated to the seed.

Measured as a % by weight.

9.6.3.7 Foreign Material

Foreign Material includes unmillable material and all vegetable matter other than Kabuli type chickpea seed material.

Foreign Material includes, but is not limited to, unmillable material, cereal grains, wild oats, oil seeds, other pulses, weed seeds not otherwise specified and any vegetable matter other than Desi Chick Pea seed material.

Measured as a % by weight.

9.6.3.8 Unmillable Material

Includes soil, stones, metal and non-vegetable matter. Soil is defined as clumps of 2 mm diameter or greater.

There is a maximum tolerance for soil within the unmillable category and needs to be assessed separately.

Measured as a % by weight.

9.6.3.9 Nominated Foreign Seeds

Refer to Nominated Weed Seed Contaminants earlier in this section.

9.6.3.10 Snails

Refers to Snails Dead or Alive, Whole or substantially whole (more than half) including bodies per a 200 gram sample for Kabuli Small types or 400 grams for Kabuli Large.

Measured as count per 200 grams or 400 grams depending on type.

9.6.3.11 Field Insects

Refers to insect contaminants that do not cause damage to stored grain products. Tolerances are for Dead or Alive per 200 grams for Kabuli Small types or 400 grams for Kabuli Large.

Refer to the full listing of Field insects in the Wheat section - **Note: Pea Weevil tolerances.**

Measured as count per 200 grams or 400 grams depending on type.

9.6.3.12 Pea Weevil

There is a NIL tolerance for live Pea Weevil during harvest receivals.

Note: Pea Weevil contaminated loads, within normal receival tolerances, may be accepted at selected sites at the end of harvest. This would be conditional on suitable facilities being available, and with no possibility of cross infestation of other commodities.

9.6.3.13 Ryegrass Ergot

Ryegrass Ergot is measures as the total length of all pieces laid end to end per 200 grams for Kabuli Small types or 400 grams for Kabuli Large.

9.7 Vetch Receival Standards

The following receival standard applies to the classification of Australian Vetch and is equivalent to Pulse Australia’s Vetch Minimum Receival Standard Farmer Dressed CSP 12.1.

Vetch grades are varietal based.

VETB grade will only accept the variety Blanchfleur

VETL grade will only accept the variety Languedoc.

VETM grade will only accept the variety Marova.

9.7.1 Vetch Varieties

There is a distinct requirement for varietal segregation in vetch. The codes listed below must be noted on the receival weighnote to confirm the variety.

| VARIETY | CODE |
|--------------|------|
| Blanchefleur | BVE |
| Cummins | CVE |
| Languedoc | LVE |
| Morava | MVE |
| Namoi | NVE |
| Popany | PVE |
| Unknown* | XVE |

If variety is unknown call QTS for assistance.

9.7.2 Physical Characteristics

There is a **NIL tolerance** for

- Animal excreta, rodents, live grain and stored product pests (including live adult Pea Weevil), or animal carcasses.
- Sticks, stones and mineral matter in excess of tolerances. (If excess sticks and stones are detected at the classification platform or at the grid, but not in the 200 gram sample the load is still rejectable).
- Pickling compounds / seed dressings, any chemical not registered for use on stored pulses or in excess of legal tolerances or any fungicide added to the pulse as a seed dressing, any tainting agents and / or other contaminants imparting an odour not normally associated with the pulse.
- Toxic and / or Noxious weed seeds which are prohibited by state laws against inclusion in stock feeds.

The vetch must be whole, sound, dry, fresh and colour typical of the variety of the season.

9.7.3 Moisture

The amount of water measured in a sample of Vetch. Use the Calibration table below for measurement of moisture.

9.7.3.1 Marconi Moisture Meter Calibration Table

To convert the reading obtained for a ground sample of Vetch to an actual moisture content percentage using the Marconi Moisture Meter, the calibration / correction tables given below must be used.

