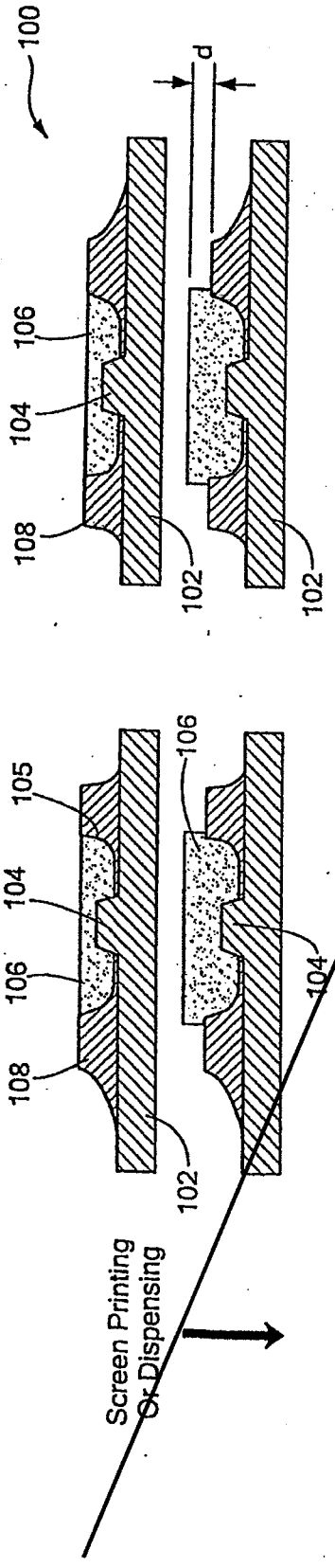

100
d
106
104
108
102
102
105
106
104
106
108
102
104
Screen Printing
Or Dispensing

