



# Swine Portfolio

Piglet gut health and welfare solutions 2021



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Piglet gut health and welfare solutions

This brochure gives you an overview of Elanco's comprehensive, newly expanded, range of piglet gut health solutions.

Following the integration of Bayer Animal Health into the Elanco fold, our comprehensive swine portfolio has grown to include an even broader selection of leading anticoccidial, anthelmintic, antimicrobial, enzyme, sedative and vaccine options.

**Please review the following pages for more detailed information of the health, welfare and diagnostic solutions we offer to help improve piglet gut health and the productivity outcomes of UK pig producers.**

Contact the Elanco Swine Team at [PigTeam@elancoah.com](mailto:PigTeam@elancoah.com)



# Swine Portfolio

Piglet gut health and welfare solutions

Coliprotec® F4/F18 Vaccination



Baycox® Iron Injection



Baycox® Multi 50mg/ml



Hemicell™ HT



Additional products in our portfolio



## Coliprotec® F4/F18 Vaccination

Coliprotec® immunises young pigs, from as early as 18 days of age (pre-weaning), against enterotoxigenic (pre-weaning) and F4/F18 enterotoxigenic *E. coli* (ETEC) the main cause of post-weaning diarrhoea (PWD)<sup>1,2</sup>

Coliprotec® reduces the incidence of serious and moderate PWD in nursery pigs by preventing colonisation of F4/F18 enterotoxigenic *E. coli* (ETEC). This improves gut health and reduces faecal shedding of ETEC to help control cross infection between pigs.

This improvement in the gut health of young pigs can significantly improve performance<sup>3,4,5</sup> and reduce the need for antimicrobial interventions<sup>6</sup>. This, in turn, helps the fight against the development of antimicrobial resistance to important human medicines.

### The importance of controlling PWD

*E. coli* post-weaning diarrhoea (PWD) is the most common cause of post-weaning mortality<sup>7,8,9</sup>

ETEC PWD is costly to pig production and is documented to cost up to £5 per piglet<sup>10,11</sup>

This is because, in addition to increased mortalities and the cost of treatments, PWD decreases weight gain<sup>12</sup>, delays time to market by 10 days<sup>11</sup> and increases feed costs by 7-9%<sup>11</sup>



**COLIPROTEC® F4|F18**

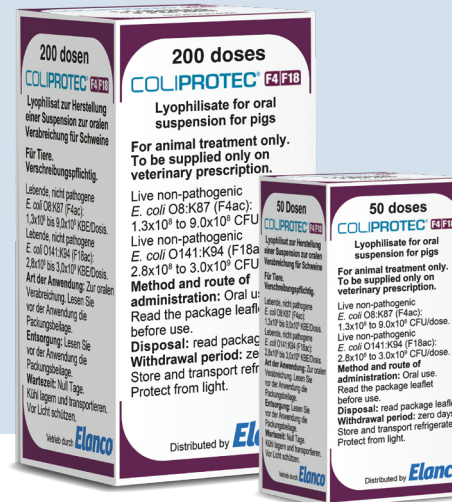
A MORE SUSTAINABLE FUTURE



## Coliprotec® F4/F18 Vaccination

### Key features and benefits of Coliprotec®

- Easy to use
- Protects against the main causes of PWD<sup>1</sup>
- Live vaccine, local immunity
- Early protection, rapid onset of immunity
- Reduces faecal shedding of ETEC
- Promotes responsible use of antimicrobials<sup>6</sup>
- Reduces environmental impact of alternatives



Test for  
**E.coli F4/F18,  
rotavirus  
and Clostridium  
perfringens with  
ON-FARM RAINBOW  
PIGLET KITS**

To find out more contact  
[PigTeam@elancoah.com](mailto:PigTeam@elancoah.com)



**COLIPROTEC® F4/F18**

A MORE SUSTAINABLE FUTURE



## Baycox® Iron Injection

Baycox® Iron Injection contains a combination of toltrazuril and high-quality iron, (gleptoferron) that's proven to prevent the clinical signs of coccidiosis in piglets while providing concurrent prevention of iron deficiency anaemia<sup>13</sup>, and has been shown to lead to significantly higher absorption and bioavailability than iron dextran.<sup>14</sup>

This combined solution of two common piglet challenges has welfare benefits for the pigs, through reduced handling stress, as well as efficiency benefits for producers by reducing the number of management procedures required.