Calibration Table To convert meter reading to a percentage moisture reading for Vetch

| GROUND BERRY DIAL READING | MOISTURE CONTENT AT 68°F (20°C) | GROUND BERRY DIAL READING | MOISTURE CONTENT AT 68°F (20°C) |
|---------------------------|---------------------------------|---------------------------|---------------------------------|
| 00 | 9.9 | 16 | 11.5 |
| 01 | 10.0 | 17 | 11.6 |
| 02 | 10.1 | 18 | 11.7 |
| 03 | 10.2 | 19 | 11.8 |
| 04 | 10.3 | 20 | 11.9 |
| 05 | 10.4 | 21 | 12.0 |
| 06 | 10.5 | 22 | 12.1 |
| 07 | 10.6 | 23 | 12.2 |
| 08 | 10.7 | 24 | 12.3 |
| 09 | 10.8 | 25 | 12.4 |
| 10 | 10.9 | 26 | 12.5 |
| 11 | 11.0 | 27 | 12.6 |
| 12 | 11.1 | 28 | 12.7 |
| 13 | 11.2 | 29 | 12.8 |
| 14 | 11.3 | 30 | 12.9 |
| 15 | 11.4 | | |

Temperature Correction Table

| °C | TABLE | °C | TABLE |
|----|-------|----|-------|
| 00 | +2.0% | 22 | -0.2% |
| 02 | +1.8% | 24 | -0.4% |
| 04 | +1.6% | 26 | -0.6% |
| 06 | +1.4% | 28 | -0.8% |
| 08 | +1.2% | 30 | -1.0% |
| 10 | +1.0% | 32 | -1.2% |
| 12 | +0.8% | 34 | -1.4% |
| 14 | +0.6% | 36 | -1.6% |
| 16 | +0.4% | 38 | -1.8% |
| 18 | +0.2% | 40 | -2.0% |

Each degree centigrade difference in temperature corresponds to a 0.1% moisture correction.

Example

Grind Sample and place in Moisture Meter Clamp

If Reading 16 on Dial = 11.5% at 20°C as per above

If actual temperature is 26°C then deduct 0.6%

Then moisture content = 11.5% - 0.6% = 10.9%.

9.7.4 Purity

The sample will contain a minimum of **97%** by weight of vetch seed material that includes whole vetch, defective vetch, skins and de-coated vetch.

9.7.5 Defective Vetch

Includes vetch not of the specified type*. Vetch kernels that are broken, heat damaged, hail damaged, insect damaged, shriveled, split, chipped, frosted, sprouted, caked, bin burnt, affected by mould (field or storage). Includes pods that contain Vetch, whether broken or unbroken and loose seed coat. Vetch where whole or part of the seed coat only is damaged is included as sound Vetch.

VETB – specified variety Blanchfleur

VETL – specified variety Langedoc

VETM – Specified variety Morava

Measured as a % by weight.

9.7.6 Variety Segregations

Vetch shall be segregated separately by variety. There are 4 main varieties of vetch grown in South Australia. The code must be noted on the weight ticket in the variety box.

| VARIETY | CODE | DESCRIPTION |
|------------------------------|------|---|
| Blanchefleur | BVE | Reddish brown with mottles. Seeds are pillow shaped and orange when split. |
| Langedoc | LVE | Brownish grey with mottles. Seeds are pillow shaped and beige (brownish grey) when split. |
| Namoi (woolypod) | NVE | Blackish brown seeds round, but with slightly squashed look. Split seeds are bright yellow. |
| Popany (purple vetch) | PVE | Velvet black round seed, with white scar. Split seeds are yellow. |
| Marova | MVE | |

Namoi vetch and Popany vetch are not suitable for animal (non-ruminant) usage and processors require no more than 1% admixture in Blanchefleur and Langedoc vetch for export and human consumption.

9.7.7 Poor Colour

Poor colour Vetch as those seeds whose seed coat or kernels are distinctly off colour from the characteristic colour of the predominating class.

Measured as a % by weight.

9.7.8 Foreign Material

Foreign Material includes all unmillable material and all vegetable material other than Vetch seed material.

Foreign Material includes but is not limited to unmillable material, cereal grains, wild oats, oil seeds, other pulses, weed seeds not otherwise specified and any vegetable matter other than Vetch seed material.

Measured as a % by weight.

There is a specified limit for cereal grains in Foreign Material in Vetch. See the Vetch Receival Standards Reference Chart for tolerances.

9.7.9 Unmillable Material

Includes soil, stones, metal and non-vegetable matter. Soil is defined as clumps of 2 mm diameter or greater.

