



PGC1 β Rabbit mAb

Catalog No	YP-rAb-17971
Isotype	IgG
Reactivity	Human,Mouse,Rat
Applications	WB,IP,ELISA
Gene Name	PPARGC1B
Protein Name	Peroxisome proliferator-activated receptor gamma coactivator 1-beta
Purification Process	Protein A
Specificity	Endogenous
Formulation	PBS, 50% glycerol, 0.05% Proclin 300, 0.05%BSA
Source	Monoclonal, Rabbit,IgG
Dilution	WB 1:1000-1:5000; ELISA 1:5000-1:20000; IP 1:50-1:200,
Concentration	0.5 mg/ml
Purity	≥90%
Storage Stability	-15 ° C to -25 ° C/1 year(Do not lower than -25 ° C)
Synonyms	PGC1 β ;Peroxisome proliferator-activated receptor gamma coactivator 1-beta;PPARGC1B PERC PGC1 PGC1B PPARGC1;PPARGC1B
Observed Band	113kD
Calculated Molecular Weight	113kD
Cell Pathway	Nucleus
Tissue Specificity	Ubiquitous with higher expression in heart, brain and skeletal muscle.
Function	Domain:Contains 2 Leu-Xaa-Xaa-Leu-Leu (LXXLL) motif, which are usually required for the association with nuclear receptors.,Function:Plays a role of stimulator of transcription factors and nuclear receptors activities. Activates transcriptional activity of estrogen receptor alpha, nuclear respiratory factor 1 (NRF1) and glucocorticoid receptor in the presence of glucocorticoids. May play a role in constitutive non-adrenergic-mediated mitochondrial biogenesis as suggested by increased basal oxygen consumption and mitochondrial number when overexpressed. May be involved in fat oxidation and non-oxidative glucose metabolism and in the regulation of energy expenditure.,induction:Repressed by saturated fatty acids such as palmitate and stearate in skeletal muscle cells. Induced by insulin and reduced by aging in skeletal muscle biopsies. Down-regulated in type 2 diabetes mellitus subjects as well as in pre-diabetics.,polymorphism:Variation of PPARGC1B may contribute to the



pathogenesis of obesity, with a widespread Ala-203 allele being a risk factor for the development of this common disorders.,similarity:Contains 1 RRM (RNA recognition motif) domain.,subunit:Interacts with hepatocyte nuclear factor 4-alpha/HNF4A, Sterol regulatory binding transcription factor 1/SREBF1, PPAR-alpha/PPARA, thyroid hormone receptor beta/THRB and host cell factor/HCFC1. Interacts with estrogen-related receptor gamma/ESRRG and alpha/ESRR (By similarity). Interacts with estrogen receptor alpha/ESR1.,tissue specificity:Ubiquitous with higher expression in heart, brain and skeletal muscle.,

Background

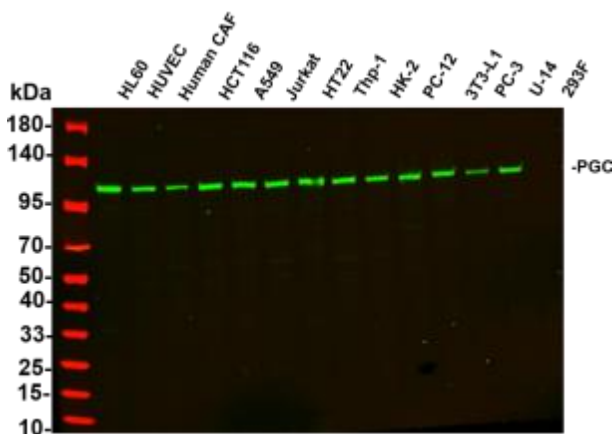
The protein encoded by this gene stimulates the activity of several transcription factors and nuclear receptors, including estrogen receptor alpha, nuclear respiratory factor 1, and glucocorticoid receptor. The encoded protein may be involved in fat oxidation, non-oxidative glucose metabolism, and the regulation of energy expenditure. This protein is downregulated in prediabetic and type 2 diabetes mellitus patients. Certain allelic variations in this gene increase the risk of the development of obesity. Three transcript variants encoding different isoforms have been found for this gene. [provided by RefSeq, Mar 2010],

matters needing attention

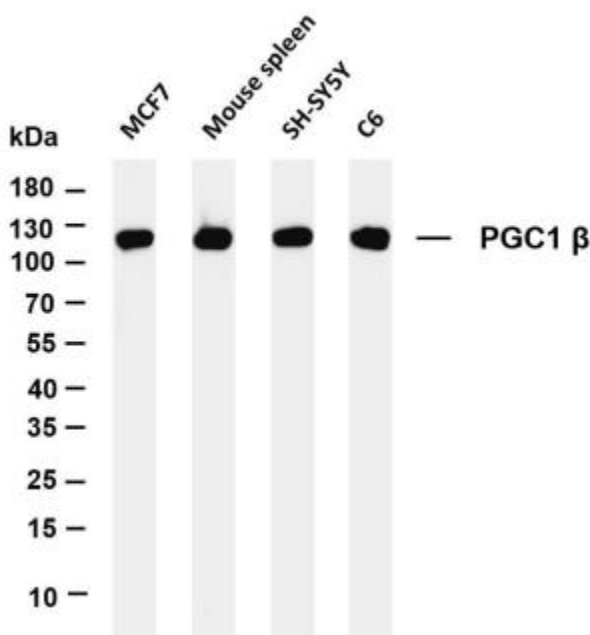
Avoid repeated freezing and thawing!

Usage suggestions

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.



Various whole cell lysates were separated by 4-20% SDS-PAGE, and the primary antibody was used at 4 °C, over night with a 1:2500 dilution. The Dylight 800-conjugated Goat anti-Rabbit antibody



Various whole cell lysates were separated by 4-20% SDS-PAGE, and the membrane was blotted with anti-PGC1 β antibody. The HRP-conjugated Goat anti-Rabbit IgG(H + L) antibody was used to detect the antibody. Lane 1: MCF7 Lane 2: Mouse spleen Lane 3: SH-SY5Y Lane 4: C6 Predicted band size: 113kDa Observed band size: 113kDa

