



Kluman and Balter Limited

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Product Specification

Product	: Hulled Sunflower Seed		
Size / Weight	: 25kg		
K & B Code	: 160072		
Date	: 18.10.12	Issue:	5.
Reason for issue	: Countries of Origin added		

1. Product Description: Small oval shaped seeds, off white, grey in colour obtained from sunflowers, *Helianthus annuus*.

2. Analytical Standards:

2.1. Chemical:

Parameter	Target Value	Limits	Method / Frequency
Moisture content	10.0% max		
Aflatoxin B1	2ppb max		
Total aflatoxin	4 ppb max		
Free fatty acid	1.0% max as oleic acid		

2.2. Physical, including allowable contaminants and levels and organoleptic attributes:

Parameter	Target Value	Limits	Method / Frequency
Size	9-11mm		
Broken kernels <50%	10% by weight		
Adhering husk	0.25% by weight max		
Insect damage	2% max		
Sclerotina	5 per sack max.		
EVM/Foreign seeds	0.1% max		
Foreign matter (wood, glass, metal etc)	Absent		
Colour	Grey white, with no heat discolouration		
Taste	Characteristic; no off flavours		
Texture	Crisp; no softness		



2.3. Microbiological:

Parameter	Target Value	Limits	Method / Frequency
TVC	<100 000cfu/g	>100 000cfu/g	
Yeasts	<1 000 cfu/g	>1 000 cfu/g	
Moulds	<10 000 cfu/g	>10 000 cfu/g	
Coliforms	<10 000 cfu/g	>100 000 cfu/g	
E.Coli	<10 cfu/g	>20 cfu/g	
Salmonella	Absent per 25g	Present per 25g	

3. Metal Detection:

Non-Ferrous:	2.5 mm	Ferrous:	2.5 mm	Stainless Steel:	3 mm
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Frequency of metal checking metal detector:

4. Nutrition:

Source of data: (USDA Website)

Values per 100g	
Energy, Kcals	610
Energy, Kjoules	2532
Protein	22g
Fat	50g
- of which saturates	6.0g
- of which mono-unsaturates	-
- of which poly-unsaturates	-
trans fatty acids	-
cholesterol	-
Carbohydrate	19g
- of which sugars	3.0g
- of which starch	16.3
Sodium	3mg
Fibre	4.2g

5. Shelf Life:

Shelf life from date of production: 9 months.

Minimum life on delivery to Kluman & Balter: 6 months.

6. Storage and Transport Conditions:

6.1. Storage Conditions: Dry ambient when stored in a cool dry place away from direct sunlight and strong odours

6.2. Transport Conditions: As above.

7. Packaging:

7.1 Primary Packaging: (unit of sale)

Dimensions (L x W x H) mm: mm x mm 420 x 100 x 890

Material and closure: Multi wall paper sack

Weight of primary packaging:

Label position: Front face of sack

Label information: Lot number, commodity name, pack size (net weight), best before end (month/year), country of origin.

Coding information and example:

7.2 Secondary Packaging: n/a

Dimensions (L x W x H) mm:
 Material and closure:
 Weight of secondary packaging:
 Label position:
 Label information:
 Coding information and example:

7.3 Palletisation:

Units per layer: 8 Layers per pallet: 5.
 Pallet type: 4W UK Chep blue (1200 x 1000mm), Wood.
 Height of completed pallet: 1500mm Weight of completed pallet: 1000 kg

8. Weight Control:

Average weight or minimum weight: Minimum
 Target Weight: 25kg Label Weight: 25kg

