Antarctic Krill Meal values

Krill meal is a specialty feed ingredient, which has been produced by the industry for more than 15 years from whole round krill, yet it is still in the growth phase of the product life cycle curve. Although there are more than 80 different krill species around the globe, resource abundance and high value dried krill meals have been mainly produced from South Antarctic Krill [Euphausia superba].

Regarding krill meal's palatability attribute, it has low molecular weight soluble compounds such as nucleotides, amino acids in the form of Proline and Glycine, Glucosamine, and high levels of tri-methyl amine oxide, TMAO (190 MgN/100 g sample). All these compounds act together as an effective attractant and flavouring agent. Krill meal has been successfully used in low palatability aqua-diets such as feeds containing vegetable proteins and/or antibiotics. Additionally, krill meal high TMAO content has an extra osmo-regulatory contribution, useful to reduce salmon's physiological stress when they are transferred from fresh to seawater.

Beta-carotene astaxanthin found in krill meal has an important role in the regulation of fish' immune system, besides its role as a pigmentation agent, enhancing disease resistance and boosting survival rates. It is also known as an essential fish growth regulator.

Krill meal has an additional relevant feature, which is its fat content uniqueness, in an average of 15% (8 – 18%), depending mainly on the fishing season and processing particulars. Within the traditional krill meal-processing layout, around 70% of raw krill original fat content remains bonded to krill meal's protein. This fat contains a high Omega-3 fatty acid concentration, where EPA & DHA are found in the vicinity of 23% or even higher (as part of the lipids). This fat has also a high content of phospholipids (40-50% of lipids). Accordingly, fish fed with diets containing krill meals increase their natural Omega 3 and natural astaxanthin content allowing this fish to enter the highly lucrative natural food market niche.

Krill Meal shows a remarkably low content of undesirable substances such as heavy metals and dioxins, closely related to the unpolluted waters where it is captured and processed.

Crude Protein content:	60%
Crude Lipid (fat/oil) content:	15%
Ash:	20% max.
Pepsin Digestibility:	95%

- Alanine	5.8%
- Arginine	6.7%
- Aspartic Acid	9.5%
- Cisteine	1.2%
- Glutamic Acid	12.6%
- Glycine	4.8%
- Histidine	2.5%
- Isoleucine	5.0%
- Leucine	7.8%
- Lysine	8.2%
- Methionine	4.0%
- Phenylalanine	5.2%
- Proline	4.0%
- Serine	4.5%
- Taurine	2.9%
- Threonine	4.7%
- Tyrosine	4.5%
- Valine	5.3%

(Amino Acids expressed as a percentage of crude protein)