

ARG59341 anti-Osteocalcin antibody

Package: 50 µg
Store at: -20°C

Summary

Product Description	Rabbit Polyclonal antibody recognizes Osteocalcin
Tested Reactivity	Rat
Tested Application	FACS, IHC-P
Host	Rabbit
Clonality	Polyclonal
Isotype	IgG
Target Name	Osteocalcin
Species	Rat
Immunogen	Recombinant protein corresponding to Y50-V99 of Rat Osteocalcin.
Conjugation	Un-conjugated
Alternate Names	OCN; Gamma-carboxyglutamic acid-containing protein; Osteocalcin; OC; Bone Gla protein; BGP

Application Instructions

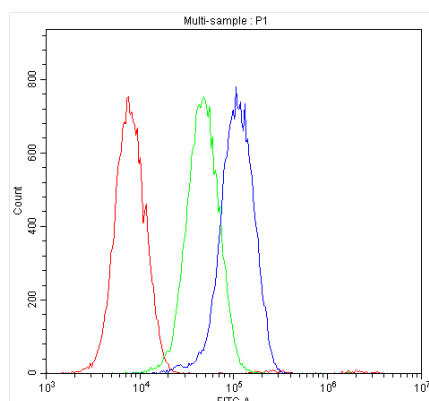
Application table	Application	Dilution
	FACS	1 µg/10 ⁶ cells
	IHC-P	0.5 - 1 µg/ml
Application Note	IHC-P: Antigen Retrieval: Heat mediated was performed in Citrate buffer (pH 6.0) for 20 min. * The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.	

Properties

Form	Liquid
Purification	Affinity purification with immunogen.
Buffer	0.9% NaCl, 0.2% Na ₂ HPO ₄ , 0.05% Sodium azide and 5% BSA.
Preservative	0.05% Sodium azide
Stabilizer	5% BSA
Concentration	0.5 mg/ml
Storage instruction	For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C or below. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed before use.
Note	For laboratory research only, not for drug, diagnostic or other use.

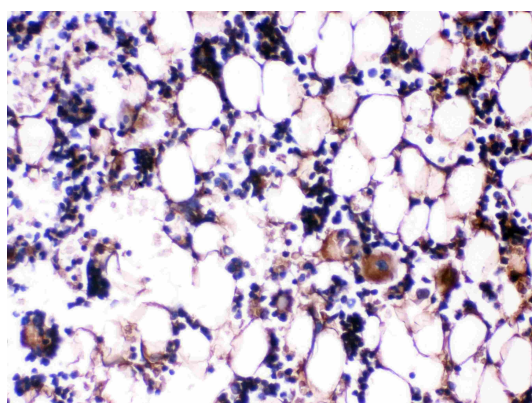
Gene Symbol	BGLAP
Gene Full Name	bone gamma-carboxyglutamate (gla) protein
Background	This gene encodes a highly abundant bone protein secreted by osteoblasts that regulates bone remodeling and energy metabolism. The encoded protein contains a Gla (gamma carboxyglutamate) domain, which functions in binding to calcium and hydroxyapatite, the mineral component of bone. Serum osteocalcin levels may be negatively correlated with metabolic syndrome. Read-through transcription exists between this gene and the neighboring upstream gene, PMF1 (polyamine-modulated factor 1), but the encoded protein only shows sequence identity with the upstream gene product. [provided by RefSeq, Jun 2015]
Function	Constitutes 1-2% of the total bone protein. It binds strongly to apatite and calcium. [UniProt]
Calculated Mw	11 kDa
PTM	Gamma-carboxyglutamate residues are formed by vitamin K dependent carboxylation. These residues are essential for the binding of calcium. [UniProt]
Cellular Localization	Secreted. [UniProt]

Images



ARG59341 anti-Osteocalcin antibody FACS image

Flow Cytometry: L6 cells were blocked with 10% normal goat serum and then stained with ARG59341 anti-Osteocalcin antibody (blue) at 1 µg/10⁶ cells for 30 min at 20°C, followed by DyLight®488 labelled secondary antibody. Isotype control antibody (green) was Rabbit IgG (1 µg/10⁶ cells) used under the same conditions. Unlabelled sample (red) was also used as a control.



ARG59341 anti-Osteocalcin antibody IHC-P image

Immunohistochemistry: Paraffin-embedded Rat tibia tissue. Antigen Retrieval: Heat mediated was performed in Citrate buffer (pH 6.0, epitope retrieval solution) for 20 min. The tissue section was blocked with 10% goat serum. The tissue section was then stained with ARG59341 anti-Osteocalcin antibody at 1 µg/ml, overnight at 4°C.