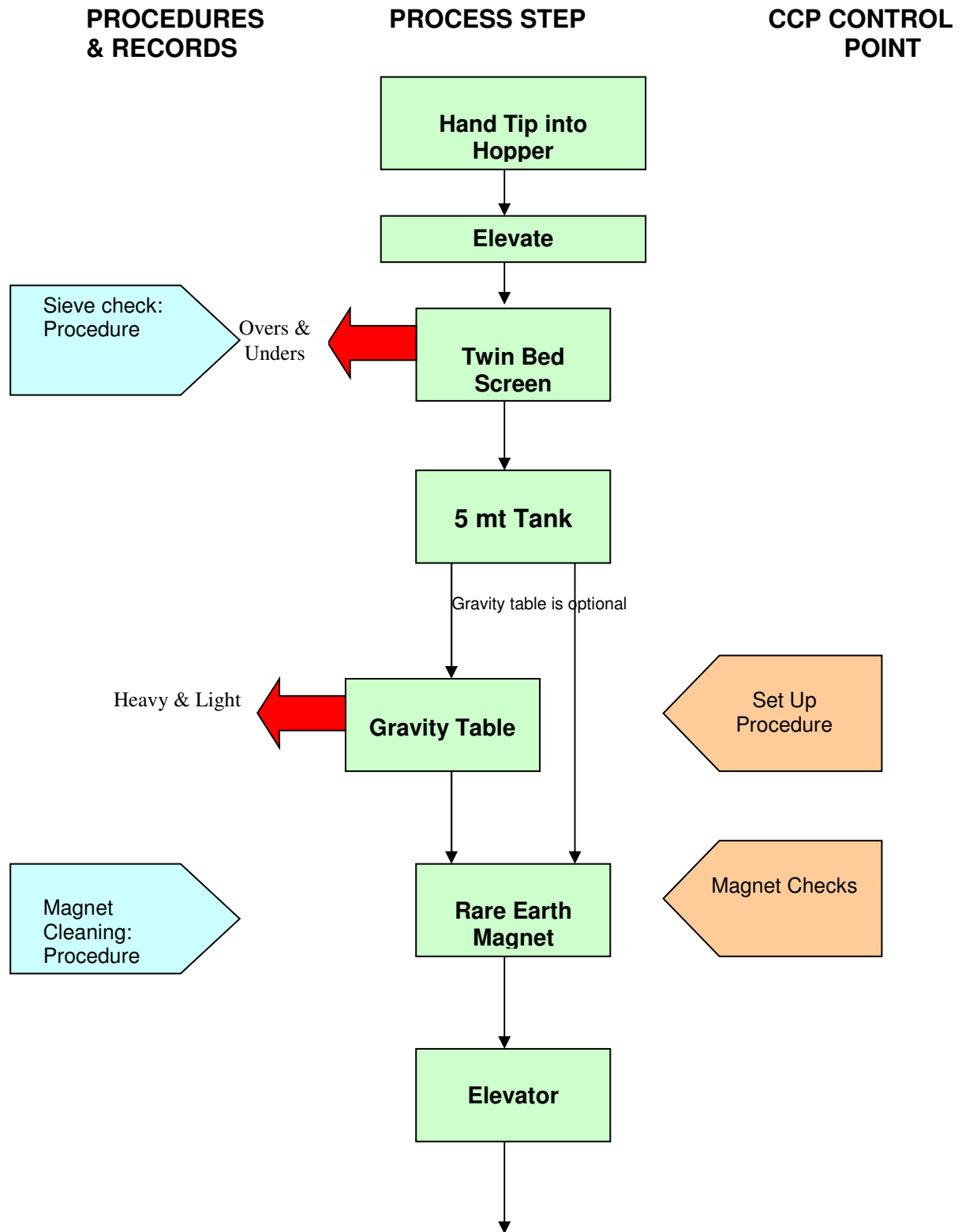
9. Ingredient Declaration (legal): Sunflower Seeds

10. Raw Material Components (in descending order):

Ingredient, including compound ingredients.	%	+ / -	Supplier	Country of Origin	GM Status
Sunflower Seeds (Hulled)	100			Bulgarian/Chinese/USA/Argentinean	GM Free
Total	100				