FIG. 1A

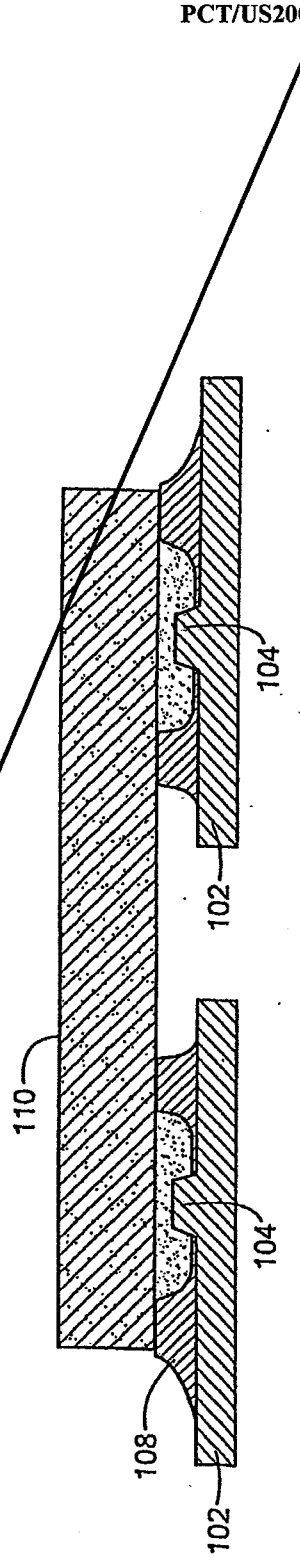

100
104
102
110
104
108
102
Chip attach

FIG. 1B

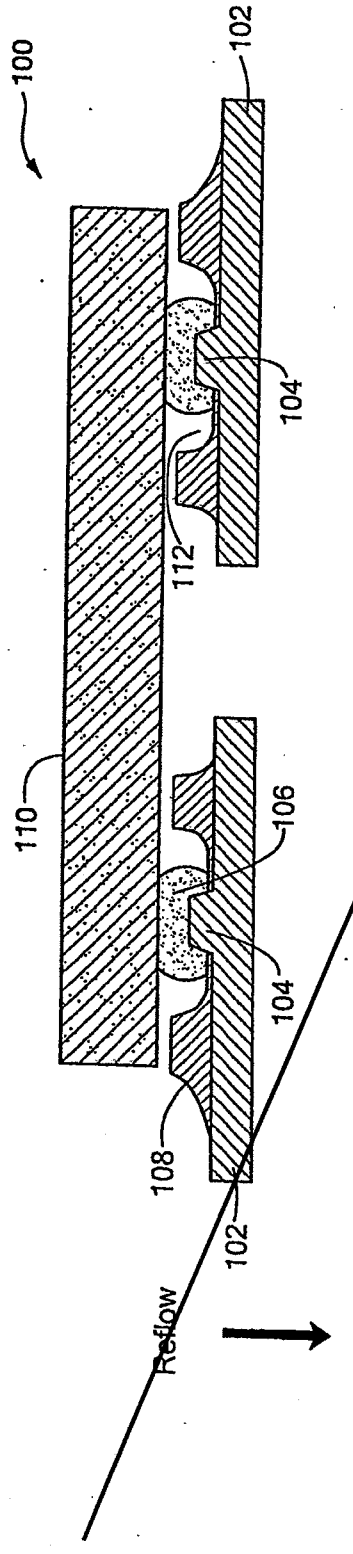

100
102
104
112
110
106
104
108
102
Reflow

FIG. 1C

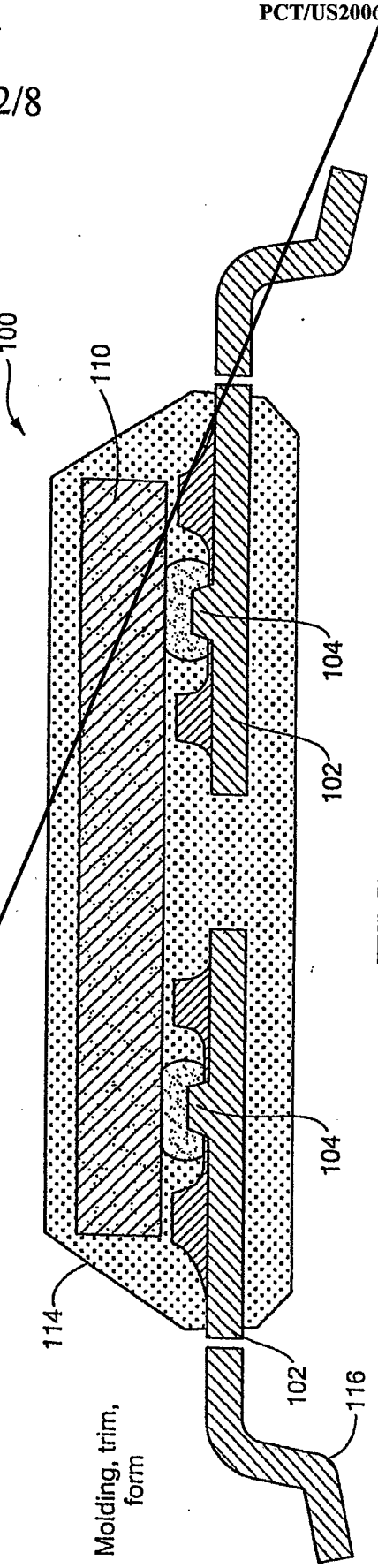

100
110
104
102
104
114
102
116
Molding, trim, form

FIG. 1D

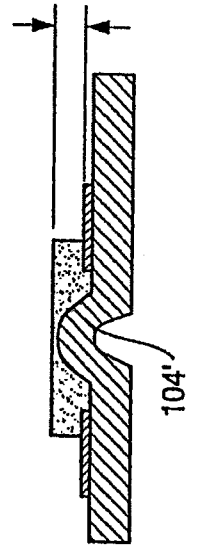
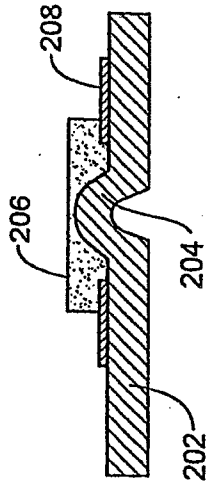
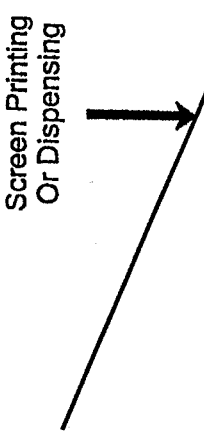
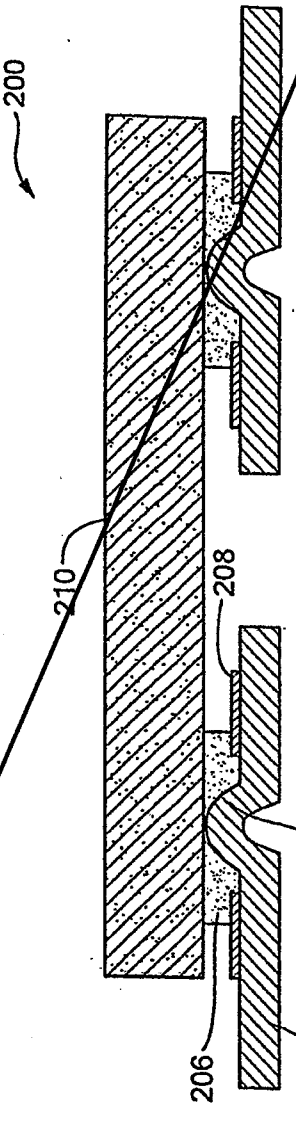

200
104'

