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 <150> JP2011-218793
 <151> 2011-10-01
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 <170> PatentIn version 3.1
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Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
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Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
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Cys Asn Val Tyr His Gln Ile Asn His Leu Lys Thr Val Leu Glu Glu
1 5 10 15

Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu Met Ser Ser Leu
20 25 30

His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr Leu Lys Ala Lys
35 40 45

Glu Tyr Ser His Cys Ala Trp Thr Ile Val Arg Val Glu Ile Leu Arg
50 55 60

Asn Phe Tyr Phe Ile Asn Arg Leu Thr Gly Tyr Leu Arg Asn
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1 5 10 15

Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu Met Ser Ser Leu
20 25 30

His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr Leu Lys Ala Lys
35 40 45

Glu Tyr Ser His Cys Ala Trp Thr Ile Val Arg Val Glu Ile Leu Arg
Page 22

50

55

60

Asn Phe Tyr Phe Ile Asn Arg Leu Thr Gly Tyr Leu Arg Asn
 65 70 75

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Val Glu Asn Leu Leu Cys Asn Val Tyr His Gln Ile Asn His Leu Lys Thr
 20 25 30

Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu
 35 40 45

Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr
 50 55 60

Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr Ile Val Arg Val
 65 70 75 80

Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu Thr Gly Tyr Leu
 85 90 95

Arg Asn

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<222> (80)..(80)

<223> asialo oligosaccharide

<400> 17

Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
1 5 10 15

Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
50 55 60

Asn Ile Phe Cys Ile Phe Arg Gln Asp Ser Ser Ser Thr Gly Trp Asn
65 70 75 80

Glu Thr Ile Val Glu Asn Leu Leu Cys Asn Val Tyr His Gln Ile Asn
85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
145 150 155 160

Thr Gly Tyr Leu Arg Asn
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<223> asialo oligosaccharide

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Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
1 5 10 15

Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
50 55 60

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

Glu Thr Ile Val Glu Asn Leu Leu Ala Asn Val Tyr His Gln Ile Asn
85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
145 150 155 160

Thr Gly Tyr Leu Arg Asn
165

<210> 19
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<400> 19

Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
1 5 10 15

Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
50 55 60

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

Glu Thr Ile Val Glu Asn Leu Leu Ala Asn Val Tyr His Gln Ile Asn
85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
145 150 155 160

Thr Gly Tyr Leu Arg Asn
165

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<400> 20

Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
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Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
50 55 60

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

Glu Thr Ile Val Glu Asn Leu Leu Ala Asn Val Tyr His Gln Ile Asn
85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
145 150 155 160

Thr Gly Tyr Leu Arg Asn
165

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1 5 10 15

Val Glu Asn Leu Leu CysAsn Val Tyr His Gln Ile Asn His Leu Lys Thr
20 25 30

Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu
35 40 45

Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr
50 55 60

Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr Ile Val Arg Val
65 70 75 80

Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu Thr Gly Tyr Leu
85 90 95

Arg Asn

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Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
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Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
50 55 60

Asn Ile Phe Cys Ile Phe Arg Gln Asp Ser Ser Ser Thr Gly Trp Asn
65 70 75 80

Glu Thr Ile Val Glu Asn Leu Leu Cys Asn Val Tyr His Gln Ile Asn
85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
145 150 155 160

Thr Gly Tyr Leu Arg Asn
165

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<400> 23

Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
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Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
50 55 60

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

Glu Thr Ile Val Glu Asn Leu Leu Ala Asn Val Tyr His Gln Ile Asn
85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
145 150 155 160

Thr Gly Tyr Leu Arg Asn
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Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
50 55 60

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

Glu Thr Ile Val Glu Asn Leu Leu Ala Asn Val Tyr His Gln Ile Asn
85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
145 150 155 160

Thr Gly Tyr Leu Arg Asn
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Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
50 55 60

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

Glu Thr Ile Val Glu Asn Leu Leu Ala Asn Val Tyr His Gln Ile Asn
85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
145 150 155 160

Thr Gly Tyr Leu Arg Asn
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Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
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Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
 50 55 60

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

Glu Thr Ile Val Glu Asn Leu Leu Ala Asn Val Tyr His Gln Ile Asn
 85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
 100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
 115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
 130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
 145 150 155 160

Thr Gly Tyr Leu Arg Asn
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Cys Asn Val Tyr His Gln Ile Asn His Leu Lys Thr Val Leu Glu Glu
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Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu Met Ser Ser Leu
 20 25 30

His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr Leu Lys
 35 40 45

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<223> tBu

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<220>

<221> BINDING

<222> (46)..(46)

