# ABclonal®

# Rabbit anti-Human IL-12p70 mAb(DET)

Catalog No.: RMK0090

#### **Basic Information**

#### **Catagory**

Matched Antibody Pair

#### **Applications**

CLIA

#### **Product Information**

#### Ig Type

Rabbit IgG

#### **Purification**

Affinity purification

#### **Endotoxin Level**

#### Storage

Store at -20°C.

Avoid repeated freeze-thaw cycles.

#### **Formulation**

Supplied as a 0.2µm filtered solution in PBS with 0.05% Proclin300,PH 7.4.

#### **Contact**



www.abclonal.com

# **Background**

Interleukin 12, also known as natural killer cell stimulatory factor (NKSF) or cytotoxic lymphocyte maturation factor (CLMF), is a pleiotropic cytokine originally identified in the medium of activated human B lymphoblastoid cell lines. Biologically active IL-12 is a disulfide-linked, 70 kDa (p70) heterodimeric glycoprotein composed of a 40 kDa (p40) subunit and a 35 kDa (p35) subunit. The p40 subunit of IL-12 has been shown to have extensive amino acid sequence homology to the extracellular domain of the human IL-6 receptor while the p35 subunit shows distant but significant sequence similarity to IL-6, G-CSF, and chicken MGF. These observations have led to the suggestion that IL-12 might have evolved from a cytokine/soluble receptor complex. Human and murine IL-12 share 70% and 60% amino acid sequence homology in their p40 and p35 subunits, respectively. IL-12 apparently shows species specificity with human IL-12 reportedly showing minimal activity in the murine system. IL-12 is produced by macrophages and B lymphocytes and has been shown to have multiple effects on T cells and natural killer (NK) cells. These effects include inducing production of IFNgamma and TNF by resting and activated T and NK cells, synergizing with other IFNgamma inducers at both the transcriptional and post-transcriptional levels. This interaction induces IFN-gamma gene expression, enhancing the cytotoxic activity of resting NK and T cells, inducing and synergizing with IL-2 in the generation of lymphokine-activated killer (LAK) cells, acting as a co-mitogen to stimulate proliferation of resting T cells, and inducing proliferation of activated T and NK cells. Current evidence indicates that IL-12, produced by macrophages in response to infectious agents, is a central mediator of the cell-mediated immune response by its actions on the development, proliferation, and activities of TH1 cells. In its role as the initiator of cell-mediated immunity, it has been suggested that IL-12 has therapeutic potential as a stimulator of cell-mediated immune responses to microbial pathogens, metastatic cancers, and viral infections such as AIDS

# **Immunogen Information**

#### **Immunogen**

Recombinant Human IL-12p70 Protein

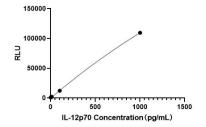
## **Cross-Reactivity**

# **Assay Applications**

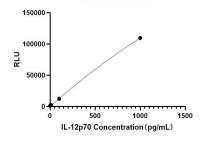
### Human IL-12p70 Sandwich Immunoassay

	Recommended Concentration	Sample
CLIA Capture	1-4ug/mL	Rabbit anti-Human IL-12p70 mAb (CAP)(Cat. No.RMK0089)
CLIA Detection	0.5-2ug/mL	Rabbit anti-Human IL-12p70 mAb (DET)(Cat. No.RMK0090)
Standard	2.5-1000pg/mL	Recombinant Human IL-12p70 Protein

# **Validation Data**



This standard curve is only for demonstration purposes. A standard curve should be generated for each assay.



This standard curve is only for demonstration purposes. A standard curve should be generated for each assay.