### Baycox® Iron Injection 100ml

#### Addressing two key performance impacting conditions

Both coccidiosis and iron deficiency anaemia are common challenges to piglet health, welfare and performance.

#### 1. Coccidiosis

Caused by *Cystoisospora suis*, coccidiosis is a highly infectious disease in suckling piglets, resulting in diarrhoea and reduced performance.<sup>14</sup> It is difficult to eradicate and is prevalent in approximately 76-83% of farms in Europe<sup>15,16</sup>

Effective coccidiosis prevention can lead to an increase in body weight at weaning of 670g<sup>17</sup>

#### 2. Iron deficiency anaemia

Piglets are born with limited iron reserves.<sup>18</sup> Their iron requirements for growth outstrip their stored iron by the time they are a week to ten days old.<sup>19</sup>

This can lead to iron deficiency anaemia, reducing well-being, performance and increasing susceptibility to infection.<sup>21</sup> The requirement for iron also increases with high growth rates,<sup>19,20</sup> and larger piglets are at a greater risk.<sup>22</sup>



HemoCue  
hemoglobin  
testing  
kits now  
available

**Baycox® Iron**  
Injection

Easy | Efficient | Evolved



## Baycox® Iron Injection

### Two in one solution

Baycox® is a proven oral anticoccidial highly effective for the prevention of diarrhoea caused by *Cystoisospora suis* in piglets.<sup>23,24</sup> Combining Baycox® and iron, in a single easy to administer injection offers significant health, welfare and management efficiency benefits.<sup>24-28</sup>

### Key benefits of Baycox® Iron

#### Safety profile

- Reassuring safety profile with no systemic intolerance and excellent local injection site tolerance<sup>13</sup>

#### Efficacy

- Proven efficacy preventing clinical signs of coccidiosis (e.g. diarrhoea) and iron deficiency anaemia<sup>13</sup>
- Significantly reduces oocyst excretion and diarrhoea<sup>25</sup>
- Proven to maintain healthy haemoglobin levels<sup>13</sup>

#### Performance

- Improved weight gain consistent with separate doses of Baycox® 50mg/ml (dosed orally) and iron injection<sup>13</sup>

#### Piglet welfare

- Delivers 2 treatments in a single injection which reduces piglet handling and associated stress. This promotes better animal welfare

#### Convenience and flexibility

- Reduces labour and complexity making piglet management easier and more efficient
- Adjustable dose volume tailored to individual farm and piglet needs

#### Flexible Dosing

Baycox® Iron comes with a free, fully featured applicator. This means you can easily calibrate an accurate, easy to deliver dose over a range of piglet weights.

Piglet Weight	1.2kg	1.4kg	1.6kg	1.8kg	2kg
Dose	0.7ml	0.8ml	0.9ml	1ml	1.1ml
Doses per 100ml bottle	142	125	111	100	91

The product is not recommended for use in piglets weighing less than 0.9kg

**Baycox® Iron**  
Injection

Easy | Efficient | Evolved



## Baycox® Multi 50mg/ml

Baycox® Multi is a ready to use oral solution (toltrazuril) that is highly effective against *Cystoisospora suis* which affects pig production worldwide and can be used successfully alongside other treatments such as iron supplements.

In addition, because Baycox® does not kill the extracellular stages of *C. suis*, it will not impair the pig's ability to develop immunity against coccidia<sup>27,28</sup>.

### Key benefits of Baycox® Multi

#### Increased weight gains

- Baycox® treated piglets grow faster between treatment and weaning than untreated piglets<sup>29</sup>

#### Improved feed efficiency

- Baycox® treated piglets have a better feed conversion rate than untreated piglets<sup>30</sup>

#### Reduced need for antibiotic treatments

- Intestinal damage caused by *C. suis* leaves the intestine prone to secondary infections
- Antibiotic use to treat diarrhoea in piglets infected with coccidiosis dropped by 50-88% in groups treated with Baycox® 50 mg/ml compared to untreated control groups<sup>29, 31,32</sup>

#### More uniform body weights at weaning

- Weaning weights in groups treated with Baycox® are more uniform than in untreated groups<sup>33</sup>



# Baycox® Multi

Prevent | Protect | Profit





## Hemicell™ HT

Hemicell™ HT is an energy sparing enzyme for inclusion in feed rations to improve Intestinal Integrity, growth and production efficiency. Hemicell™ HT acts to prevent feed-induced immune responses (FIIR) to  $\beta$ -mannans which are anti-nutritive fibres commonly found in swine feeds.