<223> Boc

<400> 28

Cys Asn Val Tyr His Gln Ile Asn His Leu Lys Thr Val Leu Glu Glu
1 5 10 15

Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu Met Ser Ser Leu
20 25 30

His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr Leu Lys
35 40 45

<210> 29

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<400> 29

Cys Asn Val Tyr His Gln Ile Asn His Leu Lys Thr Val Leu Glu Glu
1 5 10 15

Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu Met Ser Ser Leu
20 25 30

His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr Leu Lys
35 40 45

<210> 30
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<223> Boc

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<223> OtBu

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<223> tBu

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<222> (5)..(5)
<223> fμMe, MePro

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<223> Trt

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 <223> AcM

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 <223> Boc

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 <223> tBu

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 <223> OtBu

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 <223> Pbf

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 <223> Trt

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 <223> tBu

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 <223> Trt

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 <223> Pbf

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 <222> (27)..(27)
 <223> tBu

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 <223> tBu

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 <222> (31)..(31)
 <223> Pbf

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 <222> (32)..(32)
 <223> Trt

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<221> BINDING
<222> (32)..(32)
<223> Resin

<400> 30

Cys Lys Glu Tyr Ser His Cys Ala Trp Thr Ile Val Arg Val Glu Ile
1 5 10 15

Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu Thr Gly Tyr Leu Arg Asn
20 25 30

<210> 31
<211> 32
<212> PRT
<213> Artificial sequence

<220>
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<220>
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<222> (7)..(7)
<223> Acn

<400> 31

Cys Lys Glu Tyr Ser His Cys Ala Trp Thr Ile Val Arg Val Glu Ile
1 5 10 15

Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu Thr Gly Tyr Leu Arg Asn
20 25 30

<210> 32
<211> 78
<212> PRT
<213> Artificial sequence

<220>
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<220>
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<222> (53)..(53)
<223> Acn

<400> 32

Cys Asn Val Tyr His Gln Ile Asn His Leu Lys Thr Val Leu Glu Glu
1 5 10 15

Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu Met Ser Ser Leu
20 25 30

His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr Leu Lys Cys Lys Glu
35 40 45

Tyr Ser His Cys Ala Trp Thr Ile Val Arg Val Glu Ile Leu Arg Asn
50 55 60

Phe Tyr Phe Ile Asn Arg Leu Thr Gly Tyr Leu Arg Asn
65 70 75

<210> 33
<211> 99
<212> PRT
<213> Artificial sequence

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<222> (74)..(74)
<223> Acn

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<222> (13)..(13)
<223> asialo oligosaccharide

<400> 33

Cys Ile Phe Arg Gln Asp Ser Ser Ser Thr Gly Trp Asn Glu Thr Ile
1 5 10 15

Val Glu Asn Leu Leu Cys Asn Val Tyr His Gln Ile Asn His Leu Lys Thr
20 25 30

Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu
35 40 45

Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr
50 55 60

Leu Lys Cys Lys Glu Tyr Ser His Cys Ala Trp Thr Ile Val Arg Val
65 70 75 80

Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu Thr Gly Tyr Leu
85 90 95

Arg Asn

<210> 34
<211> 166
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 <222> (31)..(31)
 <223> Acn

<220>
 <221> BINDING
 <222> (141)..(141)
 <223> Acn

<220>
 <221> CARBOHYD
 <222> (80)..(80)
 <223> asialo oligosaccharide

<400> 34

Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
 1 5 10 15

Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
 20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
 35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
 50 55 60

Asn Ile Phe Cys Ile Phe Arg Gln Asp Ser Ser Ser Thr Gly Trp Asn
 65 70 75 80

Glu Thr Ile Val Glu Asn Leu Leu Cys Asn Val Tyr His Gln Ile Asn
 85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
 100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
 115 120 125

Ile Leu His Tyr Leu Lys Cys Lys Glu Tyr Ser His Cys Ala Trp Thr
 130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
 145 150 155 160

Thr Gly Tyr Leu Arg Asn
 165

<210> 35
 <211> 166
 <212> PRT
 <213> Artificial sequence

<220>
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 <223> Acn

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 <221> BINDING
 <222> (141)..(141)
 <223> Acn

<220>
 <221> CARBOHYD
 <222> (80)..(80)
 <223> asialo oligosaccharide

<400> 35

Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
 1 5 10 15

Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
 20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
 35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
 50 55 60

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

Glu Thr Ile Val Glu Asn Leu Leu Ala Asn Val Tyr His Gln Ile Asn
 85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
 100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
 115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
 130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
 145 150 155 160

Thr Gly Tyr Leu Arg Asn
 165

<210> 36
 <211> 99
 <212> PRT
 <213> Artificial sequence

<220>
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 <221> BINDING
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 <223> Acn

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 <221> CARBOHYD
 <222> (13)..(13)
 <223> disialo oligosaccharide protected with dibenzyl

