

# BUTRIENT™

An esterified butyric acid fuel for best intestinal health

Offers whole gut villi development and protection

Leads to improved nutrient absorption

Cost effective performance

Supports antibiotic-free (ABF) production

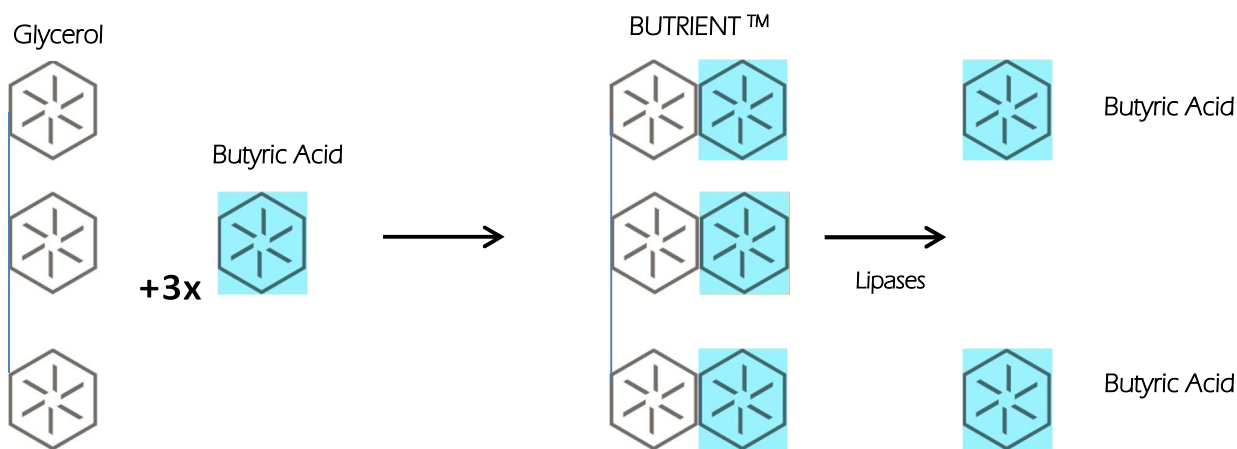
Available in 50% & 25% butyric acid concentrations

At APC Nutrients Pvt. Ltd., we believe in feeding advanced animal agri-businesses of India with sustainable farming, healthy animals and less antibiotics. By developing and producing innovative products imported from The Netherlands (Holland), we want to contribute to this belief. Esterification technology is one of our evolving businesses that we pioneered since 2013.

Esters of short chain fatty acid such as butyric acid are now intensively studied and

tested, showing a positive impact on animal performance and product handling. APC Nutrients ester based solutions, is based on high purity tri-esters significantly boosting animal health in general and gut health in specific. A better developed animal gut optimizes feed nutrients uptake and enhances pathogen protection, resulting into improved animal performance (growth and FCR), lower mortality and reduced use of antibiotics.

### Illustration of esterification process & butyric acid release from BUTRIENT™



Butyric acid is naturally produced in the gut through fermentation of carbohydrates by gut microflora. However, in species such as poultry, natural production of butyric acid does not occur until 15 days of age, in general use of lower fibre diets and NSP enzymes has further reduced carbohydrate proportion available for fermentation, and hence low butyric acid.

**BUTRIENT™** offers a unique tri-ester (also known as tri-butyryn or tri-glyceride) form of butyric

acid nutrient containing high purity of molecules that is less volatile (does not smell), delivers active butyric acid and provides protection (by reducing intestinal inflammation) along the length of the intestinal tract. **BUTRIENT™** contains unique butyric acid release boosters due to which it has superior advantages over other competitors in the market and has lower dosage recommendations. This helps customers in reaching optimal balance between performance & product's affordability.

## Benefits of BUTRIENT™



Optimized delivery in entire gut

Completely Odorless product

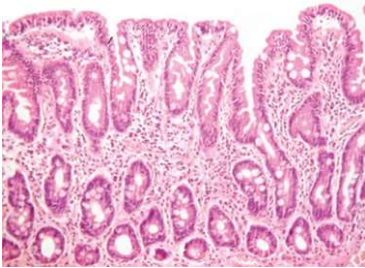


Faster performance, due to unique butyric release boosters within intestinal tract

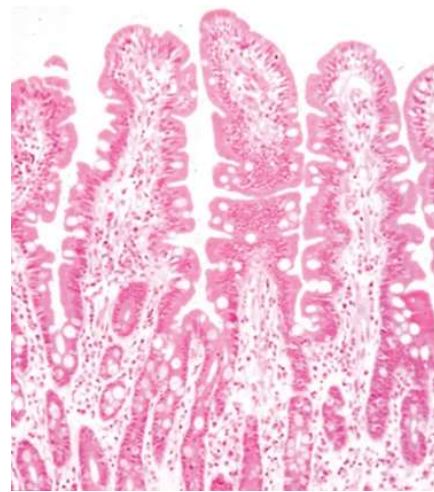
Pelleting & Extrusion Stable



## Visible effects after using BUTRIENT™



Magnification x 100, haematoxylin and eosin stain



Magnification x 100, haematoxylin and eosin stain

Without BUTRIENT (Villous atrophy seen in small intestine)

With BUTRIENT (Healthy villi development in small intestine)

**BUTRIENT™** enhances development, regeneration and absorptive surface area of the intestinal villi.

## BUTRIENT™ Dosage

Poultry (Broiler, Layer & Breeder): At least 200 g/T complete feed

Aqua (Shrimp & Fish): At least 3 Kg/ T complete feed

Dairy (Calves): At least 1 Kg/ T complete feed

Swine (Piglets): At least 1 Kg/ T complete feed

## Product Specifications

Each 1 Kg BUTRIENT™ 50/ BUTRIENT™ 25 contains min. 50% & 25% butyric acid, respectively

Available in 25 Kgs & 20 Kgs HDPE multilayer paper bags

White free-flowing micro-granular odorless powder



## Superior Quality Guarantee



GMP+ FSA certified companies demonstrate that they meet all requirements and conditions for the assurance of feed safety.

FSA stands for Feed Safety Assurance.

Developed & Imported by:



APC NUTRIENTS PVT. LTD., 506, 5th Floor, Amsri Eden Square, St. John's Road, Secunderabad - 500 003, Telangana, India.

Tel: +91 40 2789 9273/ 2784 9798

E-mail: [admin@apcnutrients.com](mailto:admin@apcnutrients.com)