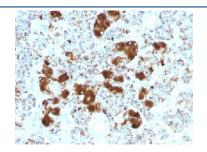


# ACTH Antibody / CLIP [clone SPM501] (V3191)

| Catalog No.    | Formulation  | Size   |
|----------------|--|--------|
| V3191-100UG    | 0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide | 100 ug |
| V3191-20UG     | 0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide | 20 ug  |
| V3191SAF-100UG | 1 mg/ml in 1X PBS; BSA free, sodium azide free                             | 100 ug |

### **Bulk quote request**

| Species Reactivity | Human  |
|--------------------|--|
| Format             | Purified   |
| Clonality          | Monoclonal (mouse origin)                              |
| Isotype            | Mouse IgG1, kappa                                      |
| Clone Name         | SPM501   |
| Purity             | Protein G affinity chromatography                      |
| Buffer             | 1X PBS, pH 7.4   |
| Gene ID            | 5443   |
| Localization       | Cytoplasmic  |
| Applications       | Immunohistochemistry (FFPE): 1-2ug/ml for 30 min at RT |
| Limitations        | This ACTH antibody is available for research use only. |



IHC testing of FFPE human pituitary gland with ACTH antibody (clone SPM501). Required HIER: steam sections in pH 9 10mM Tris with 1mM EDTA for 10-20 min.

## **Description**

ACTH (or Corticotropin) is a 39 amino acid active peptide produced by the anterior pituitary. This mAb is specific to CLIP (aa 25-39) and does not react with Synacthen (aa 1-24). POMC (pro-opiomelanocortin or corticotropin-lipotropin) is a 267

amino acid polypeptide hormone precursor that goes through extensive, tissue-specific posttranslational processing by convertases. POMC is cleaved into ten hormone chains named NPP, ACTH, alpha-MSH (Melanocyte Stimulating Hormone), beta-MSH, gamma-MSH, CLIP (corticotropin-like intermediary peptide), Lipotropin-beta, Lipotropin-gamma, beta-endorphin and Met-enkephalin. ACTH is also produced by cells of immune system (T-cells, B-cells, and macrophages) in response to stimuli associated with stress. Anti-ACTH is a useful marker in classification of pituitary tumors and the study of pituitary disease. It reacts with ACTH-producing cells (corticotrophs). It also may react with other tumors (e.g. some small cell carcinomas of the lung) causing paraneoplastic syndromes by secreting ACTH.

#### **Application Notes**

The concentration stated for each application is a general starting point. Variations in protocols, secondaries and substrates may require the ACTH antibody to be titered up or down for optimal performance.

#### **Immunogen**

Amino acids 25-39 (NGAEDESAEAFPLEF) of Adrenocorticotropic hormone (CLIP sequence) were used as the immunogen for this ACTH antibody.

#### **Storage**

Store the ACTH antibody at 2-8oC (with azide) or aliquot and store at -20oC or colder (without azide).

References (1)