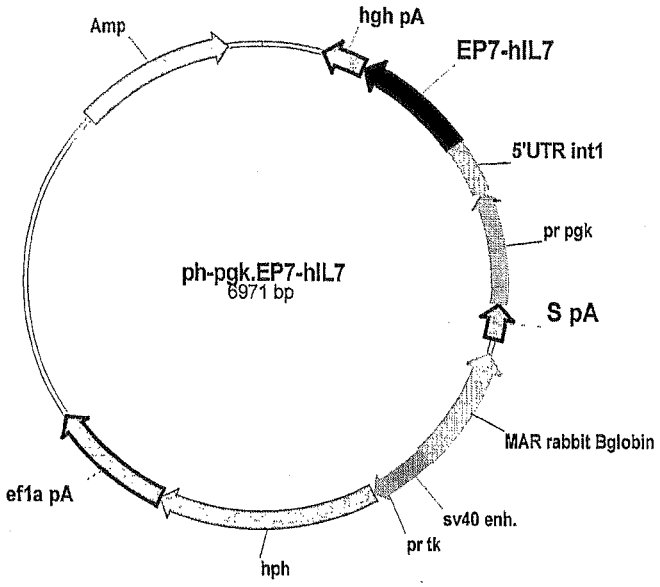


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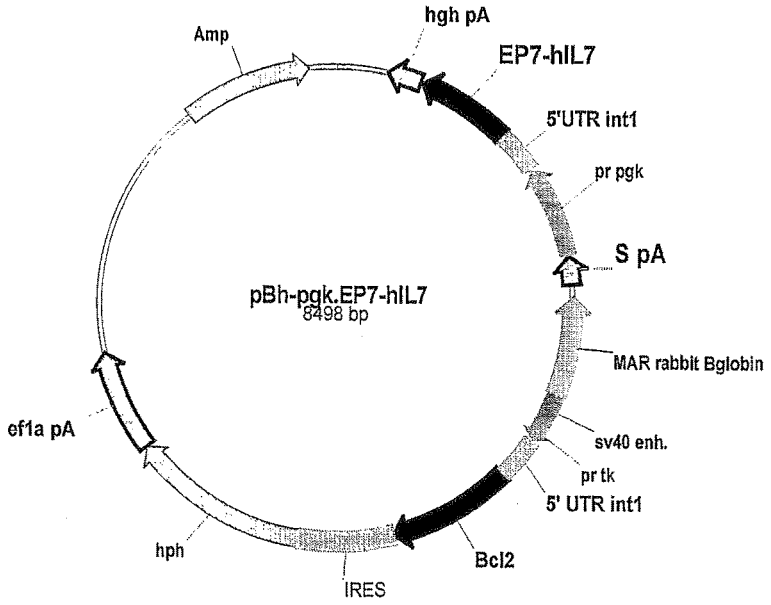


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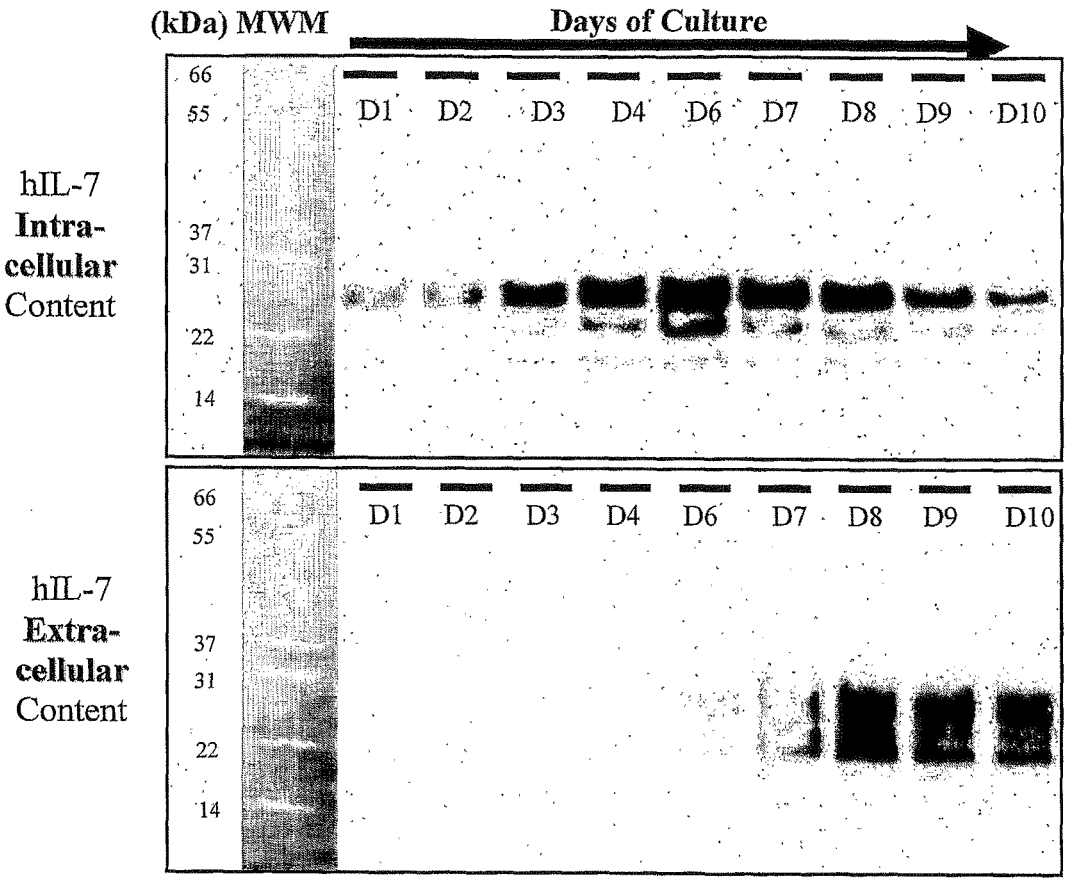