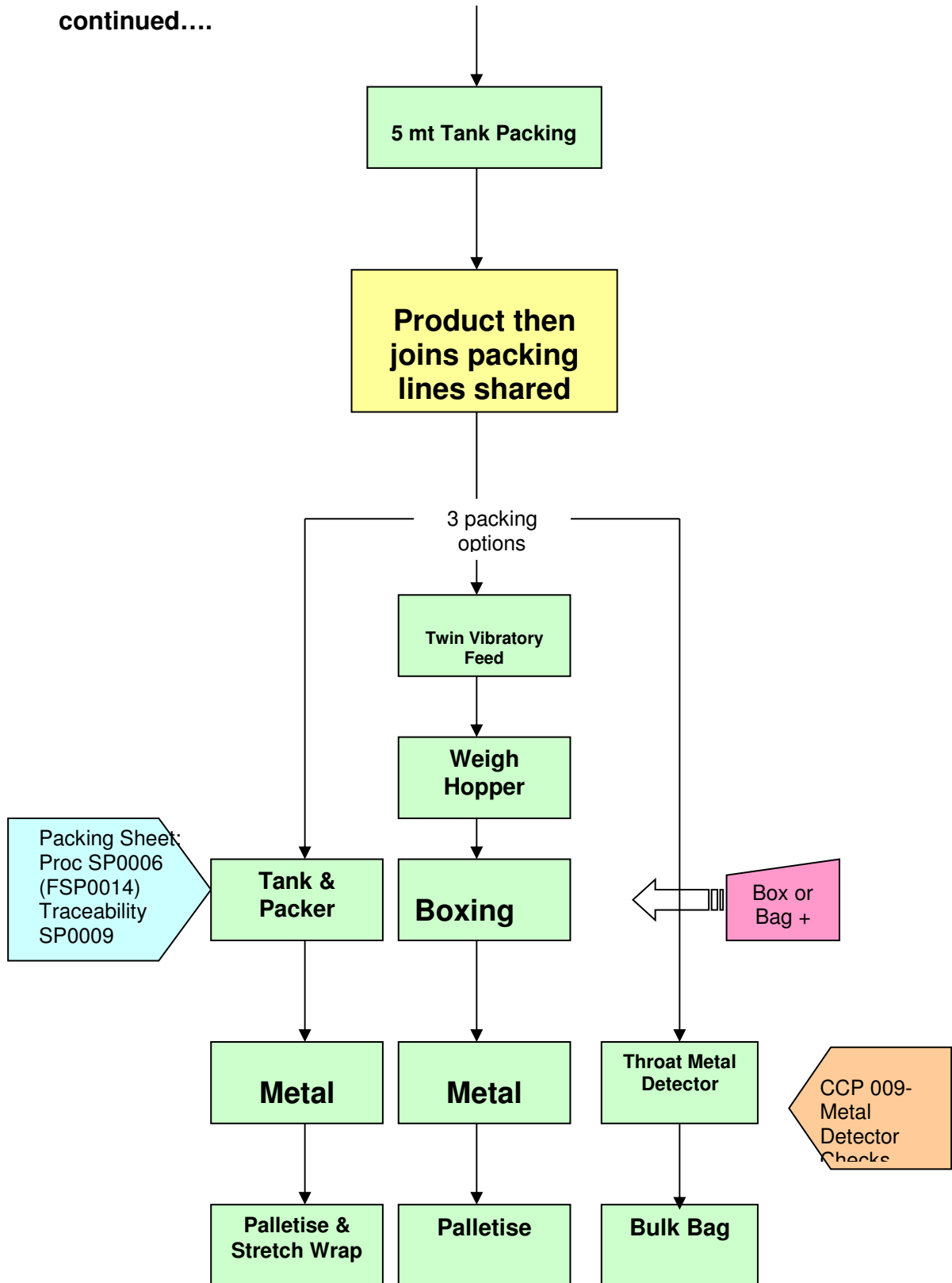
Country of manufacture: Bulgarian/Chinese/USA/Argentinean.

11. Flow diagram of manufacturing process, showing critical control points:



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12. Detail of Critical Control Points:

CCP No.	Hazard Identified	Control Procedure	Critical Limits, reject procedure, check frequency	Responsibility, authority
1. Twin bed screen	Physical, over & undersize material.	Operator training.	Correct size sieve, undamaged. If reject, change sieve & reprocess. Sieve check at start up.	Line Operative, Site Manager.
7. Metal detection bulk	Metal contamination.	In-line metal detector.	2.5mm ferrous. If reject, re-check product since previous satisfactory check. Test piece check at start up and hourly.	Line Operative, Site Manager.
7. Metal detection boxing	Metal contamination.	In-line metal detector.	3mm stainless steel, 2.5mm non-ferrous. If reject, re-check product since previous satisfactory check. Test piece check at start up and hourly.	Line Operative, Site Manager.
7. Metal detection bagging	Metal contamination.	In-line metal detector.	3mm stainless steel, 2.5mm non-ferrous. If reject, re-check product since previous satisfactory check. Test piece check at start up and hourly.	Line Operative, Site Manager.

