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Product datasheet for RC214083

CDC42 binding protein kinase alpha (CDC42BPA) (NM_003607) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	CDC42 binding protein kinase alpha (CDC42BPA) (NM_003607) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	CDC42 binding protein kinase alpha
Synonyms:	MRCK; MRCKA; PK428
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)

ORF Nucleotide Sequence:

>RC214083 representing NM_003607
Red=Cloning site Blue=ORF Green=Tags(s)

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Protein Sequence:

>RC214083 representing NM_003607
Red=Cloning site Green=Tags(s)

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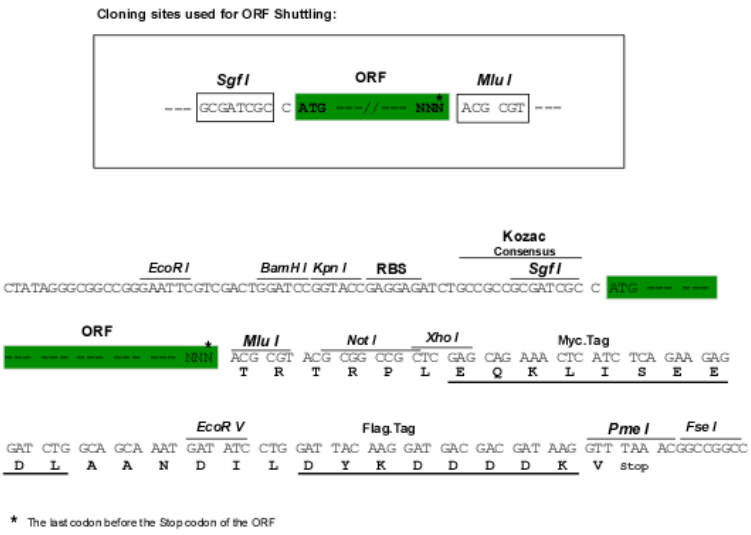
Restriction Sites: SgfI-MluI

Cloning Scheme:



ACCN:	NM_003607
ORF Size:	1424 bp
OTI Disclaimer:	The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. More info
OTI Annotation:	This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.
Components:	The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

Reconstitution Method: 1. Centrifuge at 5,000xg for 5min.
2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.
3. Close the tube and incubate for 10 minutes at room temperature.
4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.
5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of shipping when stored at -20°C.

RefSeq Size: 8019 bp

RefSeq ORF: 5160 bp

Locus ID: 8476

UniProt ID: Q5VT25

Cytogenetics: 1q42.13

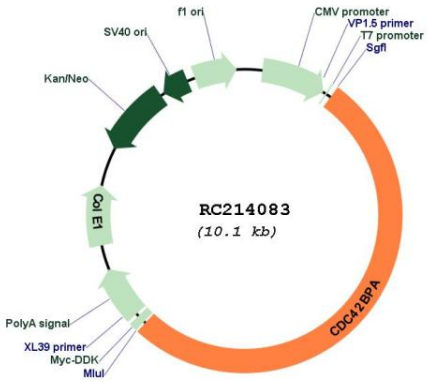
Domains: pkinase, S_TK_X, TyrKc, S_TKc

Protein Families: Druggable Genome, Protein Kinase

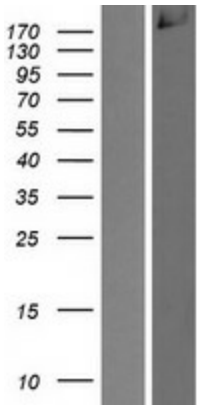
MW: 199.86 kDa

Gene Summary: The protein encoded by this gene is a member of the serine/threonine protein kinase family. This kinase contains multiple functional domains. Its kinase domain is highly similar to that of the myotonic dystrophy protein kinase (DMPK). This kinase also contains a Rac interactive binding (CRIB) domain, and has been shown to bind CDC42. It may function as a CDC42 downstream effector mediating CDC42 induced peripheral actin formation, and promoting cytoskeletal reorganization. Multiple alternatively spliced transcript variants have been described. [provided by RefSeq, Sep 2018]

Product images:



Circular map for RC214083



Western blot validation of overexpression lysate (Cat# [LY415030]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from un-transfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with [RC222587] using transfection reagent MegaTran 2.0 (Cat# [TT210002]).