(kDa) MWM
Days of Culture
66
55
37
31
22
14
D1
D2
D3
D4
D6
D7
D8
D9
D10
hIL-7
Intra-
cellular
Content
hIL-7
Extra-
cellular
Content

Figure 3

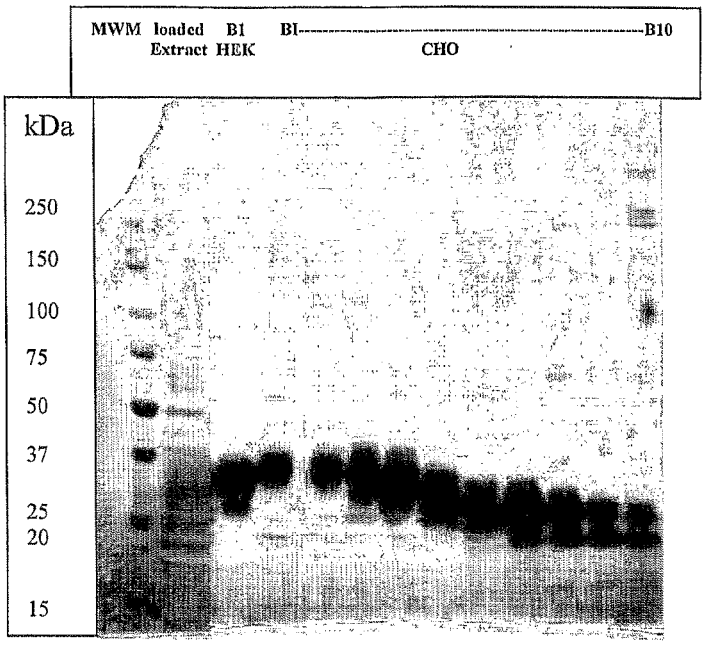


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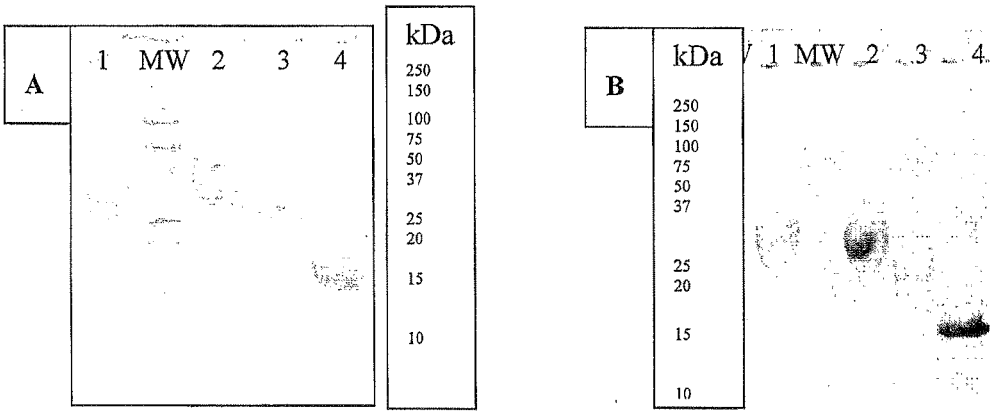


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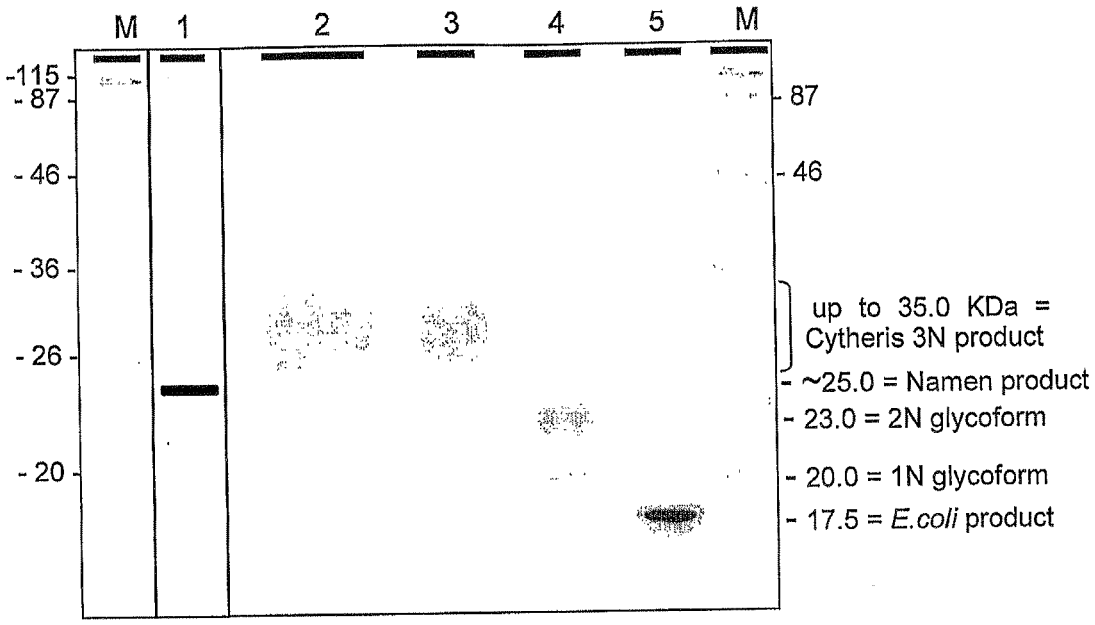


