

## LISTA DE SECUENCIAS

<110> UCB Biopharma SPRL

<120> Formulaci3n Farmac3utica

<130> B0090-PCT

<150> 15154301.4

<151> 2015-02-09

<160> 14

<170> Versi3n de patente 3.5

<210> 1

<211> 11

<212> PRT

<213> Secuencia Artificial

<220>

<223> CA019\_969 Ab secuencias CDR-L1

<400> 1

Leu Ala Ser Glu Asp Ile Tyr Asp Asn Leu Ala  
1 5 10

<210> 2

<211> 7

<212> PRT

<213> Secuencia Artificial

<220>

<223> CA019\_969 Ab secuencias CDRL2

<400> 2

Tyr Ala Ser Ser Leu Gln Asp  
1 5

<210> 3

<211> 9

<212> PRT

<213> Secuencia Artificial

<220>

<223> CA019\_969 Ab secuencias CDR-L3

<400> 3

Leu Gln Asp Ser Glu Tyr Pro Trp Thr  
1 5

<210> 4

<211> 12

<212> PRT

<213> Secuencia Artificial

<220>

<223> CA019\_969 Ab secuencias CDR-H1

<400> 4

Gly Phe Ser Leu Thr Thr Tyr Gly Met Gly Val Gly  
1 5 10

<210> 5

<211> 16

<212> PRT

<213> Secuencia Artificial

<220>

<223> CA019\_969 Ab secuencias CDR-H2

<400> 5

Asn Ile Trp Trp Asp Asp Asp Lys Tyr Tyr Asn Pro Ser Leu Lys Asn  
1 5 10 15

<210> 6

<211> 16

<212> PRT

<213> Secuencia Artificial

<220>

<223> CA019\_969 Ab secuencias CDR-H3

<400> 6

Ile Gly Pro Ile Lys Tyr Pro Thr Ala Pro Tyr Arg Tyr Phe Asp Phe  
1 5 10 15

<210> 7

<211> 107  
<212> PRT  
<213> Secuencia Artificial

<220>  
<223> 969 gL7 V-región

<400> 7

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 Leu Ala Ser Glu Asp Ile Tyr Asp Asn  
20 25 30

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

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

Ser Gly Ser Gly Thr Asp Tyr Thr Leu Thr Ile Ser Ser Leu Gln Pro  
65 70 75 80

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

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

<210> 8  
<211> 127  
<212> PRT  
<213> Secuencia Artificial

<220>  
<223> 969 gL7 V- Región con secuencia de señal subrayada y en cursiva

<400> 8

Met Ser Val Pro Thr Gln Val Leu Gly Leu Leu Leu Leu Trp Leu Thr  
1 5 10 15

Asp Ala Arg Cys Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser  
20 25 30

Ala Ser Val Gly Asp Arg Val Thr Ile Thr Cys Leu Ala Ser Glu Asp  
35 40 45

Ile Tyr Asp Asn Leu Ala Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro  
50 55 60

Lys Leu Leu Ile Tyr Tyr Ala Ser Ser Leu Gln Asp Gly Val Pro Ser  
65 70 75 80

Arg Phe Ser Gly Ser Gly Ser Gly Thr Asp Tyr Thr Leu Thr Ile Ser  
85 90 95

Ser Leu Gln Pro Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln Asp Ser  
100 105 110

Glu Tyr Pro Trp Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys  
115 120 125

<210> 9

<211> 214

<212> PRT

<213> Secuencia Artificial

<220>

<223> 969 gL7 cadena ligera (V + constante)

<400> 9

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 Leu Ala Ser Glu Asp Ile Tyr Asp Asn  
20 25 30

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

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

Ser Gly Ser Gly Thr Asp Tyr Thr Leu Thr Ile Ser Ser Leu Gln Pro  
65 70 75 80

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

Thr Phe Gly Gly Gly Thr Lys Val 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> 10

<211> 234

<212> PRT

<213> Secuencia Artificial

<220>

<223> 969 gL7 cadena ligera (V + constante) con secuencia señal  
subrayada y en cursiva

<400> 10

Met Ser Val Pro Thr Gln Val Leu Gly Leu Leu Leu Leu Trp Leu Thr  
1 5 10 15

Asp Ala Arg Cys Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser  
20 25 30