13. Food Intolerance Data:

The product is **FREE** from the following:

Component	Y or N	Detail if N
Additives ; Artificial	Y	
Additives ; Natural	Y	
Antioxidants BHA/BHT	Y	
Artificial Sweeteners	Y	
Azo and Coal Tar Dyes	Y	
Benzoates	Y	
Colours: Artificial	Y	
Colours: Natural	Y	
Colours: Nature Identical	Y	
Egg & Egg Derivatives	Y	
Flavourings: Artificial / Nature Identical	Y	
Flavourings: Natural	Y	
Glutamates, MSG	Y	
Gluten and Gluten Derivatives	Y	
Histamine, Caffeine	Y	
Lactose	Y	
Lupin Seed	Y	
Milk & Milk Derivatives	Y	
Modified Starches	Y	
Mustard/Mustard seeds, Celery/Celeriac, Kiwi fruit	Y	
Nuts & Nut derivatives (including tree nuts) (and any possible sources of cross contamination)	Y	
Peanuts & Peanut Derivatives	Y	
Potassium Based Salt Substitute	Y	
Preservatives ; Artificial	Y	
Preservatives ; Natural	Y	
Rye, Barley & Oats or their Derivatives	Y	
Seeds (Poppy, Sesame, Sunflower) & Seed Derivatives	N	Product is a seed, seeds on site.
Sulphites and Sulphur Dioxide	Y	
Wheat and Wheat Derivatives	Y	
Yeast and Yeast Derivatives	Y	
Genetically Modified Ingredients	Y	
Components derived from Maize	Y	
- If No, are they derived from Identity Preserved Source ?	Y	(if Y for maize, leave blank)
Or do they have a negative PCR Certificate ?	Y	(if Y for maize, leave blank)
Components derived from Soya	Y	
- If No, are they derived from Identity Preserved Source ?	Y	(if Y for soya, leave blank)
Or do they have a negative PCR Certificate ?	Y	(if Y for soya, leave blank)
Processing Aids derived from G.M.O.	Y	
Beef	Y	
Beef derivatives, stocks, extracts, offals, gelatin, fat, blood	Y	
Beef, Pork, Lamb, Fish products or derivatives on site	Y	
Fish, Crustacian or Mollusc derivatives, stocks, extracts, offals, gelatin, fat, blood	Y	
Fish, Crustacians or Molluscs	Y	
Lamb	Y	
Lamb derivatives, stocks, extracts, offals, gelatin, fat, blood	Y	
Pork	Y	
Pork derivatives, stocks, extracts, offals, gelatin, fat, blood	Y	

14. Diet Suitability:

The product is **SUITABLE** for the following diets:- (leave blank if not known)

Vegetarians	Y	Ovo - Lacto Vegetarians	Y
Vegans	Y	Muslims / Halal certified*	N*
Jewish / Kosher certified*	N*	Diabetics	Y
Low Potassium		Coeliacs	Y
Low Sodium		Organic	N

* Not certified.

15. Warranty:

We warrant that all food products and packaging materials supplied by Kluman & Balter Ltd:

- Shall comply in all respects with this specification, shall be clean, sound, non-injurious to health and shall be fit for the purpose for which they are intended.
- Shall comply with all aspects with the Food Safety Act 1990, and with associated regulations, and with all other relevant United Kingdom and European Union legislation, regulations, standards and codes of practice. Packaging shall comply with legal requirements for Food Contact Materials.
- Shall be of the nature, substance and quality described and shall not be presented in such a way which may mislead the purchaser.
- Shall be stored, stacked, handled and transported under suitable conditions so as to maintain safety and quality at all times.
- Shall be fully traceable back to the place and time of manufacture, and to the ingredients used.
- This specification is based on manufacturer's information, and is believed to be correct. No liability is accepted for errors and omissions. It may be updated or altered from time to time as new information becomes available.
- Customers are advised to determine the suitability of products for their specific application, and to store and use products according to this specification. It will not normally be possible to provide a life extension on products once delivered to customers' premises.
- Customers must notify any damage or defects immediately on arrival.

For and on behalf of Kluman & Balter:		For and on behalf of: (customer)	
Signature:			
Print Name:	Craig Stewart		
Position:	Technical Manager		
Date:			
KB code & Product:	160072 Hulled Sunflower Seed		