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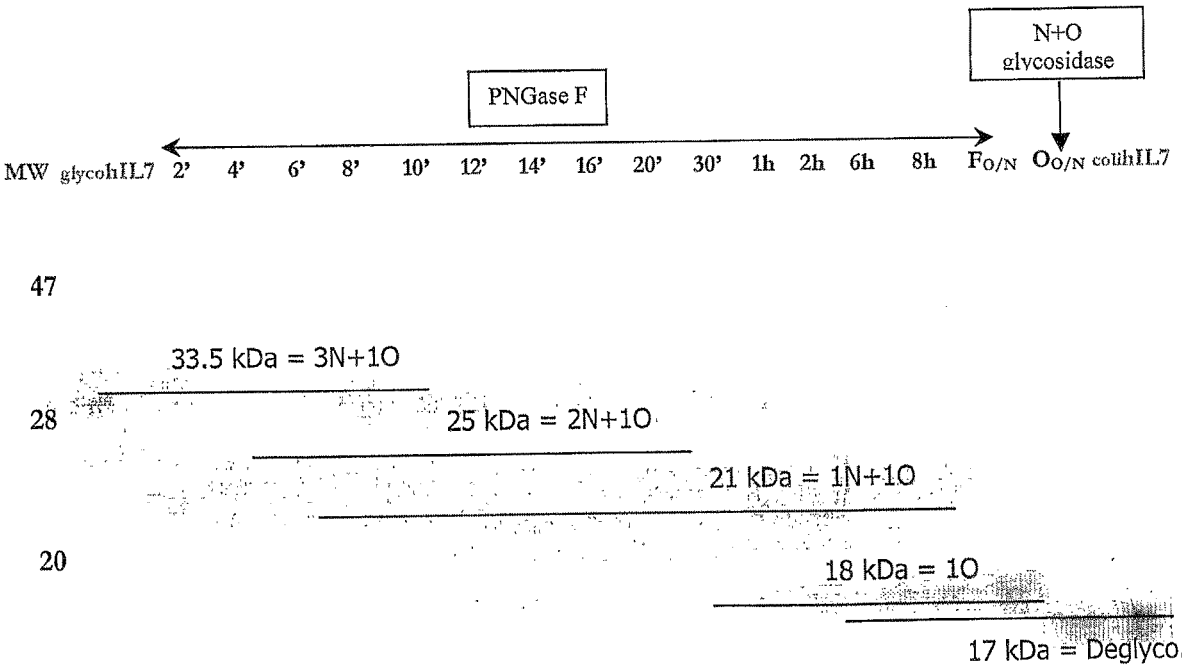


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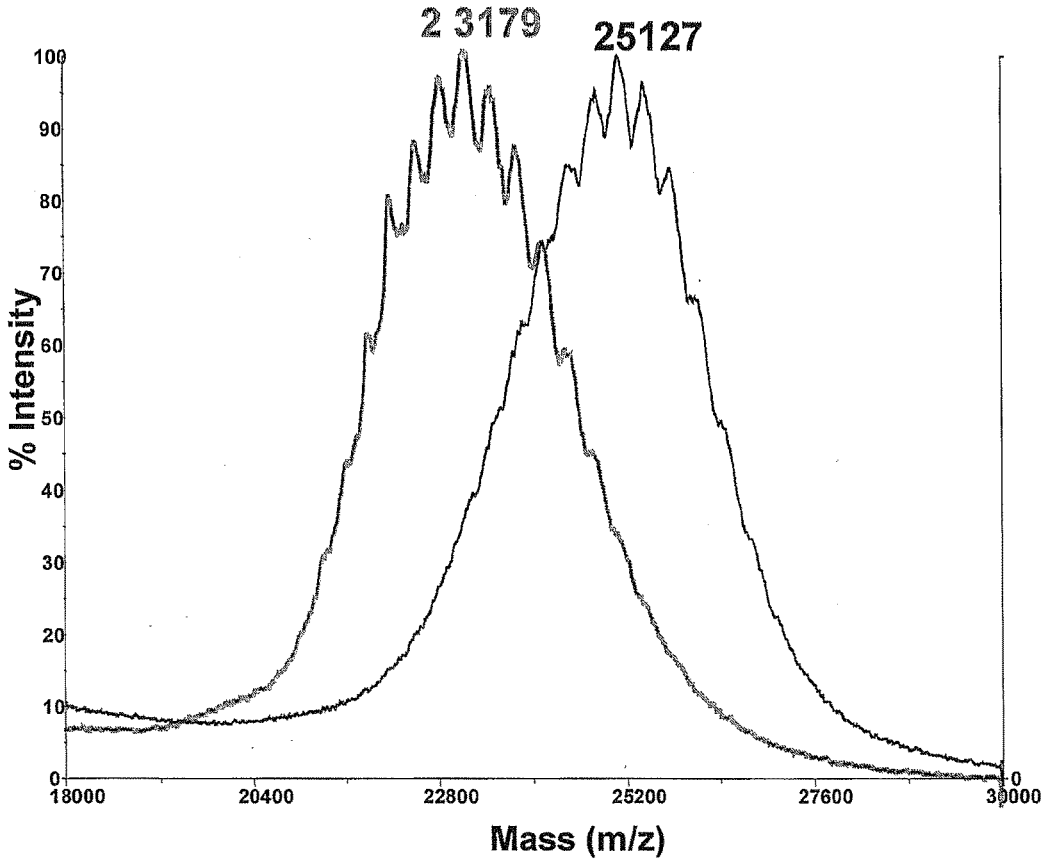

