

SEQUENCE LISTING

<110> Purcell , Lisa

<120> ANTI-TMPRSS2 ANTIBODIES AND ANTIGEN-BINDING FRAGMENTS

<130> 10378-WO

<140> To be assigned

<141> 2019-01-24

<150> 62/622,292

<151> 2018-01-26

<160> 48

<170> PatentIn version 3.5

<210> 1

<211> 360

<212> DNA

<213> Homo sapiens

<220>

<221> CDS

<222> (1)..(360)

<400> 1

cag	gtg	cag	ctg	gtg	gag	tct	ggg	gga	ggc	gtg	gtc	cag	cct	ggg	agg	48
Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg	
1				5					10					15		

tcc	ctg	aga	ctc	tcc	tgt	gca	gcg	tct	gga	ttc	acc	ttc	agt	tcc	tat	96
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Ser	Tyr	
			20					25					30			

ggc	atg	cac	tgg	gtc	cgc	cag	tct	cca	ggc	aag	ggg	ctc	gag	tgg	gtg	144
Gly	Met	His	Trp	Val	Arg	Gln	Ser	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val	
		35					40					45				

gca	gtt	ata	tgg	aat	gat	gga	agt	tat	gta	tac	tat	gca	gac	tcc	gtg	192
Ala	Val	Ile	Trp	Asn	Asp	Gly	Ser	Tyr	Val	Tyr	Tyr	Ala	Asp	Ser	Val	
		50				55					60					

aag	ggc	cga	ttc	acc	atc	tcc	aga	gac	att	tcc	aag	aac	acg	ctg	ttt	240
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Ile	Ser	Lys	Asn	Thr	Leu	Phe	
65					70				75					80		

ctg	caa	atg	aac	agc	ctg	aga	gcc	gag	gac	acg	gct	gtg	tat	tac	tgt	288
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys	
				85					90					95		

gcg	aga	gag	ggg	gag	tgg	gta	ctt	tac	tac	ttt	gac	tac	tgg	ggc	cag	336
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----

Ala Arg Glu Gly Glu Trp Val Leu Tyr Tyr Phe Asp Tyr Trp Gly Gln
100 105 110

gga acc ctg gtc acc gtc tcc tca
Gly Thr Leu Val Thr Val Ser Ser
115 120

360

<210> 2
<211> 120
<212> PRT
<213> Homo sapiens

<400> 2

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15

Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30

Gly Met His Trp Val Arg Gln Ser Pro Gly Lys Gly Leu Glu Trp Val
35 40 45

Ala Val Ile Trp Asn Asp Gly Ser Tyr Val Tyr Tyr Ala Asp Ser Val
50 55 60

Lys Gly Arg Phe Thr Ile Ser Arg Asp Ile Ser Lys Asn Thr Leu Phe
65 70 75 80

Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95

Ala Arg Glu Gly Glu Trp Val Leu Tyr Tyr Phe Asp Tyr Trp Gly Gln
100 105 110

Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 3
<211> 321
<212> DNA
<213> Homo sapiens

<220>

<221> CDS
<222> (1)..(321)

<400> 3

gac	atc	cag	atg	acc	cag	tct	cct	tcc	acc	ctg	tct	gca	tct	gtt	gga	48
Asp	Ile	Gln	Met	Thr	Gln	Ser	Pro	Ser	Thr	Leu	Ser	Ala	Ser	Val	Gly	
1				5					10					15		

gac	aga	gtc	acc	atc	act	tgc	cgg	gcc	agt	cag	agt	att	agt	agc	tgg	96
Asp	Arg	Val	Thr	Ile	Thr	Cys	Arg	Ala	Ser	Gln	Ser	Ile	Ser	Ser	Trp	
			20					25					30			

ttg	gcc	tgg	tat	cag	cag	aaa	cca	ggg	aaa	gcc	cct	aaa	ctc	ctg	atc	144
Leu	Ala	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Leu	Leu	Ile	
		35					40					45				

tat	aag	gcg	tct	act	tta	gaa	agt	ggg	gtc	cca	tca	agg	ttc	agc	ggc	192
Tyr	Lys	Ala	Ser	Thr	Leu	Glu	Ser	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly	
	50					55					60					

agt	gga	tct	ggg	aca	gaa	ttc	act	ctc	acc	atc	agc	agc	ctg	cag	cct	240
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Pro	
65					70					75					80	

gat	gat	ttt	gca	act	tat	tac	tgc	caa	cag	tat	aat	agt	tat	tcg	tac	288
Asp	Asp	Phe	Ala	Thr	Tyr	Tyr	Cys	Gln	Gln	Tyr	Asn	Ser	Tyr	Ser	Tyr	
				85					90					95		

act	ttt	ggc	cag	ggg	acc	aag	ctg	gag	atc	aaa						321
Thr	Phe	Gly	Gln	Gly	Thr	Lys	Leu	Glu	Ile	Lys						
			100					105								