There is a maximum tolerance for SOIL within the unmillable category and needs to be assessed separately.

Measured as a % by weight.

9.7.10 Nominated Foreign Seeds

Refer to Nominated Weed Seed Contaminants earlier in this section.

9.7.11 Snails

Refers to Snails Dead or Alive, Whole or substantially whole (more than half) including bodies per a 200 gram sample.

Measured as count per 200 grams.

9.7.12 Field Insects

Refers to insect contaminants that do not cause damage to stored grain products. Tolerances are for Dead or Alive per 200 grams.

Refer to the full listing of Field insects in the Wheat section - **Note: Pea Weevil tolerances.**

Measured as count per 200 grams.

9.7.13 Pea Weevil

There is a NIL tolerance for live Pea Weevil during harvest receivals.

Note: Pea Weevil contaminated loads, within normal receival tolerances, may be accepted at selected sites at the end of harvest. This would be conditional on suitable facilities being available, and with no possibility of cross infestation of other commodities.

9.7.14 Ryegrass Ergot

Ryegrass Ergot is measured as the total length of all pieces laid end to end per 200 grams.

9.8 Lentils Classification and Standards

9.8.1 Lentil Varieties

There is a distinct requirement for varietal segregation in Lentils. The codes listed below must be noted on the Grower Receival transaction to confirm the variety.

| VARIETY | CODE | COLOUR |
|------------|------|-----------|
| Aldinga | ALE | Red |
| Ansak | ANLE | Red |
| Callisto | OLE | Red |
| Cassab | CALE | Red |
| Cobber | CLE | Red |
| Digger | DLE | Red |
| Invincible | ILE | Green |
| Kye | KLE | Red |
| Laird | LLE | Green |
| Matilda | MLE | Green |
| Northfield | NLE | Red |
| Nugget | NULE | Red |
| Spinner | SLE | Green |
| Unknown* | XLE | Refer QTS |

* If variety is unknown call QTS for assistance

9.8.2 Lentil Classification Procedure

The following procedure is to be used when classifying a load of Lentils. Use the following screen sizes for classification.

| PULSE | SCREEN |
|---------------------|-----------------------------------|
| Aldinga | 2.2mm Slotted Agtator Type Screen |
| All Other Varieties | 2.0mm Slotted Agtator Type Screen |

1. Sample the load presented for delivery according to the receival sampling procedure to produce a representative **Grower Load Composite (GLC)** sample.
2. From the GLC draw a subsample to be tested for **Moisture** content. For lentils a calibration for moisture is available on the Infratec.
3. Thoroughly mix the GLC and weigh out 200 grams of lentils using the digital scales.
4. Depending on the variety select the required Agtator Type screen for assessment. Screen the lentils – using Hand Shake method (40 shakes).
5. Separate the screen and tray and examine the contents for the presence of **NIL Tolerance Contaminants** such as animal excreta, sticks and mineral matter and pickling compounds / seed dressings.
6. Examine the sample for the presence of **Nominated Foreign Weed Seeds**. See earlier in this section for nominated weed seeds / pods.

7. Check the sample for **Snails** and **Field Insects**. Tolerances are set as a maximum count per 200 grams.
8. Remove all **Foreign Material** from the sample. Weigh this material and divide by two to express it as a percentage % Foreign Material.
9. From the foreign material remove any **Unmillable Material**. Weigh this separately, divide this result by two to express as a percentage % Unmillable Material.
10. From the unmillable material, remove the **Soil, Sand, Earth and Stones**. Weigh this separately, divide the result by two to express as a percentage % Soil.
11. Remove **Small Foreign Seeds** and weigh. Divide this result by two to express as a percentage - % Small Foreign Seeds.
12. Together with the lentil material that falls through the screen, remove any **Defective** lentils from above the screen and weigh. Divide the weight by 2 to determine the % Defective. Any whole lentils that fall through the screen are classed as defective.

Defective lentils are those not of the specified variety. Lentil kernels that are broken, heat damaged, hail damaged, insect damaged, frosted, shriveled, split, chipped, caked, bin burnt, sprouted, affected by mould (field and storage) or black. It includes pods that contain Lentils whether broken or unbroken and loose seed coat and screenings.