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25127
100
90
80
70
60
50
40
30
20
10
0
% Intensity
18000
20400
22800
25200
27600
30000
Mass (m/z)

Figure 8

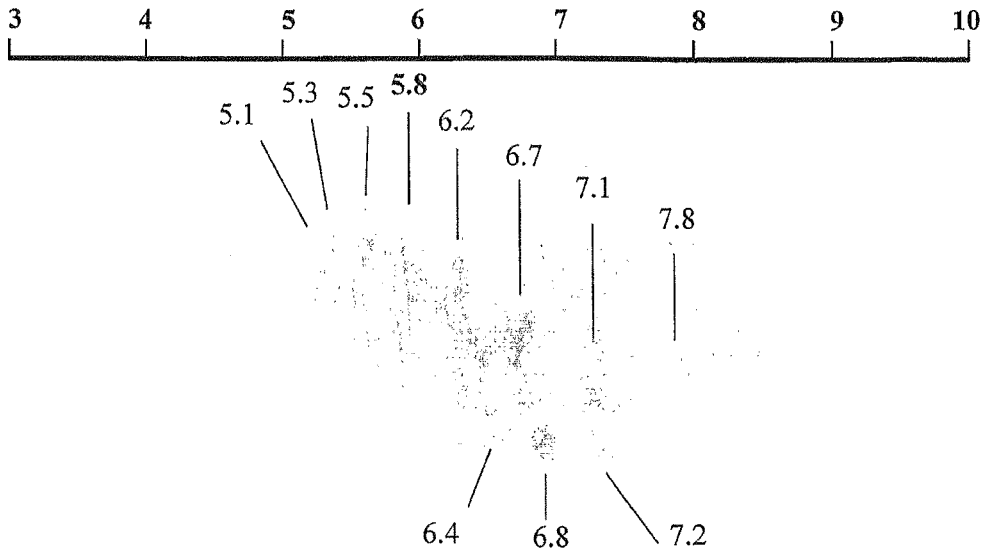


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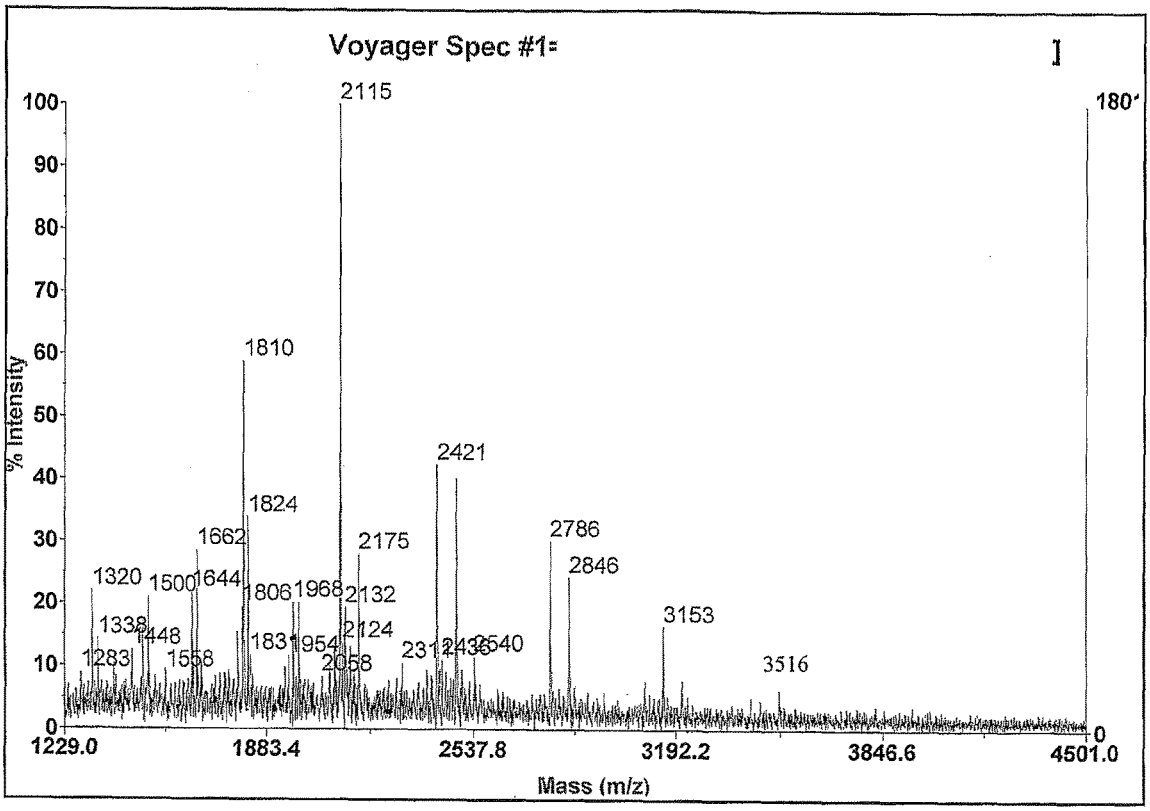

