

RyR1 Monoclonal Antibody (34C)

Product Details	
Size	100 µL
Species	Amphibian, Bovine, Dog, Chicken, Fish, Human, Mustelid, Mouse, Non-human primate, Sheep, Rabbit, Rat
Published Species	Dog, Rabbit, Rat, Pig, Bovine, Cat, Mouse, Human, Chicken
Expression System	Mouse / IgG1
Class	Monoclonal
Type	Antibody
Clone	34C
Conjugate	Unconjugated
Immunogen	Partially purified chicken pectoral muscle ryanodine receptor.
Form	Liquid
Concentration	1 mg/mL
Purification	Protein A
Contains	0.05% sodium azide
Storage Conditions	-20° C, Avoid Freeze/Thaw Cycles
RRID	AB_2254138

Applications	Tested Dilution	Publications
Immunofluorescence (IF)	Assay dependent	9 Publications
Immunohistochemistry (Frozen) (IHC (F))	1:1,000	1 Publication
Immunoprecipitation (IP)	Assay dependent	9 Publications
Western Blot (WB)	1:5,000	99 Publications
Immunocytochemistry (ICC)	-	22 Publications
Immunohistochemistry (IHC)	-	13 Publications
Immunohistochemistry (Paraffin) (IHC (P))	-	1 Publication
Immunohistochemistry - Free Floating (IHC (Free))	-	2 Publications
Miscellaneous PubMed (Misc)	-	1 Publication

Product Specific Information

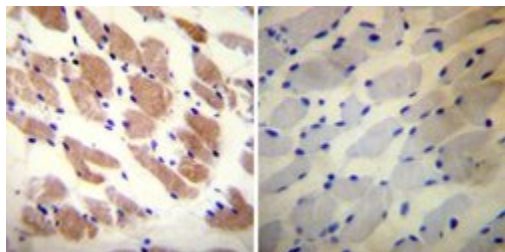
MA3-925 detects ryanodine receptor (RyR)-1 and RyR-2 isoforms in amphibian, chicken, bovine, canine, fish, human, non-human primate, mouse, rabbit, mink, rat and sheep tissues. In chickens this antibody detects the alpha, beta and cardiac isoforms. This antibody also detects RyR-3 in mouse cells. In frog, MA3-925 detects the alpha and beta isoforms and in fish it detects the alpha isoform.

MA3-925 has been successfully used in Western blot, immunohistochemistry, immunofluorescence and immunoprecipitation procedures. By Western blot, this antibody detects a 565 kDa protein representing RyR from rat skeletal muscle extracts. In non-mammalian vertebrates, a doublet is seen at 565 kDa representing the alpha and beta isoforms of the receptor.

Immunohistochemical staining of RyR in chicken brain with MA3-925 results in intense staining of cerebellar Purkinje neurons.

The MA3-925 antigen is partially purified chicken pectoral muscle ryanodine receptor.

Product Images For RyR1 Monoclonal Antibody (34C)



RyR1 Antibody (MA3-925) in IHC

Immunohistochemistry was performed on biopsies of deparaffinized Human skeletal muscle tissue. To expose target proteins, heat induced antigen retrieval was performed using 10mM sodium citrate (pH6.0) buffer, microwaved for 8-15 minutes. Following antigen retrieval tissues were blocked in 3% BSA-PBS for 30 minutes at room temperature. Tissues were then probed at a dilution of 1:20 with a mouse monoclonal antibody recognizing Ryanodine Receptor (Product # MA3-925) or without primary antibody (negative control) overnight at 4°C in a humidified chamber. Tissues were washed extensively with PBST and endogenous peroxidase activity was quenched with a peroxidase suppressor. Detection was performed using a biotin-conjugated secondary antibody and SA-HRP, followed by colorimetric detection using DAB. Tissues were counterstained with hematoxylin and prepped for mounting.

Western Blot (99)

Frontiers in physiology

Electrical Stimulation Prevents Preferential Skeletal Muscle Myosin Loss in Steroid-Denervation Rats.

"MA3-925 was used in Western Blotting to demonstrate that electrical stimulation treatment is an effective way to prevent muscle impairments associated with loss of myosin."

Authors: Yamada T,Himori K,Tatebayashi D,Yamada R,Ashida Y,Imai T,Akatsuka M,Masuda Y,Kanzaki K,Watanabe D,Wada M,Westerblad H,Lanner JT

Species
Rat

Dilution
Not Cited

Year
2020

Physiological reports

SERCA2a tyrosine nitration coincides with impairments in maximal SERCA activity in left ventricles from tafazzin-deficient mice.

"MA3-925 was used in Western Blotting to demonstrate that sarco/endoplasmic reticulum Ca²⁺ -ATPase function is impaired in left ventricles obtained from young and old Taz knockdown mice likely due to elevated reactive oxygen /nitrogen species production."

Authors: Braun JL,Hamstra SI,Messner HN,Fajardo VA

Species
Mouse

Dilution
1:1000

Year
2019

[View more WB references on thermofisher.com](#)

Immunocytochemistry (22)

Skeletal muscle

Development of the excitation-contraction coupling machinery and its relation to myofibrillogenesis in human iPSC-derived skeletal myocytes.

"MA3-925 was used in Immunocytochemistry-immunofluorescence to study the development of the excitation-contraction coupling machinery and its relation to myofibrillogenesis in human iPSC-derived skeletal myocytes."

Authors: Lainé J,Skoglund G,Fournier E,Tabti N

Species
Human

Dilution
1:100

Year
2018

The Journal of physiology

Calcium/calmodulin-dependent kinase II and nitric oxide synthase 1-dependent modulation of ryanodine receptors during -adrenergic stimulation is restricted to the dyadic cleft.

"MA3-925 was used in immunocytochemistry to characterize modulation of ryanodine receptors during beta-adrenergic stimulation and restriction to the dyadic cleft via nitric oxide synthase-1 and calcium/calmodulin-dependent kinase II"

Authors: Dries E,Santiago DJ,Johnson DM,Gilbert G,Holemans P,Korte SM,Roderick HL,Sipido KR

Species
Not Applicable

Dilution
1:200

Year
2016

[View more ICC references on thermofisher.com](#)

More applications with references on thermofisher.com

IF (9) IHC (13) IHC (F) (1) IHC (P) (1) Misc (1) IHC (Free) (2) IP (9)

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