Refer to the Pulse Australia Lentil Photographic Charts.
13. From the sample remove any lentils not of the specified **Variety** and weigh. Divide this weight by 2 to determine % Varietal Restriction.
14. Weigh out a 100 gram sample from the lentil remaining above the screen. Remove any lentils that have excessive discolouration of the seed coat as per the Pulse Australia Lentil Photographic standards. Include any disease, frost and water staining. Weigh the poor coloured seeds to determine the **% Poor Colour Seed Coat**.
15. Weigh out a 130 gram sample from the grain remaining above the screen. You may need to screen a new sample. Dehull the sample using the **Dehuller**. The time taken to dehull the Lentils may vary from year to year - as an indication new season Lentils will take approximately 1 - 2 minutes. Weigh out 100 grams of the dehulled lentils, place into a triangular tray and remove all the lentils not of the dominant colour (red lentil types - red kernels) as per the Pulse Australia Lentil Photographic standards. Weigh the poor coloured kernels to determine the **% Poor Colour Kernel**.
16. Calculate the % Total Defective Seeds by adding Defective, Varietal Restriction, Poor Colour Seed Coat and Poor Colour Kernel.
17. At Manual Data Entry sites (MLE), record the results of the quality tests along with the pay and bin grade in the quality section of the Other Commodities Receipts Transaction according to the instructions in the Commodity Document Manual. Ensure that the quality test data entered is compatible with classification, otherwise the transaction will be held in error when it is entered at the Business Centre, delaying payment to the grower until the information is corrected.
18. At Operational Management System sites (OMS), enter the test results onto the computer according to the instructions in the OMS User Guide. The computer can derive a list of the acceptable pay and bin grades in order of rank. However it is important to remember that this is only an aid for the classifier and does not absolve the classifier from responsibility of classifying the load.
19. Draw the appropriate amount of sample from the GLC sample to add to the **Partition Quality Sample** or **Bin Grade Composite** samples and collect any other samples requested by Head Office.

9.8.3 Lentil Standards

Lentil Receival Standards are extremely customer specific and standards may vary from year to year and customer to customer.

The following standard applies to the classification of Australian Red Lentils and is equivalent to Pulse Australia's Lentils Whole Red No. 1 Grade Minimum Receival Standards Farmer Dressed CSP 7.2.1.

Lentil segregations are variety based. Only the specified variety is to be taken into the segregations.

ALD1 Only the variety Aldinga is acceptable.

NOR1& NORS Only the variety Northfield is acceptable

NUG1 & NUGS Only the variety Nugget is acceptable.

Other variety specific grades may be introduced depending on customer requirements.

9.8.3.1 Objectionable Material

There is a **NIL tolerance** for

- Animal excreta, rodents, live grain and stored product pests (including live adult Pea Weevil), or animal carcasses.
- Sticks, stones and mineral matter in excess of tolerances. (If excess sticks and stones are detected at the classification platform or at the grid, but not in the 200 gram sample the load is still reject able).
- Pickling compounds / seed dressings, any chemical not registered for use on stored pulses or in excess of legal tolerances or any fungicide added to the pulse as a seed dressing, any tainting agents and / or other contaminants imparting an odour not normally associated with the pulse.
- Toxic and / or Noxious weed seeds which are prohibited by state laws against inclusion in stock feeds.

The lentils must be hard and well filled.

9.8.3.2 Moisture

The amount of water measured in a sample of Lentils. A Lentil moisture calibration is available on the Infratec.

9.8.3.3 Purity

The sample shall contain a minimum of 97% for Grade 1 or 95% for Grade 2 by weight of whole lentils, defective lentils and seed coats.

9.8.3.4 Defective Lentils

Refers to Lentils not of the specified variety. Lentil kernels that are broken, heat damaged, hail damage, insect damage, frosted, shriveled, split, chipped, caked, bin burnt, sprouted, affected by mould (field and storage) or black. Includes pods that contain lentils whether broken or unbroken and loose seed coat and screenings. Refer to the Pulse Australia Lentil photographic standards.

