For Research Use Only

CoraLite® Plus 488-conjugated XRCC5 Recombinant antibody



Purification Method:

Catalog Number: CL488-80325-6

Basic Information

Catalog Number:

CL488-80325-6

1000 ug/ml

Source: Rabbit GeneID (NCE 7520 UNIPROT ID:

Isotype: Full Name:

Immunogen Catalog Number:

AG9454

GenBank Accession Number:

 BC019027
 Protein A purification

 Genel D (NCBI):
 CloneNo.:

 7520
 240301G6

UNIPROT ID: Recommended Dilutions: P13010 IF/ICC 1:50-1:500

Full Name: Excitation/Emission maxima X-ray repair complementing defectivewavelengths:

repair in Chinese hamster cells 5 493 nm / 522 nm

(double-strand-break rejoining)

Calculated MW: 732 aa, 83 kDa Observed MW: 80 kDa

Applications

Tested Applications: IF/ICC, FC (Intra)
Species Specificity:

human

Positive Controls:

IF/ICC: HepG2 cells,

Background Information

There are at least two pathways for eukaryotes to repair DNA double-strand breaks: homologous recombination and nonhomologous end joining(NHEJ). The core NHEJ machinery includes XRCC4, DNA ligase IV and the DNA-dependent protein kinase complex, which consists of the DNA end-binding XRCC5/XRCC6 heterodimer and the catalytic subunit PRKDC. The heterdimer of XRCC5/XRCC6 enhanced teh affinity of the catalytic subunit PRKDC to DNA by 100-fold. Once the XRCC5/6 dimer association with NAA15, it can bind to the osteocalcin promoter and activate osteocalcin expression. The XRCC5/6 dimer acts as a negative regulator of transcription when together with APEX1. Some publised papers indicated that the MW of XRCC5 is 86kDa, while more papers suggested that XRCC5 is a 80kDa protein, as it was firstly introducted in publication.

Storage

Storage:

Store at -20°C. Avoid exposure to light.

Storage Buffer

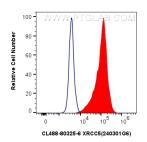
PBS with 50% Glycerol, 0.05% Proclin300, 0.5% BSA, pH 7.3.

Aliquoting is unnecessary for -20°C storage

Selected Validation Data



Immunofluorescent analysis of (4% PFA) fixed HepG2 cells using Coralite® Plus 488 XRCC5 antibody (CL488-80325-6, Clone: 240301G6) at dilution of 1:200.



1x10^6 HeLa cells were intracellularly stained with 0.4 ug CoraLite® Plus 488-conjugated KRCC5 Recombinant antibody (CL488-80325-6, Clone:240301G6)(red), or 0.4 ug CoraLite® Plus 488-conjugated Rabbit 1gG control Rabbit PolyAb (CL488-30000) (blue). Cells were fixed and permeabilized with Transcription Factor Staining Buffer Kit (PF00011).