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Anti-MCAD / ACADM Antibody

Rabbit Anti Human Polyclonal Antibody
Catalog # ALS18163

Product Information

Application	WB, IHC-P
Primary Accession	P11310
Predicted	Human, Mouse, Rat
Host	Rabbit
Clonality	Polyclonal
Isotype	IgG
Calculated MW	46588

Additional Information

Gene ID	34
Alias Symbol	ACADM
Other Names	ACADM, ACAD1, MCAD, MCADH
Target/Specificity	Human MCAD / ACADM
Reconstitution & Storage	Affinity purified
Precautions	Anti-MCAD / ACADM Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	ACADM (HGNC:89)
Function	Medium-chain specific acyl-CoA dehydrogenase is one of the acyl-CoA dehydrogenases that catalyze the first step of mitochondrial fatty acid beta-oxidation (FAO), breaking down fatty acids into acetyl- CoA and allowing the production of energy from fats (PubMed:1970566, PubMed:21237683, PubMed:2251268, PubMed:8823175). The first step of FAO consists in the proR-proR stereospecific alpha, beta-dehydrogenation of fatty acyl-CoA thioesters using the electron transfer flavoprotein (ETF) as their physiologic electron acceptor, resulting in the formation of trans-2-enoyl-CoA ((2E)-enoyl-CoA) (PubMed:2251268). ETF is the electron acceptor that transfers electrons to the main mitochondrial respiratory chain via ETF-ubiquinone oxidoreductase (ETF dehydrogenase) (PubMed:15159392, PubMed:25416781). Among the different mitochondrial acyl-CoA dehydrogenases, medium-chain specific acyl-CoA dehydrogenase has preference for fatty acyl-CoAs with saturated 6 to 12 carbons long primary chains, making it but can also catalyze longer chains such as C14 and C16 (PubMed:1970566, PubMed:21237683,

PubMed:2251268, PubMed:8823175).

Cellular Location	Mitochondrion matrix
Tissue Location	Expressed ubiquitously with highest levels in heart and muscle.