Total Defective Lentils includes maximum tolerances for

- Defects (other than Pool Colour and Varietal Restriction)
- Varietal Restriction
- Poor Colour Seed Coat
- Poor Colour Kernel

- **REFER** to the Lentil Receival Standards Reference Chart for details on the tolerances for each quality parameter.

Screen Sizes

2.20mm slotted when assessing a load of Aldinga Lentils

2.00mm slotted when assessing a load of any other variety other than Aldinga.

If whole lentils fall through the screen the lentils are classed as defective. All material that passes through the screen is part of defective or foreign material as applicable.

Measured as a % by weight.

9.8.3.5 Varietal Restriction

Refers to Lentils not of the specified variety.

Measured as a % by weight.

9.8.3.6 Poor Colour Seed Coat

Poor Coloured Seed Coat lentils are those discoloured lentils that have excessive discolouration of the seed coat as per the Pulse Australia Lentil Photographic charts. Includes disease, frost and water staining.

Measured as a % by weight.

9.8.3.7 Poor Colour Kernel

Poor Colour kernels refers to discoloured Lentils which have excessive discolouration of the kernel as per the Pulse Australia Lentil Photographic charts. Includes any disease, frost and water staining and green, brown, black, yellow, bleached and chalky white kernels.

Measured as a % by weight.

9.8.3.8 Foreign Material

Refers to unmillable material, and all vegetable matter other than lentil seed material.

Measured as a % by weight.

9.8.3.9 Unmillable Material

Includes soil, stones, metal and all non-vegetable material. Soil is defined as clumps of 2mm diameter or greater.

There is a maximum tolerance for SOIL within the unmillable category and needs to be assessed separately.

Measured as a % by weight.

9.8.3.10 Nominated Foreign Seeds

Refer to Nominated Weed Seed Contaminants earlier in this section.

9.8.3.11 Snails

Refers to Snails Dead or Alive, Whole or substantially whole (more than half) including bodies per a 200 gram sample.

Measured as count per 200 grams.

9.8.3.12 Field Insects

Refers to insect contaminants that do not cause damage to stored grain products. Tolerances are for Dead or Alive per 200 grams.

Refer to the full listing of Field insects in the Wheat section - **Note: Pea Weevil tolerances.**

Measured as count per 200 grams.

9.8.3.13 Pea Weevil

There is a NIL tolerance for live Pea Weevil during harvest receivals.

Note: Pea Weevil contaminated loads, within normal receival tolerances, may be accepted at selected sites at the end of harvest. This would be conditional on suitable facilities being available, and with no possibility of cross infestation of other commodities.

9.8.3.14 Ryegrass Ergot

Ryegrass Ergot is measures as the total length of all pieces laid end to end per 200 grams.

9.9 Broad Bean Classification and Standards

9.9.1 Broad Bean Varieties

While there is no requirement for varietal segregation in Broad Beans the codes listed below must be noted on the receiveal weighnote to confirm the variety.

| VARIETY | CODE |
|-----------|------|
| Aquadulce | QBB |
| Toranto | TBB |
| Unknown* | XBB |

Broad Bean standards are customer specific. Please contact Quality and Technical Services Department for any queries in regard to the classification process or standards.

9.9.2 Broad Bean Classification Procedure

1. The following procedure is to be used when classifying a load of Broad Beans.
2. Sample the load presented for delivery according to the Receiveal Sampling procedure detailed in section 1 to produce a representative **Grower Load Composite (GLC)** sample.
3. From the GLC draw a subsample to be tested for **Moisture** content. At least 50 grams of Broad Beans needs to be ground using the Coffee Grinder and thoroughly mixed. A sub-sample is used for the moisture assessment. For J model Kett Moisture Meter set to the Faba Beans Conversion Scale or for the E model using the Kett conversion chart for Faba Beans. Operating instructions for the Kett Moisture Meters are given in section 2.

If the moisture content exceeds the allowable limit by 1.0% then the load must be rejected and issued a Temporary Decline notice.

If the moisture exceeds the allowable limits but not by 1.0% then retest 2 further samples and average the three results using the Kett's averaging function.

Should one of the repeats exceed the allowable limit by 1.0%, the load must immediately be issued a Temporary Decline notice.

Should the average moisture content be above the allowable limit the load must be rejected and issued a Temporary Decline notice.

If the average moisture content is below the allowable limit the classification can continue.

4. Weigh a 500 gram sample using the digital scales according to the pulse hand screen and balance procedure in Section 2.

Screens

The following screens will be required for assessment.

- 14.0mm Round Hole (RH)
- 11.0mm Round Hole (RH)
- 6.00mm Slotted

5. Using the combination of 14.0mm screen (top), 11.0mm screen (middle) and 6.00mm (bottom). Sieve approximately 250gm of the 500gm sample.
6. Take the Broad Beans that remain above 14.0mm screen and put aside.

7. Repeat steps 4/- and 5/- for the remaining 250gm.
8. Group all Broad Beans that were retained above 14.0mm screen together.
9. Separate the three screens / trays and examine the contents for any NIL Contaminants such as live grain insects, sticks or animal excreta.
10. Examine the three screens / trays and pick out any Foreign Material and Unmillable Material and Contaminants and separate from defective Broad Bean material.

Foreign Material

Foreign material is all the unmillable material and all vegetable matter other than Broad Bean material.

Weigh the contents to calculate the % **Total Foreign Material (TF)** and record on the transaction.

Unmillable Material

Unmillable material is defined as soil, stones, metals and non vegetable material.

Weigh the contents to calculate the % **Unmillable Material (SA)** and record on the weighnote.

Soil

Check the unmillable material for any soil contamination. Determine the % **Soil (EA)** and record on the transaction.

11. Examine the trays for the presence of Nominated Foreign Weed Seeds.
Any foreign seedpods must be opened and the seeds counted unless the seed pods are specified on the weed seed list.
12. Pick out any defective grains from above the 14.0mm RH screen, 11.0mm RH screen and 6.00 mm slotted screen. Put aside and weigh to calculate the % **Defective Broad Beans (DG)** and record on the transaction.
13. Pick out any broad beans of poor colour from above the 14.0mm RH screen, 11.0mm RH screen and 6.00 mm slotted screen. Weigh the Poor Colour Broad Beans and calculate the % of **Poor Colour (PC)** and record on the weighnote.
14. Weigh the Broad beans remaining above the 14.0 mm screen and record weight as a % (**140**).
15. Weigh the Broad beans remaining above the 11.0 mm screen and record weight as a % (**110**).
16. Weigh the Broad beans above the 6.0 mm screen and record weight as a % (**SB**).
17. Weigh the Broad Bean material (including cracked, chipped, shriveled, splits and small seeds as well as pods and stalk) below the 6.0mm screen and record weight as a % (**SC**). Record the following on the transaction as a percentage. Test Codes are in **bold**.
 - **Total Offal % (OF)** on transaction). Represents Broad Bean material and is the sum of:
 - Defective Material % (**DG** on transaction)
 - Poor Colour % (**PC** on the transaction)
 - Percentage of cracked, chipped, shriveled, splits and small seed as well as pods and stalk Broad Beans below 6.0mm screen (**SC** on transaction)

If OF is above 7.0% the load is rejected.

Other Quality parameters to be recorded include:

- Total Foreign Material % (**TF** in transaction)
- Unmillable Material % (**SA** on transaction)
- Number of Snails (**SNR or SNC** on transaction)

- Percentage of Broad Beans above 14.0mm screen (**140** on transaction, was 14.0mm)
- Percentage of Broad Beans above 11.0mm screen (**110** on transaction)
- Percentage of whole small Broad Beans above 6.0mm / below 11.0mm screen (**SB** on transaction)

9.9.3 Broad Bean Receival Standards

The following receival standards applies to the classification of Australian Broad Beans, this is based on the Pulse Australia Broad Bean Minimum Receival Standard Farmer Dressed CSP 2.1.1. The standards may change due to customer requirements.

9.9.3.1 Objectionable Material

There is a **NIL tolerance** for:

- Animal excreta, rodents, live grain and stored product pests (including live adult Pea Weevil), or animal carcasses.
- Sticks, stones and mineral matter in excess of tolerances. (If excess sticks and stones are detected at the classification platform or at the grid, but not in the 400 gram sample the load is still rejectable).
- Pickling compounds / seed dressings, any chemical not registered for use on stored pulses or in excess of legal tolerances or any fungicide added to the pulse as a seed dressing, any tainting agents and / or other contaminants imparting an odour not normally associated with the pulse.
- Toxic and / or noxious weed seeds that are prohibited by state laws against inclusion in stock feeds.