Voyager Spec #1=
% Intensity
Mass (m/z)
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90
80
70
60
50
40
30
20
10
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2537.8
3192.2
3846.6
4501.0
2115
1810
2421
1824
1662
2175
2786
2846
1320
1500
1644
1806
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Figure 10

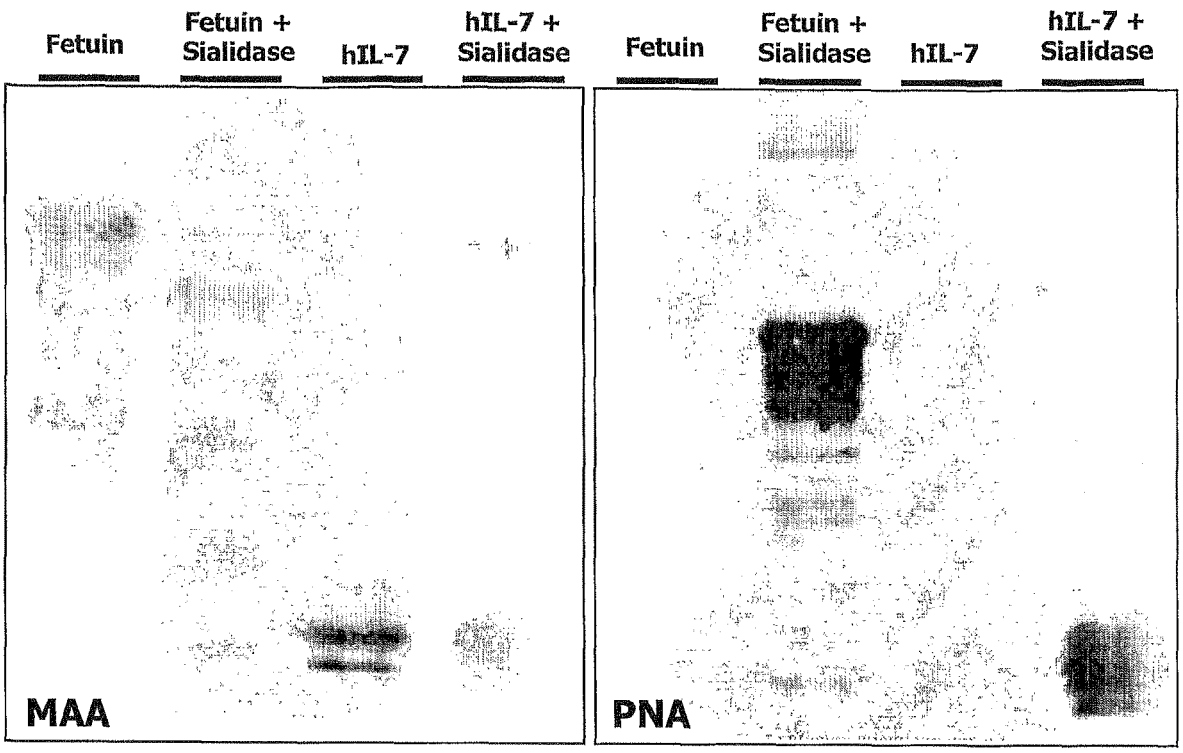

Fetuin
Fetuin + Sialidase
hIL-7
hIL-7 + Sialidase
MAA
Fetuin
Fetuin + Sialidase
hIL-7
hIL-7 + Sialidase
PNA

Figure 11

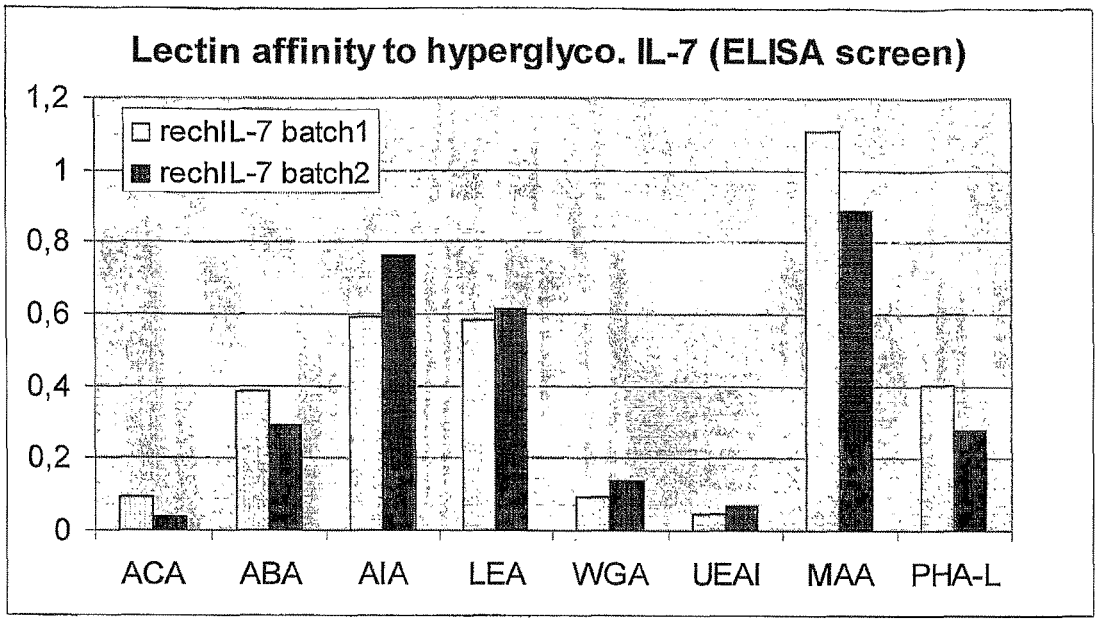

Lectin affinity to hyperglyco. IL-7 (ELISA screen)
1,2
1
0,8
0,6
0,4
0,2
0
rechIL-7 batch1
rechIL-7 batch2
ACA
ABA
AIA
LEA
WGA
UEAI
MAA
PHA-L

