



## A Preparation from Bovine Colostrum

**Balanced food supplement as an adjuvant to therapy  
with antibiotics, analgesics and anti-inflammatory drugs**

Prepared from at least 200 individual colostrum of New Zealand cows under strict veterinary controls  
From cows fed only on grass, no animal derived foodstuffs  
Collected and tested under New Zealand Ministry of Agriculture Safety Program  
Standardized antibody content independent of batch  
Safe and well tolerated even in repeated and high dosages

***Lactobin N – world-wide the most comprehensively tested and  
documented colostrum preparation on the market***

### **Lactobin® N contains:**

- cytokines, growth factors, enzymes and immunoglobulins
- anti-infectious, immunomodulatory, antitoxic, antiphlogistic antibodies
- antibody specificities against viral, bacterial and protozoal pathogens
- high concentration of IgG and of lactoferrin (important for the neutralization of endotoxins from gram-negative bacteria) and of pathogenicity factors from enterohemorrhagic E.coli (e.g. shiga-like toxins)
- no additives

**Lactobin® N**, produced from bovine colostrum pools, is free of additives

### **Active ingredients of Lactobin® N:**

*(Batch D1786)*

Immune factors: IgG: 21.1% (highest of any colostrum preparation on the market)  
IgM: 8.0mg/g, IgA: 4.3mg/g  
Lactoferrin: 20mg/g (the highest content of any colostrum preparation on the market)  
Glycoproteins  
Tumour Necrosis Factor alpha and other cytokines

Growth factors: Insulin-like Growth Factors: IGF-1, IGF-2; TGF beta-1  
Enzymes: e.g. lysozyme, lactoperoxidase  
Functional proteins: e.g. proline rich proteins

Nutritional factors: vitamins, minerals, amino acids

Total protein concentration: 810mg/g      Carbohydrates: 100mg/g      Fat: 12mg/g



**Antibody activities in *Lactobin*® vs *human plasma***

	<b>Lactobin</b>	<b>human plasma</b>
<b>Escherichia coli</b>	640	640
<b>Escherichia coli 35</b>	640	40
<b>Pseudomonas aeruginosa</b>	640	160
<b>Klebsiella pneumoniae</b>	640	80
<b>Proteus vulgaris</b>	80	not tested
<b>Serratia marcescens HY</b>	1280	not tested.
<b>Salmonella typhimurium</b>	160	not tested
<b>Staphylococcus aureus</b>	640	40
<b>Staphylococcus epidermidis</b>	160	not tested
<b>Streptococcus pyogenes</b>	160	80
<b>Streptococcus faecalis</b>	160	40
<b>Streptococcus viridans</b>	640	80
<b>Streptococcus B</b>	80	not tested
<b>Candida albicans</b>	320	not tested

The plasma values are the median of 80 individual plasma values.

The Lactobin values are the median of 3 batches.

from: Stephan, W et al. Antibodies from colostrum in oral immunotherapy. Clin Chem Clin Biochem (1990) 28:19-23

(Based on fingerprint analysis data (Research Report [2005] A.M.Waaga-Gasser, Würzburg University Hospital), these reciprocal titres with reference to the IgG concentrations are applicable to Lactobin N.)



## **Lactobin® N – A Food Supplement as Adjuvant Treatment for a Variety of Human Diseases**

*Main actions include an antibacterial effect and modulation of the immune response*

### **Range of applications**

- 1. To improve general well-being**, e.g. in burn-out syndrome, in digestive dysfunctions, etc.

Lactobin N protects and heals the gut and increases the body's metabolism.

Dosage: 5g per day

- 2. To boost the human immune system**

Lactobin N is rich in immunoglobulins and immune factors, thereby giving an excellent support to the immune system.

Dosage: 5g per day

- 3. Supportive treatment of early symptoms and mitigation of influenza**

- Intake of Lactobin N increases the synthesis of secretory IgA covering the outer parts of the mucous membrane of the upper airways and the lung, as well as of the gastrointestinal and urinary tract.

- Secretory IgA is the first line of specific defense against pathogens.