<400> 36

Cys Ile Phe Arg Gln Asp Ser Ser Ser Thr Gly Trp Asn Glu Thr Ile
 1 5 10 15

Val Glu Asn Leu Leu Cys Asn Val Tyr His Gln Ile Asn His Leu Lys Thr
 20 25 30

Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr Arg Gly Lys Leu
 35 40 45

Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg Ile Leu His Tyr
 50 55 60

Leu Lys Cys Lys Glu Tyr Ser His Cys Ala Trp Thr Ile Val Arg Val
 65 70 75 80

Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu Thr Gly Tyr Leu
 85 90 95

Arg Asn

<210> 37
 <211> 166
 <212> PRT
 <213> Artificial sequence

<220>
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<220>
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 <223> Acn

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 <223> Acn

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 <222> (141)..(141)
 <223> Acn

<220>
 <221> CARBOHYD
 <222> (80)..(80)
 <223> disialo oligosaccharide protected with dibenzyl

<400> 37

Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
 1 5 10 15

Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
 20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
 35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
 50 55 60

Asn Ile Phe Cys Ile Phe Arg Gln Asp Ser Ser Ser Thr Gly Trp Asn
 65 70 75 80

Glu Thr Ile Val Glu Asn Leu Leu Cys Asn Val Tyr His Gln Ile Asn
 85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
 100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
 115 120 125

Ile Leu His Tyr Leu Lys Cys Lys Glu Tyr Ser His Cys Ala Trp Thr
 130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
 145 150 155 160

Thr Gly Tyr Leu Arg Asn
 165

<210> 38
 <211> 166
 <212> PRT
 <213> Artificial sequence

<220>
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<220>
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 <223> Acn

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<223> AcM

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<222> (141)..(141)
<223> AcM

<220>
<221> CARBOHYD
<222> (80)..(80)
<223> disialo oligosaccharide protected with dibenzyl

<400> 38

Met Ser Tyr Asn Leu Leu Gly Phe Leu Gln Arg Ser Ser Asn Phe Gln
1 5 10 15

Cys Gln Lys Leu Leu Trp Gln Leu Asn Gly Arg Leu Glu Tyr Cys Leu
20 25 30

Lys Asp Arg Met Asn Phe Asp Ile Pro Glu Glu Ile Lys Gln Leu Gln
35 40 45

Gln Phe Gln Lys Glu Asp Ala Ala Leu Thr Ile Tyr Glu Met Leu Gln
50 55 60

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

Glu Thr Ile Val Glu Asn Leu Leu Ala Asn Val Tyr His Gln Ile Asn
85 90 95

His Leu Lys Thr Val Leu Glu Glu Lys Leu Glu Lys Glu Asp Phe Thr
100 105 110

Arg Gly Lys Leu Met Ser Ser Leu His Leu Lys Arg Tyr Tyr Gly Arg
115 120 125

Ile Leu His Tyr Leu Lys Ala Lys Glu Tyr Ser His Cys Ala Trp Thr
130 135 140

Ile Val Arg Val Glu Ile Leu Arg Asn Phe Tyr Phe Ile Asn Arg Leu
145 150 155 160

Thr Gly Tyr Leu Arg Asn
165

<210> 39
<211> 9
<212> PRT
<213> Artificial sequence

<220>
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<220>
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<223> disialo oligosaccharide protected with dibenzyl

<220>
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<222> (1)..(1)
<223> Fmoc

<220>
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<222> (2)..(2)
<223> OtBu

<220>
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<222> (3)..(3)
<223> tBu

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<222> (6)..(6)
<223> OtBu

<220>
<221> BINDING
<222> (7)..(7)
<223> Trt

<220>
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<222> (9)..(9)
<223> Resin

<400> 39

Asn Glu Thr Ile Val Glu Asn Leu Leu
1 5

<210> 40
<211> 13
<212> PRT
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<220>
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<220>
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<222> (1)..(1)
<223> Boc

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<222> (2)..(2)
<223> tBu

<220>
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<222> (4)..(4)
<223> Boc

<220>
<221> CARBOHYD
<222> (5)..(5)
<223> disialo oligosaccharide protected with dibenzyl

<220>
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<222> (6)..(6)
<223> OtBu

<220>
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<222> (7)..(7)
<223> tBu

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<223> OtBu

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<222> (11)..(11)
<223> Trt

<220>
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<222> (13)..(13)
<223> Resin

<400> 40

Cys Thr Gly Trp Asn Glu Thr Ile Val Glu Asn Leu Leu
1 5 10

<210> 41
<211> 13
<212> PRT
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<220>
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<220>
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<222> (1)..(1)
<223> Trt

<220>
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<222> (1)..(1)
<223> Boc

<220>
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<222> (2)..(2)
<223> tBu

<220>
<221> BINDING
<222> (4)..(4)
<223> Boc

<220>
<221> CARBOHYD
<222> (5)..(5)
<223> disialo oligosaccharide protected with dibenzyl