FIG. 2A


208
206
204
202


Screen Printing
Or Dispensing


200
210
208
204
206
202

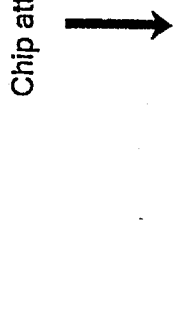

Chip attach

FIG. 2B

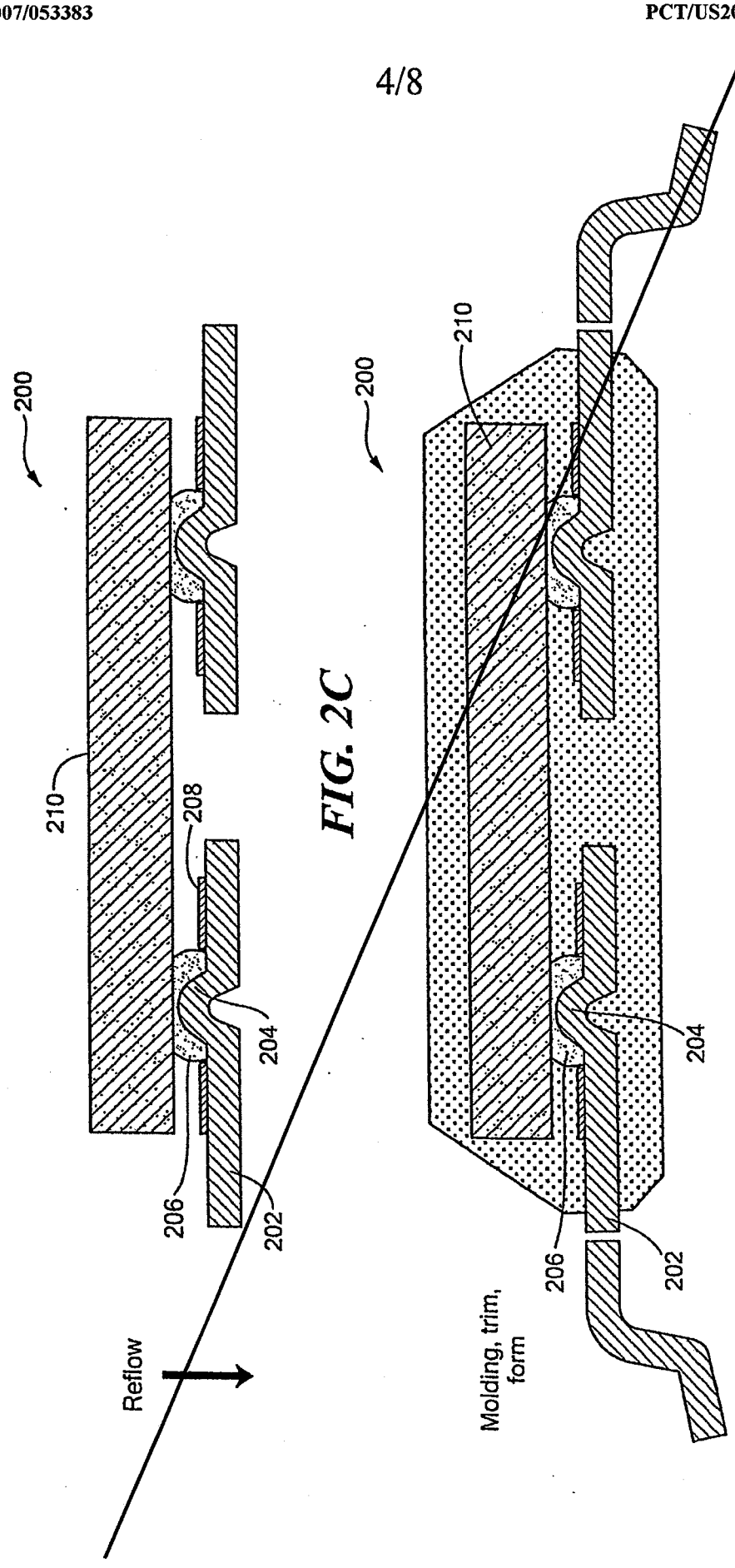

200
210
208
204
206
202
Reflow
200
210
204
206
202
Molding, trim, form

FIG. 2C

FIG. 2D

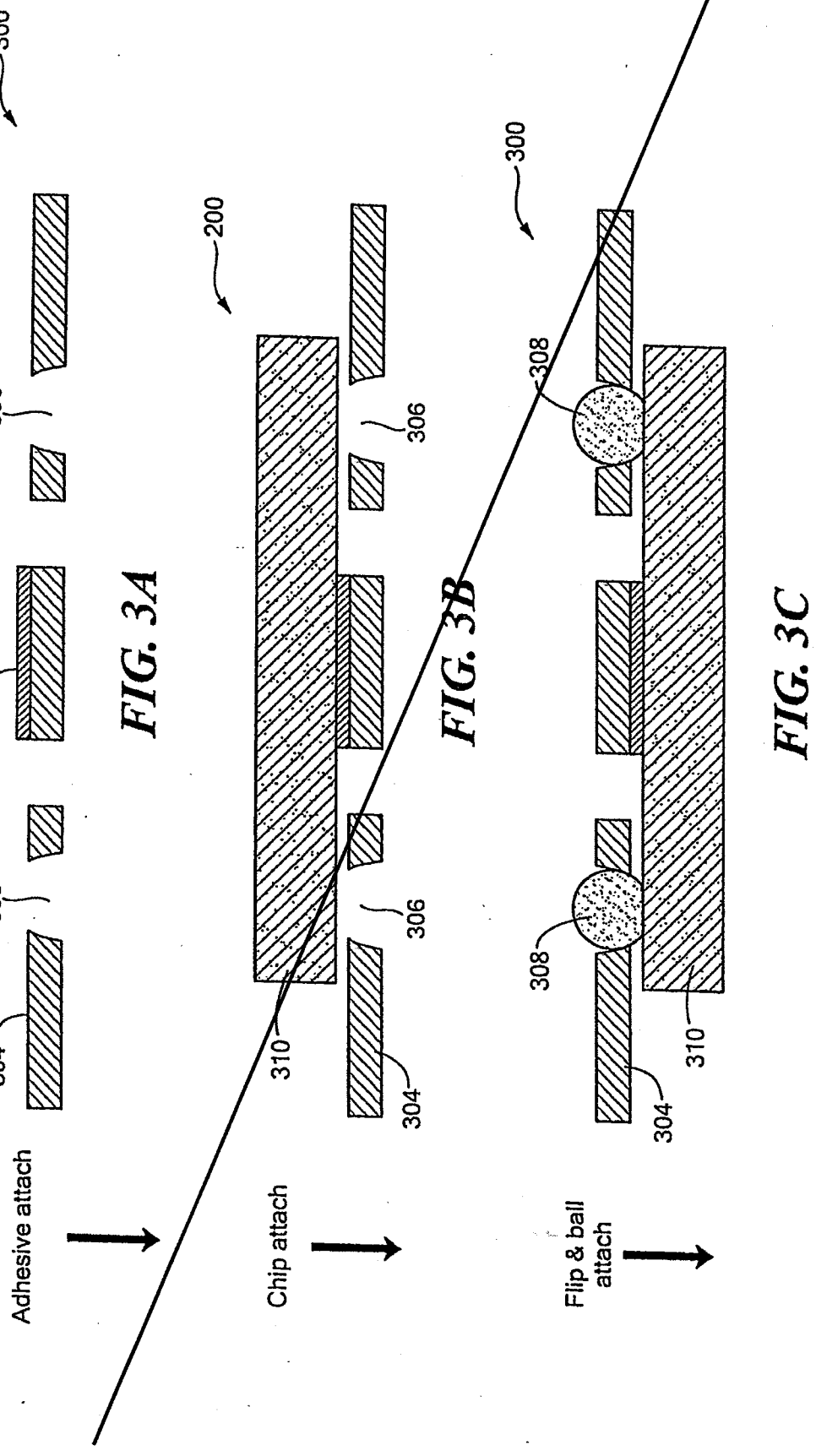


FIG. 3A

FIG. 3B

FIG. 3C

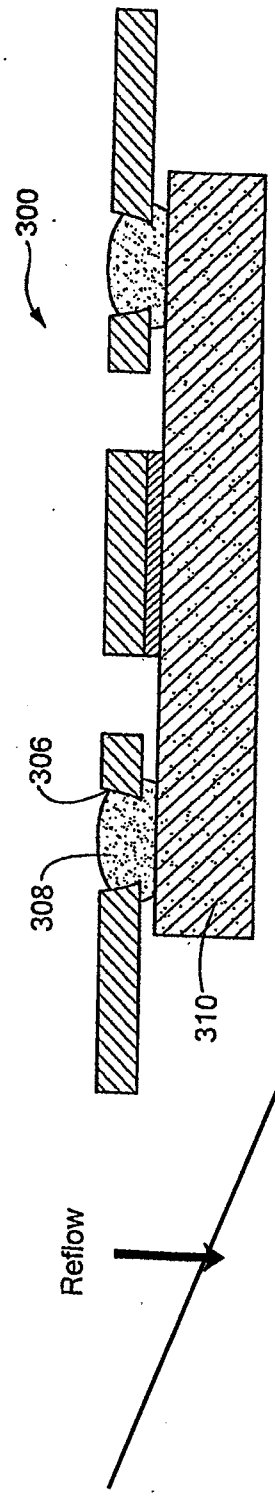


FIG. 3D

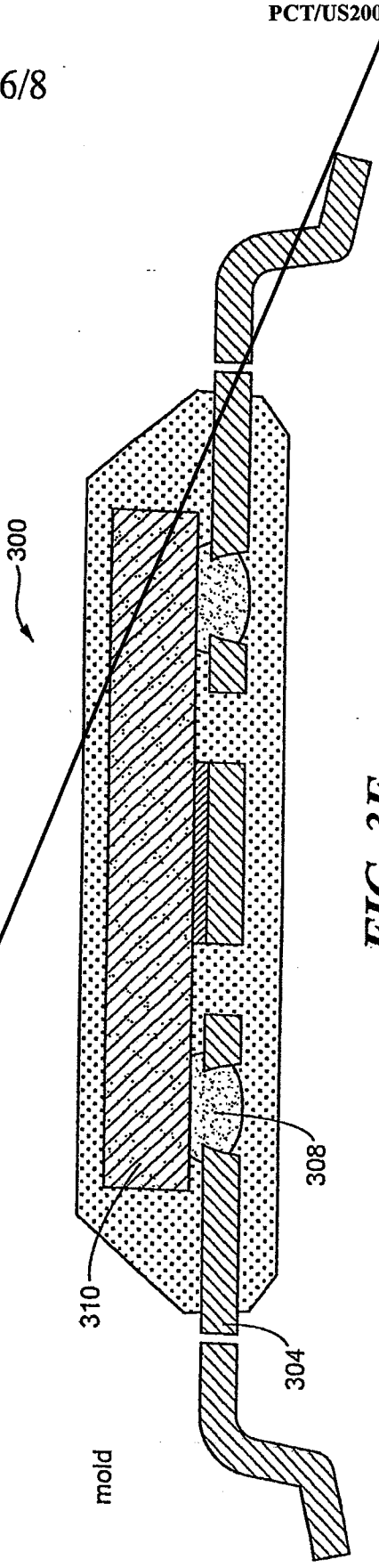


FIG. 3E

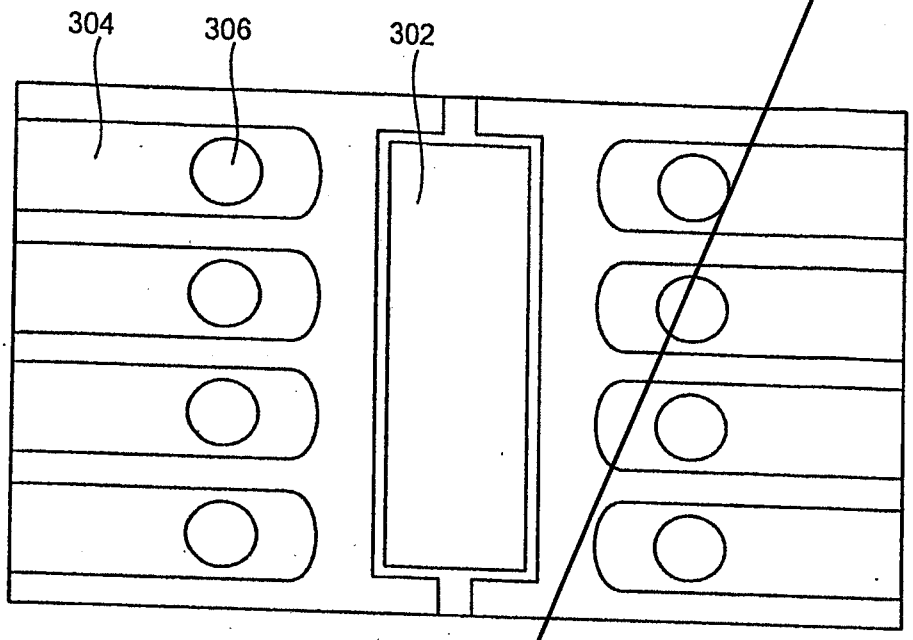