<210> 4

<211> 107

<212> PRT

<213> Homo sapiens

<400> 4

Asp	Ile	Gln	Met	Thr	Gln	Ser	Pro	Ser	Thr	Leu	Ser	Ala	Ser	Val	Gly
1				5					10					15	

Asp	Arg	Val	Thr	Ile	Thr	Cys	Arg	Ala	Ser	Gln	Ser	Ile	Ser	Ser	Trp
			20					25					30		

Leu	Ala	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Leu	Leu	Ile
		35					40					45			

Tyr	Lys	Ala	Ser	Thr	Leu	Glu	Ser	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
	50					55				60					

Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80

Asp Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Tyr Asn Ser Tyr Ser Tyr
85 90 95

Thr Phe Gly Gln Gly Thr Lys Leu Glu Ile Lys
100 105

<210> 5
<211> 24
<212> DNA
<213> Homo sapiens

<220>
<221> CDS
<222> (1)..(24)

<400> 5
gga ttc acc ttc agt tcc tat ggc
Gly Phe Thr Phe Ser Ser Tyr Gly
1 5

24

<210> 6
<211> 8
<212> PRT
<213> Homo sapiens

<400> 6

Gly Phe Thr Phe Ser Ser Tyr Gly
1 5

<210> 7
<211> 24
<212> DNA
<213> Homo sapiens

<220>
<221> CDS
<222> (1)..(24)

<400> 7
ata tgg aat gat gga agt tat gta
Ile Trp Asn Asp Gly Ser Tyr Val

24

1 5

<210> 8
<211> 8
<212> PRT
<213> Homo sapiens

<400> 8

Ile Trp Asn Asp Gly Ser Tyr Val
1 5

<210> 9
<211> 39
<212> DNA
<213> Homo sapiens

<220>
<221> CDS
<222> (1)..(39)

<400> 9
gcg aga gag ggg gag tgg gta ctt tac tac ttt gac tac 39
Ala Arg Glu Gly Glu Trp Val Leu Tyr Tyr Phe Asp Tyr
1 5 10

<210> 10
<211> 13
<212> PRT
<213> Homo sapiens

<400> 10

Ala Arg Glu Gly Glu Trp Val Leu Tyr Tyr Phe Asp Tyr
1 5 10

<210> 11
<211> 18
<212> DNA
<213> Homo sapiens

<220>
<221> CDS
<222> (1)..(18)

<400> 11
cag agt att agt agc tgg 18
Gln Ser Ile Ser Ser Trp

1 5

<210> 12
<211> 6
<212> PRT
<213> Homo sapiens

<400> 12

Gln Ser Ile Ser Ser Trp
1 5

<210> 13
<211> 9
<212> DNA
<213> Homo sapiens

<400> 13
aaggcgtct

9

<210> 14
<211> 3
<212> PRT
<213> Homo sapiens

<400> 14

Lys Ala Ser
1

<210> 15
<211> 27
<212> DNA
<213> Homo sapiens

<220>
<221> CDS
<222> (1)..(27)

<400> 15
caa cag tat aat agt tat tcg tac act
Gln Gln Tyr Asn Ser Tyr Ser Tyr Thr
1 5

