

## **PLAU**

## **Human Urokinase Plasminogen Activator Activity ELISA Kit**

 Catalog No.
 CSI19849A
 Quantity:
 1x96 tests

 CSI19849B
 5x96 tests

Alternate Names: ATF, UPA, URK, u-PA, PLAU

**Description:** Urokinase Plasminogen Activator (uPA) is a serine protease involved in degradation of

the extracellular matrix and possibly tumor cell migration and proliferation. A specific polymorphism in this gene may be associated with late-onset Alzheimer's disease and also with decreased affinity for fibrin-binding. This protein converts Plasminogen to Plasmin by specific cleavage of an Arg-Val bond in Plasminogen. Plasmin in turn cleaves this protein at a Lys-lle bond to form a two-chain derivative in which a single disulfide bond connects the amino-terminal A-chain to the catalytically active, carboxy-terminal B-chain. This two-chain derivative is also called HMW-uPA (High Molecular Weight uPA). HMW-uPA can be further processed into LMW-uPA (Low Molecular Weight uPA) by cleavage of chain A into a short chain A (A1) and an ATF-uPA (Amino-Terminal

Fragment uPA). LMW-uPA is proteolytically active but does not bind to the uPA Receptor

(uPAR).

Urokinase Plasminogen Activator, along with its receptor uPAR, initiates a proteolytic cascade that results in the conversion of Plasminogen to Plasmin. Clinical studies have indicated that high uPA levels may elevate the risk for tumor invasion and metastasis Increased expression and activity can exert potent arthritogenic properties in rheumatoid arthritis patients. Increased uPA activity may be an implication for the pathophysiology of

endometriosi

**Range:** 0.1-50 ng/mL

**Sensitivity:** The minimum detectable level of uPA activity is 0.064 ng/mL.

**Linearity:** Slope = 1.059, Correlation Coefficient = 0.9991

Intra-Assay Precision: High 5.2%, Medium 2.5%, Low 5.7%

Sample Types: Samples of Human plasma, serum, urine, cell culture media, or tissue extracts.

Sample Size: 100 µl

**Kit Content:** Pre-coated 96-well plate, Anti-Human uPA primary antibody, HRP-conjugated secondary

antibody, Biotinylated Human PAI1, Human uPA activity standard, buffers, TMB.

Storage & Stability: Store kit components at 4°C. Store unopened plate and any unused microtiter strips in

the pouch with desiccant. Reconstituted standards and primary antibody may be stored at -70°C for later use. **DO NOT freeze/thaw the standards and primary antibody more than once.** All other unused kit components must be stored at 4°C. Kit should be

used no later than the expiration date.

NOT FOR HUMAN USE. FOR RESEARCH ONLY. NOT FOR DIAGNOSTIC OR THERAPEUTIC USE.

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