DATASHEET

PGC1 alpha Rabbit Polyclonal Antibody

CAT. NO. APA16553

KEY FEATURES

Target	PGC1 alpha	Source / Host	Rabbit
Reactivity	Human, Mouse, Rat	Clonality	Polyclonal
Applications	WB, IHC, IF/ICC	Conjugation	Unconjugated
Form / Buffer	Liquid in 0.42% Potassium phosphate, 0.87% Sodium chloride, pH 7.3, 30% glycerol, and 0.01% sodium azide.	Storage	at-20°C

BACKGROUND

Transcriptional coactivator for steroid receptors and nuclear receptors . Greatly increases the transcriptional activity of PPARG and thyroid hormone receptor on the uncoupling protein promoter . Can regulate key mitochondrial genes that contribute to the program of adaptive thermogenesis . Plays an essential role in metabolic reprogramming in response to dietary availability through coordination of the expression of a wide array of genes involved in glucose and fatty acid metabolism . Acts as a key regulator of gluconeogenesis: stimulates hepatic gluconeogenesis by increasing the expression of gluconeogenic enzymes, and acting together with FOXO1 to promote the fasting gluconeogenic program . Induces the expression of PERM1 in the skeletal muscle in an ESRRA-dependent manner .

APPLICATION

To ensure optimal assay performance, AREX recommends conducting reagent titration tailored to each testing system for optimal detection results.

WB	1:500 - 1:1000
IHC	1:50 - 1:100
IF/ICC	1:50 - 1:100

*Results are sample-specific. Please refer to your local assay conditions and test parameters for reference.

PRODUCT OVERVIEW

Description	Rabbit polyclonal antibody to PGC1 alpha
Specificity	Recognizes endogenous levels of PGC1 alpha protein
Antibody Type	Primary antibody
Immunogen	KLH-conjugated synthetic peptide of human PGC1 alpha. The exact sequence is proprietary.
Purification	The antibody was purified by immunogen affinity chromatography.
Molecular Weight	Predicted: 14; Observed: 91 kD
Form/Buffer	Liquid in 0.42% Potassium phosphate, 0.87% Sodium chloride, pH 7.3, 30% glycerol, and 0.01% sodium azide.
Alternative Names	LEM6; PGC1; PGC1A; PPARGC1; Peroxisome proliferator-activated receptor gamma coactivator 1-alpha; PGC-1-alpha; PPAR-gamma coactivator 1-alpha; PPARGC-1-alpha; Ligand effect modulator 6
Gene Symbol	PPARGC1A
Entrez Gene	10891(Human); 19017(Mouse); 83516(Rat)
SwissProt	Q9UBK2(Human); O70343(Mouse); Q9QYK2(Rat)

*AREX continuously optimizes our products. Webpage content may not reflect the latest updates. For inquiries, please contact info@arexbio.com or your local distributor.

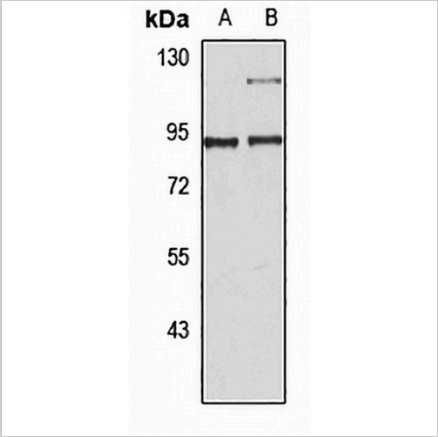
*Clone Number, Reactivity, Source/Host and Clonality can be found in the product name and Key Features section above.

DATASHEET

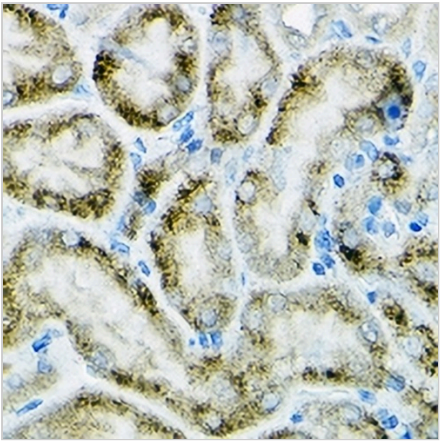
PGC1 alpha Rabbit Polyclonal Antibody

CAT. NO. APA16553

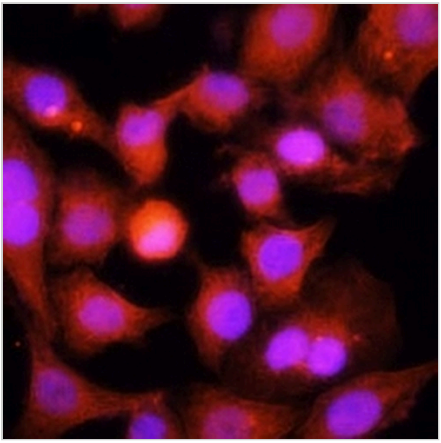
DATA



Western blot analysis of PGC1 alpha expression in mouse heart (A), rat heart (B) whole cell lysates. (Predicted band size: 14; 30; 31; 33; 77; 89; 91 kD; Observed band size: 91 kD)



Immunohistochemical analysis of PGC1 alpha staining in mouse kidney formalin fixed paraffin embedded tissue section. The section was pre-treated using heat mediated antigen retrieval with sodium citrate buffer (pH 6.0). The section was then incubated with the antibody at room temperature and detected using an HRP conjugated compact polymer system. DAB was used as the chromogen. The section was then counterstained with haematoxylin and mounted with DPX.



Immunofluorescent analysis of PGC1 alpha staining in HeLa cells. Formalin-fixed cells were permeabilized with 0.1% Triton X-100 in TBS for 5-10 minutes and blocked with 3% BSA-PBS for 30 minutes at room temperature. Cells were probed with the primary antibody in 3% BSA-PBS and incubated overnight at 4 °C in a hidified chamber. Cells were washed with PBST and incubated with a Alexa Fluor 594-conjugated secondary antibody (red) in PBS at room temperature in the dark.

STORAGE

Store at 4°C short term. For long term storage, store at -20°C, avoiding freeze/thaw cycles.

NOTE

For Research Use Only. Not for diagnostic, therapeutics, prophylactic or in vivo use.