<220>
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<222> (6)..(6)
<223> OtBu

<220>
<221> BINDING
<222> (7)..(7)
<223> tBu

<220>
<221> BINDING
<222> (10)..(10)
<223> OtBu

<220>
<221> BINDING
<222> (11)..(11)
<223> Trt

<400> 41

Cys Thr Gly Trp Asn Glu Thr Ile Val Glu Asn Leu Leu
1 5 10

<210> 42
<211> 13
<212> PRT
<213> Artificial sequence

<220>
<223> chemically synthesized

<220>
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<222> (13)..(13)
<223> -SCH₂-CH₂-SO₃H

<220>
<221> CARBOHYD
<222> (5)..(5)
<223> disialo oligosaccharide protected with dibenzyl

<400> 42

Cys Thr Gly Trp Asn Glu Thr Ile Val Glu Asn Leu Leu
1 5 10

<210> 43
<211> 8
<212> PRT
<213> Artificial sequence

<220>
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<222> (1)..(1)
<223> 1C has a Thiazolidine group

<220>
<221> BINDING
<222> (1)..(1)
<223> Boc

<220>
<221> BINDING
<222> (4)..(4)
<223> Pbf

<220>
<221> BINDING
<222> (5)..(5)
<223> Trt

<220>
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<222> (6)..(6)
<223> OtBu

<220>
<221> BINDING
<222> (7)..(7)
<223> tBu

<220>
<221> BINDING
<222> (8)..(8)
<223> tBu

<220>
<221> BINDING
<222> (8)..(8)
<223> Resin

<400> 43

Cys Ile Phe Arg Gln Asp Ser Ser
1 5

<210> 44
<211> 8
<212> PRT
<213> Artificial sequence

<220>
<223> chemically synthesized

<220>
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<223> 1C has a Thiazolidine group

<220>
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<222> (1)..(1)
<223> Boc

<220>
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<222> (4)..(4)
<223> Pbf

<220>
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<222> (5)..(5)
<223> Trt

<220>
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<222> (6)..(6)
<223> OtBu

<220>
<221> BINDING
<222> (7)..(7)
<223> tBu

<220>
<221> BINDING
<222> (8)..(8)
<223> tBu

<400> 44

Cys Ile Phe Arg Gln Asp Ser Ser
1 5

<210> 45
<211> 8
<212> PRT
<213> Artificial sequence

<220>
<223> chemically synthesized

<220>
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<222> (1)..(1)
<223> 1C has a Thiazolidine group

<220>
<221> BINDING
<222> (8)..(8)
<223> SPh

<400> 45

Cys Ile Phe Arg Gln Asp Ser Ser
1 5

<210> 46
<211> 21
<212> PRT
<213> Artificial sequence

<220>
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<220>
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<222> (1)..(1)
<223> 1C has a Thiazolidine group

<220>
<221> CARBOHYD
<222> (13)..(13)

<223> disialo oligosaccharide protected with dibenzyl

<220>

<221> BINDING

<222> (21)..(21)

<223> -SCH2-CH2-SO3H

<400> 46

Cys Ile Phe Arg Gln Asp Ser Ser Cys Thr Gly Trp Asn Glu Thr Ile
1 5 10 15
Val Glu Asn Leu Leu
20

<210> 47

<211> 21

<212> PRT

<213> Artificial sequence

<220>

<223> chemically synthesized

<220>

<221> MISC_FEATURE

<222> (1)..(1)

<223> 1C has a Thiazolidine group

<220>

<221> MISC_FEATURE

<222> (9)..(9)

<223> Methyl

<220>

<221> CARBOHYD

<222> (13)..(13)

<223> disialo oligosaccharide protected with dibenzyl

<220>

<221> BINDING

<222> (21)..(21)

<223> -SCH2-CH2-SO3H

<400> 47

Cys Ile Phe Arg Gln Asp Ser Ser Cys Thr Gly Trp Asn Glu Thr Ile
1 5 10 15
Val Glu Asn Leu Leu
20

<210> 48

<211> 21

<212> PRT

<213> Artificial sequence

<220>

<223> chemically synthesized

<220>

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<222> (1)..(1)

<223> 1C has a Thiazolidine group

<220>

<221> CARBOHYD

<222> (13)..(13)

<223> disialo oligosaccharide protected with dibenzyl

<220>
<221> BINDING
<222> (21)..(21)
<223> -SCH2-CH2-SO3H

<400> 48

Cys	Ile	Phe	Arg	Gln	Asp	Ser	Ser	Ser	Thr	Gly	Trp	Asn	Glu	Thr	Ile
1				5					10					15	
Val	Glu	Asn	Leu	Leu											
			20												