



White Fish Meal- MSC

Natural Pacific Whiting Meal

White Fish Meal- MSC is derived from the fresh cuttings of Pacific whiting (*Merluccius productus*) originally harvested and processed for human consumption. All processing is domestic and shore-based. All facilities are federally inspected. It is a quality feed ingredient and certified as sustainable by the [Marine Stewardship Council](#). Achieving these standards reflects our commitment to worldwide marine resource management that is responsible and sustainable, and to best manufacturing practices.

White Fish Meal- MSC is a product of the United States of America. It is a source of highly digestible fish protein and provides a supplemental level of omega-3 fatty acids including docosahexaenoic (DHA) and eicosapentaenoic (EPA). This complete fishmeal contains soluble fish components and is stabilized with natural antioxidants.

White Fish Meal- MSC is traceable with documentation showing source and processing of raw material utilized in production. Our company benefits from vertical integration within a human seafood company, Pacific Seafood Group, through access to their electronic tracking of fish catch, landings and processing, and the subsequent disposition of fresh fish cuttings. Pacific Seafood Group maintains strict quality standards based on scientifically-derived FSMA/HACCP systems at all our locations to ensure that the product you receive is the highest quality.

Customers are always welcome to visit our facilities and review our practices. Our definition of excellence, “*consistently doing your best and always striving to do better*”, demonstrates our commitment to providing a traceable, sustainable and wholesome product to our customers and yours.

Guaranteed Analysis

| | |
|---------------------|-------------|
| Crude Protein (min) | 65.0 % |
| Crude Fat (min) | 6.0 % |
| Crude Fiber (max) | 1.5 % |
| Ash (max) | 23.0 % |
| Moisture (max) | 10.0 % |
| Calcium (min/max) | 5.3 / 7.0 % |
| Phosphorus (min) | 3.1 % |
| Salt (max) | 3.0 % |

Freshness

| | |
|-------------------------|-----------------------|
| Histamine | 50 mg / kg meal |
| Total Volatile Nitrogen | 100 mg N / 100 g meal |



| Amino Acids | (% meal) |
|--------------------|-----------------|
| Alanine | 4.0 |
| Arginine | 4.5 |
| Aspartic acid | 5.3 |
| Cystine | 0.5 |
| Glutamic acid | 8.0 |
| Glycine | 5.4 |
| Histidine | 1.4 |
| Isoleucine | 2.6 |
| Leucine | 4.9 |
| Lysine | 5.0 |
| Methionine | 1.6 |
| Phenylalanine | 2.7 |
| Proline | 3.6 |
| Serine | 3.0 |
| Threonine | 2.0 |
| Tryptophan | 0.5 |
| Tyrosine | 2.1 |
| Valine | 3.2 |

| Protein Digestibility | |
|---------------------------------------|--------|
| Pepsin Digestibility (0.0002% pepsin) | 96.0 % |

| Fatty Acids | | (%meal) |
|-----------------------------|------------|----------------|
| Myristic | C 14:0 | 0.2 |
| Palmitic | C 16:0 | 1.6 |
| Palmitoleic | C 16:1 | 0.5 |
| Stearic | C 18:0 | 0.3 |
| cis-Oleic | C 18:1 n-9 | 1.9 |
| cis-Linoleic | C 18:2 n-6 | 0.1 |
| gamma-Linolenic | C 18:3 n-6 | BDL |
| α-Linolenic | C 18:3 n-3 | 0.1 |
| cis-11-Eicosenoic | C 20:1 n-9 | 0.1 |
| cis-11,14,17-Eicosatrienoic | C 20:3 n-3 | 0.1 |
| Arachidonic | C 20:4 n-6 | 0.1 |
| Eicosapentaenoic (EPA) | C 20:5 n-3 | 1.1 |
| Erucic | C 22:1 n-9 | 0.1 |
| Docosahexaenoic (DHA) | C 22:6 n-3 | 1.0 |
| Total omega-3 | | 2.3 |
| Total omega-6 | | 0.3 |



Fat Stability

| | |
|----------------------------------|-------------------|
| Preserved with mixed tocopherols | 1000 ppm |
| Peroxide Value | 10.0 mEq / kg fat |

Minerals (% meal)

| | |
|------------|-----|
| Calcium | 6.0 |
| Phosphorus | 3.5 |
| Potassium | 1.0 |
| Sodium | 1.1 |
| Sulfur | 0.8 |
| Magnesium | 0.2 |

(mg / kg meal)

| | |
|------------|-----|
| Iron | 100 |
| Zinc | 85 |
| Aluminum | 40 |
| Copper | 5 |
| Manganese | 13 |
| Chromium | 1 |
| Vanadium | BDL |
| Cadmium | BDL |
| Lead | BDL |
| Cobalt | BDL |
| Nickel | BDL |
| Molybdenum | BDL |

Vitamins (IU / kg meal)

| | |
|-----------|--------|
| Vitamin A | 86,500 |
| Vitamin D | 1,500 |
| Vitamin E | -- |

Microbial Analysis

| | |
|---------------------|-----------------|
| Aerobic Plate Count | 100,000 cfu / g |
|---------------------|-----------------|

Product Characteristics

| | |
|----------|--|
| Color | Light brown |
| Odor | Mild fish |
| Physical | Free-flowing, 100% through 2.5 mm screen |
| Density | Approximately 25 - 28 lb / ft ³ |



pH 7.0 – 7.5
Storage Store in a cool, dry place in original packaging
Stability 6 months when appropriately stored

Packaging 1,500 lb bulk bags

AAFCO Ingredient Name Fish Meal

Certification Marine Stewardship Council (MSC-C-50472)

Processing Statements

Allergen: This product contains fish and is processed in a facility that processes crustacean shellfish.

This product is not intended for human consumption.

The values for freshness, amino acids, fatty acids, minerals, vitamins, aerobic plate count, and product characteristics are typical and expected.

The value for peroxide is a typical value for the product at the time of shipping.

Manufacturer

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