Figure 12

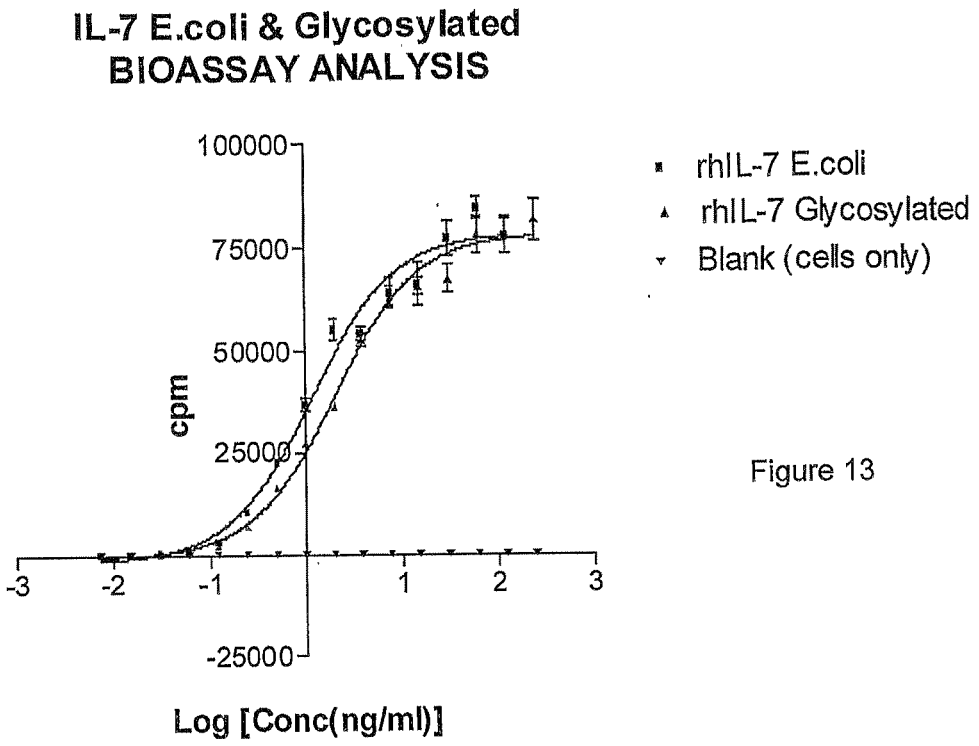


Figure 13

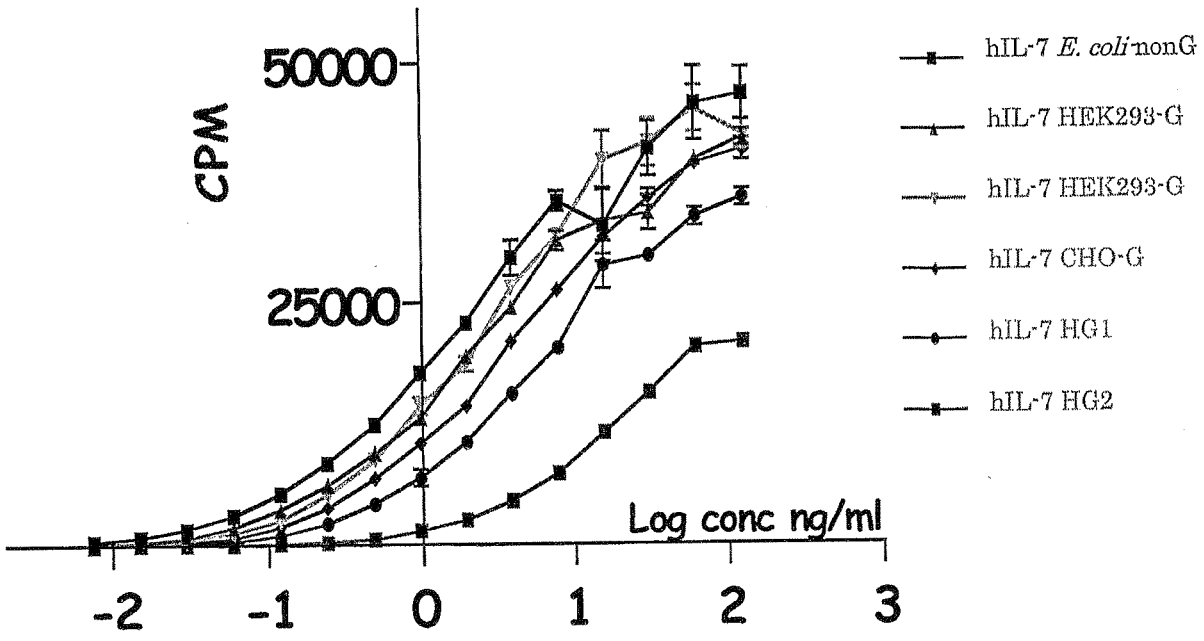


Figure 14

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        35                  40                  45

