



# S-1197

# Calcitonin (rat) ELISA [UniProt: P01257]

Calcitonin is a 32 amino acid peptide hormone that defines the calcitonin-like protein family. It is formed by the proteolytic cleavage of a larger prepropeptide, which is the product of the CALC1 gene and secreted by parafollicular cells of the thyroid gland in humans, and in the ultimopharyngeal body in animals. The hormone participates in calcium and phosphorus metabolism by reducing blood calcium, and counteracts the effects of parathyroid hormone and Vitamin D3.

This ELISA was developed with serum from rabbits immunized with rat Calcitonin coupled to a carrier protein.

### TECHNICAL AND ANALYTICAL CHARACTERISTICS

Lot number: A17936

Host species: Rabbit IgG

Quantity: 96 tests

**Format:** Formulated for extracted samples (EIAH type).

**Shelf-life:** One year from production date. Store refrigerated at 4° - 8°C.

**Applications:** This ELISA has been validated with the included reagents. It is intended

to be used with appropriately extracted rat samples (original protocol III,

Std.Ab1hr.Bt). For research use only.

Please see www.bma.ch for protocols and general information.

**Range:** 0 - 25ng/ml **Average IC50:** 0.7ng/ml

Immunogen: Synthetic peptide H-Cys-Gly-Asn-Leu-Ser-Thr-Cys-Met-Leu-Gly-Thr-Tyr-

Thr-Gln-Asp-Leu-Asn-Lys-Phe-His-Thr-Phe-Pro-Gln-Thr-Ser-Ile-Gly-Val-

Gly-Ala-Pro-NH<sub>2</sub> (Disulfide bond), coupled to a carrier protein.

#### **Cross-Reactivity:**

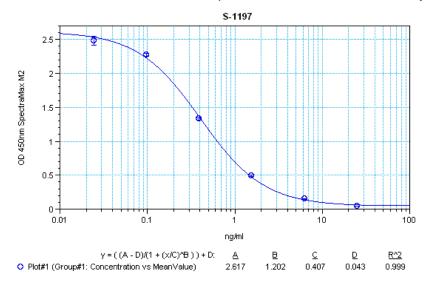
PEPTIDE:	%:
Calcitonin (rat)	100
Calcitonin (human)	87
Calcitonin (salmon I)	0
Calcitonin (eel)	0
Calcitonin (chicken)	0
α- CGRP (human)	0.1
$\alpha$ -CGRP (rat)	0
Amylin (rat)	0

## **Cross-Reactivity (continued):**

PEPTIDE:	%:
Amylin (free acid) (human)	0
Calcitonin C-Terminal Adjacent Peptide (rat)	0
Calcitonin C-Terminal Flanking Peptide (human)	0

Cross-Reactivity data is taken from Radioimmunoassay applications.

Typical titration curve of rat Calcitonin in a competitive ELISA with this antibody:



Suggested Preparation of Standards			
	ng/ml	Range: 0.02 to 25ng/ml	
Stock	1000		
S1	25.00	Add 25µl Stock + 975µl diluent	
S2	6.25	Add 200µl S1 + 600µl diluent	
S3	1.56	Add 200µl S2 + 600µl diluent	
S4	0.39	Add 200µl S3 + 600µl diluent	
<b>S</b> 5	0.10	Add 200µl S4 + 600µl diluent	
S6	0.02	Add 200µl S5 + 600µl diluent	
S0	0.00	500µl diluent	

Related Products: S-1338: ELISA, extraction-free for rat serum and plasma samples

T-4234: purified IgG (anti rat) T-4235: neat serum (anti rat)

This product contains Thimerosal as a preservative and is intended for laboratory use and research purposes only. Purchase of this product does not include authorization to use it in diagnostic or therapeutic applications.

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