FIG. 3A1

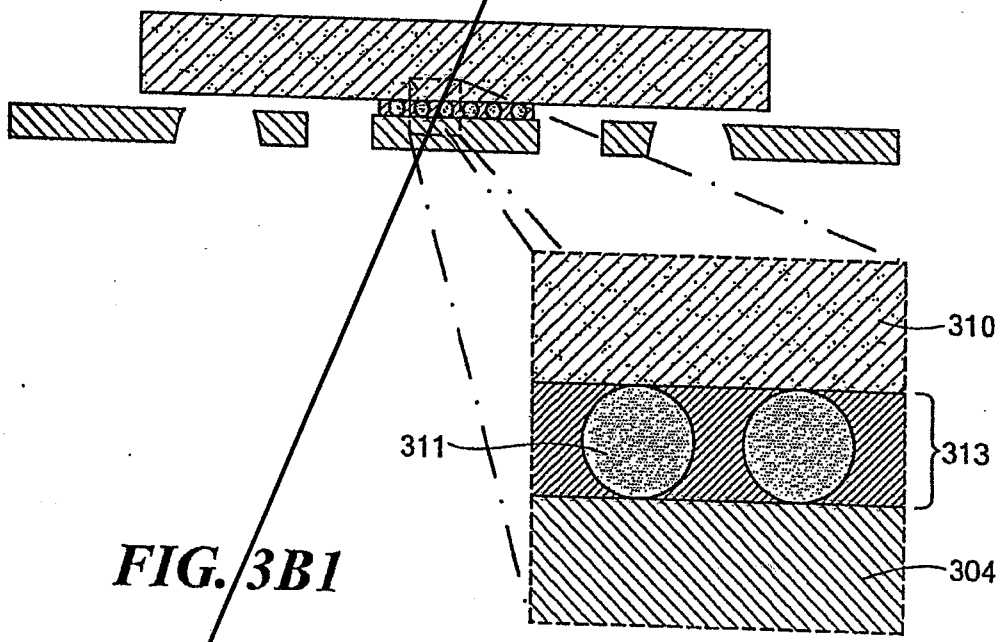


FIG. 3B1

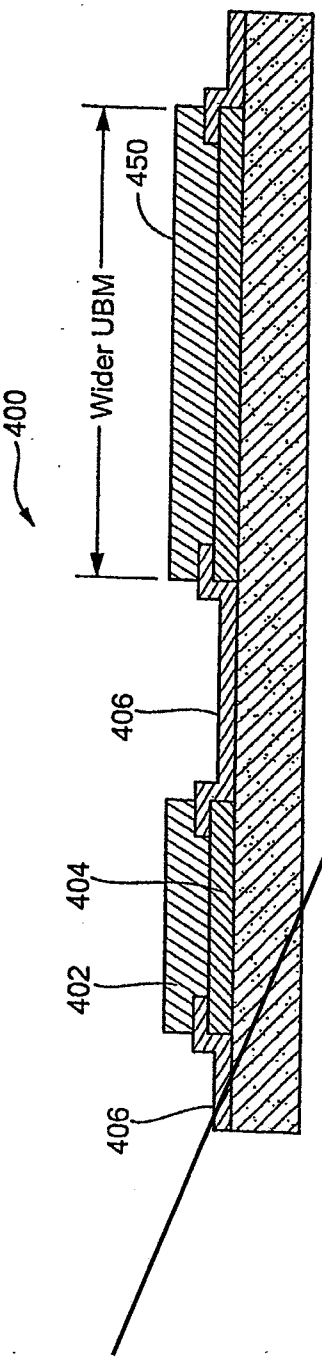

Si wafer
Al bond pad
Wafer passivation
UBM
400
Wider UBM
450
406
404
402
406

FIG. 4

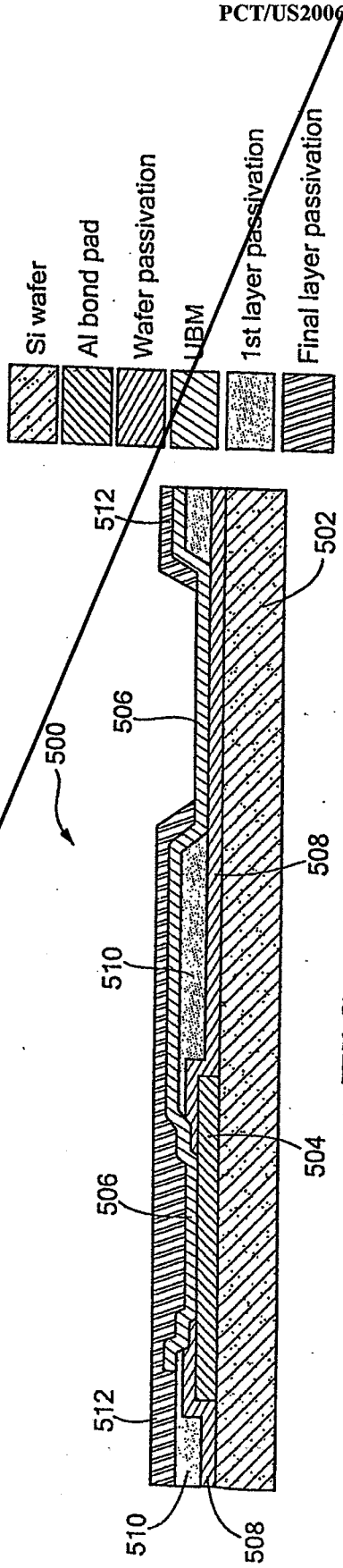

Si wafer
Al bond pad
Wafer passivation
UBM
1st layer passivation
Final layer passivation
500
512
502
506
508
510
504
506
512
510
508

FIG. 5

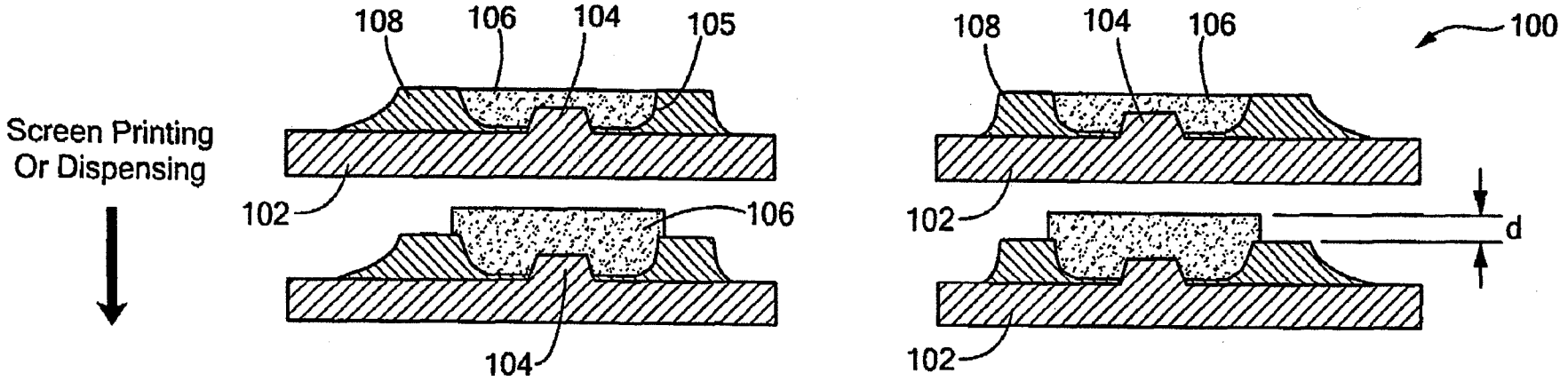

Screen Printing
Or Dispensing
108
106
104
105
102
106
104
108
104
106
100
102
d
102