- Lactobin N neutralizes endotoxins which are responsible for the prodromal symptoms like fatigue, fever, back pain etc. of the early stages of influenza.

Dosage: 2x 5g per day

## Applications



### 4. Adjuvant therapy of diabetes mellitus, type 2

Mode of action: by virtue of insulin-like growth factor IGF-1 present in the preparation

Dosage: 5g per day

### 5. To improve endurance performance in sports

Lactobin N promotes the body's recovery after physical exertion.

Dosage: 5g per day

### 6. Relief from menstrual pain

Dosage: 10 - 15g per day during the menstrual period

### 7. Supportive treatment of severe diarrhea

- caused by pathogens like **clostridium difficile**, triggered by **long-term antibiotic treatment**

Lactobin N not only neutralizes and eliminates human pathogens from the gut but also inactivates toxins from the decaying germs, i.e. endotoxins (LPS)

- in patients with **primary immune deficiencies** (e.g. CVID i.e. Common Variable Immune Deficiency Syndrome), and patients with secondary forms under **immune suppression** (e.g. HIV-infected patients, transplant patients)

Lactobin N is effective due to the content of antibody specificities against viral, bacterial and protozoal pathogens. It reduces stool frequency in patients with severe diarrhea caused by infections with cryptosporidia, cyclospora and microsporidia (particularly in AIDS patients) and improves their general health condition.

Dosage: 2 x 10g per day



## Applications

### 8. Supportive treatment of children with severe long-lasting hemorrhagic diarrhea caused by pathogenic strains of E-coli (EHEC)

Over and above standard treatment (minerals and liquids), these children should be treated immediately with Lactobin N, even before microbiologic differential diagnosis is available.

Lactobin N contains antibodies which can eliminate EHEC-bacteria and neutralize the shiga-like toxins and other pathogenicity factors.

- stool frequency is reduced, and no longer loose
- only Lactobin N is effective since antibiotic treatment in infants with EHEC-infections increases the risk of developing hemolytic uremic syndrome HUS)

Dosage: 3x 10g for 14 days,  
until the diarrhea has stopped

### 9. Supportive treatment of

**Chronic facial pain** (trigeminal neuralgia) / post zoster neuralgia

**Chronic wide spread** pain including fibromyalgia (soft tissue rheumatism) in severe cases with clear cut differential diagnosis

- Lactobin N has a favourable effect on disturbed functional and pathological-anatomical disorders of the gut barrier in the patient.
- Normalizes dysfunctional states of apoptosis

Dosage: 2x 5g for 10 days



## Applications

### 10. Supportive therapy of

- **gram-negative septic shock** (prophylaxis and early treatment, according to Bölke, E et al 2002)
- patients with **polytrauma, early stages of peritonitis, large area burns**

Lactobin N neutralizes and eliminates human pathogens from the gut and inactivates toxins from the decaying germs, e.g. endotoxins (LPS), which are the causative agents of gram-negative septic shock, or pathogenicity factors from EHEC.

Dosage: 50 - 60g on 3 consecutive days

**Mode of administration:** Pour about 200 ml of drinking water or milk in a shaker or cup (butter milk or tomato juice can also be used for taste purposes). Note: Do not use hot liquids. Add Lactobin N powder and shake or stir well. Shaking or stirring should be repeated about 30 secs. later. The suspension is now ready to drink and should be consumed immediately. Before swallowing, we recommend to swirl the solution in the mouth (rinsing and gargling) in order to eliminate as many pathogens as possible in the cavities of the mouth and throat.

**At best, to be taken in between normal meal times.**

Note: Lactobin N should not be given to patients with milk protein allergy or lactose intolerance (generally known to them from the intake of common household products containing milk).

Pack sizes: 5g, 10g, 70g powder for the preparation of a drinkable solution

Shelf life: 2 years



Marienthaler Str. 3  
65366 Geisenheim  
Germany

Tel.: +49-6722-56 100  
Email: [info@wolz.de](mailto:info@wolz.de)  
Web: [www.Lactobin.de/en](http://www.Lactobin.de/en)