27

<210> 16
<211> 9
<212> PRT
<213> Homo sapiens

<400> 16

Gln Gln Tyr Asn Ser Tyr Ser Tyr Thr
1 5

<210> 17

<211> 450

<212> PRT

<213> Homo sapiens

<400> 17

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15

Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30

Gly Met His Trp Val Arg Gln Ser Pro Gly Lys Gly Leu Glu Trp Val
35 40 45

Ala Val Ile Trp Asn Asp Gly Ser Tyr Val Tyr Tyr Ala Asp Ser Val
50 55 60

Lys Gly Arg Phe Thr Ile Ser Arg Asp Ile Ser Lys Asn Thr Leu Phe
65 70 75 80

Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95

Ala Arg Glu Gly Glu Trp Val Leu Tyr Tyr Phe Asp Tyr Trp Gly Gln
100 105 110

Gly Thr Leu Val Thr Val Ser Ser Ala Ser Thr Lys Gly Pro Ser Val
115 120 125

Phe Pro Leu Ala Pro Ser Ser Lys Ser Thr Ser Gly Gly Thr Ala Ala
130 135 140

Leu Gly Cys Leu Val Lys Asp Tyr Phe Pro Glu Pro Val Thr Val Ser
145 150 155 160

Trp Asn Ser Gly Ala Leu Thr Ser Gly Val His Thr Phe Pro Ala Val
165 170 175

Leu Gln Ser Ser Gly Leu Tyr Ser Leu Ser Ser Val Val Thr Val Pro
180 185 190

Ser Ser Ser Leu Gly Thr Gln Thr Tyr Ile Cys Asn Val Asn His Lys
195 200 205

Pro Ser Asn Thr Lys Val Asp Lys Lys Val Glu Pro Lys Ser Cys Asp
210 215 220

Lys Thr His Thr Cys Pro Pro Cys Pro Ala Pro Glu Leu Leu Gly Gly
225 230 235 240

Pro Ser Val Phe Leu Phe Pro Pro Lys Pro Lys Asp Thr Leu Met Ile
245 250 255

Ser Arg Thr Pro Glu Val Thr Cys Val Val Val Asp Val Ser His Glu
260 265 270

Asp Pro Glu Val Lys Phe Asn Trp Tyr Val Asp Gly Val Glu Val His
275 280 285

Asn Ala Lys Thr Lys Pro Arg Glu Glu Gln Tyr Asn Ser Thr Tyr Arg
290 295 300

Val Val Ser Val Leu Thr Val Leu His Gln Asp Trp Leu Asn Gly Lys
305 310 315 320

Glu Tyr Lys Cys Lys Val Ser Asn Lys Ala Leu Pro Ala Pro Ile Glu
325 330 335

Lys Thr Ile Ser Lys Ala Lys Gly Gln Pro Arg Glu Pro Gln Val Tyr
340 345 350

Thr Leu Pro Pro Ser Arg Asp Glu Leu Thr Lys Asn Gln Val Ser Leu
355 360 365

Thr Cys Leu Val Lys Gly Phe Tyr Pro Ser Asp Ile Ala Val Glu Trp
370 375 380

Glu Ser Asn Gly Gln Pro Glu Asn Asn Tyr Lys Thr Thr Pro Pro Val
385 390 395 400

Leu Asp Ser Asp Gly Ser Phe Phe Leu Tyr Ser Lys Leu Thr Val Asp
405 410 415

Lys Ser Arg Trp Gln Gln Gly Asn Val Phe Ser Cys Ser Val Met His
420 425 430

Glu Ala Leu His Asn His Tyr Thr Gln Lys Ser Leu Ser Leu Ser Pro
435 440 445

Gly Lys
450

<210> 18
<211> 214
<212> PRT
<213> Homo sapiens

<400> 18

Asp Ile Gln Met Thr Gln Ser Pro Ser Thr Leu Ser Ala Ser Val Gly
1 5 10 15

Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Ser Ile Ser Ser Trp
20 25 30

Leu Ala Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Leu Leu Ile
35 40 45

Tyr Lys Ala Ser Thr Leu Glu Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60

Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80

Asp Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Tyr Asn Ser Tyr Ser Tyr
85 90 95

Thr Phe Gly Gln Gly Thr Lys Leu Glu Ile Lys Arg Thr Val Ala Ala

100

105

110

Pro Ser Val Phe Ile Phe Pro Pro Ser Asp Glu Gln Leu Lys Ser Gly
 115 120 125

Thr Ala Ser Val Val Cys Leu Leu Asn Asn Phe Tyr Pro Arg Glu Ala
 130 135 140

Lys Val Gln Trp Lys Val Asp Asn Ala Leu Gln Ser Gly Asn Ser Gln
 145 150 155 160

Glu Ser Val Thr Glu Gln Asp Ser Lys Asp Ser Thr Tyr Ser Leu Ser
 165 170 175

Ser Thr Leu Thr Leu Ser Lys Ala Asp Tyr Glu Lys His Lys Val Tyr
 180 185 190

Ala Cys Glu Val Thr His Gln Gly Leu Ser Ser Pro Val Thr Lys Ser
 195 200 205

Phe Asn Arg Gly Glu Cys
 210

<210> 19
 <211> 447
 <212> PRT
 <213> Homo sapiens

<400> 19

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15

Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30

Gly Met His Trp Val Arg Gln Ser Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45

