





# Escherichia coli (C5) – Sepsis

## **Procedure Summary**

- Newborn IOPS OFA rats, 5 days old
- Escherichia coli C5
- Bacterial challenge by intraperitoneal route
- Reference compound: immunomodulatory molecule IFNγ 0.2μg/rat SC

## **Experimental readouts**

- Bacterial counts in blood
- Survival rate
- Clinical score
- Cryo preservation of tissues

## **Optional Services**

- Cytokine and chemokine analysis
- Microscopy (Histochemistry on white matter)
- Quantitative PCR on tissue homogenates
- Measurement of reactive oxygen species

## Literature / reference

• Le Sache *et al.*, AAC. 2011. « Effect of Moxifloxacin Combined with Cefotaxime Compared to Cefotaxime-Gentamicin Combination on Prevention of White Matter Damage Associated with Escherichia coli Sepsis in Neonatal Rats".

## **Animal Welfare**

 Each experimental protocol is approved by the local ethics committee for animal experimentation of Grand Campus Dijon (Burgundy, France) and performed in accordance to the current recommendations of the European Institute of Health EU Directive 86/609

#### **Facilities**

 These assays are performed at our BSL2 laboratory / zootechnical center in Dijon, France

Evolution over time of the bacterial load in blood of untreated vs IFNytreated newborn rats in an *Escherichia coli* sepsis infection model



Our scientific team will readily accomodate client-specific alterations and will provide expert advice and guidance for your efficacy studies For more information please contact : info@vivexia.fr