Ala Asn Lys Glu Gly Met Phe Leu Phe Arg Ala Ala Arg Lys Leu Arg
    50                  55                  60

Gln Phe Leu Lys Met Asn Ser Thr Gly Asp Phe Asp Leu His Leu Leu
65                  70                  75                  80

Lys Val Ser Glu Gly Thr Thr Ile Leu Leu Asn Cys Thr Gly Gln Val
                85                  90                  95

Lys Gly Arg Lys Pro Ala Ala Leu Gly Glu Ala Gln Pro Thr Lys Ser
            100                 105                 110

Leu Glu Glu Asn Lys Ser Leu Lys Glu Gln Lys Lys Leu Asn Asp Leu
        115                 120                 125

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1               5                  10                  15

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Leu Ser Leu Val Leu Leu Pro Val Ala Ser Asp Cys Asp Ile Glu Gly
            20                  25                  30

aaa gat ggg aag cag tat gag tcc gtg ctg atg gtg agc atc gat caa     144
Lys Asp Gly Lys Gln Tyr Glu Ser Val Leu Met Val Ser Ile Asp Gln
        35                  40                  45

ttg ttg gac tcc atg aaa gaa att ggg agt aac tgc ctg aat aac gaa     192
Leu Leu Asp Ser Met Lys Glu Ile Gly Ser Asn Cys Leu Asn Asn Glu
    50                  55                  60

ttt aac ttc ttt aag cgc cat atc tgt gat gct aat aag gaa ggt atg     240
Phe Asn Phe Phe Lys Arg His Ile Cys Asp Ala Asn Lys Glu Gly Met
65                  70                  75                  80

ttt ttg ttc cgc gct gct cgg aag ttg cgc cag ttc ctt aag atg aac     288
Phe Leu Phe Arg Ala Ala Arg Lys Leu Arg Gln Phe Leu Lys Met Asn
                85                  90                  95

tct act ggt gat ttc gat ctc cac ctc ctg aaa gtt tcc gaa ggg act     336
Ser Thr Gly Asp Phe Asp Leu His Leu Leu Lys Val Ser Glu Gly Thr
            100                 105                 110

act atc ctg ttg aac tgc act ggc cag gtt aaa gga aga aaa ccc gct     384
Thr Ile Leu Leu Asn Cys Thr Gly Gln Val Lys Gly Arg Lys Pro Ala
        115                 120                 125

gcc ctg ggt gaa gcc caa ccg aca aag agt ttg gaa gaa aat aaa tct     432
Ala Leu Gly Glu Ala Gln Pro Thr Lys Ser Leu Glu Glu Asn Lys Ser
    130                 135                 140

ttg aag gaa cag aag aag ctg aac gac ttg tgt ttc ctg aag cgc ctg     480
Leu Lys Glu Gln Lys Lys Leu Asn Asp Leu Cys Phe Leu Lys Arg Leu
145                 150                 155                 160

ttg cag gag att aag act tgt tgg aat aag atc ttg atg ggg act aag     528
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                165                 170                 175

gag cat tga taa                                                     540
Glu His
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20 25 30

Lys Asp Gly Lys Gln Tyr Glu Ser Val Leu Met Val Ser Ile Asp Gln
35 40 45

Leu Leu Asp Ser Met Lys Glu Ile Gly Ser Asn Cys Leu Asn Asn Glu
50 55 60

Phe Asn Phe Phe Lys Arg His Ile Cys Asp Ala Asn Lys Glu Gly Met
65 70 75 80

Phe Leu Phe Arg Ala Ala Arg Lys Leu Arg Gln Phe Leu Lys Met Asn
85 90 95

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

Thr Ile Leu Leu Asn Cys Thr Gly Gln Val Lys Gly Arg Lys Pro Ala
115 120 125

Ala Leu Gly Glu Ala Gln Pro Thr Lys Ser Leu Glu Glu Asn Lys Ser
130 135 140

Leu Lys Glu Gln Lys Lys Leu Asn Asp Leu Cys Phe Leu Lys Arg Leu
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Glu His

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ttg tct ttg gtt ctg ttg cct gta gcc tct gat tgc gat att gaa ggg       96
Leu Ser Leu Val Leu Leu Pro Val Ala Ser Asp Cys Asp Ile Glu Gly
            20                  25                  30

aaa gat ggg aag cag tat gag tcc gtg ctg atg gtg agc atc gat caa      144
Lys Asp Gly Lys Gln Tyr Glu Ser Val Leu Met Val Ser Ile Asp Gln
        35                  40                  45

ttg ttg gac tcc atg aaa gaa att ggg agt aac tgc ctg aat aac gaa      192
Leu Leu Asp Ser Met Lys Glu Ile Gly Ser Asn Cys Leu Asn Asn Glu
    50                  55                  60

ttt aac ttc ttt aag cgc cat ctg tgt gat gat aat aag gaa ggt atg      240
Phe Asn Phe Phe Lys Arg His Leu Cys Asp Asp Asn Lys Glu Gly Met
65                  70                  75                  80

ttt ttg ttc cgc gct gct cgg aag ttg cgc cag ttc ctt aag atg aac      288
Phe Leu Phe Arg Ala Ala Arg Lys Leu Arg Gln Phe Leu Lys Met Asn
                85                  90                  95

tct act ggt gat ttc gat ctc cac ctc ctg aaa gtt tcc gaa ggg act      336
Ser Thr Gly Asp Phe Asp Leu His Leu Leu Lys Val Ser Glu Gly Thr
            100                 105                 110