Ala Val Ile Trp Asn Asp Gly Ser Tyr Val Tyr Tyr Ala Asp Ser Val
 50 55 60

Lys Gly Arg Phe Thr Ile Ser Arg Asp Ile Ser Lys Asn Thr Leu Phe
65 70 75 80

Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95

Ala Arg Glu Gly Glu Trp Val Leu Tyr Tyr Phe Asp Tyr Trp Gly Gln
100 105 110

Gly Thr Leu Val Thr Val Ser Ser Ala Ser Thr Lys Gly Pro Ser Val
115 120 125

Phe Pro Leu Ala Pro Cys Ser Arg Ser Thr Ser Glu Ser Thr Ala Ala
130 135 140

Leu Gly Cys Leu Val Lys Asp Tyr Phe Pro Glu Pro Val Thr Val Ser
145 150 155 160

Trp Asn Ser Gly Ala Leu Thr Ser Gly Val His Thr Phe Pro Ala Val
165 170 175

Leu Gln Ser Ser Gly Leu Tyr Ser Leu Ser Ser Val Val Thr Val Pro
180 185 190

Ser Ser Ser Leu Gly Thr Lys Thr Tyr Thr Cys Asn Val Asp His Lys
195 200 205

Pro Ser Asn Thr Lys Val Asp Lys Arg Val Glu Ser Lys Tyr Gly Pro
210 215 220

Pro Cys Pro Pro Cys Pro Ala Pro Glu Phe Leu Gly Gly Pro Ser Val
225 230 235 240

Phe Leu Phe Pro Pro Lys Pro Lys Asp Thr Leu Met Ile Ser Arg Thr
245 250 255

Pro Glu Val Thr Cys Val Val Val Asp Val Ser Gln Glu Asp Pro Glu
260 265 270

Val Gln Phe Asn Trp Tyr Val Asp Gly Val Glu Val His Asn Ala Lys
275 280 285

Thr Lys Pro Arg Glu Glu Gln Phe Asn Ser Thr Tyr Arg Val Val Ser
290 295 300

Val Leu Thr Val Leu His Gln Asp Trp Leu Asn Gly Lys Glu Tyr Lys
305 310 315 320

Cys Lys Val Ser Asn Lys Gly Leu Pro Ser Ser Ile Glu Lys Thr Ile
325 330 335

Ser Lys Ala Lys Gly Gln Pro Arg Glu Pro Gln Val Tyr Thr Leu Pro
340 345 350

Pro Ser Gln Glu Glu Met Thr Lys Asn Gln Val Ser Leu Thr Cys Leu
355 360 365

Val Lys Gly Phe Tyr Pro Ser Asp Ile Ala Val Glu Trp Glu Ser Asn
370 375 380

Gly Gln Pro Glu Asn Asn Tyr Lys Thr Thr Pro Pro Val Leu Asp Ser
385 390 395 400

Asp Gly Ser Phe Phe Leu Tyr Ser Arg Leu Thr Val Asp Lys Ser Arg
405 410 415

Trp Gln Glu Gly Asn Val Phe Ser Cys Ser Val Met His Glu Ala Leu
420 425 430

His Asn His Tyr Thr Gln Lys Ser Leu Ser Leu Ser Leu Gly Lys
435 440 445

<210> 20
<211> 178
<212> PRT
<213> Homo sapiens

<400> 20

Trp Lys Phe Met Gly Ser Lys Cys Ser Asn Ser Gly Ile Glu Cys Asp
1 5 10 15

