



**EuroProxima**  
Close to your analysis

## GLUTEN-TEC<sup>®</sup> ELISA (5171GT)

### General

The Gluten-Tec<sup>®</sup> ELISA is a patented test for the quantitative detection of gliadin and gliadin fragments in food, exclusively marketed by Euro-Proxima.

The kit uses a monoclonal mouse antibody that detects a well characterized T cell stimulatory epitope of  $\alpha$ 20-gliadin in wheat, and homologue sequences present in barley (hordein), rye (secalin) and their crossbred varieties. These epitopes play a dominant role in the triggering of celiac disease. Both intact and small protein fragments, resulting from the hydrolysis of intact proteins, can be detected. A synthetic peptide that contains the  $\alpha$ 20-gliadin epitope is used for calibration, which allows an accurate and reproducible standardization.

The **Gluten-Tec<sup>®</sup> ELISA** is a competitive enzyme immunoassay based on antibodies directed against the  $\alpha$ -20 epitope of gliadin.

### Kit characteristics

**Microtiter plate:**

96 wells  
12 x 8 Breakapart

**Antibody cross-reactivity:**

The used monoclonal antibody is 100% specific for a T cell stimulatory peptide on the gliadin molecule from wheat and related prolamins from rye and barley. No cross-reactivity is observed with oats, rice, millet and buckwheat.

**Conjugate:**

$\alpha$ -20 gliadin peptide HRP stabilized.

**Standard range (ready-to-use):**

0, 0.156, 0.313, 0.625, 1.25, 2.5 and 5.00 ng  $\alpha$ -20-peptide/ml

### Assay characteristics

The LOQ expressed in gliadin equivalents is 3.6 ppm.

**Sample preparation**

For the food samples fast and efficient methods are included in the kit manual. In the elaborated extraction procedure hazardous chemicals are avoided.

**Procedure**

Conjugate and standard/sample are pipetted into the wells coated with anti  $\alpha$ -20 antibody and incubated for 3 hours at 4°C. After a washing procedure ready-to-use substrate is added and incubated for 30 minutes at 20°C - 25°C. The reaction is stopped and the absorbance is read in a spectrophotometer at 450 nm.

EuroProxima's user-friendly software converts the measured optical density into the concentration of the metabolite in the starting material.