act atc ctg ttg aac tgc act ggc aag gtt aaa gga aga aaa ccc gct      384
Thr Ile Leu Leu Asn Cys Thr Gly Lys Val Lys Gly Arg Lys Pro Ala
        115                 120                 125

gcc ctg ggt gaa ccc caa ccg aca aag agt ttg gaa gaa aat aaa tct      432
Ala Leu Gly Glu Pro Gln Pro Thr Lys Ser Leu Glu Glu Asn Lys Ser
    130                 135                 140

ttg aag gaa cag aag aag ctg aac gac tcc tgt ttc ctg aag cgc ctg      480
Leu Lys Glu Gln Lys Lys Leu Asn Asp Ser Cys Phe Leu Lys Arg Leu
145                 150                 155                 160

ttg cag aag att aag act tgt tgg aat aag atc ttg atg ggg act aag      528
Leu Gln Lys Ile Lys Thr Cys Trp Asn Lys Ile Leu Met Gly Thr Lys
                165                 170                 175

gag cat tga                                                         537
Glu His
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<213> Simian

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Leu Ser Leu Val Leu Leu Pro Val Ala Ser Asp Cys Asp Ile Glu Gly
            20                  25                  30

Lys Asp Gly Lys Gln Tyr Glu Ser Val Leu Met Val Ser Ile Asp Gln
        35                  40                  45

Leu Leu Asp Ser Met Lys Glu Ile Gly Ser Asn Cys Leu Asn Asn Glu
    50                  55                  60

Phe Asn Phe Phe Lys Arg His Leu Cys Asp Asp Asn Lys Glu Gly Met
65                  70                  75                  80

Phe Leu Phe Arg Ala Ala Arg Lys Leu Arg Gln Phe Leu Lys Met Asn
                85                  90                  95

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

Thr Ile Leu Leu Asn Cys Thr Gly Lys Val Lys Gly Arg Lys Pro Ala
        115                 120                 125

Ala Leu Gly Glu Pro Gln Pro Thr Lys Ser Leu Glu Glu Asn Lys Ser
    130                 135                 140

Leu Lys Glu Gln Lys Lys Leu Asn Asp Ser Cys Phe Leu Lys Arg Leu
145                 150                 155                 160

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1               5                  10                  15

ttg tct ttg gtt ctg ttg cct gta gcc tct gat tgt gat att gaa ggc      96
Leu Ser Leu Val Leu Leu Pro Val Ala Ser Asp Cys Asp Ile Glu Gly
            20                  25                  30

aaa gac ggc aga gag tat cag cac gtt cta atg atc agc atc aat gac     144
Lys Asp Gly Arg Glu Tyr Gln His Val Leu Met Ile Ser Ile Asn Asp
        35                  40                  45

ttg gac atc atg ata aaa aat cgt acc aat tgc tcg aat aat gaa cct     192
Leu Asp Ile Met Ile Lys Asn Arg Thr Asn Cys Ser Asn Asn Glu Pro
    50                  55                  60

aac att tta aaa aaa cat gca tgt gat gat aat aag gaa ggt atg ttt     240
Asn Ile Leu Lys Lys His Ala Cys Asp Asp Asn Lys Glu Gly Met Phe
65                  70                  75                  80

tta tat cgt gct gct cac aag ttg aag caa ttt gtt aaa gtg aat aac     288
Leu Tyr Arg Ala Ala His Lys Leu Lys Gln Phe Val Lys Val Asn Asn
                85                  90                  95

agt gag gat ttc aat ctc cac tta tca aga gtt tca cag ggc aca tta     336
Ser Glu Asp Phe Asn Leu His Leu Ser Arg Val Ser Gln Gly Thr Leu
            100                 105                 110

caa ttg ttg aac tgt act ccc aag gaa gac aat aaa tct tta aag gaa     384
Gln Leu Leu Asn Cys Thr Pro Lys Glu Asp Asn Lys Ser Leu Lys Glu
        115                 120                 125

cag aga aaa cag aag agc ttg tgt tcc cta ggg ata cta cta caa aag     432
Gln Arg Lys Gln Lys Ser Leu Cys Ser Leu Gly Ile Leu Leu Gln Lys
    130                 135                 140

ata aaa act tgt tgg aac aaa att ttg agg ggc tct aaa gaa cat tga     480
Ile Lys Thr Cys Trp Asn Lys Ile Leu Arg Gly Ser Lys Glu His
145                 150                 155
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            20                  25                  30

Lys Asp Gly Arg Glu Tyr Gln His Val Leu Met Ile Ser Ile Asn Asp
        35                  40                  45

Leu Asp Ile Met Ile Lys Asn Arg Thr Asn Cys Ser Asn Asn Glu Pro
    50                  55                  60
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Asn Ile Leu Lys Lys His Ala Cys Asp Asp Asn Lys Glu Gly Met Phe
65 70 75 80

Leu Tyr Arg Ala Ala His Lys Leu Lys Gln Phe Val Lys Val Asn Asn
85 90 95

Ser Glu Asp Phe Asn Leu His Leu Ser Arg Val Ser Gln Gly Thr Leu
100 105 110

Gln Leu Leu Asn Cys Thr Pro Lys Glu Asp Asn Lys Ser Leu Lys Glu
115 120 125

Gln Arg Lys Gln Lys Ser Leu Cys Ser Leu Gly Ile Leu Leu Gln Lys
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Gly

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9