FIG. 1A

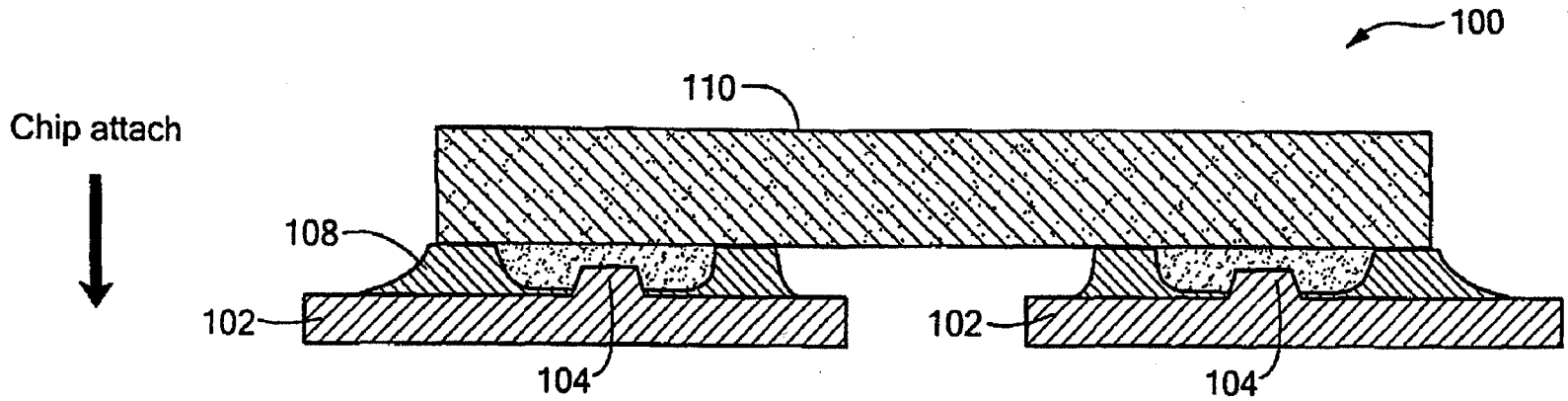

Chip attach
100
110
108
102
104
102
104

FIG. 1B

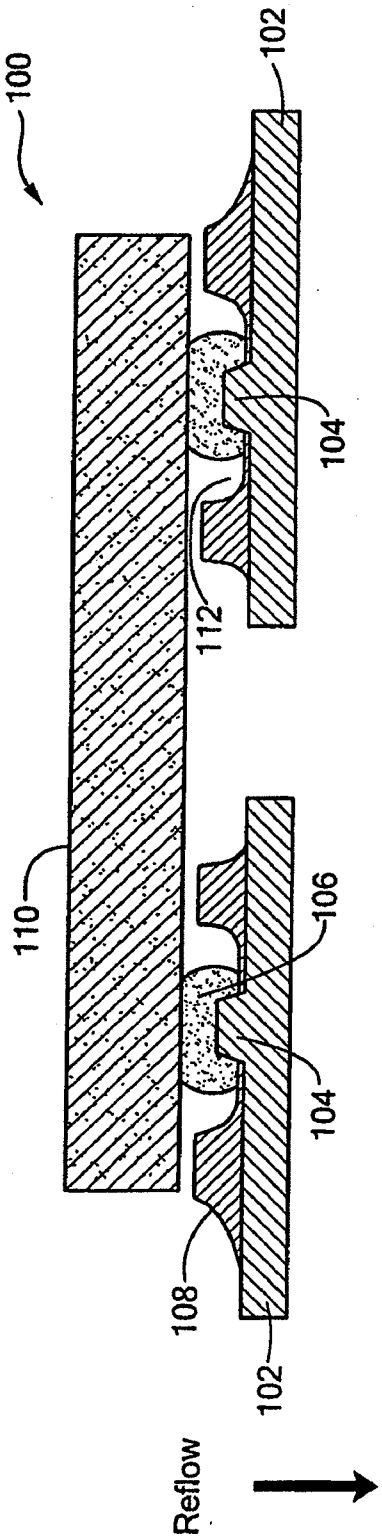

100
102
104
112
110
106
104
108
102
Reflow

FIG. 1C

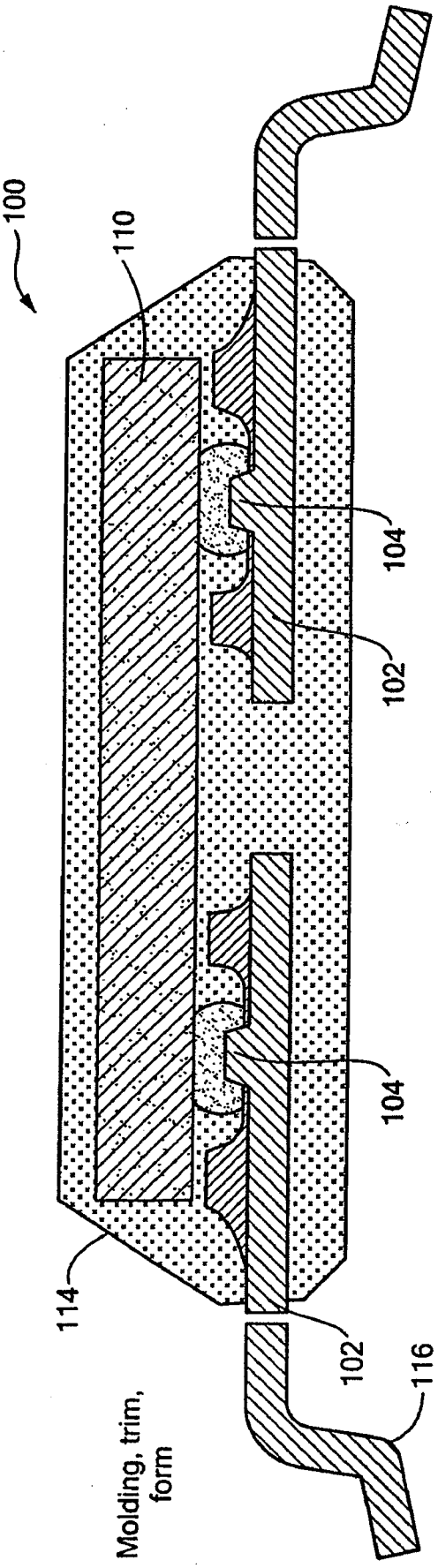

100
110
104
102
104
114
102
116
Molding, trim, form

FIG. 1D

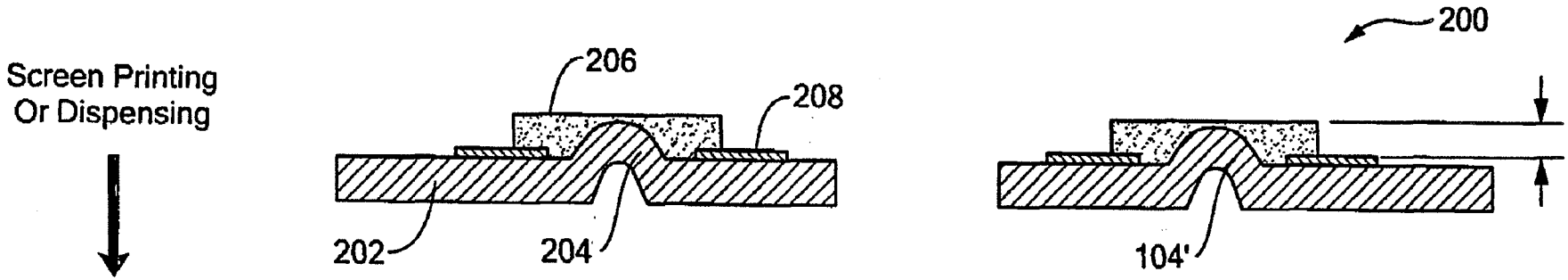

Screen Printing
Or Dispensing
206
208
202
204
200
104'