Ser Ser Gly Thr Cys Ile Asn Pro Ser Asn Trp Cys Asp Gly Val Ser

20

25

30

His Cys Pro Gly Gly Glu Asp Glu Asn Arg Cys Val Arg Leu Tyr Gly
 35 40 45

Pro Asn Phe Ile Leu Gln Met Tyr Ser Ser Gln Arg Lys Ser Trp His
 50 55 60

Pro Val Cys Gln Asp Asp Trp Asn Glu Asn Tyr Gly Arg Ala Ala Cys
 65 70 75 80

Arg Asp Met Gly Tyr Lys Asn Asn Phe Tyr Ser Ser Gln Gly Ile Val
 85 90 95

Asp Asp Ser Gly Ser Thr Ser Phe Met Lys Leu Asn Thr Ser Ala Gly
 100 105 110

Asn Val Asp Ile Tyr Lys Lys Leu Tyr His Ser Asp Ala Cys Ser Ser
 115 120 125

Lys Ala Val Val Ser Leu Arg Cys Ile Ala Cys Gly Val Asn Leu Asn
 130 135 140

Ser Ser Arg Gln Ser Arg Glu Gln Lys Leu Ile Ser Glu Glu Asp Leu
 145 150 155 160

Gly Gly Glu Gln Lys Leu Ile Ser Glu Glu Asp Leu His His His His
 165 170 175

His His

<210> 21

<211> 178

<212> PRT

<213> *Macaca fascicularis*

<400> 21

Trp Lys Phe Met Gly Ser Lys Cys Ser Asp Ser Gly Ile Glu Cys Asp
 1 5 10 15

Ser Ser Gly Thr Cys Ile Ser Leu Ser Asn Trp Cys Asp Gly Val Ser
20 25 30

His Cys Pro Asn Gly Glu Asp Glu Asn Arg Cys Val Arg Leu Tyr Gly
35 40 45

Pro Asn Phe Ile Leu Gln Val Tyr Ser Ser Gln Arg Lys Ser Trp His
50 55 60

Pro Val Cys Arg Asp Asp Trp Asn Glu Asn Tyr Ala Arg Ala Ala Cys
65 70 75 80

Arg Asp Met Gly Tyr Lys Asn Ser Phe Tyr Ser Ser Gln Gly Ile Val
85 90 95

Asp Asn Ser Gly Ala Thr Ser Phe Met Lys Leu Asn Thr Ser Ala Gly
100 105 110

Asn Val Asp Ile Tyr Lys Lys Leu Tyr His Ser Asp Ala Cys Ser Ser
115 120 125

Lys Ala Val Val Ser Leu Arg Cys Ile Ala Cys Gly Val Arg Ser Asn
130 135 140

Leu Ser Arg Gln Ser Arg Glu Gln Lys Leu Ile Ser Glu Glu Asp Leu
145 150 155 160

Gly Gly Glu Gln Lys Leu Ile Ser Glu Glu Asp Leu His His His His
165 170 175

His His

<210> 22
<211> 492
<212> PRT
<213> Homo sapiens

<400> 22

Met Ala Leu Asn Ser Gly Ser Pro Pro Ala Ile Gly Pro Tyr Tyr Glu
1 5 10 15

Asn His Gly Tyr Gln Pro Glu Asn Pro Tyr Pro Ala Gln Pro Thr Val
20 25 30

Val Pro Thr Val Tyr Glu Val His Pro Ala Gln Tyr Tyr Pro Ser Pro
35 40 45

Val Pro Gln Tyr Ala Pro Arg Val Leu Thr Gln Ala Ser Asn Pro Val
