# Human IL1 alpha protein, His tag (active)

## Cat. No. GTX00067-pro

Applications	Functional Assay	Package 10 μg
Species	Human	

#### Applications

#### **Application Note**

 $IL1\alpha$  (Interleukin-1 alpha) is a member of the interleukin 1 cytokine family. This cytokine is produced by monocytes and macrophages as a proprotein, which is proteolytically processed and released in response to cell injury, and thus induces cell apoptosis. It is reported that exposure of MCF-7 cells to certain concentration of  $IL1\alpha$  results in inhibition of cell growth. Thus, an cell proliferation assay of MCF-7 was conducted with the addition of  $IL1\alpha$ . MCF-7 cells were seeded overnight at a density of 5000 cells/well, and then treated with or without various concentrations of  $IL1\alpha$  for 72h, then cells were observed by inverted microscope and cell viability was measured by Cell Counting Kit-8 (CCK-8). Briefly, 10 µl of CCK-8 solution was added to each well of the plate, then measure the absorbance at 450nm using a microplate reader after incubating the plate for 1-4 hours in at 37°C. Inhibition of MCF-7 cell proliferation after incubation with  $IL1\alpha$  for 72h observed by inverted microscope.

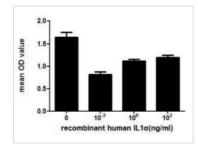
Observed MW (kDa) 21 kDa.

Properties		
Form	Lyophilized powder	
Buffer	Reconstitute with 20mM Tris and 150mM NaCl to 0.1-1.0mg/ml. Do not vortex. Lyophilized from 20mM Tris, 150mM NaCl, 1mM EDTA, 1mM DTT, 0.01% SKL, 5% Trehalose.	
Preservative	ProClin 300	
Storage	For short-term storage (1-2 weeks), store at 4°C. For long-term storage, store at -20°C or below. After reconstitution, keep as concentrated solution. Avoid freeze-thaw cycles.	
Region/Sequence	N-terminal His-Tag; Ser113~Ala271 (NP_000566.3)	
Expression System	E. coli	
Purity	> 97%	
Endotoxin	< 1 EU/µg	
Conjugation	Unconjugated	
Note	For laboratory use only. Not for any clinical, therapeutic, or diagnostic use in humans or animals. Not for animal or human consumption.	



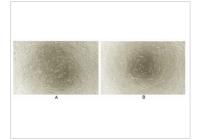
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#### DATA IMAGES



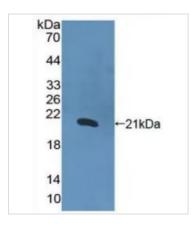
### GTX00067-pro Functional Assay Image

The inhibitory effect of GTX00067-pro Human IL1 alpha protein (active) on the cell proliferation of MCF-7 cells. After incubation of Human IL1 alpha protein (active) for 72hrs, cell viability was measured by Cell Counting Kit-8 (CCK-8).



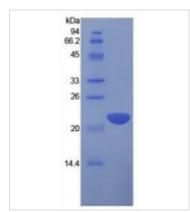
#### GTX00067-pro Functional Assay Image

Cell suppression effect of GTX00067-pro Human IL1 alpha protein (active).(A) Unstimulated MCF-7 cells cultured in DMEM for 72hrs.(B) MCF-7 cells cultured in DMEM, stimulated with 1 ng/ml IL1α for 72hrs.



#### GTX00067-pro Image

WB analysis of GTX00067-pro Human IL1 alpha protein (active).



#### GTX00067-pro Image

SDS-PAGE analysis of GTX00067-pro Human IL1 alpha protein (active).



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