FIG. 2A

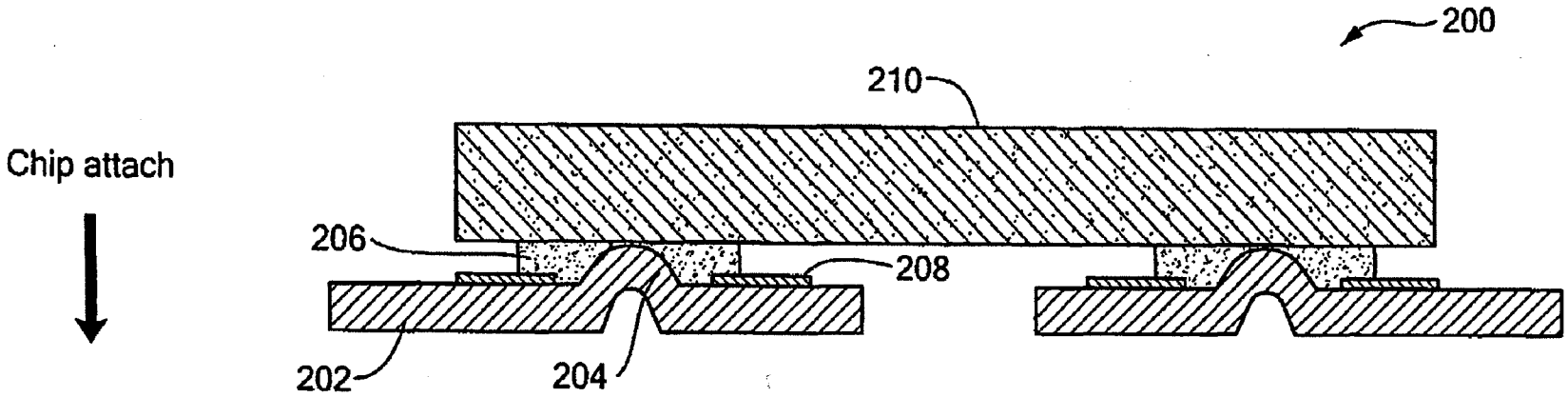

Chip attach
200
210
206
208
202
204

FIG. 2B

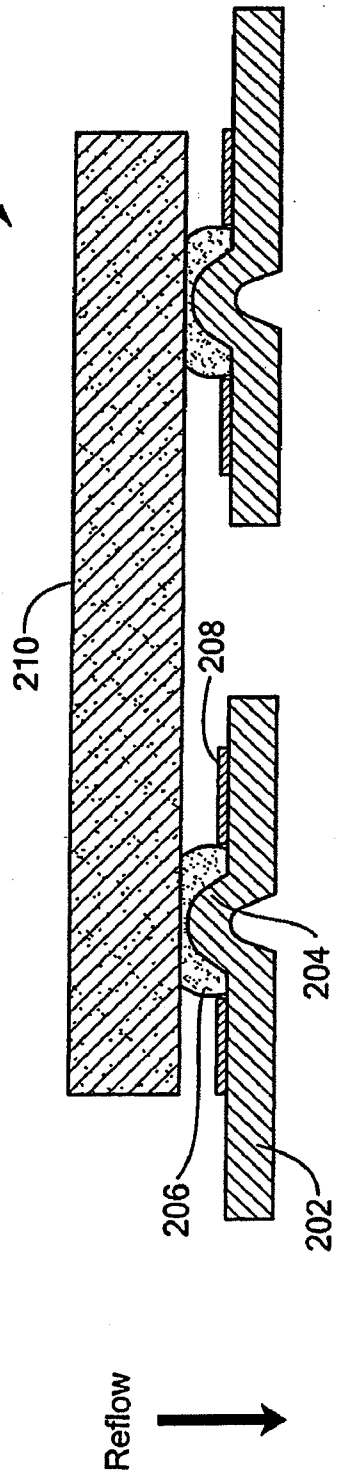

200
210
208
204
206
202
Reflow

FIG. 2C

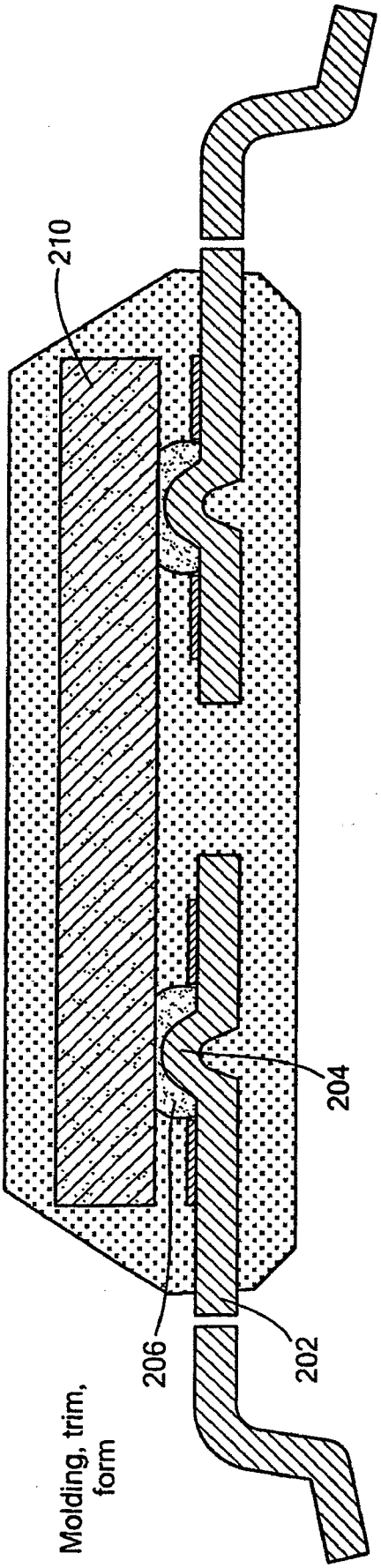

200
210
204
206
202
Molding, trim, form

FIG. 2D

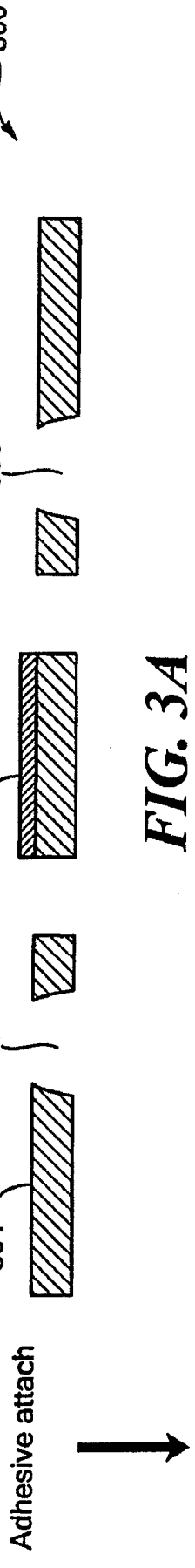