50 55 60

Val Cys Thr Gln Pro Lys Ser Pro Ser Gly Thr Val Cys Thr Ser Lys
65 70 75 80

Thr Lys Lys Ala Leu Cys Ile Thr Leu Thr Leu Gly Thr Phe Leu Val
85 90 95

Gly Ala Ala Leu Ala Ala Gly Leu Leu Trp Lys Phe Met Gly Ser Lys
100 105 110

Cys Ser Asn Ser Gly Ile Glu Cys Asp Ser Ser Gly Thr Cys Ile Asn
115 120 125

Pro Ser Asn Trp Cys Asp Gly Val Ser His Cys Pro Gly Gly Glu Asp
130 135 140

Glu Asn Arg Cys Val Arg Leu Tyr Gly Pro Asn Phe Ile Leu Gln Met
145 150 155 160

Tyr Ser Ser Gln Arg Lys Ser Trp His Pro Val Cys Gln Asp Asp Trp
165 170 175

Asn Glu Asn Tyr Gly Arg Ala Ala Cys Arg Asp Met Gly Tyr Lys Asn
180 185 190

Asn Phe Tyr Ser Ser Gln Gly Ile Val Asp Asp Ser Gly Ser Thr Ser
195 200 205

Phe Met Lys Leu Asn Thr Ser Ala Gly Asn Val Asp Ile Tyr Lys Lys
210 215 220

Leu Tyr His Ser Asp Ala Cys Ser Ser Lys Ala Val Val Ser Leu Arg

225		230		235		240									
Cys	Ile	Ala	Cys	Gly	Val	Asn	Leu	Asn	Ser	Ser	Arg	Gln	Ser	Arg	Ile
				245					250					255	
Val	Gly	Gly	Glu	Ser	Ala	Leu	Pro	Gly	Ala	Trp	Pro	Trp	Gln	Val	Ser
			260					265					270		
Leu	His	Val	Gln	Asn	Val	His	Val	Cys	Gly	Gly	Ser	Ile	Ile	Thr	Pro
		275					280					285			
Glu	Trp	Ile	Val	Thr	Ala	Ala	His	Cys	Val	Glu	Lys	Pro	Leu	Asn	Asn
	290						295				300				
Pro	Trp	His	Trp	Thr	Ala	Phe	Ala	Gly	Ile	Leu	Arg	Gln	Ser	Phe	Met
305					310					315					320
Phe	Tyr	Gly	Ala	Gly	Tyr	Gln	Val	Glu	Lys	Val	Ile	Ser	His	Pro	Asn
			325						330					335	
Tyr	Asp	Ser	Lys	Thr	Lys	Asn	Asn	Asp	Ile	Ala	Leu	Met	Lys	Leu	Gln
			340					345					350		
Lys	Pro	Leu	Thr	Phe	Asn	Asp	Leu	Val	Lys	Pro	Val	Cys	Leu	Pro	Asn
		355					360					365			
Pro	Gly	Met	Met	Leu	Gln	Pro	Glu	Gln	Leu	Cys	Trp	Ile	Ser	Gly	Trp
	370					375					380				
Gly	Ala	Thr	Glu	Glu	Lys	Gly	Lys	Thr	Ser	Glu	Val	Leu	Asn	Ala	Ala
385					390					395					400
Lys	Val	Leu	Leu	Ile	Glu	Thr	Gln	Arg	Cys	Asn	Ser	Arg	Tyr	Val	Tyr
				405					410					415	
Asp	Asn	Leu	Ile	Thr	Pro	Ala	Met	Ile	Cys	Ala	Gly	Phe	Leu	Gln	Gly
			420					425					430		
Asn	Val	Asp	Ser	Cys	Gln	Gly	Asp	Ser	Gly	Gly	Pro	Leu	Val	Thr	Ser
		435					440					445			