Ala Ser Val Gly Asp Arg Val Thr Ile Thr Cys Leu Ala Ser Glu Asp  
35 40 45

Ile Tyr Asp Asn Leu Ala Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro  
50 55 60

Lys Leu Leu Ile Tyr Tyr Ala Ser Ser Leu Gln Asp Gly Val Pro Ser  
65 70 75 80

Arg Phe Ser Gly Ser Gly Ser Gly Thr Asp Tyr Thr Leu Thr Ile Ser  
85 90 95

Ser Leu Gln Pro Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln Asp Ser  
100 105 110

Glu Tyr Pro Trp Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys Arg  
115 120 125

Thr Val Ala Ala Pro Ser Val Phe Ile Phe Pro Pro Ser Asp Glu Gln  
130 135 140

Leu Lys Ser Gly Thr Ala Ser Val Val Cys Leu Leu Asn Asn Phe Tyr  
145 150 155 160

Pro Arg Glu Ala Lys Val Gln Trp Lys Val Asp Asn Ala Leu Gln Ser  
165 170 175

Gly Asn Ser Gln Glu Ser Val Thr Glu Gln Asp Ser Lys Asp Ser Thr

|                            |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |
|----------------------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
|                            | 180 |     | 185 |     | 190 |     |     |     |     |     |     |     |     |     |     |
| Tyr                        | Ser | Leu | Ser | Ser | Thr | Leu | Thr | Leu | Ser | Lys | Ala | Asp | Tyr | Glu | Lys |
|                            | 195 |     |     |     |     | 200 |     |     |     |     |     | 205 |     |     |     |
| His                        | Lys | Val | Tyr | Ala | Cys | Glu | Val | Thr | His | Gln | Gly | Leu | Ser | Ser | Pro |
|                            | 210 |     |     |     |     | 215 |     |     |     |     | 220 |     |     |     |     |
| Val                        | Thr | Lys | Ser | Phe | Asn | Arg | Gly | Glu | Cys |     |     |     |     |     |     |
| 225                        |     |     |     |     | 230 |     |     |     |     |     |     |     |     |     |     |
| <210> 11                   |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |
| <211> 125                  |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |
| <212> PRT                  |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |
| <213> Secuencia Artificial |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |
| <220>                      |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |
| <223> 969 gH2 V-región     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |
| <400> 11                   |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |
| Glu                        | Val | Thr | Leu | Lys | Glu | Ser | Gly | Pro | Ala | Leu | Val | Lys | Pro | Thr | Gln |
| 1                          |     |     |     | 5   |     |     |     |     | 10  |     |     |     |     | 15  |     |
| Thr                        | Leu | Thr | Leu | Thr | Cys | Thr | Phe | Ser | Gly | Phe | Ser | Leu | Thr | Thr | Tyr |
|                            |     |     | 20  |     |     |     |     | 25  |     |     |     |     | 30  |     |     |
| Gly                        | Met | Gly | Val | Gly | Trp | Ile | Arg | Gln | Pro | Pro | Gly | Lys | Ala | Leu | Glu |
|                            |     | 35  |     |     |     |     | 40  |     |     |     |     | 45  |     |     |     |
| Trp                        | Leu | Ala | Asn | Ile | Trp | Trp | Asp | Asp | Asp | Lys | Tyr | Tyr | Asn | Pro | Ser |
|                            | 50  |     |     |     |     | 55  |     |     |     |     | 60  |     |     |     |     |
| Leu                        | Lys | Asn | Arg | Leu | Thr | Ile | Ser | Lys | Asp | Thr | Ser | Lys | Asn | Gln | Val |
| 65                         |     |     |     |     | 70  |     |     |     |     | 75  |     |     |     | 80  |     |
| Val                        | Leu | Thr | Met | Thr | Asn | Met | Asp | Pro | Val | Asp | Thr | Ala | Thr | Tyr | Tyr |
|                            |     |     |     | 85  |     |     |     |     | 90  |     |     |     |     | 95  |     |
| Cys                        | Ala | Arg | Ile | Gly | Pro | Ile | Lys | Tyr | Pro | Thr | Ala | Pro | Tyr | Arg | Tyr |

