

# ELISA PRODUCT INFORMATION & MANUAL

### CXCL8/IL-8 ELISA Development Kit NBP3-11747

Enzyme-linked Immunosorbent Assay for quantitative detection. For research use only.

Not for diagnostic or therapeutic procedures.

## CXCL8/IL-8 ELISA DEVELOPMENT KIT

ELISA Development Kit for quantitative determination of native or recombinant bovine CXCL8/IL-8 in solution, e.g. cell supernatant and serum/plasma samples.

The kit includes	NBP3-11747 for 6 plates
Capture mAb: MT8H6 (0.5 mg/ml)	300 μΙ
Detection mAb: 26E5, biotinylated (0.5 mg/ml)	50 μl
Streptavidin-HRP	80 µl
Recombinant bovine IL-8 ELISA standard	1 vial
Standard reconstitution buffer A5	1 ml

To ensure total recovery of the stated quantity, vials have been overfilled.

#### Shipping and storage

Shipped at ambient temperature. All reagents should be stored at 4-8  $^{\circ}$ C upon receipt, except the standard which should be stored at -20  $^{\circ}$ C. Antibodies are supplied in sterile-filtered PBS with sodium azide (0.02%). Streptavidin-HRP is supplied in PBS with 0.002% Kathon CG. The expiry date indicates how long unopened products, stored according to instructions, are recommended for use.

### **General and Preparations**

#### **Specificity**

The kit contains a matched pair of monoclonal antibodies (mAbs) specific for native and recombinant human CXCL8/IL-8 The mAbs cross-react with CXCL8/IL-8 from cow, monkey and dog.

#### Standard range

8-800 pg/ml

#### **Calibration**

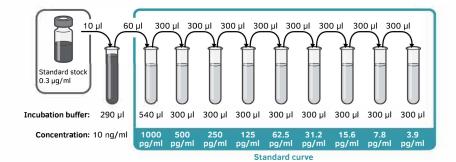
No international standard exists for calibration.

#### **Reconstitution of ELISA standard**

Reconstitute the ELISA standard to a stock solution of 0.3  $\mu$ g/ml by adding 1 ml of the standard reconstitution buffer. Allow the standard to dissolve for 5 minutes and mix thoroughly. The standard should be kept in aliquots at -20 °C. Avoid repeated freeze-thaw cycles.

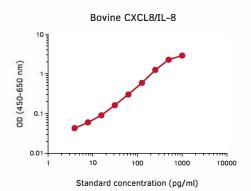
#### **Preparation of standard curve**

Prepare within 30 minutes of use. Volumes are sufficient for duplicates.



#### **Protocol**

- Day 1 1. Add 100 μl/well of capture mAb MT8H6 diluted to 2 μg/ml in PBS, pH 7.4. Use high protein binding ELISA plates. Incubate overnight at 4-8 °C.
- Day 2 2. Empty the plate and add 200  $\mu$ l/well of PBS with 0.05% Tween 20 and 0.1% BSA (incubation buffer) to block the plate. Incubate for 1 hour at room temperature.
  - 3. Wash the plate 5 times with PBS containing 0.05% Tween 20 (300 µl/well).
  - 4. Add 100 µl/well of samples or standards diluted in incubation buffer. Include assay background control, i.e. wells without standard. Incubate for 2 hours at room temperature.
  - 5. Wash as above.
  - 6. Add 100  $\mu$ l/well of detection mAb 26E5-biotin diluted to 0.1  $\mu$ g/ml in incubation buffer. Incubate for 1 hour at room temperature.
  - 7. Wash as above.
  - 8. Add 100 µl/well of Streptavidin-HRP diluted 1:1000 in incubation buffer. Incubate for 1 hour at room temperature. Please note that sodium azide used in buffers will inhibit HRP activity.
  - 9. Wash as above.
  - 10. Add 100 µl/well of TMB substrate and incubate for 15 minutes.
  - **11**. Add 100  $\mu$ l/well of 0.2 M H<sub>2</sub>SO<sub>4</sub> to stop the reaction.
  - 12. Measure the optical density in an ELISA reader at 450 nm within 15 min. Preferably use a reader capable of subtracting a reference wavelength of between 570 and 650 nm. Representative standard curve shown below.



Quality management system complies with the standards ISO 9001:2015 & ISO 13485:2016.

The products are for research use only.