FIG. 3A

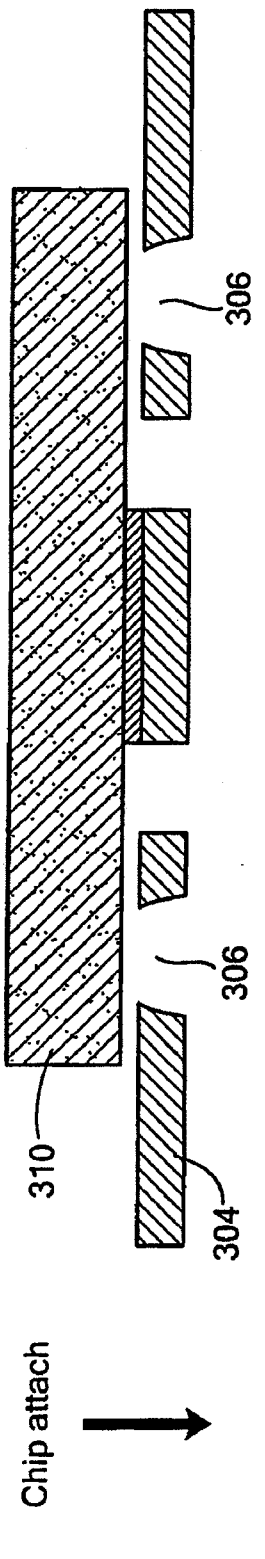


FIG. 3B

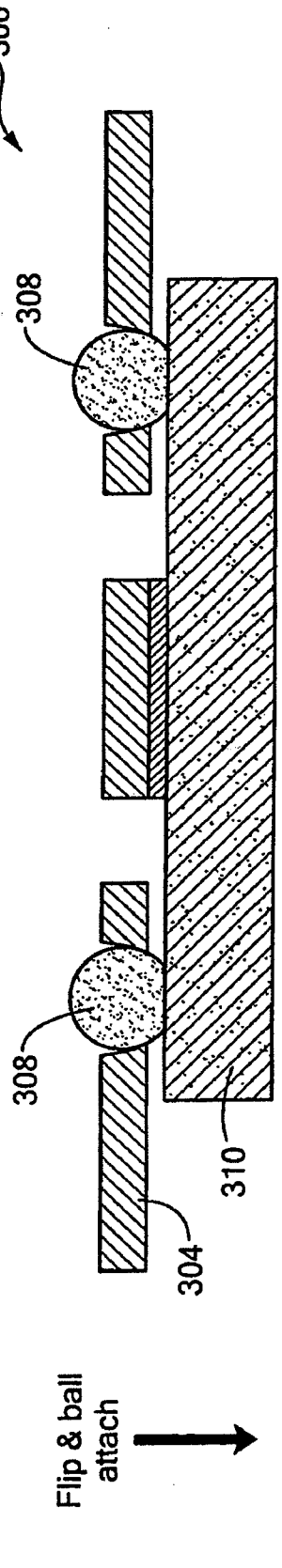


FIG. 3C

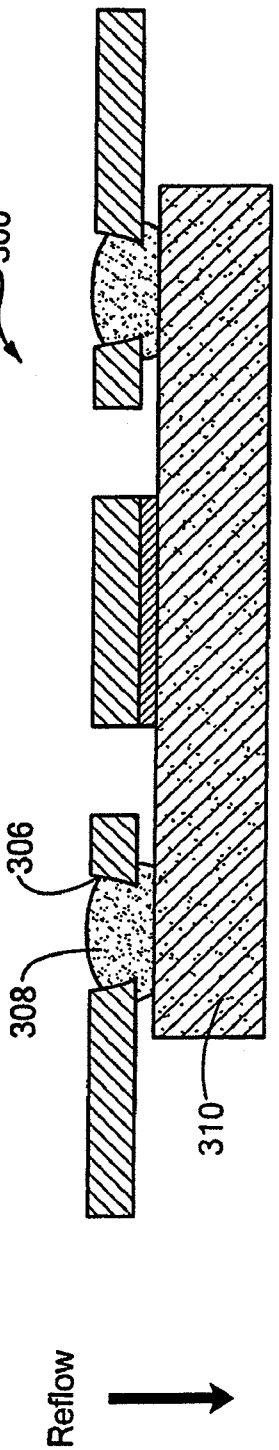


FIG. 3D

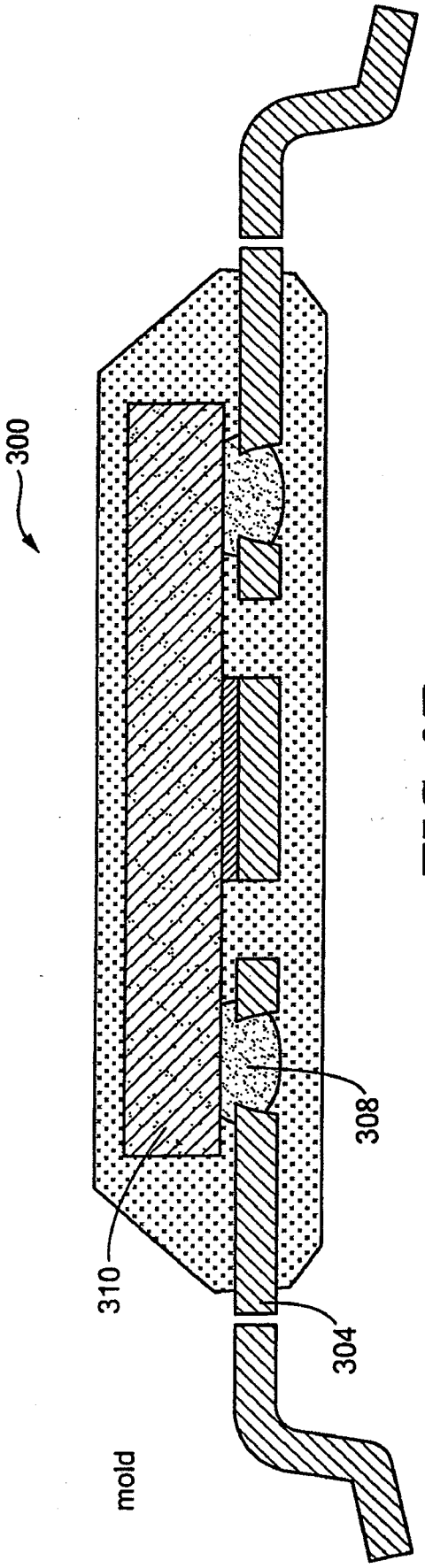


FIG. 3E

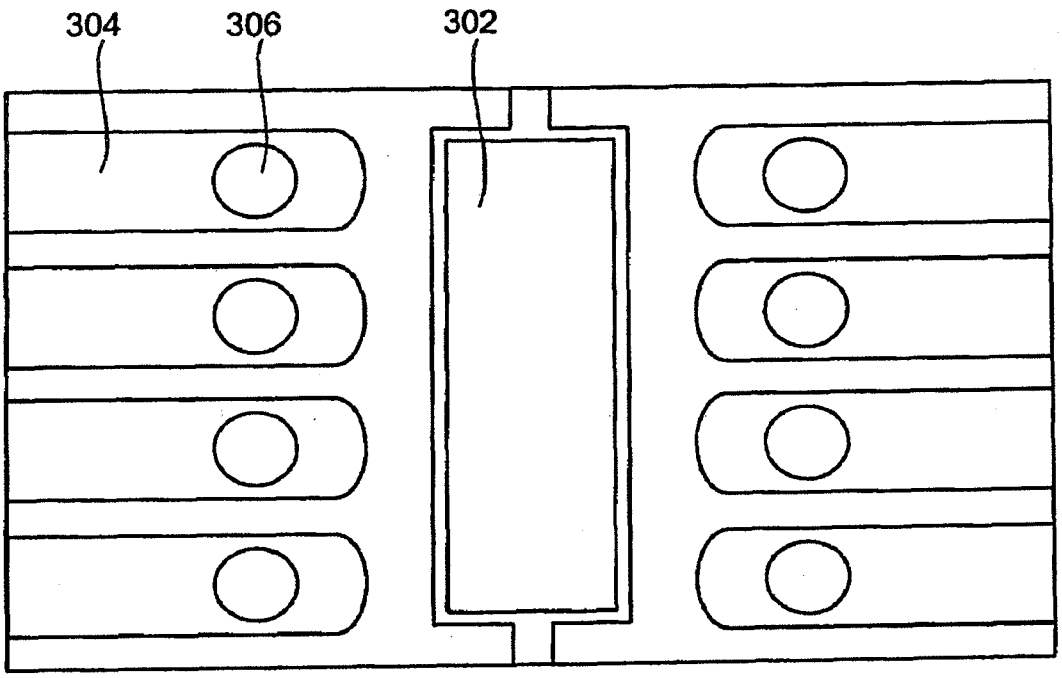


FIG. 3A1

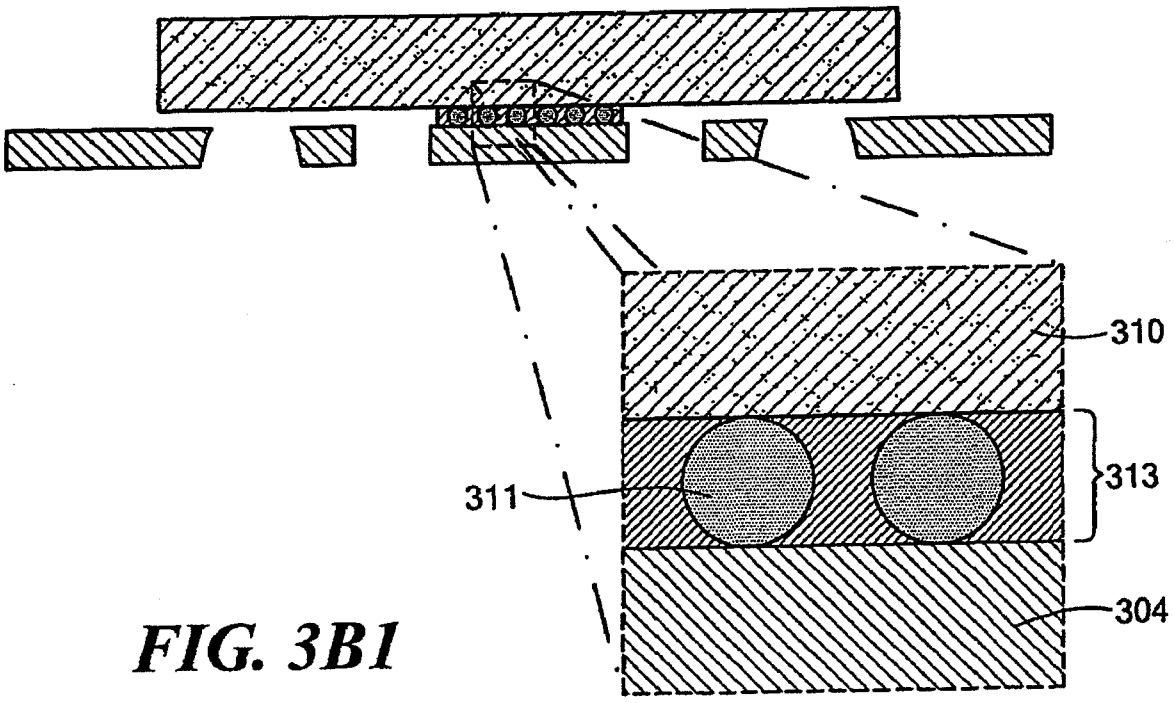


