

## Product datasheet for **TP727615**

### Troponin C1 (TNNC1) Human Recombinant Protein

#### Product data:

Product Type:	Recombinant Proteins
Description:	Recombinant Human Troponin C/TN-C/TNNC1(N-6His)
Species:	Human
Expression cDNA Clone or AA Sequence:	Met1-Glu161
Tag:	N-His
Buffer:	Supplied as a 0.2 um filtered solution of 20mM Tris,100mM NaCl,1mM DTT,10% Glycerol,pH 8.0.
Note:	Recombinant Human slow skeletal and cardiac muscles is produced by our E.coli expression system and the target gene encoding Met1-Glu161 is expressed with a 6His tag at the N-terminus.
Stability:	12 months from date of despatch
Locus ID:	7134
UniProt ID:	<a href="#">P63316</a>
Summary:	Troponin I, also known as TNI, is a 24 kDa component of a protein complex on striated muscle thin filaments. Troponin is the central regulatory protein of striated muscle contraction. Tn consists of three components: Tn-I which is the inhibitor of actomyosin ATPase, Tn-T which contains the binding site for tropomyosin and Tn-C. The binding of calcium to Tn-C abolishes the inhibitory action of Tn on actin filaments. Troponin I inhibits the calcium-dependent muscle contraction mediated by Troponins C and T. The expression of cardiac Troponin I (TNNI3) is restricted to cardiac muscle, while TNNI1 and TNNI2 (encoded by distinct genes) are expressed in skeletal muscle. Mutations of cardiac Troponin I are associated with hereditary cardiomyopathy. Human cardiac Troponin I shares 93% amino acid sequence identity with mouse and rat cardiac Troponin I.



[View online »](#)