|                                                                 |                                                                 |    |     |    |     |
|-----------------------------------------------------------------|-----------------------------------------------------------------|----|-----|----|-----|
|                                                                 | 100                                                             |    | 105 |    | 110 |
| Phe Asp Phe Trp Gly Gln Gly Thr Met Val Thr Val Ser             |                                                                 |    |     |    |     |
|                                                                 | 115                                                             |    | 120 |    | 125 |
|                                                                 |                                                                 |    |     |    |     |
| <210>                                                           | 12                                                              |    |     |    |     |
| <211>                                                           | 144                                                             |    |     |    |     |
| <212>                                                           | PRT                                                             |    |     |    |     |
| <213>                                                           | Secuencia Artificial                                            |    |     |    |     |
|                                                                 |                                                                 |    |     |    |     |
| <220>                                                           |                                                                 |    |     |    |     |
| <223>                                                           | 969 gH2 V- región con secuencia de señal subrayada y en cursiva |    |     |    |     |
| <400>                                                           | 12                                                              |    |     |    |     |
|                                                                 |                                                                 |    |     |    |     |
| Met Glu Trp Ser Trp Val Phe Leu Phe Phe Leu Ser Val Thr Thr Gly |                                                                 |    |     |    |     |
| 1                                                               |                                                                 | 5  |     | 10 | 15  |
|                                                                 |                                                                 |    |     |    |     |
| Val His Ser Glu Val Thr Leu Lys Glu Ser Gly Pro Ala Leu Val Lys |                                                                 |    |     |    |     |
|                                                                 | 20                                                              |    | 25  |    | 30  |
|                                                                 |                                                                 |    |     |    |     |
| Pro Thr Gln Thr Leu Thr Leu Thr Cys Thr Phe Ser Gly Phe Ser Leu |                                                                 |    |     |    |     |
|                                                                 | 35                                                              |    | 40  |    | 45  |
|                                                                 |                                                                 |    |     |    |     |
| Thr Thr Tyr Gly Met Gly Val Gly Trp Ile Arg Gln Pro Pro Gly Lys |                                                                 |    |     |    |     |
|                                                                 | 50                                                              |    | 55  |    | 60  |
|                                                                 |                                                                 |    |     |    |     |
| Ala Leu Glu Trp Leu Ala Asn Ile Trp Trp Asp Asp Asp Lys Tyr Tyr |                                                                 |    |     |    |     |
| 65                                                              |                                                                 | 70 |     | 75 | 80  |
|                                                                 |                                                                 |    |     |    |     |
| Asn Pro Ser Leu Lys Asn Arg Leu Thr Ile Ser Lys Asp Thr Ser Lys |                                                                 |    |     |    |     |
|                                                                 | 85                                                              |    | 90  |    | 95  |
|                                                                 |                                                                 |    |     |    |     |
| Asn Gln Val Val Leu Thr Met Thr Asn Met Asp Pro Val Asp Thr Ala |                                                                 |    |     |    |     |
|                                                                 | 100                                                             |    | 105 |    | 110 |
|                                                                 |                                                                 |    |     |    |     |
| Thr Tyr Tyr Cys Ala Arg Ile Gly Pro Ile Lys Tyr Pro Thr Ala Pro |                                                                 |    |     |    |     |
|                                                                 | 115                                                             |    | 120 |    | 125 |
|                                                                 |                                                                 |    |     |    |     |
| Tyr Arg Tyr Phe Asp Phe Trp Gly Gln Gly Thr Met Val Thr Val Ser |                                                                 |    |     |    |     |
|                                                                 | 130                                                             |    | 135 |    | 140 |

<210> 13  
<211> 453  
<212> PRT  
<213> Secuencia Artificial

<220>  
<223> 969 gH2 cadena pesada (V + constante - hu IgG4P)

