

PRG2009 Protein Information

Dear PRG2009 Study Participant:

The following gives information on the biological source for the four proteins that are part of the PRG2009 sample. Please note that all proteins were prepared by commercial vendors and the PRG does not have complete details on protein heterogeneity resulting from truncations, isoforms, post-translational modifications, etc.

Sequence information reflects what is listed in several protein databases.

Prostate specific antigen

(from human seminal fluids)

Signal peptide

prostate specific antigen isoform 3 preproprotein [Homo sapiens]

MWVPVVFLTSLVTWIGAAPLILSRIVGGWECEKHSQPWQVLVASRGRAVCGGV
LVHPQWVLTAAHCIRNKSVILLGRHSLFHPEDTGQVFQVSHSFPHPPLYDMSLLKN
RFLRPGDDSSHDLMLLRLSEPAELTDAVKVMDLPTQEPALGTTCYASGWGSIEPE
EFLTPKKLQCVDLHVISNDVCAQVHPQKVTKFMLCAGRWTGGKSTCSWVILITE
LTMPALPMVLHGSLVPWRGGV

prostate specific antigen isoform 4 preproprotein [Homo sapiens]

MWVPVVFLTSLVTWIGAAPLILSRIVGGWECEKHSQPWQVLVASRGRAVCGGV
LVHPQWVLTAAHCIRKPGDDSSHDLMLLRLSEPAELTDAVKVMDLPTQEPALGT
TCYASGWGSIEPEEFLTPKKLQCVDLHVISNDVCAQVHPQKVTKFMLCAGRWT
GGKSTCSGDSGGPLVCNGVLQGITSWGSEPCALPERPSLYTKVVHYRKWIKDTIV
ANP

prostate specific antigen isoform 5 preproprotein [Homo sapiens]

MWVPVVFLTSLVTWIGAAPLILSRIVGGWECEKHSQPWQVLVASRGRAVCGGV
LVHPQWVLTAAHCIRNKSVILLGRHSLFHPEDTGQVFQVSHSFPHPPLYDMSLLKN
RFLRPGDDSSIEPEEFLTPKKLQCVDLHVISNDVCAQVHPQKVTKFMLCAGRWT
GGKSTCSGDSGGPLVCNGVLQGITSWGSEPCALPERPSLYTKVVHYRKWIKDTIV
ANP

prostate specific antigen isoform 6 preproprotein [Homo sapiens]

MWVPVVFLTSLVTWIGAAPLILSRIVGGWECEKHSQPWQVLVASRGRAVCGGV
LVHPQWVLTAAHCIRK

prostate specific antigen isoform 1 preproprotein [Homo sapiens]

MWVPVVFLTSLVTWIGAAPLILSRIVGGWECEKHSQPWQVLVASRGRAVCGGV
LVHPQWVLTAAHCIRNKSVILLGRHSLFHPEDTGQVFQVSHSFPHPPLYDMSLLKN
RFLRPGDDSSHDLMLLRLSEPAELTDAVKVMDLPTQEPALGTTCYASGWGSIEPE
EFLTPKKLQCVDLHVISNDVCAQVHPQKVTKFMLCAGRWTGGKSTCSGDSGGP
LVCNGVLQGITSWGSEPCALPERPSLYTKVVHYRKWIKDTIVANP

Beta human chorionic gonadotropin (recombinant protein from mouse cell line)

Signal peptide

Glycosylation site

Chorionic gonadotrophin alpha subunit (CG-alpha) [Homo sapiens]

MDYYRKYAAIFLVTLVFLHVLHSAPDVQDCPECTLQENPFFSQPGAPILQCMGC
CFSRAYPTPLRSKKTMLVQKNVTSESTCCVAKSYNRVTVMGGFKVENHTACHC
STCYYHKS

Choriogonadotropin subunit beta precursor (CG-beta) [Homo sapiens]

MEMFQGLLLLLLLSMGGTWASKEPLRPRCRPINATLAVEKEGCPVCITVNTTICA
GYCPTMTRVLQGVLPALPQVVCNYRDVRFESIRLPGCPRGVNPVVSYAVALSCQ
CALCRRSTTDCGGPKDHPLTCDDPRFQDSSSSKAPPPSLPSPSRLPGPSDTPILPQ

Glycogen phosphorylase A/B (from rabbit muscle)

Phosphorylation site in 'A' isoform

Acetylated N-terminal amino acid

Glycogen phosphorylase, muscle form (Myophosphorylase) [PYGM_RABIT]

(M)SRPLSDQEKRKQISVRGLAGVENVTELKKNFNRHLHFTLVKDRNVATPRDY
YFALAHTVRDHLVGRWIRTQQHYEYKDPKRIYYLSLEFYMGRTLQNTMVNLAL
ENACDEATYQLGLDMEELEEIEEDAGLGNGGLGRLAACFLDSMATLGLAAYGY
GIRYEFGIFNQKICGGWQMEEADDWLRYGNPWEKARPEFTLPVHFYGRVEHTSQ
GAKWVDTPVVLAMPYDTPVPGYRNNVVNTMRLWSAKAPNDFNLKDFNVGGY
IQAVLDRNLAENISRVLYPNDNFFEGKELRLKQEYFVVAATLQDIIRRFKSSKFGC
RDPVRTNFDAFPDKVAIQLNDRTHPSLAPELMRVLVDLERLDWDKAWEVTVKTC
AYTNHTVLPEALERWPVHLLLETLLPRHLQIIYEINQRFLNRVAAAFPGDVDRLR
MSLVEEGAVKRINMAHLCIAGSHAVNGVARIHSEILKKTIFKDFYELEPHKFQNK
TNGITPRRWLVLCNPGLAEIIAERIGEEYISDLDQLRKLKLSYVDDEAFIRDVAKVK
QENKLFKFAAYLEREYKVHINPNSLFDVQVKRIHEYKRQLLNCLHVITLYNRIKKE
PNKFVVPRTVMIGGKAAPGYHMAKMIKLITAIGDVVNHDVPGDRLRVIFLEN
YRVSLAEKVIPAADLSEQISTAGTEASGTGNMKFMLNGALTIGTMDGANVEMAE
EAGEENFFIFGMRVEDVDRLDQRGYNAQEYYDRIPELRQIEQLSSGFFSPKQPD
FKDIVNMLMHDRFKVFADYEEYVKCQERVSALYKNPREWTRMVIRNIATSGK
FSSDRITIAQYAREIWGVEPSRQRLPAPDEKIP