

December 30, 2015

## STATEMENT ON A NONPROPRIETARY NAME ADOPTED BY THE USAN COUNCIL

USAN (CD-40)

BUROSUMAB

PRONUNCIATION

bur oh' sue mab

THERAPEUTIC CLAIM

Treatment of X-linked hypophosphatemia

## CHEMICAL NAMES

1. Immunoglobulin G1, anti-(human fibroblast growth factor 23) (human monoclonal KRN23 heavy chain), disulfide with human monoclonal KRN23 light chain, dimer
2. Immunoglobulin G1-kappa, anti-(human Fibroblast growth factor 23 (FGF-23, Phosphatonin, Tumor-derived hypophosphatemia-inducing factor)); human monoclonal antibody:  $\gamma$ 1 heavy chain (1-447) [human VH (human IGHV1-46\*01 (95%) –(IGHD)-IGHJ3\*02 (94%)) [8.8.10] (1-117) –human IGHG1\*01 (118-447)] (220-213')-disulfide with kappa light chain (1'-213') [human V-KAPPA (human IGKV1D-13\*01 (98%) –IGKJ3\*01) [6.3.8] (1'-106') – human IGKC\*01 (107'-213')] dimer (226-226":229-229")-bisdisulfide

## STRUCTURAL FORMULA

## Heavy chain

QVQLVQSGAE	VKKPGASVKV	SCKASGYTFT	NHYMHWVRQA	PGQGLEWMGI	50
INPISGSTSN	AQKFQGRVTM	TRDTSTSTVY	MELSSLRSED	TAVYYCARDI	100
VDADFDFWQQ	TMVTVSSAST	KGPSVFPLAP	SSKSTSGGTA	ALGCLVKDYF	150
PEPVTVSWNS	GALTSGVHTF	PAVLQSSGLY	SLSSVVTVPS	SSLGTQTYIC	200
NVNHKPSNTK	VDKKVEPKSC	DKTHTCPPCP	APELLGGPSV	FLFPPKPKDT	250
LMISRTPEVT	CVVVDVSHED	PEVKFNWYVD	GVEVHNAKTK	PREEQYNSTY	300
RVVSVLTVLH	QDWLNGKEYK	CKVSNKALPA	PIEKTISKAK	GQPREPQVYT	350
LPPSRDELTK	NQVSLTCLVK	GFYPSDIAVE	WESNGQPENN	YKTTTPVLDS	400
DGSFFLYSKL	TVDKSRWQQG	NVFSCSVMHE	ALHNHYTQKS	LSLSPGK	447

## Light chain

AIQLTQSPSS	LSASVGDRVT	ITCRASQGIS	SALVWYQQKP	GKAPKLLIYD	50'
ASSLESGVPS	RFSGSGSGTD	FTLTISLQP	EDFATYYCQQ	FNDYFTFGPG	100'
TKVDIKRTVA	APSVFIFPPS	DEQLKSGTAS	VVCLLNNFYP	REAKVQWKVD	150'
NALQSGNSQE	SVTEQDSKDS	TYSLSSTLTL	SKADYEKHKV	YACEVTHQGL	200'
SSPVTKSFNR	GEC				213'

## Disulfide bridges

22-96	22"-96"	23'-88'	23"-88"	133'-193'	133"-193"	144-200	144"-200"
213'-220	213"-220"	226-226"	229-229"	261-321	261"-321"	367-425	367"-425"

## Glycosylation sites (N)

Asn-297 Asn-297"

MOLECULAR FORMULA

 $C_{6388}H_{9904}N_{1700}O_{2006}S_{46}$  (peptide)

MOLECULAR WEIGHT

144.1 kDa (peptide)

TRADEMARK	None as yet
SPONSOR	Ultragenyx
CODE DESIGNATIONS	KRN23
<u>CAS</u> REGISTRY NUMBER	1610833-03-8
UNII	G9WJT6RD29
WHO NUMBER	10301

gbk