The Broad Beans shall be sound, dry, fresh and be colour typical for the variety of the season.

9.9.3.2 Moisture

The amount of water measured in a sample of Broad Beans.

The maximum moisture is 13.0% however where aeration is available 14% moisture is acceptable.

The moisture is measured on a Kett Moisture Meter. For the J model Kett Moisture Meter set it to the Faba Beans Conversion Scale or where using an E model use the Kett conversion chart for Faba Beans.

Measured as a %.

9.9.3.3 Purity

The sample must contain a minimum of 97% by weight of Whole Broad Beans, defective Broad Beans and seed coats.

9.9.3.4 Defective Broad Beans

Includes Broad Beans not of the specified variety and Broad Beans that are grub eaten, broken, damaged and split, shriveled, sprouted, frosted, hail damaged, heat damaged, caked, bin burnt, affected by field mould (field or storage) and whole pods containing seed.

Includes maximum tolerances for Mechanical Damage and Poor Colour, Ascochyta and Screenings.

There is a maximum tolerance of Grub Eaten Broad Beans of 1.5 % by weight.

Measured as a % by weight.

9.9.3.5 Poor Colour

Includes Seed Coat or kernel that is distinctly off colour from the characteristic colour of the predominating class. Including evergreens (which has a specified maximum tolerance of 2%), old season, dark beans and NIL tolerance for black beans. Refer to Pulse Australia Broad Bean photographic standards.

Measured as a % by weight.

9.9.3.6 Ascochyta

Refers to Broad Beans with greater than 4 mm spots. No Limit of Broad Beans with less than 4 mm spots. Visible is where the Ascochyta lesion is visible on the seed coat.

Measured as a % by weight.

9.9.3.7 Mechanical Damage

There is a maximum tolerance for kernel damage and skin damage caused by harvesting or handling processes. Kernel damage and skin damage are both part of the quality parameter called Mechanical Damage.

Measured as a % by weight.

9.9.3.8 Screenings

Includes Broad bean material including cracked, chipped, shriveled, splits, and small seed as well as pods and stalks.

Material passing through a 6 mm slotted screen that is not part of foreign material.

Measured as a % by weight.

9.9.3.9 Foreign Material

Foreign Material refers to unmillable material and all vegetable material other than Broad Bean material.

Foreign Material includes, but is not limited to, unmillable material, cereal grains, wild oats, oil seeds, other pulses, weed seeds not otherwise specified and any vegetable matter other than bean seed material.

This includes a maximum tolerance for Unmillable material within Foreign material.

Measured as a % by weight.

9.9.3.10 Unmillable material

Includes soil, stones, metals and non-vegetable matter. Soil is defined as clumps of 2 mm diameter or greater.

There is a maximum tolerance for SOIL within the unmillable category and needs to be assessed separately.

Measured as a % by weight.

9.9.3.11 Nominated Foreign Seeds

Refer to Nominated Weed Seed Contaminants earlier in this section.

9.9.3.12 Snails

Refers to Snails Dead or Alive, whole or substantially whole (more than half) including bodies per a 400 gram sample.

Measured as count per 400 grams.

9.9.3.13 Field Insects

Refers to insect contaminants that do not cause damage to stored grain products. Tolerances are for Dead or Alive per 400 grams.

Refer to the full listing of Field insects in the Wheat Section - **Note: Pea Weevil tolerances.**

Measured as count per 400 grams.

9.9.3.14 Pea Weevil

There is a NIL tolerance for live Pea Weevil during harvest receivals.

NOTE: Pea Weevil contaminated loads, within normal receival tolerances, may be accepted at selected sites at the end of harvest. This would be conditional on suitable facilities being available, and with no possibility of cross infestation of other commodities.

9.9.3.15 Ryegrass Ergot

Ryegrass Ergot is measures as the total length of all pieces laid end to end per 400 grams.

9.10 Pulse Receival Charts

You may add the current Pulse Receival Standards Reference Chart. Refer to the ABB Intranet for the latest revision of the Reference Chart.