



## Liver Powder

### PRODUCT DESCRIPTION

The Liver Powder belongs to the animal series of Costantino peptones production. Liver Extract families have been developed by Costantino along the years to optimize the taste and palatability of the final product.

Liver Powder is the result of the skill of Costantino in the selection of the best optimized Liver protein source in combination with an hydrolysis able to deliver the optimized performance for animal feed ingredients. The Liver Powder peptone is filtered and concentrated before spray drying to obtain a purified product for these applications. Liver Powder is so particularly efficient where a strong Liver taste is required to please animal appetite or to mask unpleasant taste. As many Costantino products customization of this product is available for eventual fine tuning of the chemical properties to fit the customers optimal needs.

### SUGGESTED USE

Liver Powder can be used when particular unpleasant tastes need to be masked or to give to animal feed a tasty flavour. Another use is in pharmaceutical preparations.

### STORAGE & SHELF LIFE

Liver Powder is hygroscopic and can absorb odors. Temperatures below 30°C, relative humidity below 65%, and odor free environment are recommended.

Avoid direct sunlight.

Expiry date: 3 years from the date of manufacture in the original sealed packaging kept in a dry area, ideally between 8 and 30°C.

### PACKAGING

The standard packaging is a 25 kg cardboard box which contains the product within an inner polyethylene liner bag. No staples or metallic fasteners are used:

- Custom packaging available.
- Delivered with Certificate of Analysis.

### CERTIFICATIONS

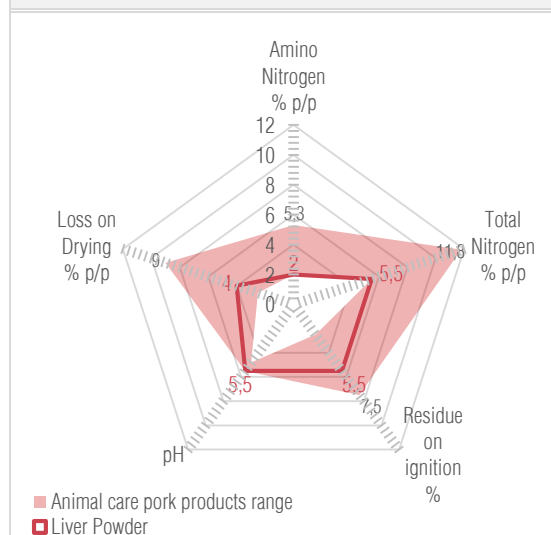


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### TYPICAL PHYSICAL & CHEMICAL PROFILE

Product	TN (w/w)	AN (w/w)	pH
<b>Liver Powder</b>	<b>0 - 11 %</b>	<b>1,2 - 2,8 %</b>	<b>5 - 6</b>
Liver Extract 20 mcg/g B12 Swine	10 - 13,5 %	4 - 6 %	4 - 5,5
Liver Extract NFXI Swine	11 - 12,5 %	4 - 6,5 %	4,5 - 5,5
Liver Extract liquid	9 - 12,5 %	3 - 5 %	4,5 - 5,5
Mucosa Extract	10,5 - 13 %	4 - 5,5 %	4,5 - 5,5
Spleen Extract	10,5 - 13 %	4,5 - 6 %	4,2 - 5,5

### RANGE OF PHYSICAL & CHEMICAL PROFILE



### AVAILABLE ON REQUEST

#### MICROBIOLOGICAL ANALYSIS

Total Bacterial Count	<i>Salmonella</i> spp
Bile-tolerant Gram-negative Bacteria	<i>S.aureus</i>
<i>E. coli</i>	Yeasts and Moulds

#### AMINOACID PROFILE

#### HYDROLYSIS PROFILE

Molecular Weights distribution	Average MW
Degree of hydrolysis	

#### OTHER ANALYSIS

Heavy Metals	Allergens
Carbohydrates	Fat
Salts and Ashes	Solubility