Lys Asn Asn Ile Trp Trp Leu Ile Gly Asp Thr Ser Trp Gly Ser Gly
450 455 460

Cys Ala Lys Ala Tyr Arg Pro Gly Val Tyr Gly Asn Val Met Val Phe
465 470 475 480

Thr Asp Trp Ile Tyr Arg Gln Met Arg Ala Asp Gly
485 490

<210> 23
<211> 492
<212> PRT
<213> Macaca mulatta

<400> 23

Met Ala Leu Asn Ser Gly Ser Pro Pro Gly Val Gly Pro Tyr Tyr Glu
1 5 10 15

Asn His Gly Tyr Gln Pro Glu Asn Pro Tyr Pro Ala Gln Pro Thr Val
20 25 30

Ala Pro Asn Val Tyr Glu Val His Pro Ala Gln Tyr Tyr Pro Ser Pro
35 40 45

Val Pro Gln Tyr Thr Pro Arg Val Leu Thr His Ala Ser Asn Pro Ala
50 55 60

Val Cys Arg Gln Pro Lys Ser Pro Ser Gly Thr Val Cys Thr Ser Lys
65 70 75 80

Thr Lys Lys Ala Leu Cys Val Thr Met Thr Leu Gly Ala Val Leu Val
85 90 95

Gly Ala Ala Leu Ala Ala Gly Leu Leu Trp Lys Phe Met Gly Ser Lys
100 105 110

Cys Ser Asp Ser Gly Ile Glu Cys Asp Ser Ser Gly Thr Cys Ile Ser
115 120 125

Leu Ser Asn Trp Cys Asp Gly Val Ser His Cys Pro Asn Gly Glu Asp
130 135 140

Glu Asn Arg Cys Val Arg Leu Tyr Gly Pro Asn Phe Ile Leu Gln Val
145 150 155 160

Tyr Ser Ser Gln Arg Lys Ser Trp His Pro Val Cys Arg Asp Asp Trp
165 170 175

Asn Glu Asn Tyr Ala Arg Ala Ala Cys Arg Asp Met Gly Tyr Lys Asn
180 185 190

Ser Phe Tyr Ser Ser Gln Gly Ile Val Asp Asn Ser Gly Ala Thr Ser
195 200 205

Phe Met Lys Leu Asn Thr Ser Ala Gly Asn Val Asp Ile Tyr Lys Lys
210 215 220

Leu Tyr His Ser Asp Ala Cys Ser Ser Lys Ala Val Val Ser Leu Arg
225 230 235 240

Cys Ile Ala Cys Gly Val Arg Ser Asn Leu Ser Arg Gln Ser Arg Ile
245 250 255

Val Gly Gly Gln Asn Ala Leu Leu Gly Ala Trp Pro Trp Gln Val Ser
260 265 270

Leu His Val Gln Asn Ile His Val Cys Gly Gly Ser Ile Ile Thr Pro
275 280 285

Glu Trp Ile Val Thr Ala Ala His Cys Val Glu Lys Pro Leu Asn Ser
290 295 300

Pro Trp Gln Trp Thr Ala Phe Val Gly Thr Leu Arg Gln Ser Ser Met
305 310 315 320

Phe Tyr Glu Lys Gly His Arg Val Glu Lys Val Ile Ser His Pro Asn
325 330 335

Tyr Asp Ser Lys Thr Lys Asn Asn Asp Ile Ala Leu Met Lys Leu His
340 345 350

Thr Pro Leu Thr Phe Asn Glu Val Val Lys Pro Val Cys Leu Pro Asn
355 360 365

Pro Gly Met Met Leu Glu Pro Glu Gln His Cys Trp Ile Ser Gly Trp
370 375 380

Gly Ala Thr Gln Glu Lys Gly Lys Thr Ser Asp Val Leu Asn Ala Ala
385 390 395 400

Met Val Pro Leu Ile Glu Pro Arg Arg Cys Asn Asn Lys Tyr Val Tyr
405 410 415

Asp Gly Leu Ile Thr Pro Ala Met Ile Cys Ala Gly Phe Leu Gln Gly
420 425 430

Thr Val Asp Ser Cys Gln Gly Asp Ser Gly Gly Pro Leu Val Thr Leu
435 440 445

Lys Asn Asp Val Trp Trp Leu Ile Gly Asp Thr Ser Trp Gly Ser Gly
450 455 460

Cys Ala Gln Ala Asn Arg Pro Gly Val Tyr Gly Asn Val Thr Val Phe
465 470 475 480

Thr Asp Trp Ile Tyr Arg Gln Met Arg Ala Asp Gly
485 490

<210> 24
<211> 120
<212> PRT
<213> Homo sapiens

<400> 24

Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15

Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Gly Phe
20 25 30

Ser Met Asn Trp Val Arg Gln Val Pro Gly Lys Gly Leu Glu Trp Val
35 40 45

Ser Ser Ile Ser Thr Ser Gly Asn Tyr Met Tyr Tyr Ala Asp Ser Val
50 55 60

Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Lys Ser Phe Ser
65 70 75 80

Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Ser Ala Ile Tyr Tyr Cys
85 90 95

Ala Arg Gly Gly Gly Tyr Asn Trp Asn Leu Phe Asp Tyr Trp Gly Gln
100 105 110

Gly Ser Leu Val Thr Val Ser Ser
115 120

<210> 25
<211> 8
<212> PRT
<213> Homo sapiens

<400> 25

Gly Phe Thr Phe Ser Gly Phe Ser
1 5

<210> 26
<211> 8
<212> PRT
<213> Homo sapiens

<400> 26

Ile Ser Thr Ser Gly Asn Tyr Met
1 5

<210> 27
<211> 13
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Ala Arg Gly Gly Gly Tyr Asn Trp Asn Leu Phe Asp Tyr
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<400> 28

Glu Ile Val Leu Thr Gln Ser Pro Gly Thr Leu Ser Leu Ser Pro Gly
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Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Leu Asn Ser Asn
20 25 30