Hemicell™ HT contains  $\beta$ -mannanase, a health-boosting, nutrient-sparing enzyme which breaks down  $\beta$ -mannans in order to conserve, and release, more energy for animal growth and production performance.  $\beta$ -mannans are costly to production, but their adverse effects can be reduced with Hemicell<sup>34-37</sup>

**PROVEN  
TO DELIVER  
NET ENERGY  
SAVINGS OF  
63 KCAL/KG<sup>38-40</sup>**

### Key benefits of Hemicell™ HT

#### Improves productivity

- Improves both ADG and FCR by up to 4% in young pigs<sup>38</sup>

#### Reduces feed costs

- Allows producers to replace more expensive specialized proteins with soybean meal<sup>11,13</sup>

#### Production efficiency

- Saves wasted energy equivalent to 63 kcal/kg<sup>38-40</sup>

#### Reduces intestinal inflammation

- Helps conserve the Intestinal Integrity and health status of pigs

#### Specialised formulation to withstand:

- Heat from feed pelleting
- pH fluctuations in the digestive tract
- Destructive gastrointestinal proteases<sup>41</sup>



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**Hemicell™ HT**



## Additional products in our portfolio

### Flubenol™

Flubenol™ is a broad spectrum anthelmintic active against mature and immature stages of the following nematodes in pigs: *Ascaris suum* (large roundworm), *Hyoststrongylus rubidus* (red stomach worm), *Oesophagostomum dentatum* (nodular worm), *Trichuris suis* (whip worm), *Strongyloides ransomi* (threadworm, adult) and *Metastrongylus apri* (lungworm). Flubenol™ is also ovicidal.

Flubenol™ comes in 2 formulations that can be mixed into medicated feed as a mash or pelleted feed:

**Flubenol™ 5% premix (25kg)**

**Flubenol™ 5% Oral Powder (600g)**

### Stellamune™ Once vaccination

Stellamune™ Once is a one-shot *Mycoplasma hyopneumoniae* vaccine for active immunisation of piglets from as early as 3 days of age to confer protection as early as 18 days of age (prior to weaning).

Stellamune™ Once gives lifelong protection and is proven to reduce lung lesions, coughing and losses in weight gain related to *M. hyo* infection of fattening pigs. Stellamune™ Once has also been shown to improve average daily weight gain and feed conversion efficiency in fattening animals on *M. hyo* infected farms.<sup>42</sup>

### Stresnil™ 40 mg/ml solution for injection

Stresnil™ is a solution containing azaperone that is injected intramuscularly behind the ear. Stresnil™ is indicated to help manage: **1.** Aggression e.g., to prevent pigs fighting and to treat aggressive sows; **2.** Stress, including transport-related stress; **3.** Obstetric conditions e.g., cessation of parturition due to excitation, as an obstetric aid in manual delivery, inversion of the vagina, prolapsed uterus, pathological straining; **4.** Pre-medication in local and general anaesthesia.

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**Flubenol**™

 **Stellamune**™ Once  
Once protected, always protected

Elanco

**Stresnil**™



## Additional products in our portfolio

### Apralan™ Soluble Powder

Soluble Powder for use in drinking water/milk replacer for weaned pigs used to treat bacterial enteritis caused by apramycin susceptible *Escherichia coli*.

### Baytril® 50mg/ml injection solution

Injection containing enrofloxacin for the treatment of pigs with bacterial bronchopneumonia caused by *Actinobacillus pleuropneumoniae*, *Pasteurella multocida* and complicated by *Glaeserella parasuis* as a secondary pathogen.