<400> 13

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

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

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

Trp Leu Ala Asn Ile Trp Trp Asp Asp Asp Lys Tyr Tyr Asn Pro Ser  
50 55 60

Leu Lys Asn Arg Leu Thr Ile Ser Lys Asp Thr Ser Lys Asn Gln Val  
65 70 75 80

Val Leu Thr Met Thr Asn Met Asp Pro Val Asp Thr Ala Thr Tyr Tyr  
85 90 95

Cys Ala Arg Ile Gly Pro Ile Lys Tyr Pro Thr Ala Pro Tyr Arg Tyr  
100 105 110

Phe Asp Phe Trp Gly Gln Gly Thr Met Val Thr Val Ser Ser Ala Ser  
115 120 125

Thr Lys Gly Pro Ser Val Phe Pro Leu Ala Pro Cys Ser Arg Ser Thr  
130 135 140

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

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

His Thr Phe Pro Ala Val Leu Gln Ser Ser Gly Leu Tyr Ser Leu Ser  
180 185 190

Ser Val Val Thr Val Pro Ser Ser Ser Leu Gly Thr Lys Thr Tyr Thr  
195 200 205

Cys Asn Val Asp His Lys Pro Ser Asn Thr Lys Val Asp Lys Arg Val  
210 215 220

Glu Ser Lys Tyr Gly Pro Pro Cys Pro Pro Cys Pro Ala Pro Glu Phe  
225 230 235 240

Leu Gly Gly Pro Ser Val Phe Leu Phe Pro Pro Lys Pro Lys Asp Thr  
245 250 255

Leu Met Ile Ser Arg Thr Pro Glu Val Thr Cys Val Val Val Asp Val  
260 265 270

Ser Gln Glu Asp Pro Glu Val Gln Phe Asn Trp Tyr Val Asp Gly Val  
275 280 285

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

Thr Tyr Arg Val Val Ser Val Leu Thr Val Leu His Gln Asp Trp Leu  
305 310 315 320

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

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

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

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

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

Pro Pro Val Leu Asp Ser Asp Gly Ser Phe Phe Leu Tyr Ser Arg Leu  
405 410 415

Thr Val Asp Lys Ser Arg Trp Gln Glu Gly Asn Val Phe Ser Cys Ser  
420 425 430

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

Leu Ser Leu Gly Lys  
450

<210> 14

<211> 472

<212> PRT

<213> Secuencia Artificial

<220>

<223> 969 gH2 cadena pesada (V + constante - hu IgG4P) con secuencia  
señal subrayada y en cursiva

<400> 14

Met Glu Trp Ser Trp Val Phe Leu Phe Phe Leu Ser Val Thr Thr Gly  
1 5 10 15

Val His Ser Glu Val Thr Leu Lys Glu Ser Gly Pro Ala Leu Val Lys  
20 25 30

Pro Thr Gln Thr Leu Thr Leu Thr Cys Thr Phe Ser Gly Phe Ser Leu  
35 40 45

Thr Thr Tyr Gly Met Gly Val Gly Trp Ile Arg Gln Pro Pro Gly Lys  
50 55 60

Ala Leu Glu Trp Leu Ala Asn Ile Trp Trp Asp Asp Asp Lys Tyr Tyr  
65 70 75 80

Asn Pro Ser Leu Lys Asn Arg Leu Thr Ile Ser Lys Asp Thr Ser Lys  
85 90 95

Asn Gln Val Val Leu Thr Met Thr Asn Met Asp Pro Val Asp Thr Ala  
100 105 110

Thr Tyr Tyr Cys Ala Arg Ile Gly Pro Ile Lys Tyr Pro Thr Ala Pro  
115 120 125

Tyr Arg Tyr Phe Asp Phe Trp Gly Gln Gly Thr Met Val Thr Val Ser  
130 135 140

Ser Ala Ser Thr Lys Gly Pro Ser Val Phe Pro Leu Ala Pro Cys Ser  
145 150 155 160

Arg Ser Thr Ser Glu Ser Thr Ala Ala Leu Gly Cys Leu Val Lys Asp  
165 170 175

Tyr Phe Pro Glu Pro Val Thr Val Ser Trp Asn Ser Gly Ala Leu Thr  
180 185 190

Ser Gly Val His Thr Phe Pro Ala Val Leu Gln Ser Ser Gly Leu Tyr  
195 200 205

Ser Leu Ser Ser Val Val Thr Val Pro Ser Ser Ser Leu Gly Thr Lys  
210 215 220

Thr Tyr Thr Cys Asn Val Asp His Lys Pro Ser Asn Thr Lys Val Asp  
225 230 235 240

Lys Arg Val Glu Ser Lys Tyr Gly Pro Pro Cys Pro Pro Cys Pro Ala

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

Ser Cys Ser Val Met His Glu Ala Leu His Asn His Tyr Thr Gln Lys  
450 455 460

Ser Leu Ser Leu Ser Leu Gly Lys  
465 470