Tyr Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu
35 40 45

Ile Tyr Gly Ala Ser Ser Arg Ala Thr Gly Ile Pro Asp Arg Phe Ser
50 55 60

Gly Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Thr Arg Leu Glu
65 70 75 80

Ser Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Gly Asn Ser Pro
85 90 95

Leu Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys
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Gln Ser Leu Asn Ser Asn Tyr
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Gly Ala Ser

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Gln Gln Tyr Gly Asn Ser Pro Leu Thr
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Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Ser Gly Ser
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Ser Val Lys Val Ser Cys Lys Ala Ser Gly Gly Thr Phe Ser Ser Tyr
20 25 30

Ala Ile Ser Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45

Gly Gly Ile Ile Pro Ile Phe Gly Thr Pro Ser Tyr Ala Gln Lys Phe
50 55 60

Gln Asp Arg Val Thr Ile Thr Thr Asp Glu Ser Thr Ser Thr Val Tyr
65 70 75 80

Met Glu Leu Ser Ser Leu Arg Ser Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95

Ala Arg Gln Gln Pro Val Tyr Gln Tyr Asn Met Asp Val Trp Gly Gln
100 105 110

Gly Thr Thr Val Thr Val Ser Ser
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Gly Gly Thr Phe Ser Ser Tyr Ala
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Ile Ile Pro Ile Phe Gly Thr Pro
1 5

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Ala Arg Gln Gln Pro Val Tyr Gln Tyr Asn Met Asp Val
1 5 10

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Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15

Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asn
20 25 30

Leu Gly Trp Tyr Gln Gln Lys Pro Leu Lys Ala Pro Lys Arg Leu Ile
35 40 45

Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60

Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80

Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln Tyr Asn Asn Tyr Pro Trp
85 90 95

Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

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<400> 37

Gln Gly Ile Arg Asn Asn
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Ala Ala Ser
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<400> 39

Leu Gln Tyr Asn Asn Tyr Pro Trp Thr
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<400> 40

Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Val Lys Pro Gly Gly

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Ser	Cys	Ala	Ala
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Ser	Gly	Phe	Ser
			30
Ser	Phe	Ser	Gly
			Phe
Ser	Met	Asn	Trp
	35		
Val	Arg	Gln	Ala
		40	
Pro	Gly	Lys	Gly
			45
Leu	Glu	Trp	Val
Ser	Ser	Ile	Ser
	50		
Thr	Ser	Gly	Asn
		55	
Tyr	Met	Tyr	Tyr
			60
Ala	Asp	Ser	Val
Lys	Gly	Arg	Phe
	65		
Thr	Ile	Ser	Arg
	70		
Asp	Asn	Ala	Lys
		75	
Lys	Lys	Ser	Phe
			80
Ser	Phe	Ser	
Leu	Gln	Met	Asn
		85	
Ser	Leu	Arg	Ala
Glu	Asp	Ser	Ala
	90		
Ile	Tyr	Tyr	Cys
		95	
Ala	Arg	Gly	Gly
		100	
Tyr	Asn	Trp	Asn
			105
Leu	Phe	Asp	Tyr
			110
Trp	Gly	Gln	

Gly	Ser	Leu	Val	Thr	Val	Ser	Ser
	115					120	

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<400> 41

Gly	Phe	Ser	Phe	Ser	Gly	Phe	Ser
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<400> 42

Ile	Ser	Thr	Ser	Gly	Asn	Tyr	Met
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<210> 43

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<400> 43

Ala Arg Gly Gly Gly Tyr Asn Trp Asn Leu Phe Asp Tyr
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Glu Ile Val Leu Thr Gln Ser Pro Gly Thr Leu Ser Leu Ser Pro Gly
1 5 10 15

Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Leu Asn Ser Asn
20 25 30

Tyr Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu
35 40 45

Ile Tyr Gly Ala Ser Ser Arg Ala Thr Gly Ile Pro Asp Arg Phe Ser
50 55 60

Gly Ser Gly Ser Gly Ala Asp Phe Thr Leu Thr Ile Ser Arg Leu Glu
65 70 75 80

Ser Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Gly Asn Ser Pro
85 90 95

Leu Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys
100 105

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Gln Ser Leu Asn Ser Asn Tyr
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Gly Ala Ser
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Gln Gln Tyr Gly Asn Ser Pro Leu Thr
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Gly Gly Gly Gly Ser
1 5