### Baytril® 0.5% oral solution 100ml

A ready to use oral solution for delivery via a dosing pump to treat piglets with bacterial diseases of the respiratory and alimentary tracts (e.g. pasteurellosis, mycoplasmosis, colibacillosis, colisepticaemia and salmonellosis) as well as multifactorial diseases such as atrophic rhinitis and enzootic pneumonia.

### Denagard™ 10% w/w premix for medicated feeding stuff

A premix medication for the treatment and metaphylaxis of swine dysentery caused by *Brachyspira hyodysenteriae*. For the treatment of colitis (*Brachyspira pilosicoli*); treatment of ileitis (*Lawsonia intracellularis*) and enzootic pneumonia (*Mycoplasma hyopneumoniae*).

### Denagard™ 12.5% w/v concentrate for oral solution

Oral solution for the treatment, prevention and control of swine dysentery caused by *Brachyspira hyodysenteriae* and complicated by *Fusobacterium* and *Bacteroides* spp.

### Denagard™ 200 mg/ml solution for injection

Injection for the treatment of swine dysentery caused by *Brachyspira hyodysenteriae* and complicated by *Bacteroides* spp., and *Fusobacterium* spp.; treatment of enzootic pneumonia complex caused by *Mycoplasma hyopneumoniae* and secondary bacteria sensitive to tiamulin; treatment of arthritis caused by *M. hyosynoviae*, to reduce lameness and restore growth performance.



## Additional products in our portfolio

### **Pulmotil™ G100 premix for medicated feed**

Premix medication for the prevention and treatment of respiratory disease caused by *Actinobacillus pleuropneumoniae*, *Mycoplasma hyopneumoniae*, *Pasteurella multocida* and other organisms sensitive to tilmicosin.

### **Tylan™ G50 premix and Tylan™ G250 premix**

Medicated premixes for the prevention and control of enzootic pneumonia (*Mycoplasma hyopneumoniae*). For the treatment and control of *Lawsonia intracellularis*, the organism associated with porcine proliferative enteritis (ileitis).

### **Tylan™ soluble powder for oral solution**

Water medication for the prevention and control of enzootic pneumonia (*Mycoplasma hyopneumoniae*), and scours caused by other sensitive microorganisms e.g. *Lawsonia intracellularis*.

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**Pulmotil**™

Elanco

**Tylan**®™



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**Apralan™** contains Apramycin. Legal category [POM-V](#). Each ml of **Baycox® Iron** contains: Toltrazuril 36.4 mg, Iron (III) 182 mg (as gleptoferron 484.7 mg). Refer to the product packaging and leaflets for information about side effects, precautions, warnings and contraindications. Legal category [POM-V](#). **Baycox® Multi** contains 50 mg/ml toltrazuril. Legal category [POM-V](#). **Baytril®** contains Enrofloxacin. Legal category [POM-V](#). Each dose of **Coliprotec®** contains 1.3 x 10<sup>8</sup> to 9.0 x 10<sup>8</sup> CFU of live non-pathogenic *Escherichia coli* O8:K87 (F4ac) and 2.8 x 10<sup>8</sup> to 3.0 x 10<sup>8</sup> CFU of live non-pathogenic *Escherichia coli* O141:K94 (F18ac). Refer to the product packaging and leaflets for information about side effects, precautions, warnings and contraindications. Legal category [POM-V](#). **Denagard™** contains tiamulin hydrogen fumarate. Legal category [POM-V](#). **Flubenol™** contains flubendazole. Legal Category UK [POM-VPS](#). **Hemicell™ HT** is a patented energy sparing enzyme produced by fermentation of *Paenibacillus lentus*. Refer to the product packaging and leaflets for information about side effects, precautions, warnings and contraindications. Legal category SFA-Enzyme. **Pulmotil™** contains timicosin. Legal category [POM-V](#). Each 2 ml dose of **Stellamune™** Once contains 4.5 to 5.2 log<sub>10</sub> Relative Potency Units of inactivated *Mycoplasma hyopneumoniae*. Strain NL1042, 0.025 ml of Amphigen Base, and 0.075 ml of Drakeol 5 (mineral oil) and 0.185 mg of thiomersal. Legal category [POM-V](#). **Stresnil™** contains 40 mg/g of Azaperone. Legal category [POM-V](#). **Tylan™** contains tylosin. Legal category [POM-V](#).

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