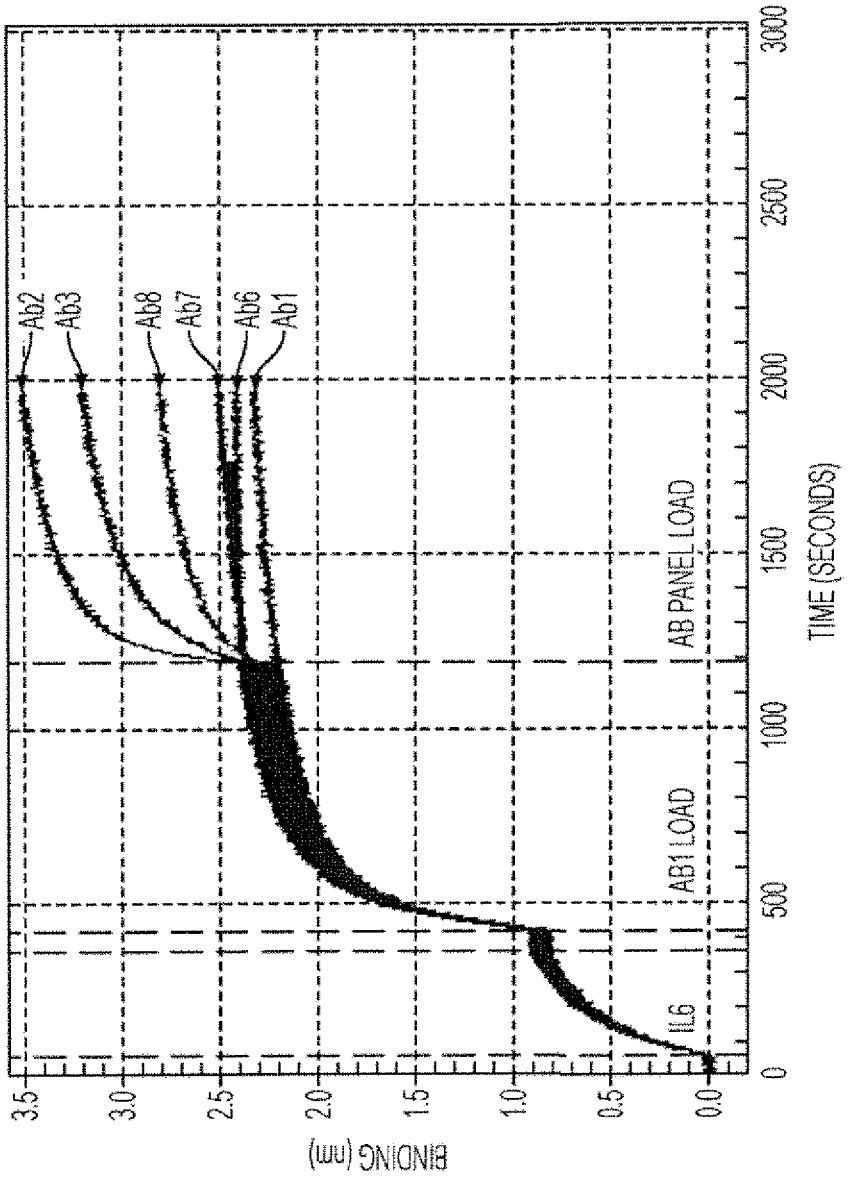
FIG. 1


Ab2
Ab3
Ab8
Ab7
Ab6
Ab1
IL6
AB1 LOAD
AB PANEL LOAD
BINDING (nm)
TIME (SECONDS)
0.0
0.5
1.0
1.5
2.0
2.5
3.0
3.5
0
500
1000
1500
2000
2500
3000

# FIG. 2

```
        FR1                     CDR1        FR2             CDR2    FR3
        1                  23 24       34 35           49 50   56 57                          88
RbtVL   AYDMTQTPASVEVAVGGTVTINC QASETIYSWLS WYQQKPGQPPKLLIY QASDLAS GVPSRFSGSGAGTEYTLTISGVQCDDAATYYC
        L12A    DIQMTQSPSTLSASVGDRVTITC RASQSISSWLA WYQQKPGKAPKLLIY KASSLES GVPSRFSGSGSGTEFTLTISSLQPDDFATYYC
        V1      DIQMTQSPSTLSASVGDRVTITC RASQSISSWLA WYQQKPGKAPKLLIY DASSLES GVPSRFSGSGSGTEFTLTISSLQPDDFATYYC
        Vx02    DIQMTQSPSSLSASVGDRVTITC RASQSISSYLN WYQQKPGKAPKLLIY AASSLQS GVPSRFSGSGSGTDFTLTISSLQPEDFATYYC

VLh     DIQMTQSPSTLSASVGDRVTITC QASETIYSWLS WYQQKPGKAPKLLIY QASDLAS GVPSRFSGSGSGTEFTLTISSLQPDDFATYYC
```

```
        CDR3            FR4
        89         100 101      111
RbtVL   QQGYSGSNVDNV FGGGTEVVVKR
                     |||||  |  ||
                     FGGGTKVEIKR

VLh     QQGYSGSNVDNV FGGGTKVEIKR
```

```
        FR1                                 CDR1    FR2             CDR2                FR3
        1                              30 31 35 36             49 50                  66 67                              98
RbtVH   QEQLKESGGRLVTPGTPLTLTCTASGFSLN DHAMG WVRQAPGKGLEYIG FINS-GGSARYASWAEG RFTISRTST--TVDLKMTSLTTEDTATYFCVR
        | || |||| || ||  | | | ||||    ||  ||||||||||||    | | |||  ||    | ||||||     |  | | ||  |||| | | |
3-64-04 QVQLVESGGGLVQPGGSLRLSCSASGFTFS SYAMH WVRQAPGKGLEYVS AISSNGGSTYYADSVKG RFTISRDNSKNTLYLQMNSLRAEDTAVYYCAR
3-66-04 EVQLVESGGGLVQPGGSLRLSCAASGFTVS SNYMS WVRQAPGKGLEWVS VIYS-GGSTYYADSVKG RFTISRDNSKNTLYLQMNSLRAEDTAVYYCAR
3-53-02 EVQLVETGGGLIQPGGSLRLSCAASGFTVS SNYMS WVRQAPGKGLEWVS VIYS-GGSTYYADSVKG RFTISRDNSKNTLYLQMNSLRAEDTAVYYCAR

VHh     QVQLVESGGGLVQPGGSLRLSCSASGFSLN DHAMG WVRQAPGKGLEYVG FINS-GGSARYASSAEG RFTISRDNSKNTLYLQMNSLRAEDTAVYYCAR
```

```
        CDR3            FR4
        99         110 111      121
RbtVH   GGAVWSIHSFDP WGPGTLVTVSS
                    ||  ||||||||
                    WGQGTLVTVSS

VHh     GGAVWSIHSFDP WGQGTLVTVSS
```

# FIG. 3

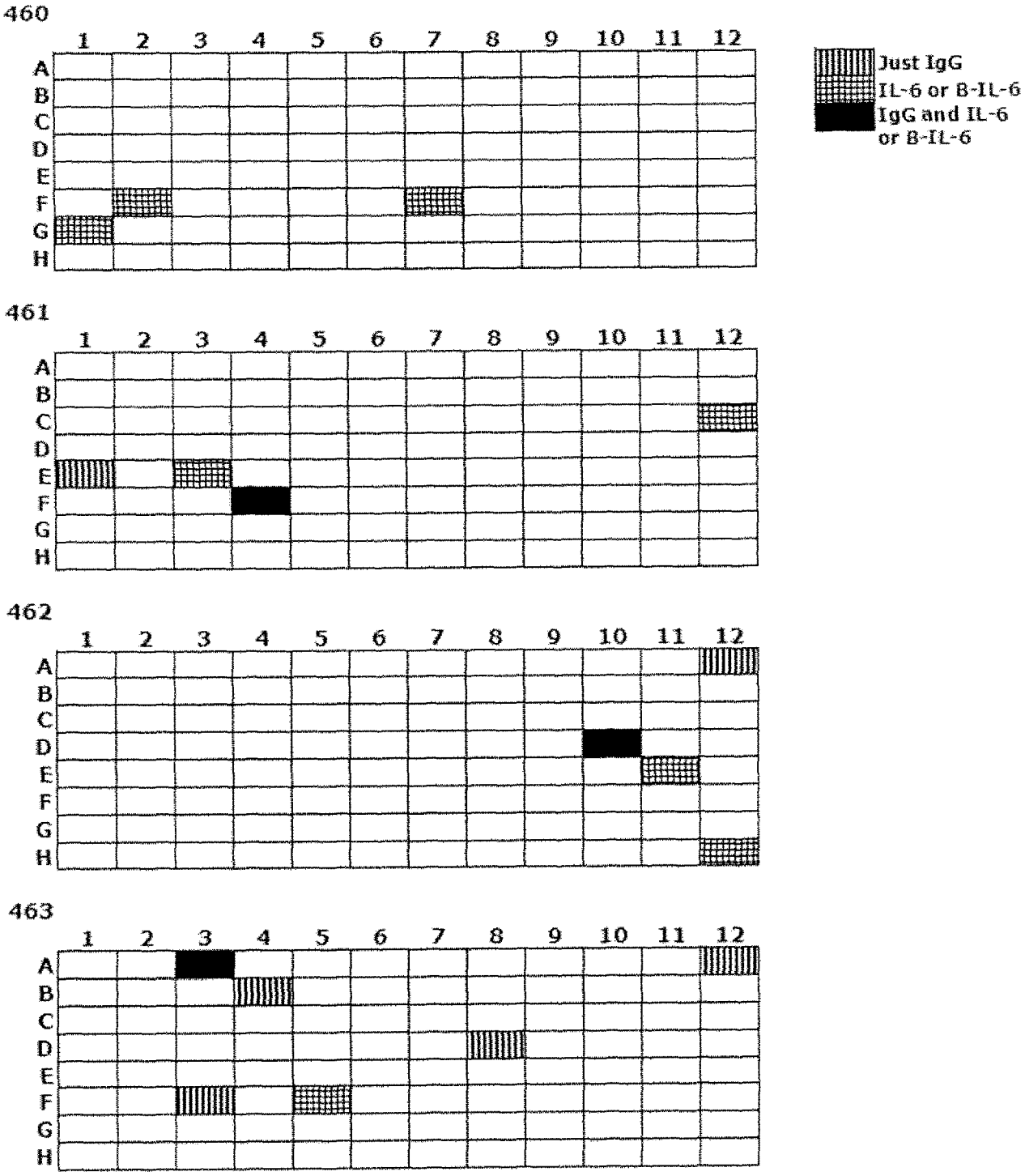

460
1 2 3 4 5 6 7 8 9 10 11 12
A
B
C
D
E
F
G
H
461
462
463
Just IgG
IL-6 or B-IL-6
IgG and IL-6 or B-IL-6

FIG. 4

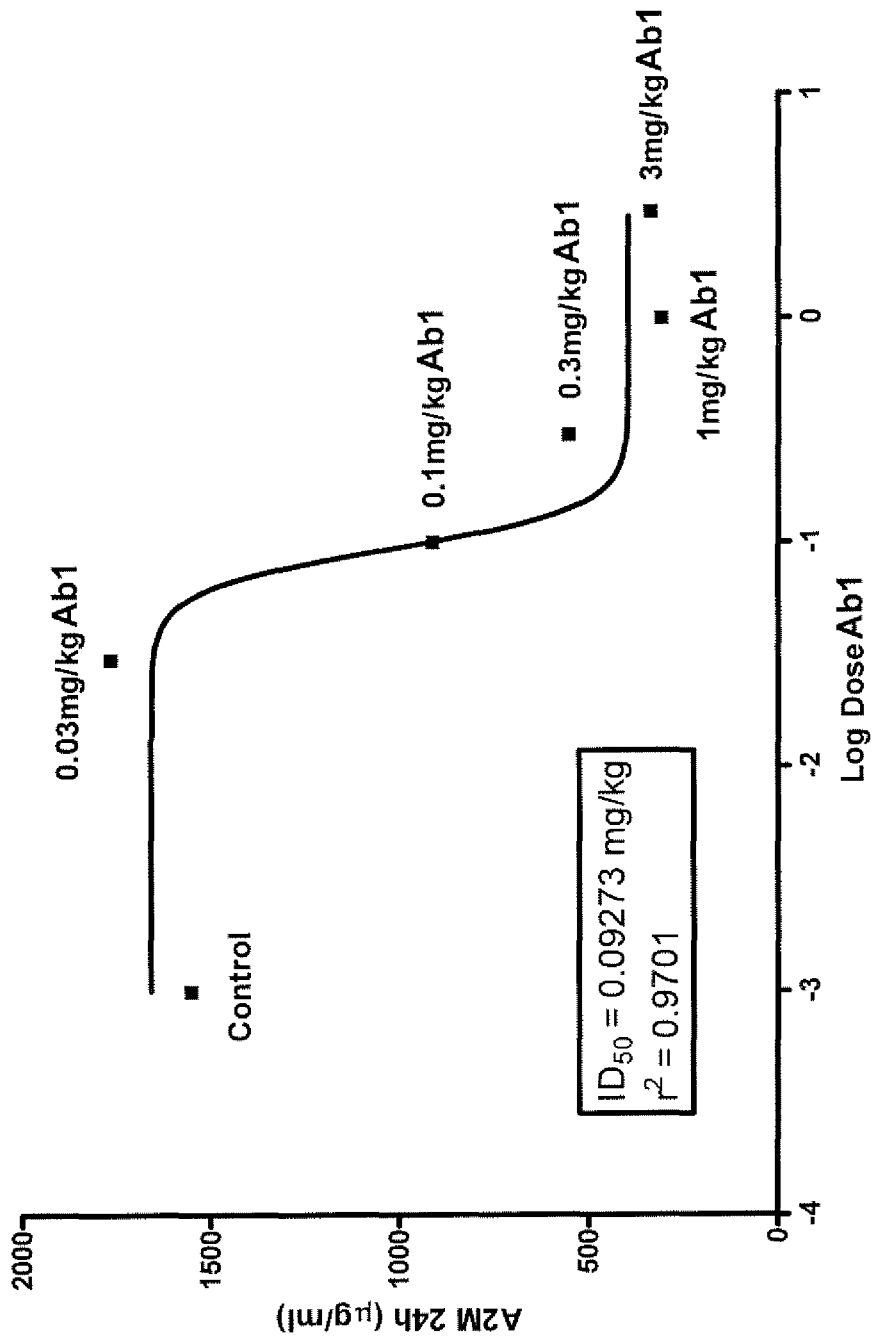

A2M 24h (µg/ml)
2000
1500
1000
500
0
-4
-3
-2
-1
0
1
Log Dose Ab1
Control
0.03mg/kg Ab1
0.1mg/kg Ab1
0.3mg/kg Ab1
1mg/kg Ab1
3mg/kg Ab1
ID50 = 0.09273 mg/kg
r2 = 0.9701

FIG. 5

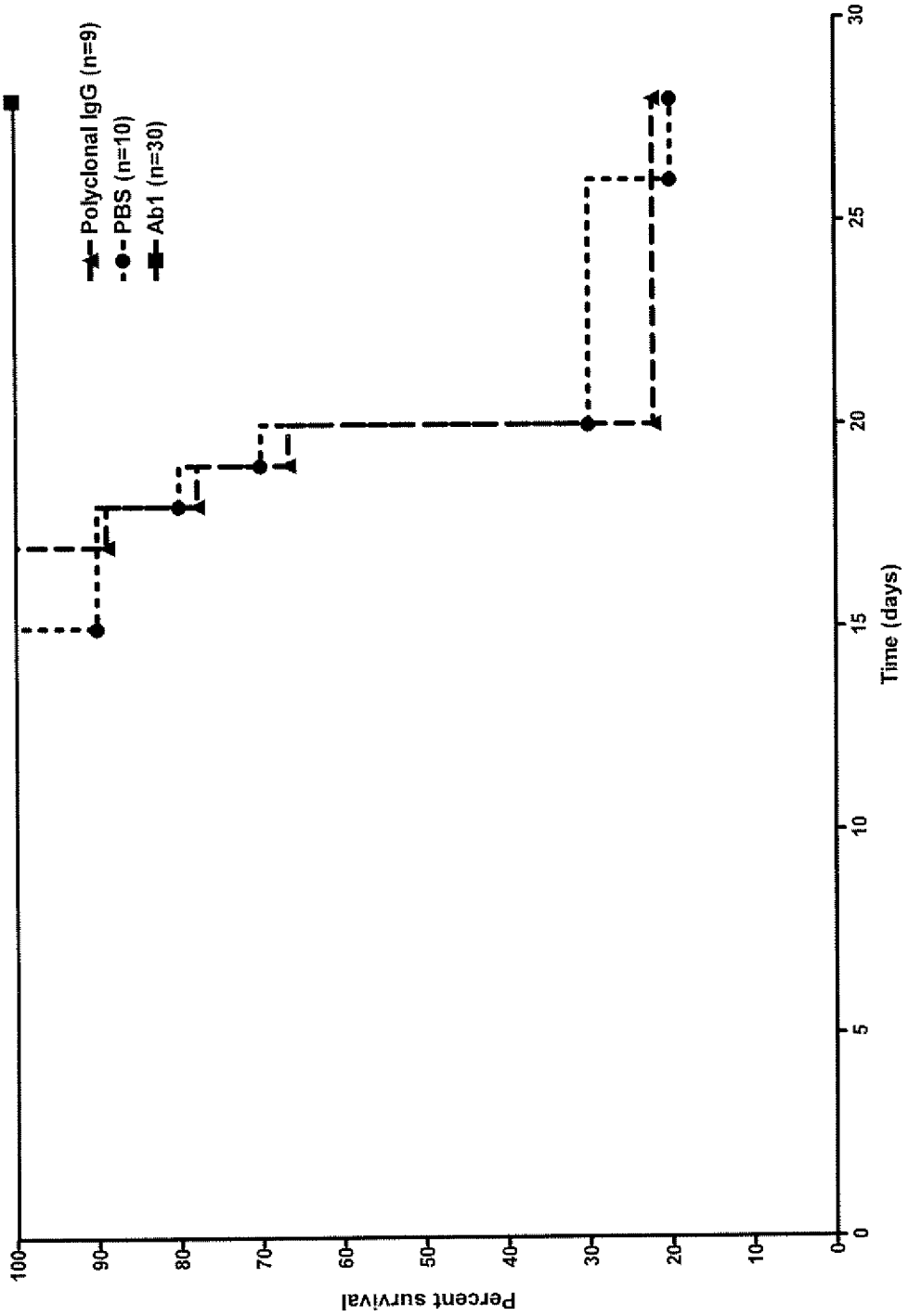

Polyclonal IgG (n=9)
PBS (n=10)
Ab1 (n=30)
Percent survival
100
90
80
70
60
50
40
30
20
10
0
0
5
10
15
20
25
30
Time (days)

FIG. 6

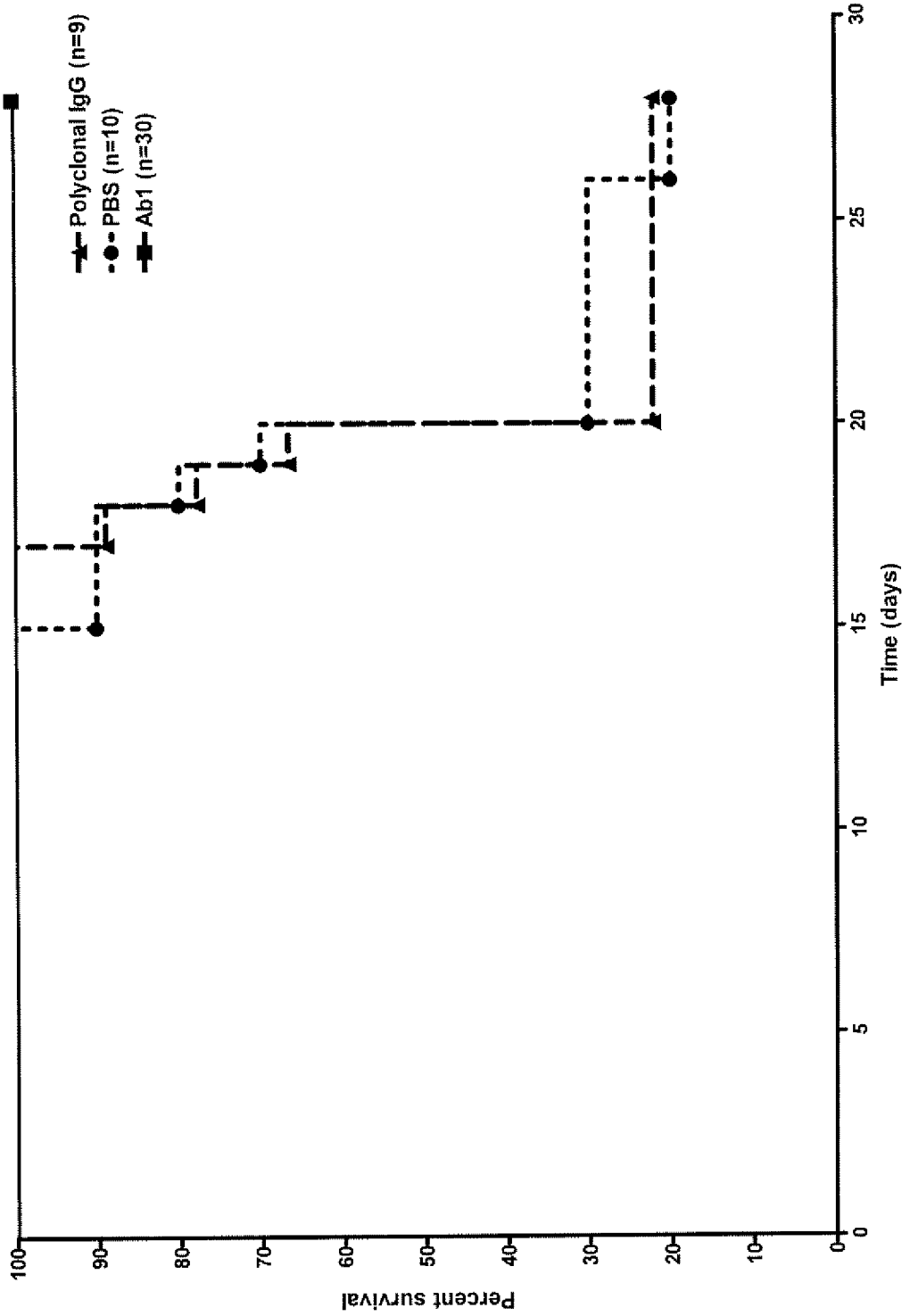

Polyclonal IgG (n=9)
PBS (n=10)
Ab1 (n=30)
Percent survival
100
90
80
70
60
50
40
30
20
10
0
0
5
10
15
20
25
30
Time (days)

FIG. 7

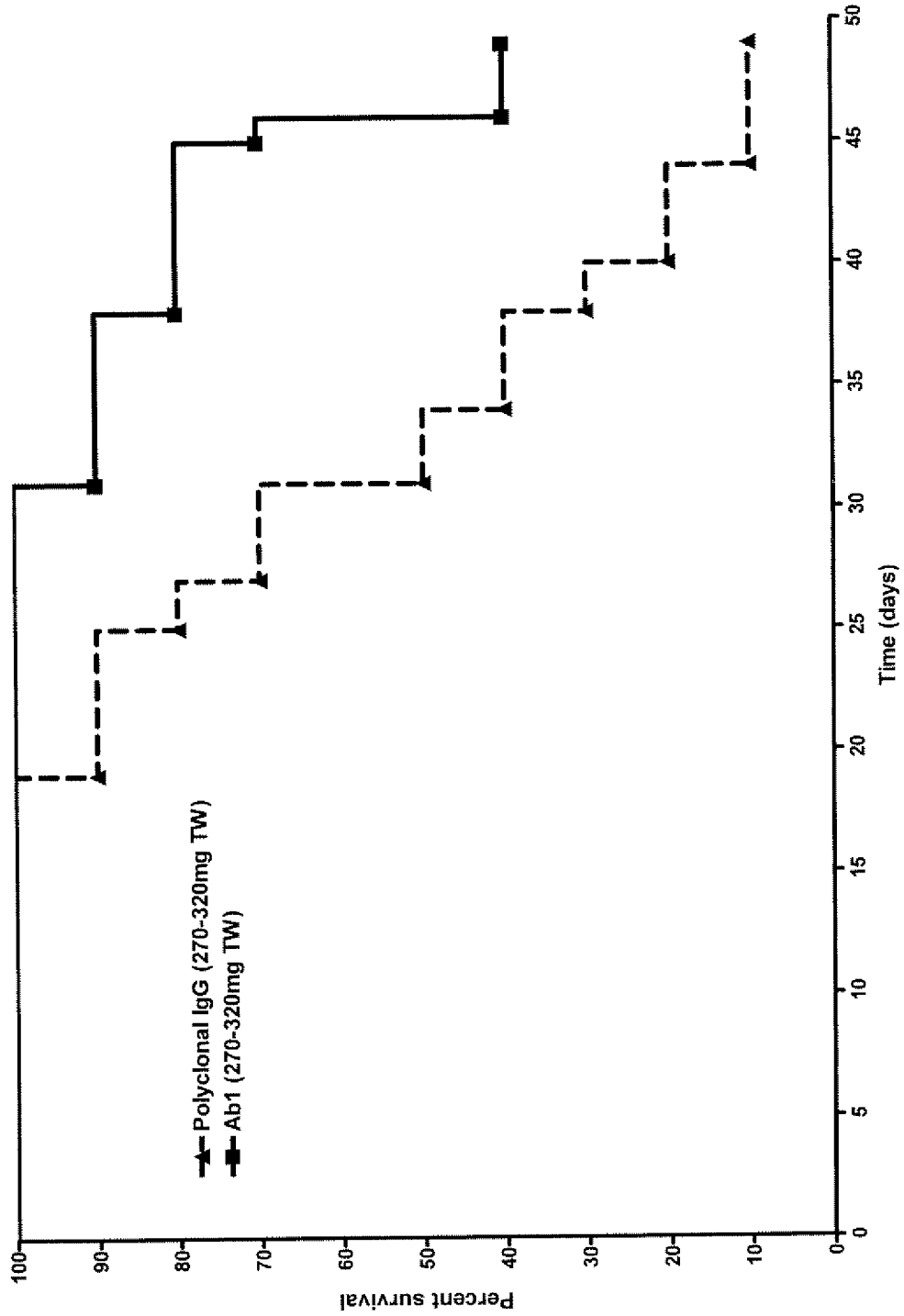

Percent survival
100
90
80
70
60
50
40
30
20
10
0
0
5
10
15
20
25
30
35
40
45
50
Time (days)
Polyclonal IgG (270-320mg TW)
Ab1 (270-320mg TW)

FIG. 8

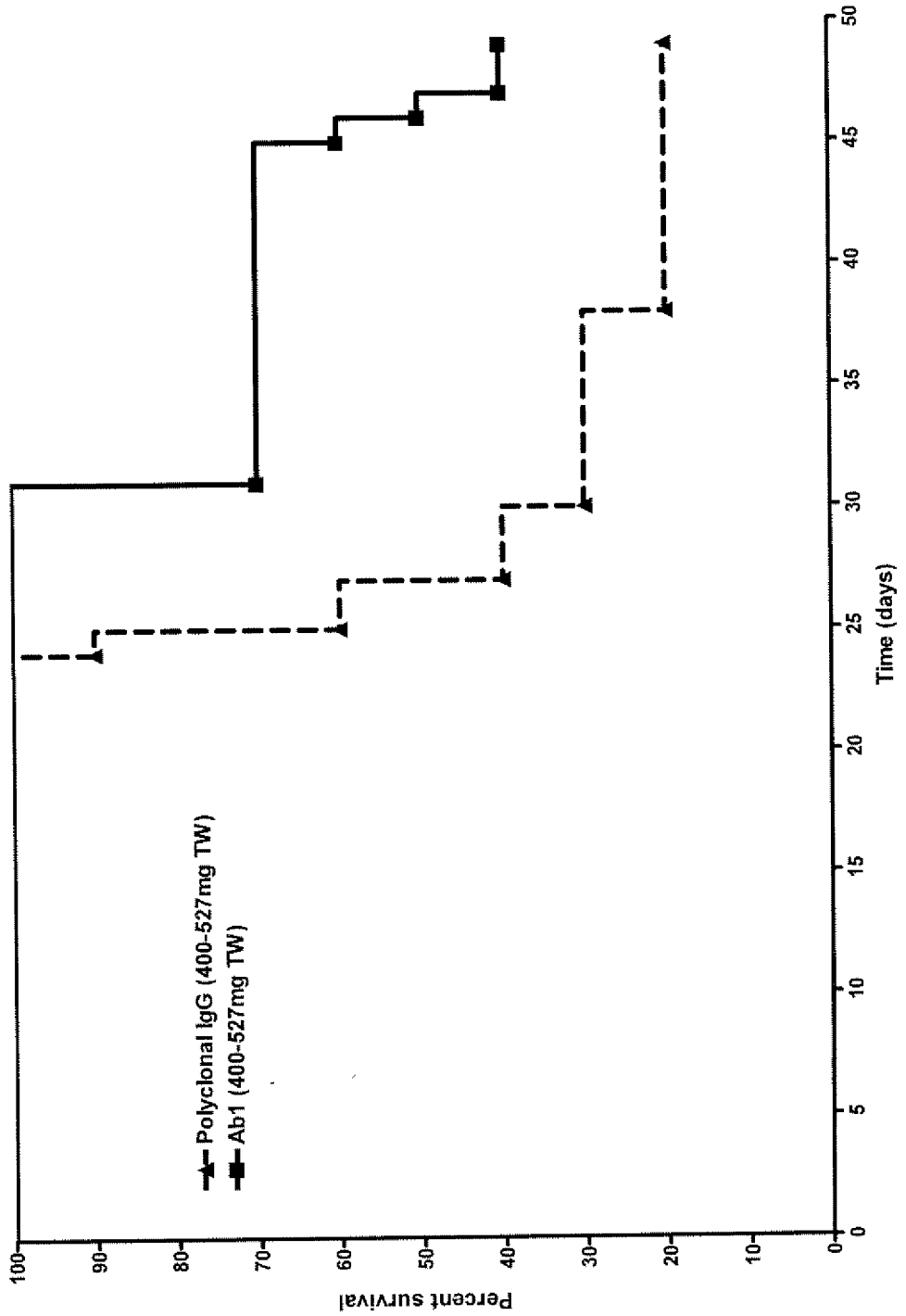

Percent survival
Time (days)
Polyclonal IgG (400-527mg TW)
Ab1 (400-527mg TW)
0
10
20
30
40
50
60
70
80
90
100
0
5
10
15
20
25
30
35
40
45
50

FIG. 9

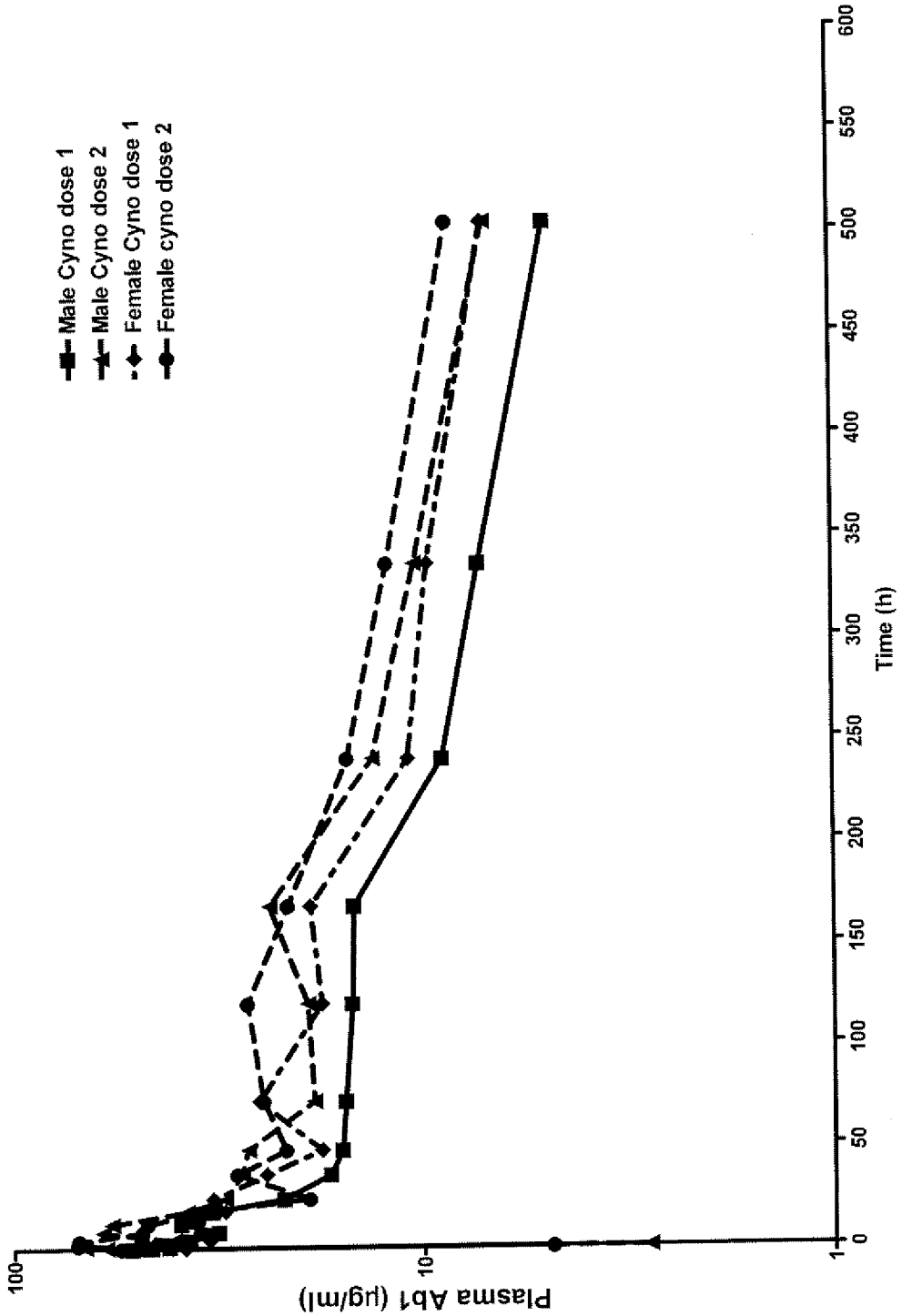

Male Cyno dose 1
Male Cyno dose 2
Female Cyno dose 1
Female cyno dose 2
Plasma Ab1 (µg/ml)
100
10
1
Time (h)
0
50
100
150
200
250
300
350
400
450
500
550
600

FIG. 10A

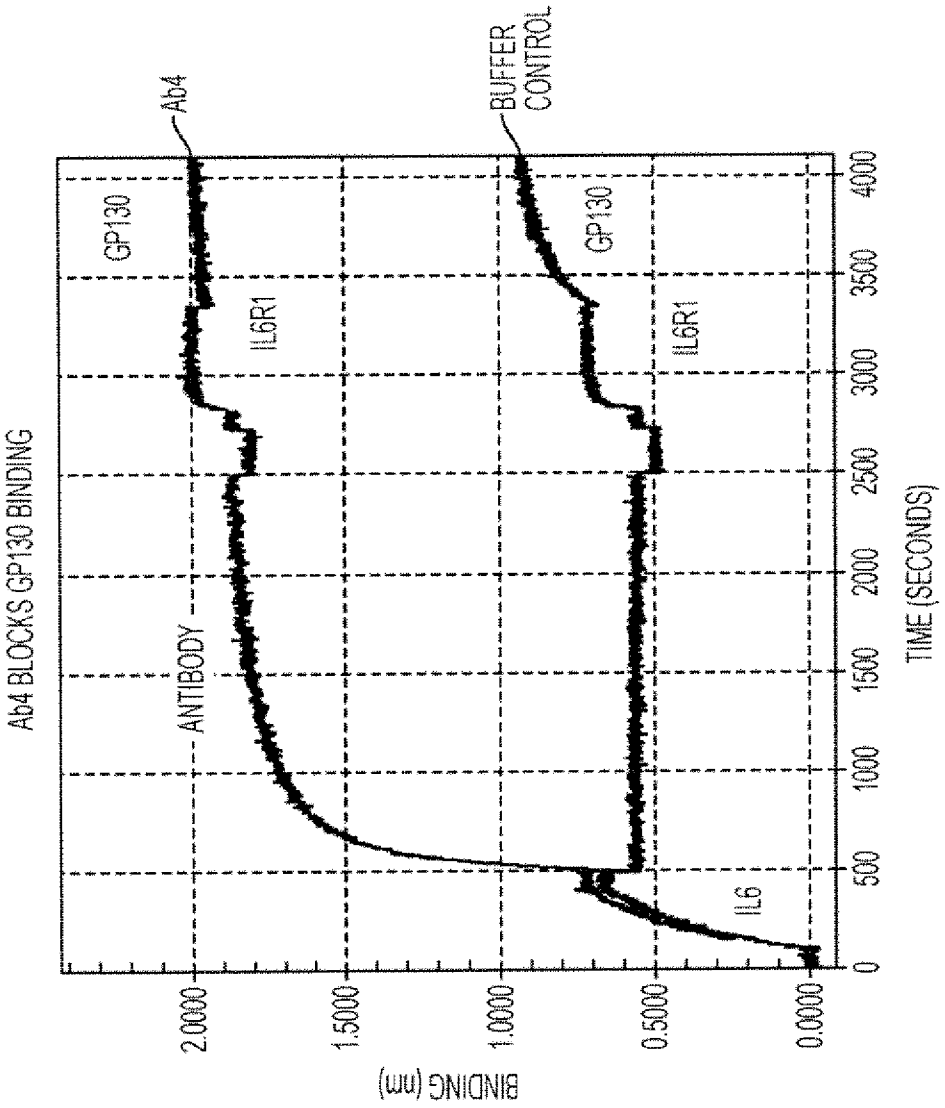

Ab4 BLOCKS GP130 BINDING
BINDING (nm)
TIME (SECONDS)
2.0000
1.5000
1.0000
0.5000
0.0000
0
500
1000
1500
2000
2500
3000
3500
4000
Ab4
BUFFER CONTROL
GP130
IL6R1
ANTIBODY
GP130
IL6R1
IL6

FIG. 10B

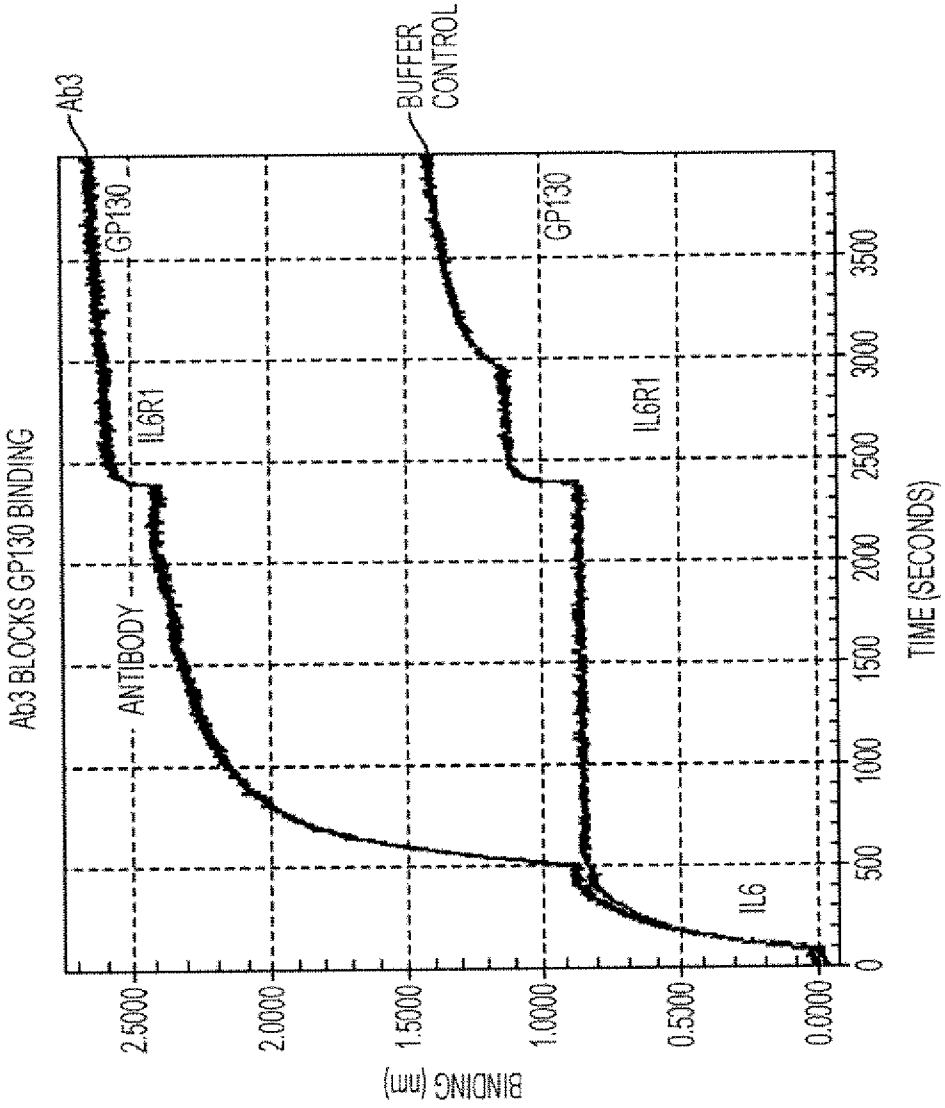

Ab3 BLOCKS GP130 BINDING
Ab3
BUFFER CONTROL
GP130
IL6R1
ANTIBODY
GP130
IL6R1
IL6
BINDING (nm)
2.5000
2.0000
1.5000
1.0000
0.5000
0.0000
0
500
1000
1500
2000
2500
3000
3500
TIME (SECONDS)

FIG. 10C

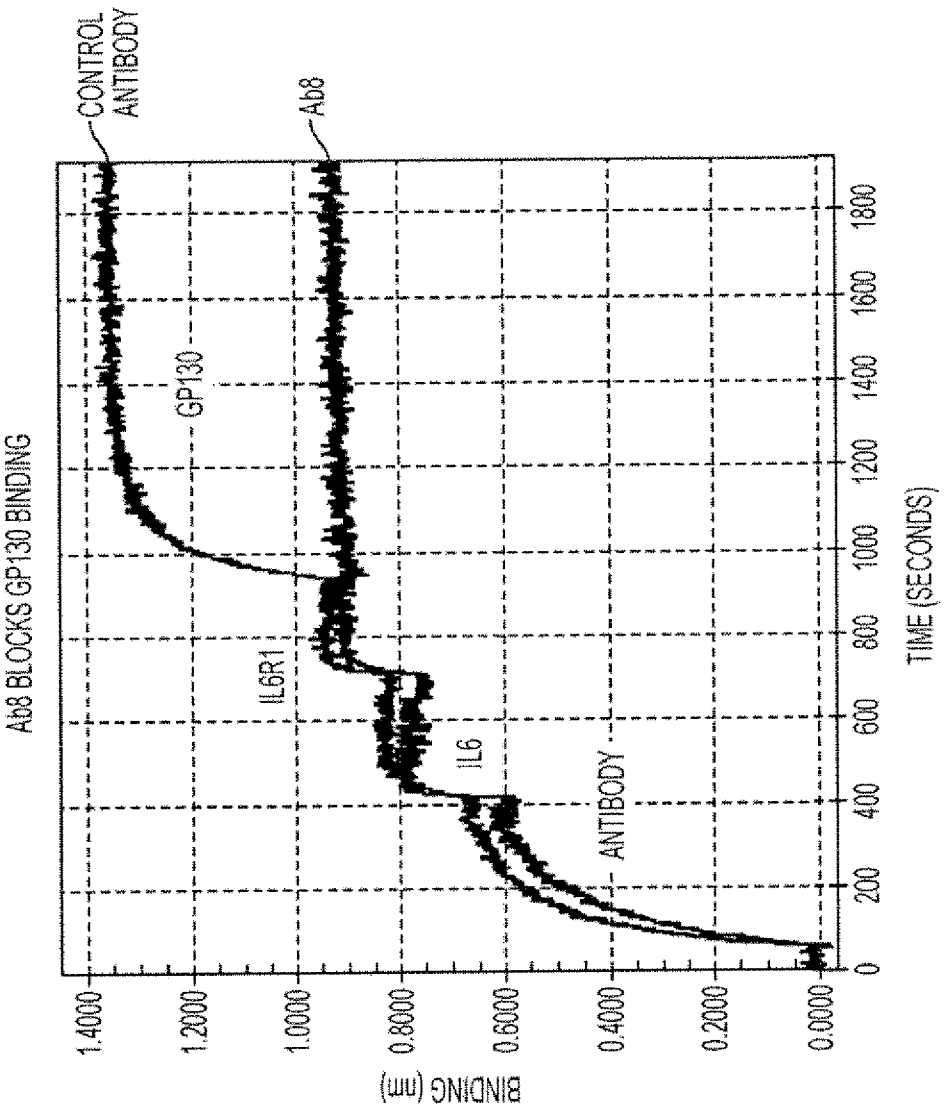

Ab8 BLOCKS GP130 BINDING
CONTROL ANTIBODY
Ab8
GP130
IL6R1
IL6
ANTIBODY
BINDING (nm)
TIME (SECONDS)
1.4000
1.2000
1.0000
0.8000
0.6000
0.4000
0.2000
0.0000
0
200
400
600
800
1000
1200
1400
1600
1800

FIG. 10D

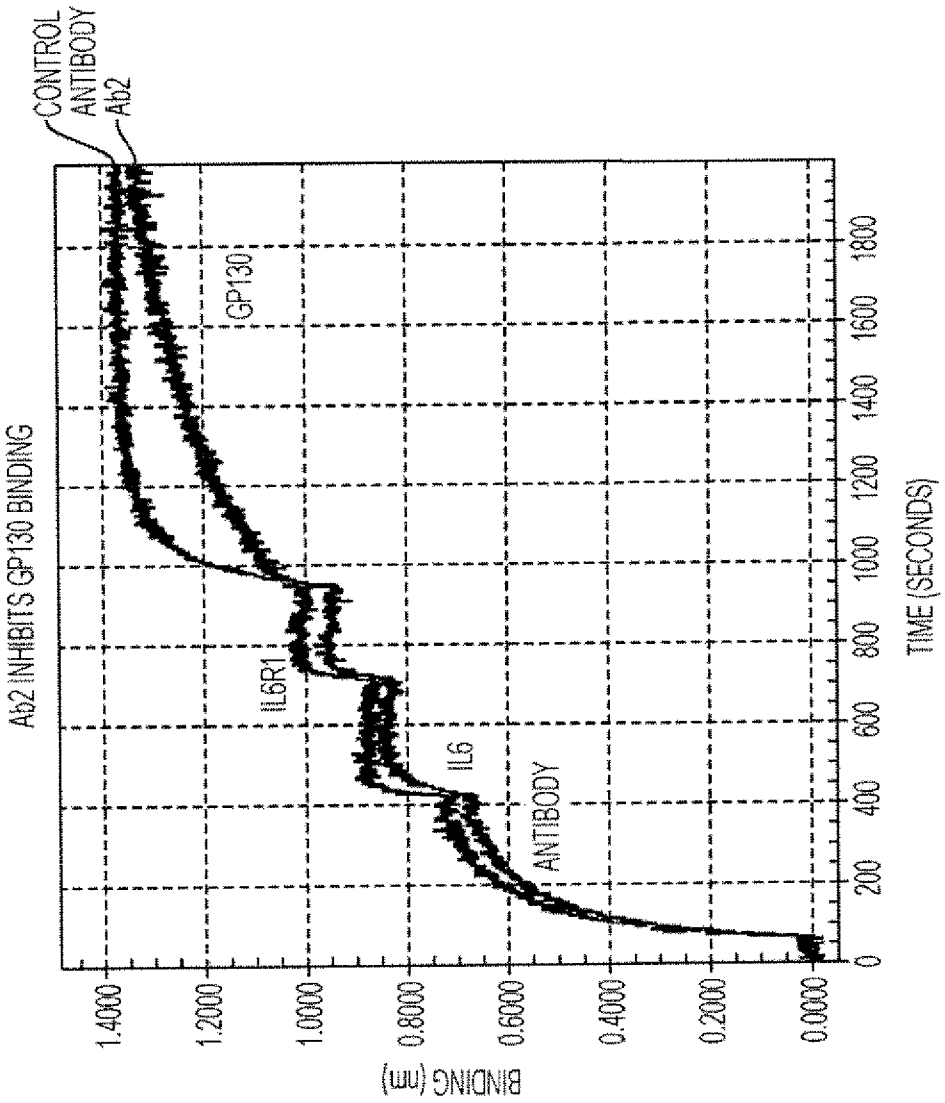
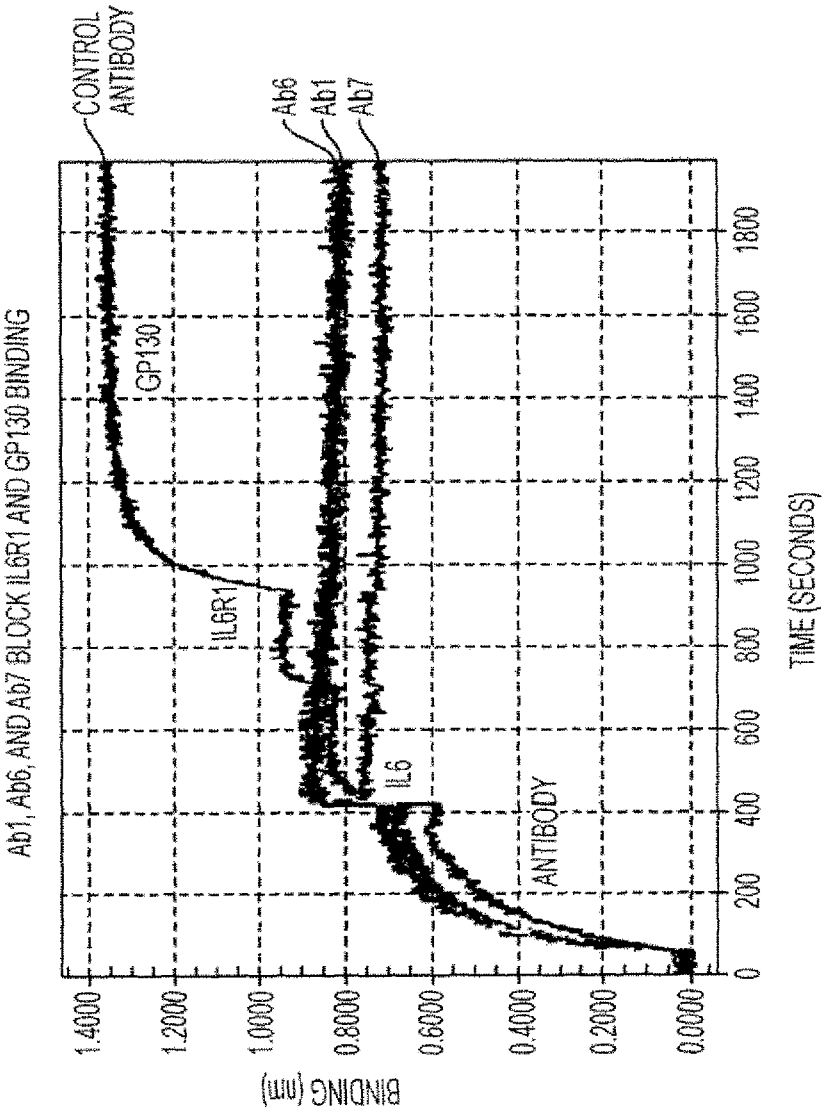

Ab2 INHIBITS GP130 BINDING
CONTROL ANTIBODY
Ab2
GP130
IL6R1
IL6
ANTIBODY
BINDING (nm)
1.4000
1.2000
1.0000
0.8000
0.6000
0.4000
0.2000
0.0000
0
200
400
600
800
1000
1200
1400
1600
1800
TIME (SECONDS)

FIG. 10E


Ab1, Ab6, AND Ab7 BLOCK IL6R1 AND GP130 BINDING
CONTROL ANTIBODY
Ab6
Ab1
Ab7
GP130
IL6R1
IL6
ANTIBODY
BINDING (nm)
TIME (SECONDS)
1.4000
1.2000
1.0000
0.8000
0.6000
0.4000
0.2000
0.0000
0
200
400
600
800
1000
1200
1400
1600
1800

# FIG. 11

| Antibody | Blocks IL6 binding to R1 | Blocks IL6 binding to GP130 | Reference |
|---|---|---|---|
| Ab1 | Yes | Yes | 021051 |
| Ab2 | No | Partial | 021050 |
| Ab3 | No | Yes | 021030 |
| Ab4 | No | Yes | 021050 |
| Ab6 | Yes | Yes | 021051 |
| Ab7 | Yes | Yes | 021051 |
| Ab8 | No | Yes | 021051 |

FIG. 12

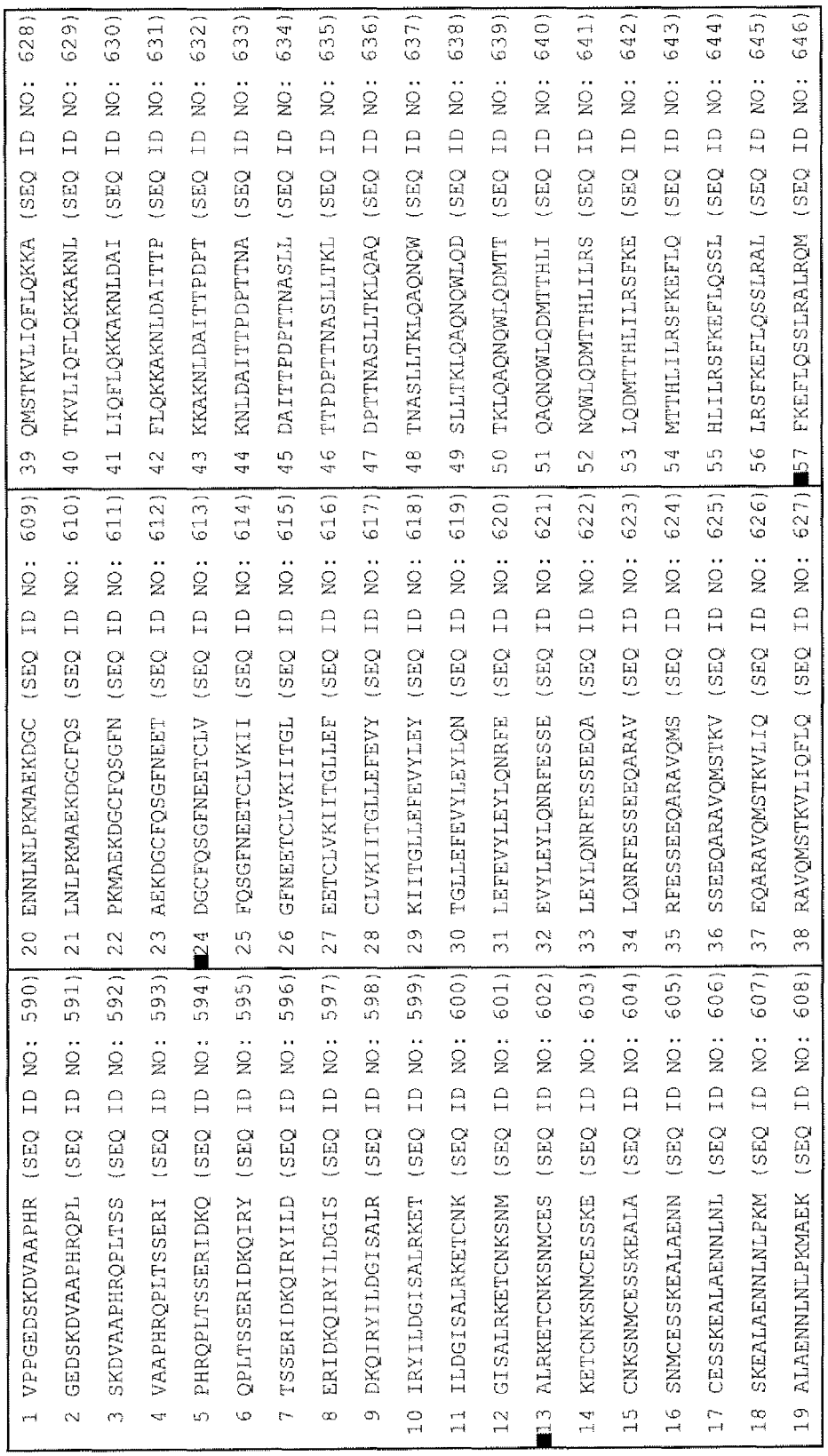

1 VPPGEDSKDVAAPHR (SEQ ID NO: 590)
2 GEDSKDVAAPHRQPL (SEQ ID NO: 591)
3 SKDVAAPHRQPLTSS (SEQ ID NO: 592)
4 VAAPHRQPLTSSERI (SEQ ID NO: 593)
5 PHRQPLTSSERIDKQ (SEQ ID NO: 594)
6 QPLTSSERIDKQIRY (SEQ ID NO: 595)
7 TSSERIDKQIRYILD (SEQ ID NO: 596)
8 ERIDKQIRYILDGIS (SEQ ID NO: 597)
9 DKQIRYILDGISALR (SEQ ID NO: 598)
10 IRYILDGISALRKET (SEQ ID NO: 599)
11 ILDGISALRKETCNK (SEQ ID NO: 600)
12 GISALRKETCNKSNM (SEQ ID NO: 601)
13 ALRKETCNKSNMCES (SEQ ID NO: 602)
14 KETCNKSNMCESSKE (SEQ ID NO: 603)
15 CNKSNMCESSKEALA (SEQ ID NO: 604)
16 SNMCESSKEALAENN (SEQ ID NO: 605)
17 CESSKEALAENNLNL (SEQ ID NO: 606)
18 SKEALAENNLNLPKM (SEQ ID NO: 607)
19 ALAENNLNLPKMAEK (SEQ ID NO: 608)
20 ENNLNLPKMAEKDGC (SEQ ID NO: 609)
21 LNLPKMAEKDGCFQS (SEQ ID NO: 610)
22 PKMAEKDGCFQSGFN (SEQ ID NO: 611)
23 AEKDGCFQSGFNEET (SEQ ID NO: 612)
24 DGCFQSGFNEETCLV (SEQ ID NO: 613)
25 FQSGFNEETCLVKII (SEQ ID NO: 614)
26 GFNEETCLVKIITGL (SEQ ID NO: 615)
27 EETCLVKIITGLLEF (SEQ ID NO: 616)
28 CLVKIITGLLEFEVY (SEQ ID NO: 617)
29 KIITGLLEFEVYLEY (SEQ ID NO: 618)
30 TGLLEFEVYLEYLQN (SEQ ID NO: 619)
31 LEFEVYLEYLQNRFE (SEQ ID NO: 620)
32 EVYLEYLQNRFESSE (SEQ ID NO: 621)
33 LEYLQNRFESSEEQA (SEQ ID NO: 622)
34 LQNRFESSEEQARAV (SEQ ID NO: 623)
35 RFESSEEQARAVQMS (SEQ ID NO: 624)
36 SSEEQARAVQMSTKV (SEQ ID NO: 625)
37 EQARAVQMSTKVLIQ (SEQ ID NO: 626)
38 RAVQMSTKVLIQFLQ (SEQ ID NO: 627)
39 QMSTKVLIQFLQKKA (SEQ ID NO: 628)
40 TKVLIQFLQKKAKNL (SEQ ID NO: 629)
41 LIQFLQKKAKNLDAI (SEQ ID NO: 630)
42 FLQKKAKNLDAITTP (SEQ ID NO: 631)
43 KKAKNLDAITTPDPT (SEQ ID NO: 632)
44 KNLDAITTPDPTTNA (SEQ ID NO: 633)
45 DAITTPDPTTNASLL (SEQ ID NO: 634)
46 TTPDPTTNASLLTKL (SEQ ID NO: 635)
47 DPTTNASLLTKLQAQ (SEQ ID NO: 636)
48 TNASLLTKLQAQNQW (SEQ ID NO: 637)
49 SLLTKLQAQNQWLQD (SEQ ID NO: 638)
50 TKLQAQNQWLQDMTT (SEQ ID NO: 639)
51 QAQNQWLQDMTTHLI (SEQ ID NO: 640)
52 NQWLQDMTTHLILRS (SEQ ID NO: 641)
53 LQDMTTHLILRSFKE (SEQ ID NO: 642)
54 MTTHLILRSFKEFLQ (SEQ ID NO: 643)
55 HLILRSFKEFLQSSL (SEQ ID NO: 644)
56 LRSFKEFLQSSLRAL (SEQ ID NO: 645)
57 FKEFLQSSLRALRQM (SEQ ID NO: 646)

FIG. 13

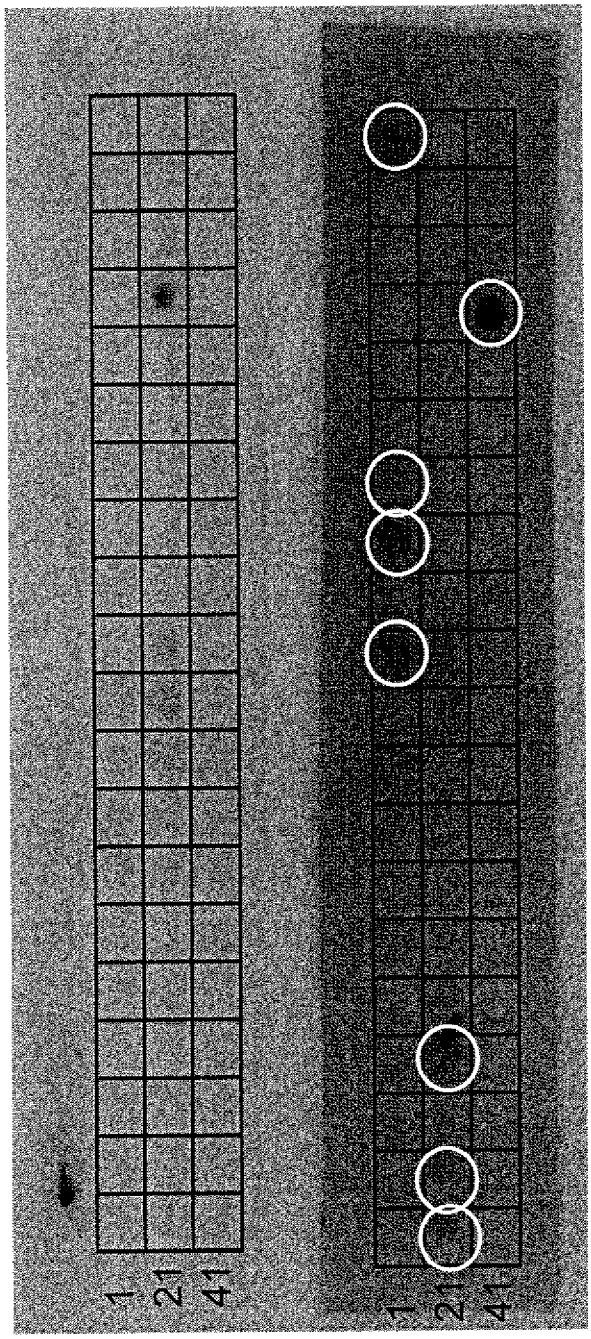


FIG. 14