FIG. 3B1

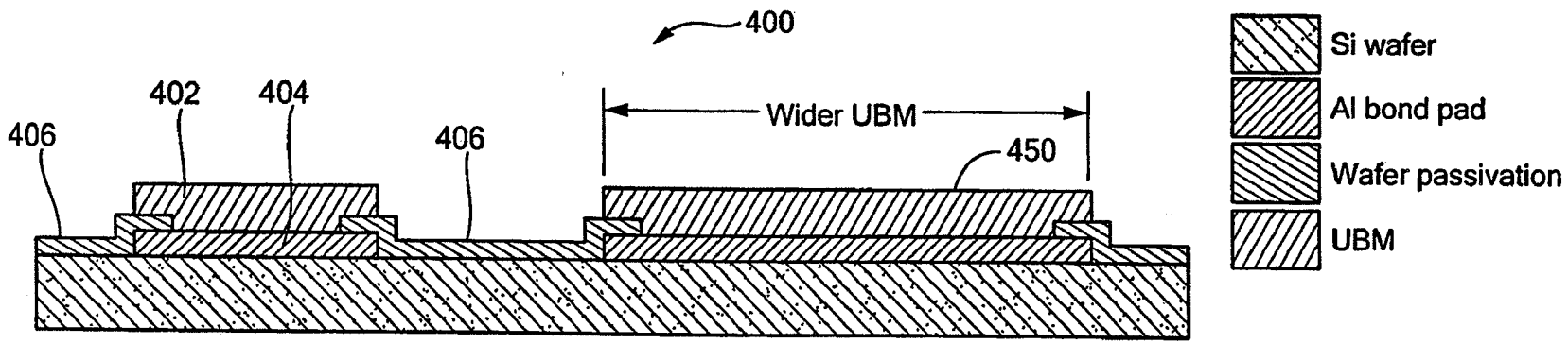

400
402
404
406
406
Wider UBM
450
Si wafer
Al bond pad
Wafer passivation
UBM

FIG. 4

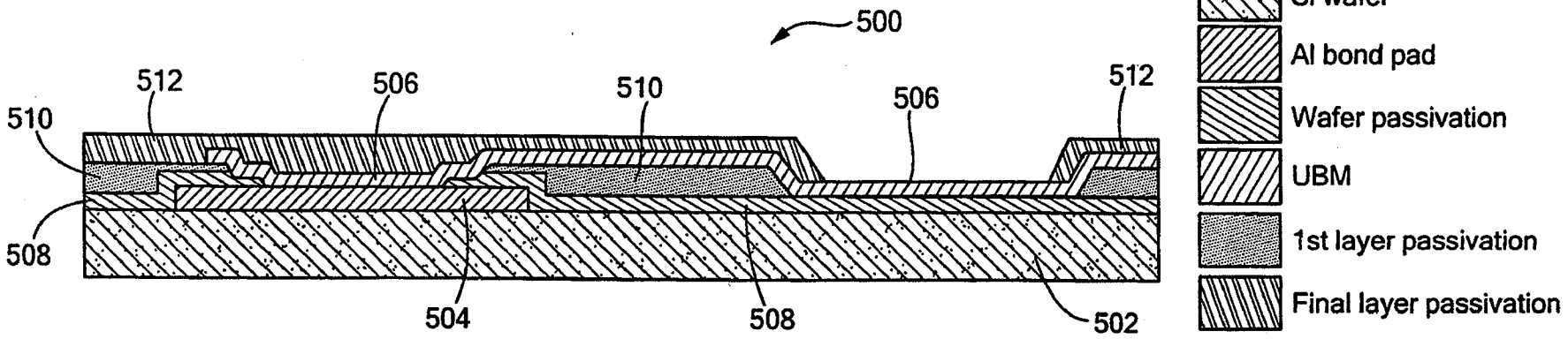

500
512
506
510
506
512
510
508
504
508
502
Si wafer
Al bond pad
Wafer passivation
UBM
1st layer passivation
Final layer passivation

FIG. 5