

# **Anti-Progesterone Receptor Antibody**

**Catalog # ABO10735** 

# **Specification**

# Anti-Progesterone Receptor Antibody - Product Information

Application WB, IHC
Primary Accession P06401
Rabbit

Reactivity Human, Mouse,

Rat

Clonality Polyclonal Format Lyophilized

**Description** 

Rabbit IgG polyclonal antibody for Progesterone receptor(PGR) detection. Tested with WB, IHC-P in Human; Mouse; Rat.

#### Reconstitution

Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-Progesterone Receptor Antibody - Additional Information

# **Gene ID 5241**

### **Other Names**

Progesterone receptor, PR, Nuclear receptor subfamily 3 group C member 3, PGR, NR3C3

Calculated MW 98981 MW KDa

# **Application Details**

Immunohistochemistry(Paraffin-embedded Section), 0.5-1 μg/ml, Human, Mouse, Rat, By Heat<br/>br>Western blot, 0.1-0.5 μg/ml, Human, Mouse, Rat<br/>br>

# **Subcellular Localization**

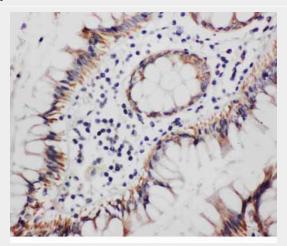
Nucleus. Cytoplasm. Nucleoplasmic shuttling is both homone- and cell cycle-dependent. On hormone stimulation, retained in the cytoplasm in the G(1) and G(2)/M phases.

#### **Protein Name**

Progesterone receptor(PR)



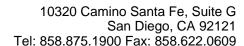
Anti-Progesterone Receptor antibody, ABO10735, Western blottingWB: HELA Cell Lysate



Anti-Progesterone Receptor antibody, ABO10735, IHC(P)IHC(P): Human Rectal Cancer Tissue

# Anti-Progesterone Receptor Antibody - Background

The progesterone receptor(PR) is an intracellular steroid receptor that specially binds progesterone in humans. PR has been a member of the steroid receptor superfamily. It





#### **Contents**

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg Thimerosal, 0.05mg NaN3.

# **Immunogen**

A synthetic peptide corresponding to a sequence in the middle region of human Progesterone Receptor(536-553aa QVYPPYLNYLRPDSEASQ), identical to the related rat and mouse sesquences.

#### **Purification**

Immunogen affinity purified.

# **Cross Reactivity**

No cross reactivity with other proteins

Storage

At -20°C for one year. After r°Constitution, at 4°C for one month. It°Can also be aliquotted and stored frozen at -20°C for a longer time. Avoid repeated freezing and thawing.

# **Sequence Similarities**

Belongs to the nuclear hormone receptor family. NR3 subfamily.

Anti-Progesterone Receptor Antibody - Protein Information

Name PGR

Synonyms NR3C3

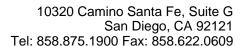
#### **Function**

The steroid hormones and their receptors are involved in the regulation of eukaryotic gene expression and affect cellular proliferation and differentiation in target tissues. Depending on the isoform, progesterone receptor functions as transcriptional activator or repressor.

# **Cellular Location**

Nucleus. Cytoplasm. Note=Nucleoplasmic shuttling is both hormone- and cell cycle-dependent. On hormone stimulation, retained in the cytoplasm in the G(1) and G(2)/M phases [Isoform 4]: Mitochondrion outer membrane

is encoded by a single PGR gene residing on chromosome 11q22. The PGR gene uses separate promoters and translational start sites to produce 2 isoforms, PRA and PRB, which are identical except for an additional 165 amino acids present only in the N terminus of PRB. It can be observed in human breast tissues. The proteins function as dimeric molecules in nuclei to regulate the transcription of target genes in a ligand-responsive manner.





# **Tissue Location**

In reproductive tissues the expression of isoform A and isoform B varies as a consequence of developmental and hormonal status. Isoform A and isoform B are expressed in comparable levels in uterine glandular epithelium during the proliferative phase of the menstrual cycle. Expression of isoform B but not of isoform A persists in the glands during mid-secretory phase. In the stroma, isoform A is the predominant form throughout the cycle. Heterogeneous isoform expression between the glands of the endometrium basalis and functionalis is implying region-specific responses to hormonal stimuli

# Anti-Progesterone Receptor Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- <u>Immunofluorescence</u>
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture