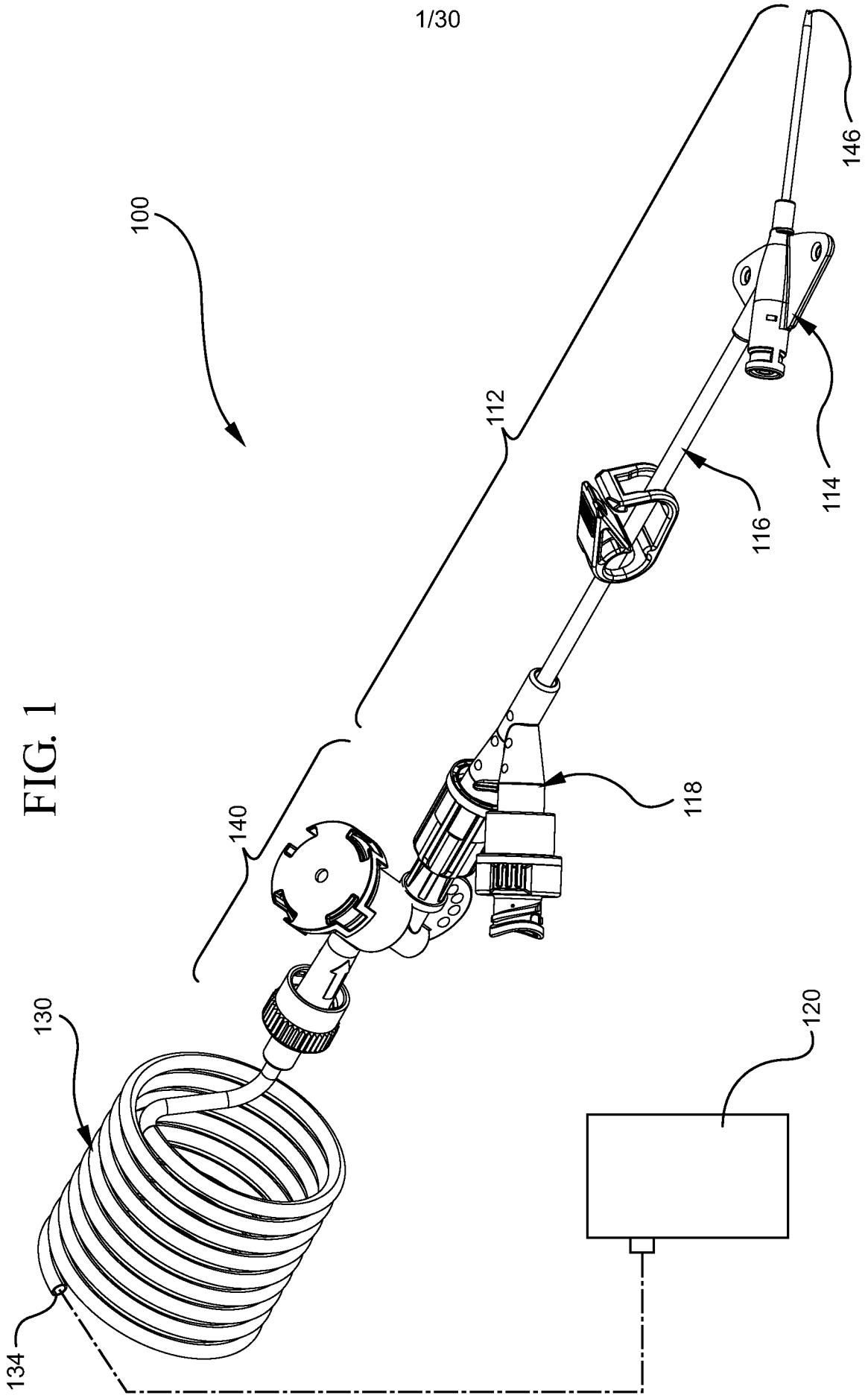
FIG. 1



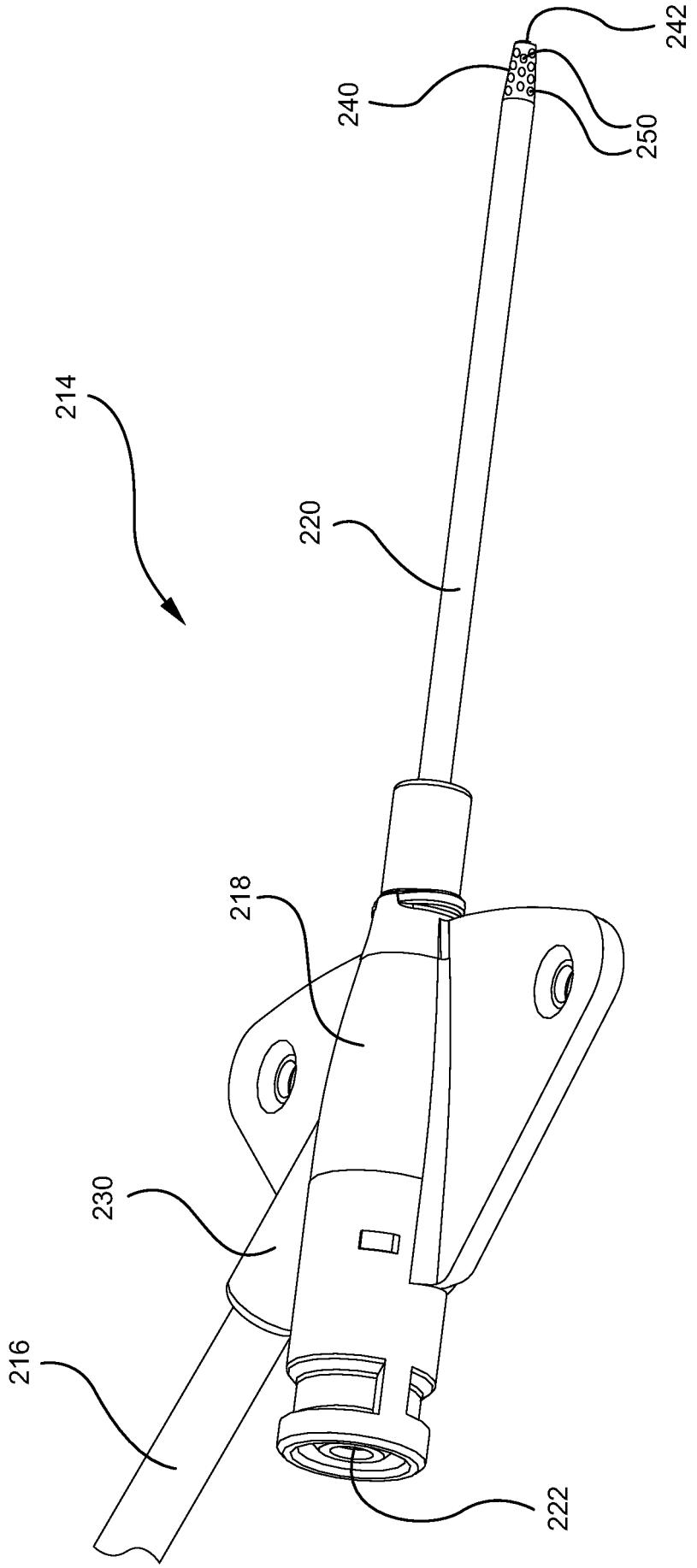



FIG. 2

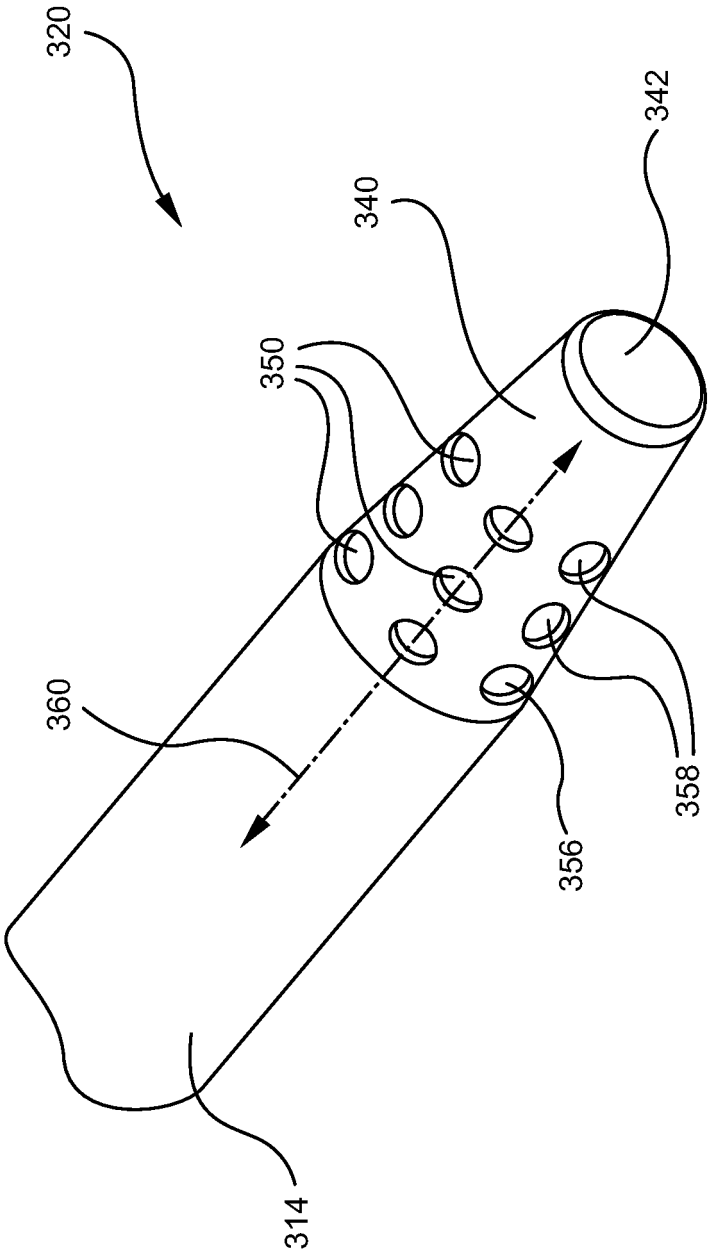



FIG. 3A

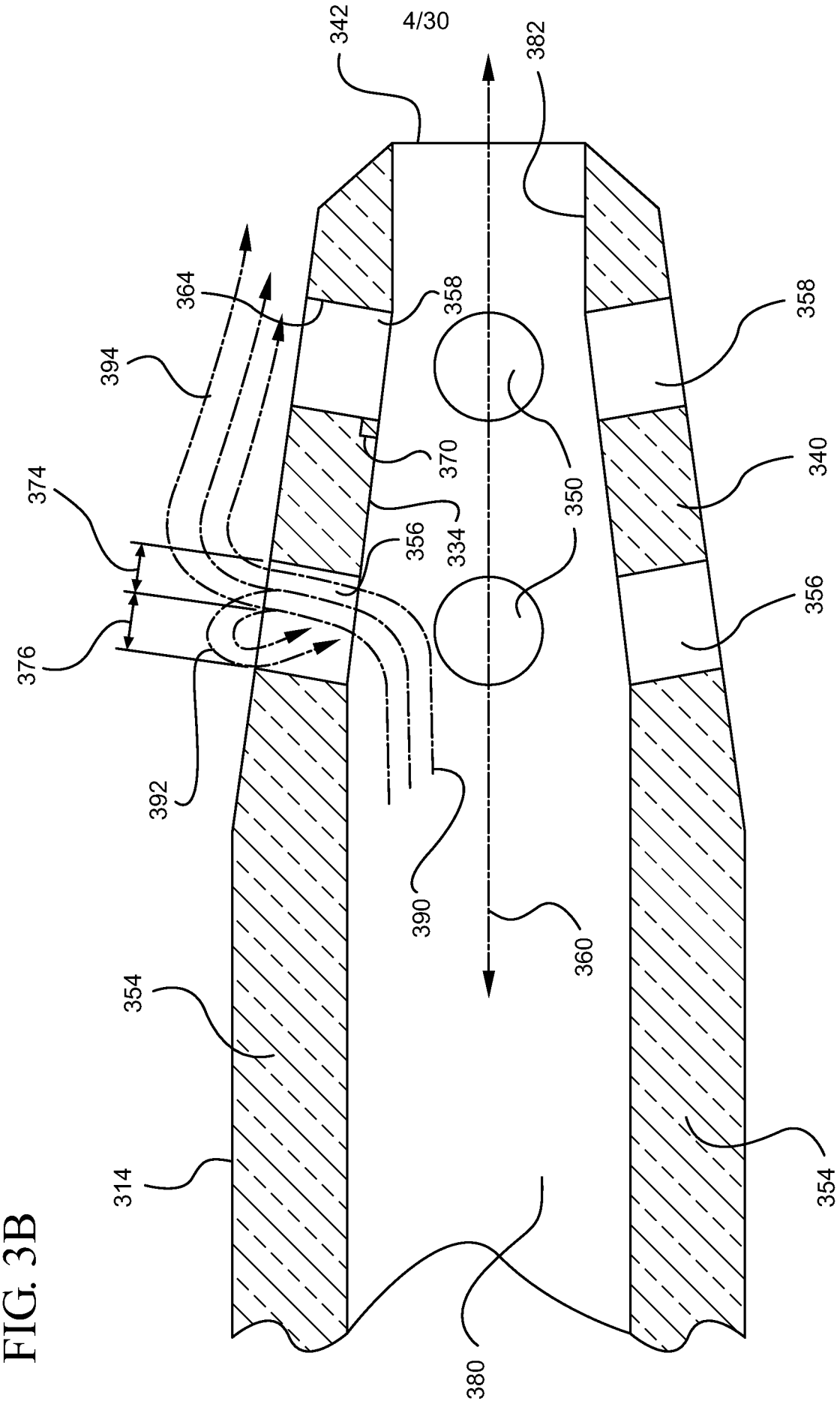

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354
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FIG. 3B

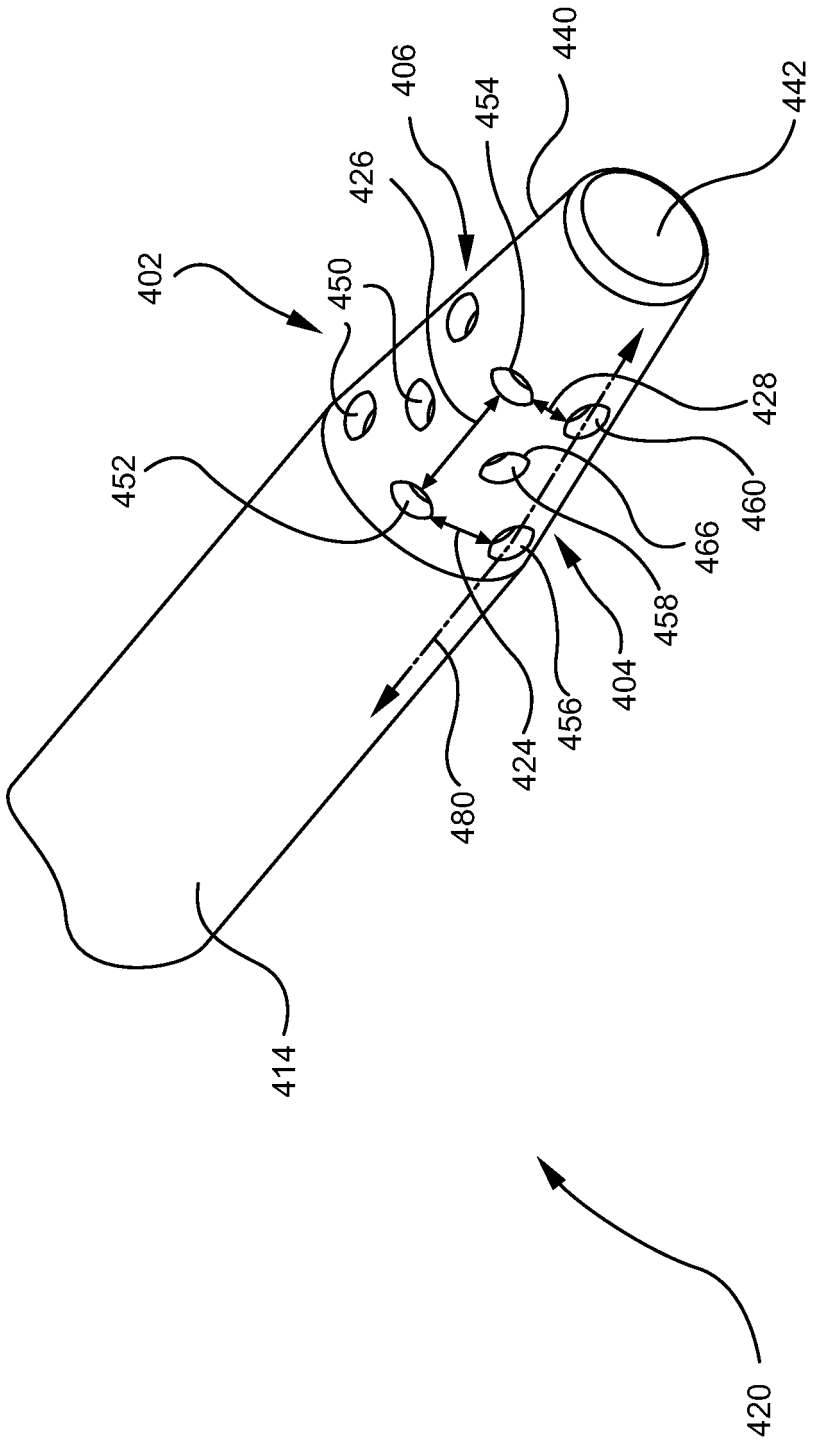

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FIG. 4A

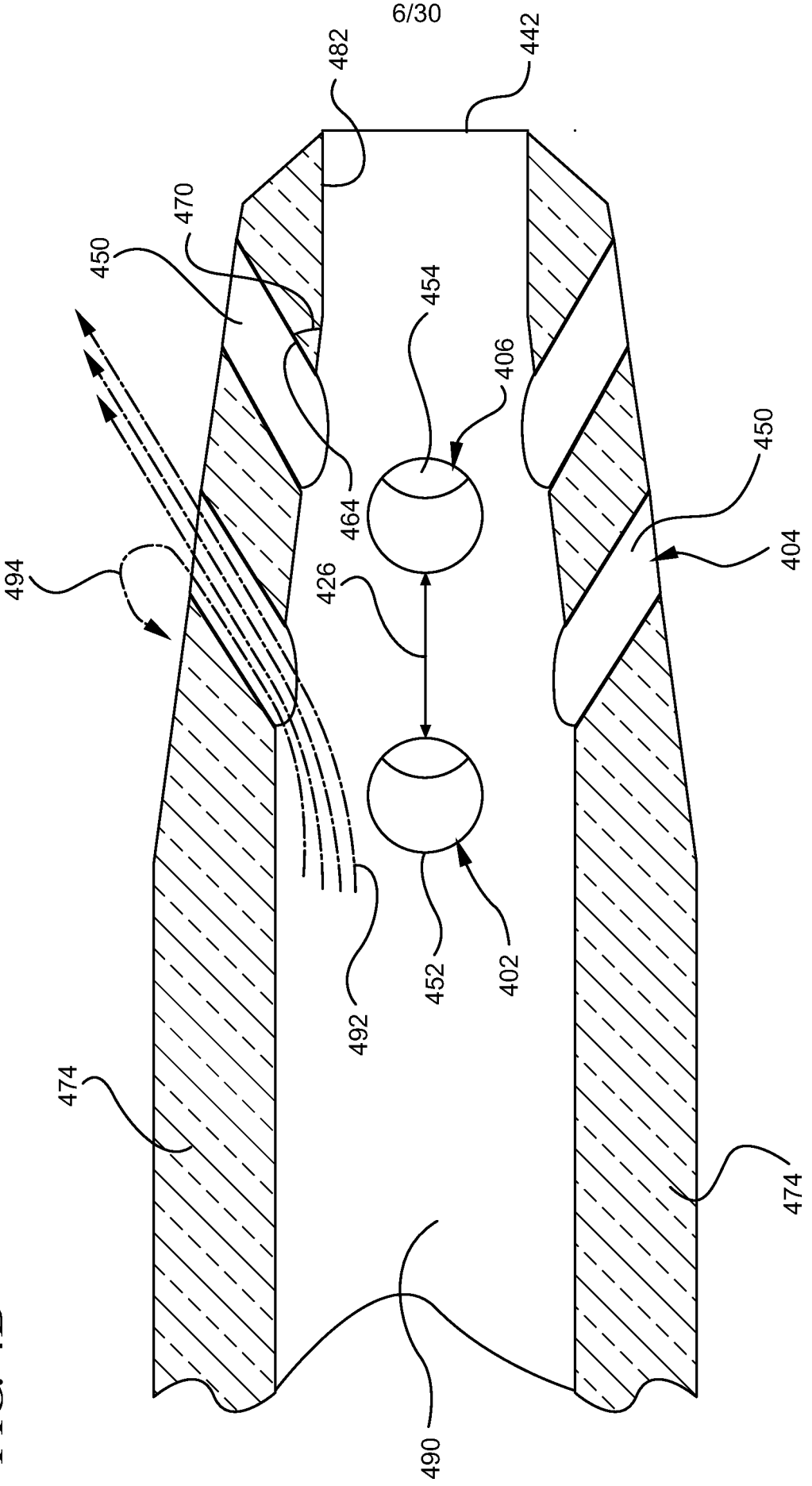

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474
490

FIG. 4B

FIG. 5

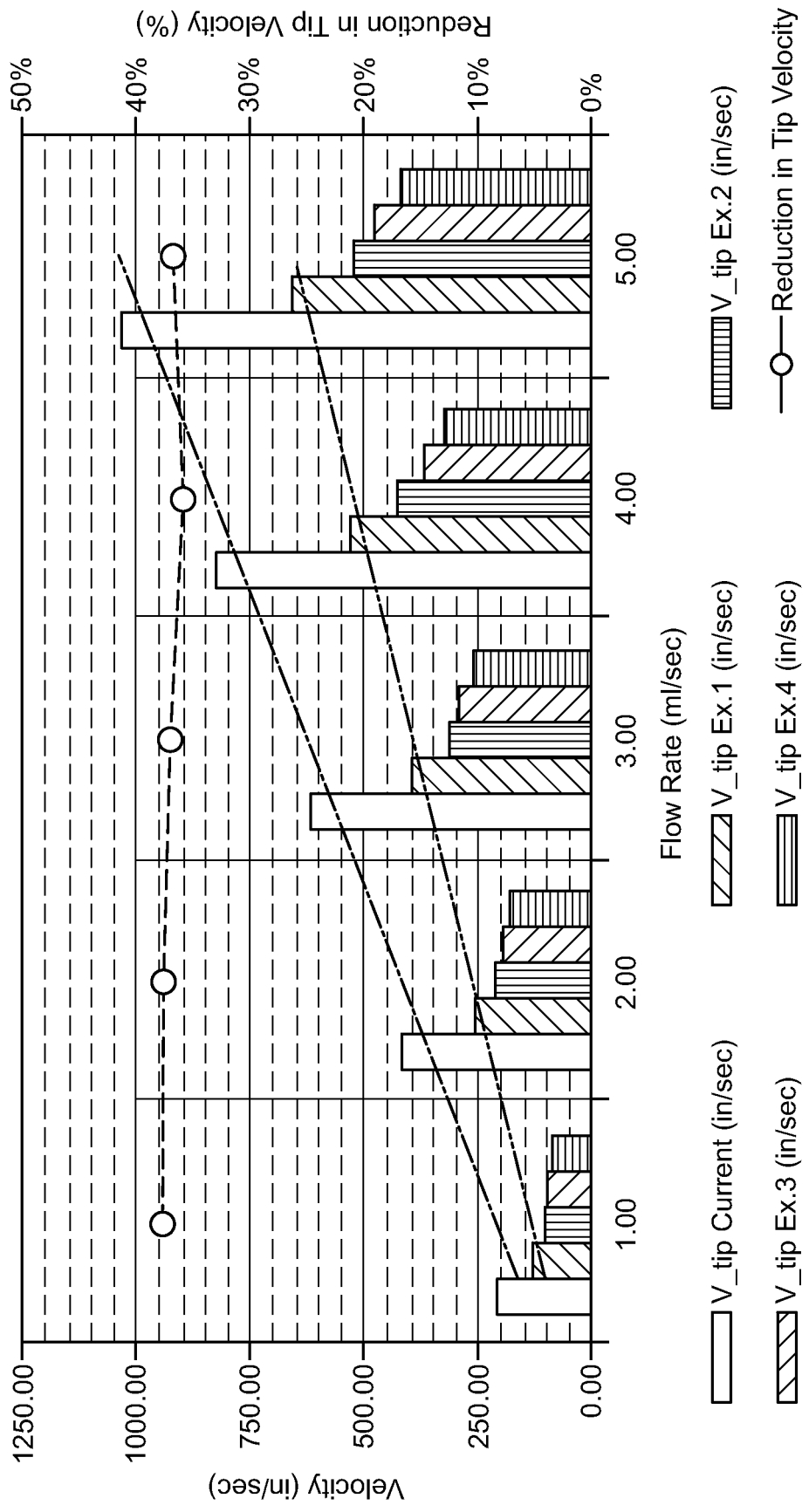
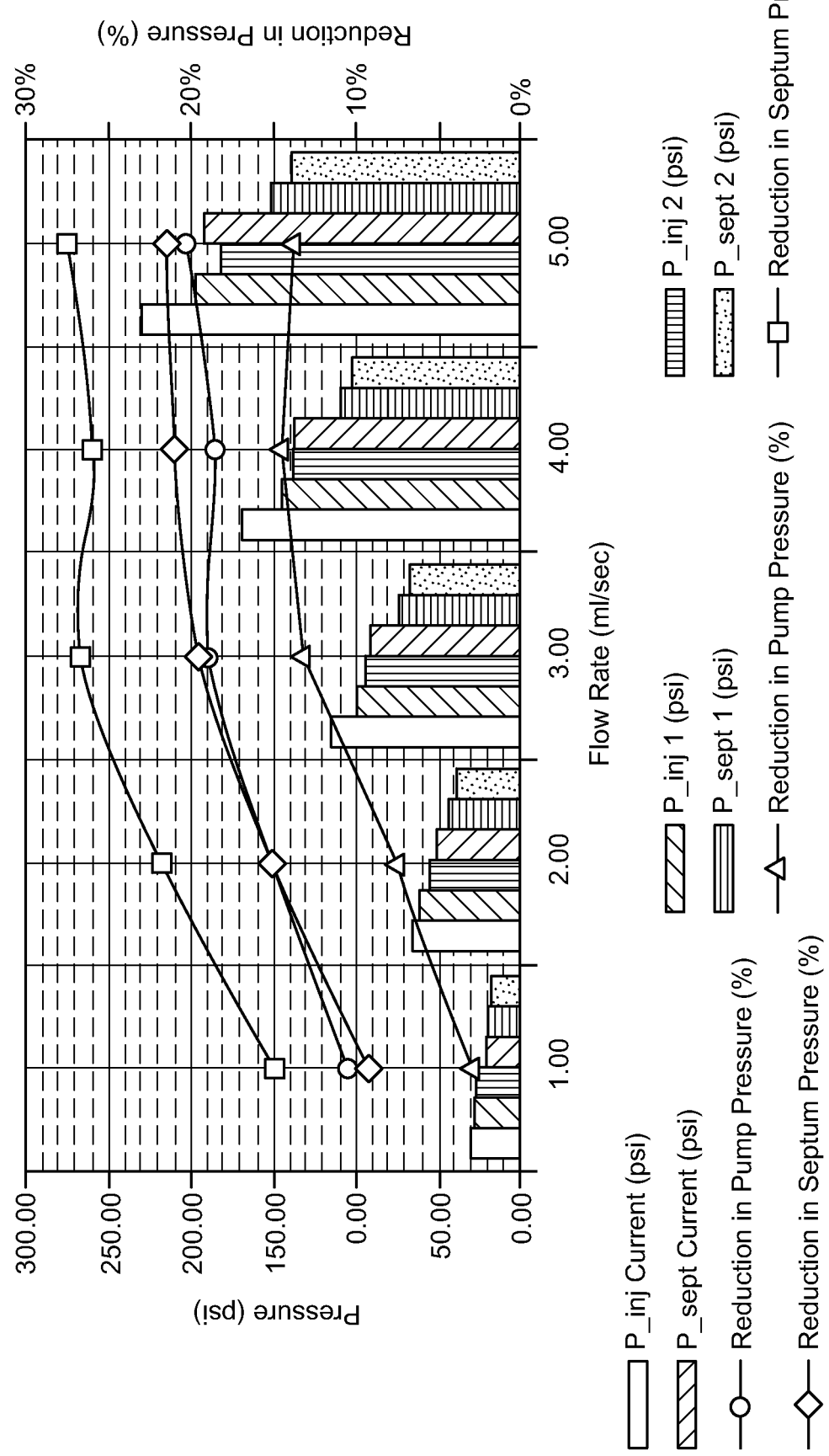

Reduction in Tip Velocity (%)
50%
40%
30%
20%
10%
0%
Velocity (in/sec)
1250.00
1000.00
750.00
500.00
250.00
0.00
1.00
2.00
3.00
4.00
5.00
Flow Rate (ml/sec)
V_tip Current (in/sec)
V_tip Ex.1 (in/sec)
V_tip Ex.2 (in/sec)
V_tip Ex.3 (in/sec)
V_tip Ex.4 (in/sec)
Reduction in Tip Velocity

FIG. 6


Reduction in Pressure (%)
30%
20%
10%
0%
Pressure (psi)
300.00
250.00
200.00
150.00
0.00
50.00
0.00
1.00
2.00
3.00
4.00
5.00
Flow Rate (ml/sec)
P_inj Current (psi)
P_sept Current (psi)
Reduction in Pump Pressure (%)
Reduction in Septum Pressure (%)
P_inj 1 (psi)
P_sept 1 (psi)
Reduction in Pump Pressure (%)
P_inj 2 (psi)
P_sept 2 (psi)
Reduction in Septum Pressure (%)

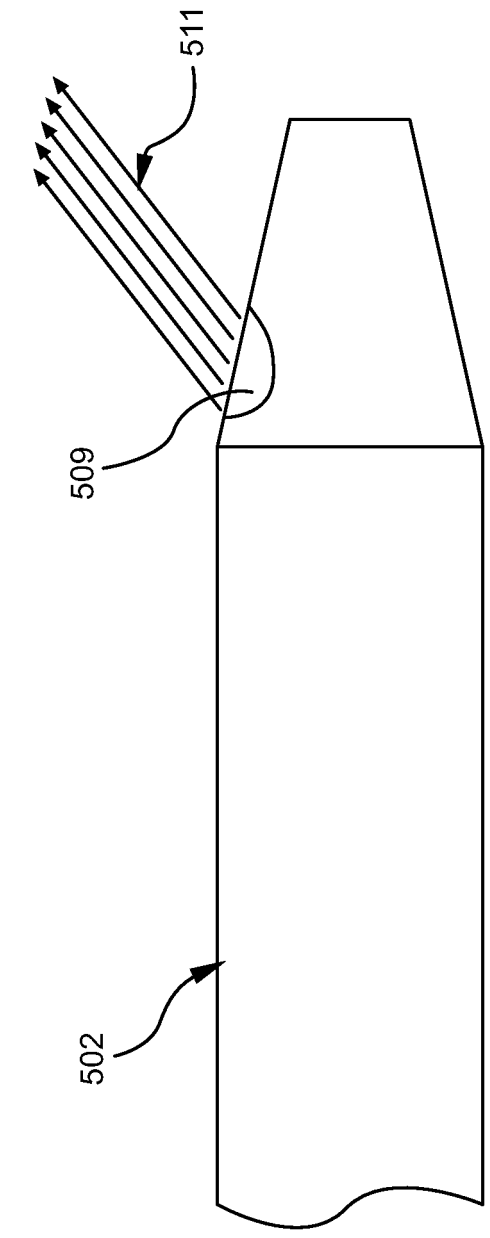



FIG. 7A

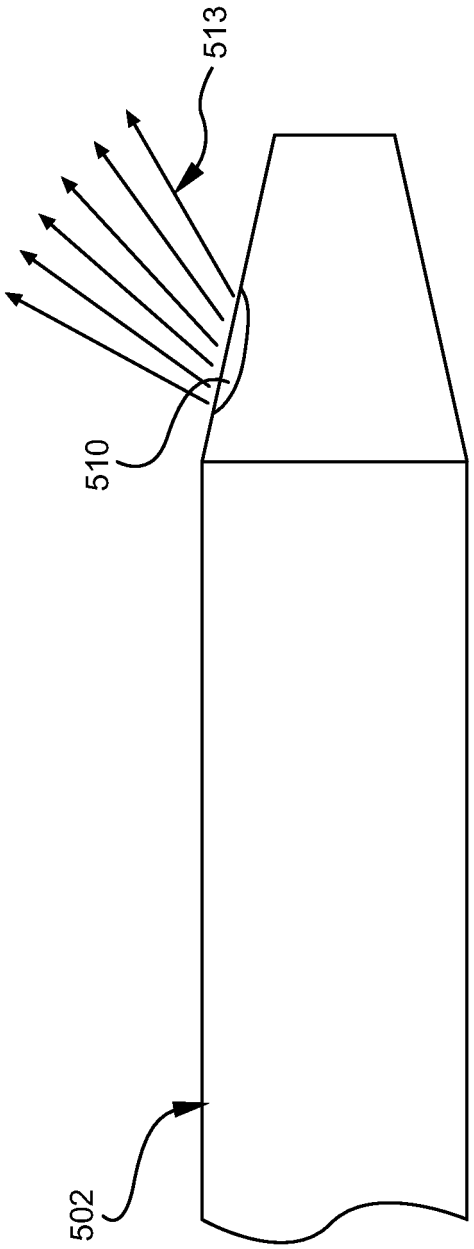



FIG. 7B

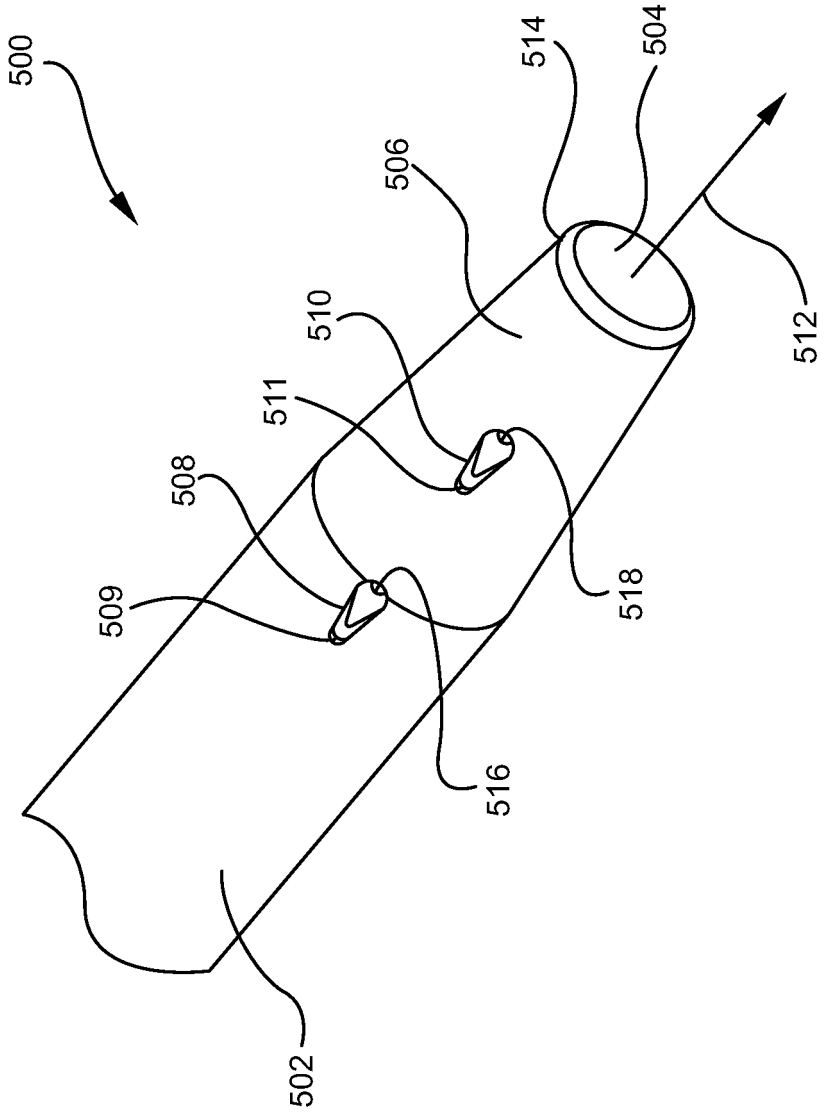



FIG. 8

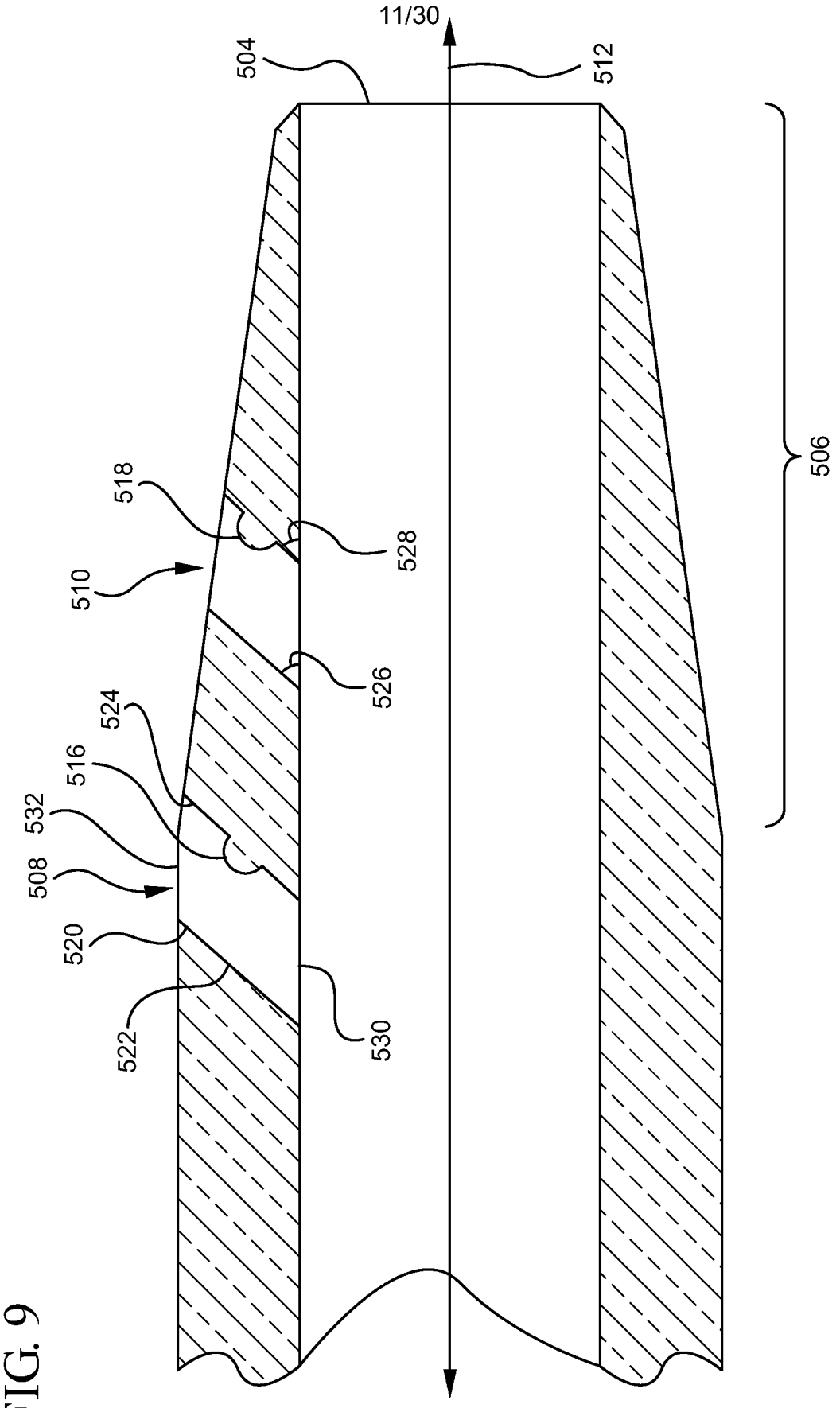



FIG. 9

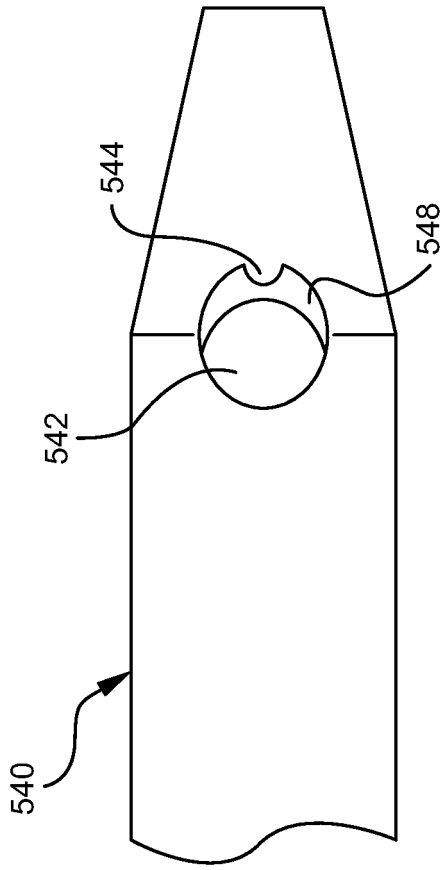



FIG. 10A

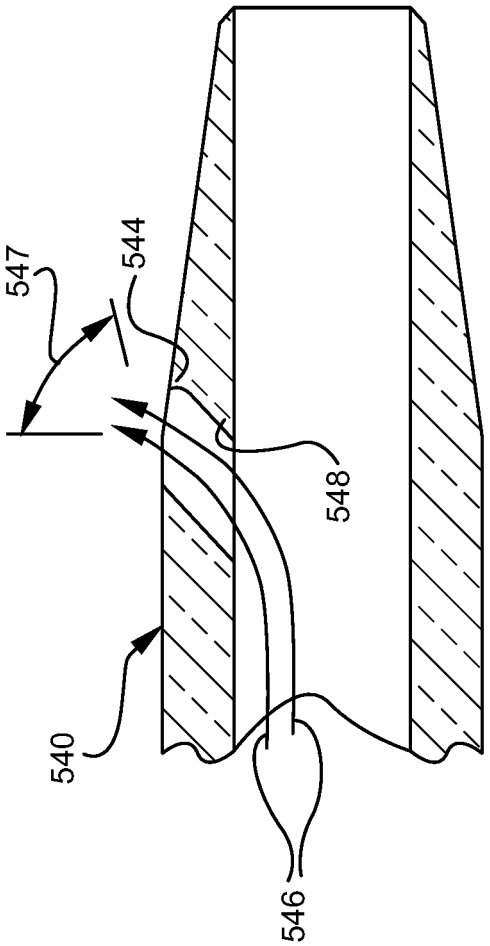



FIG. 10B

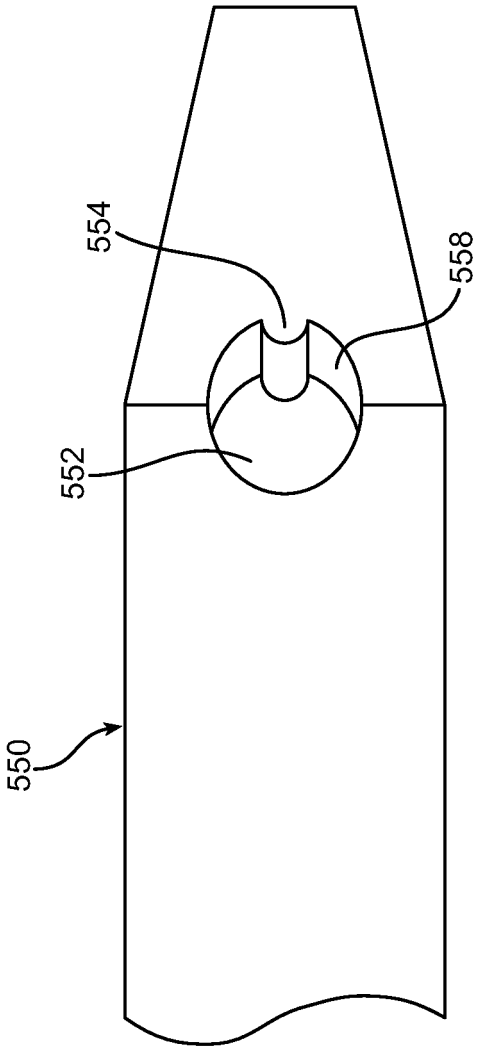



FIG. 11A

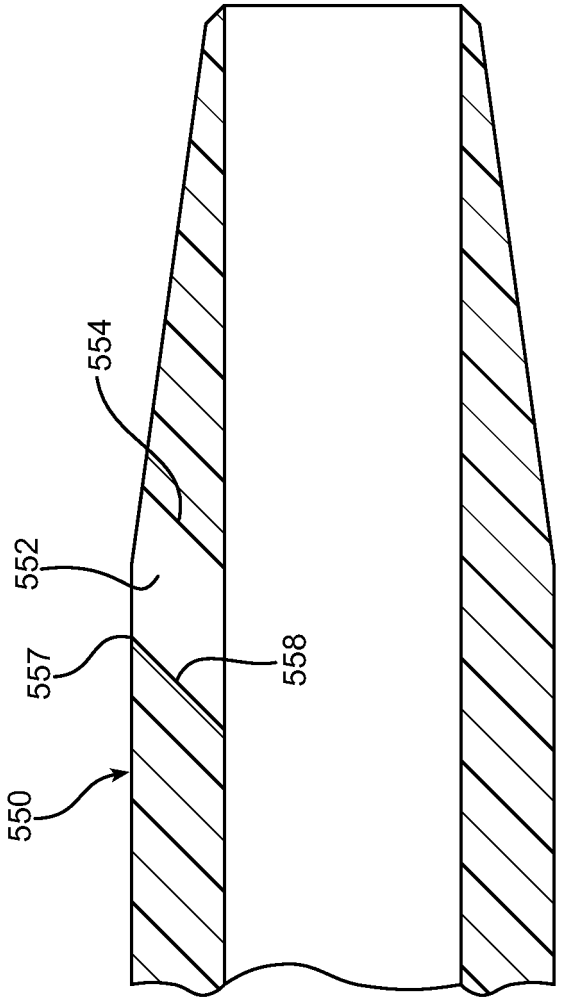



FIG. 11B

FIG. 12

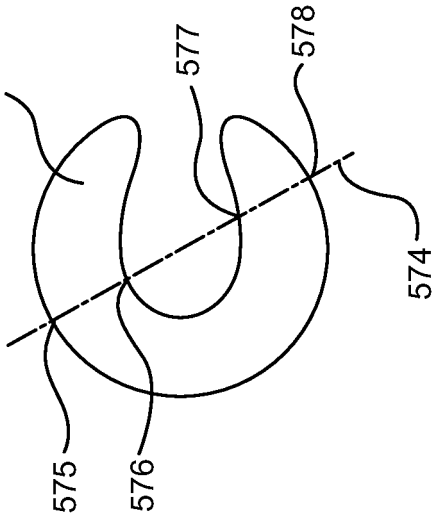



FIG. 13

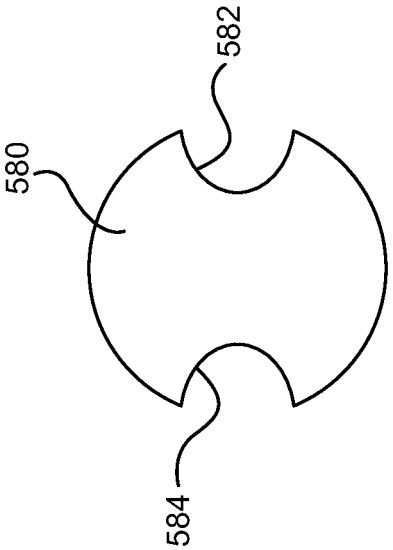



FIG. 14

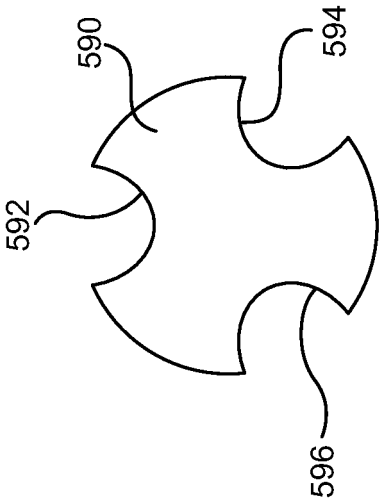



FIG. 15

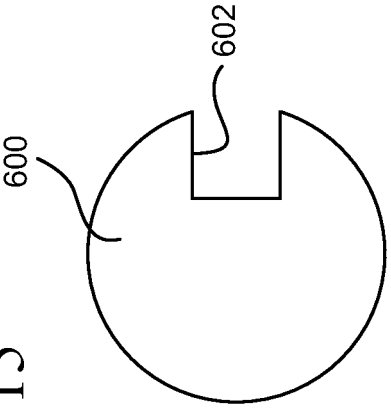
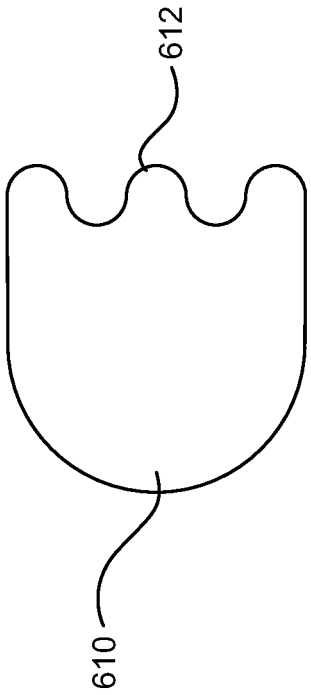



FIG. 16



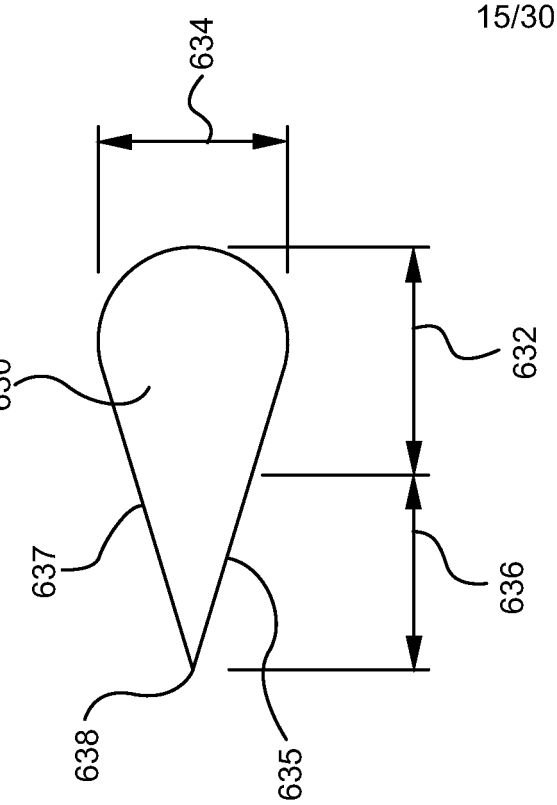



FIG. 18

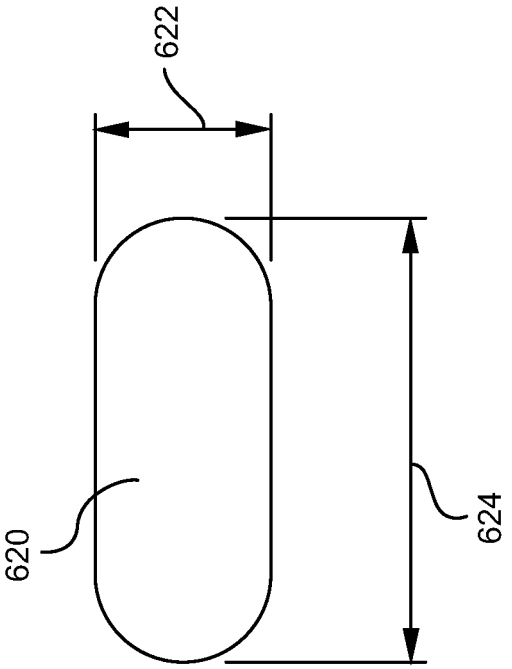



FIG. 17

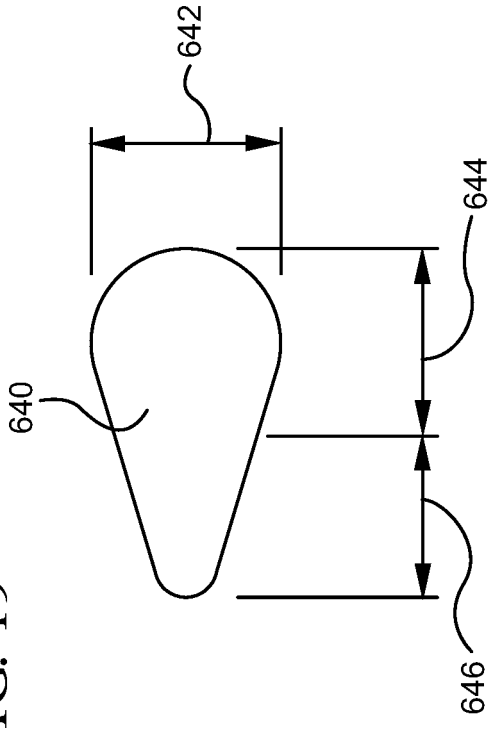



FIG. 19

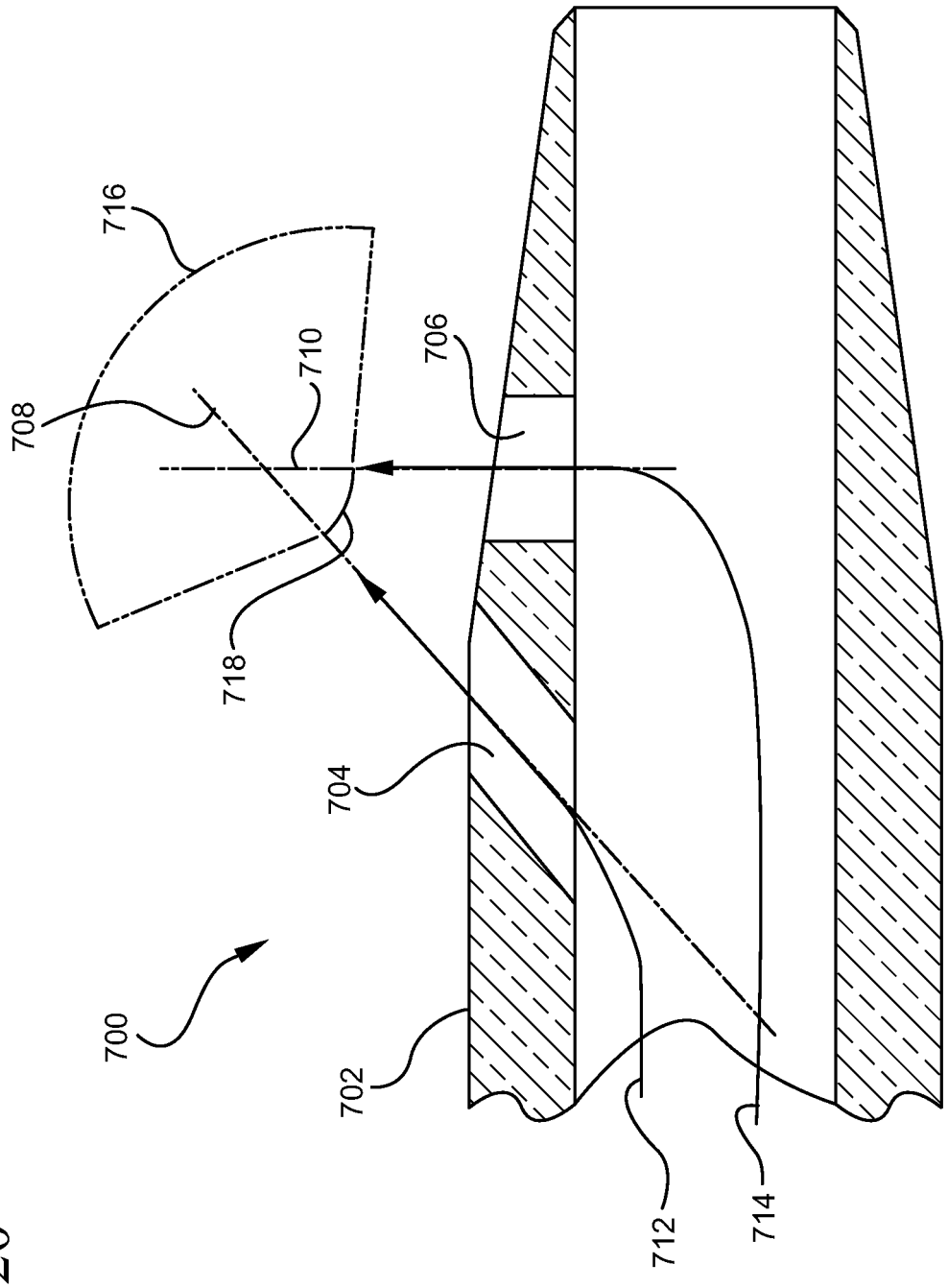



FIG. 20

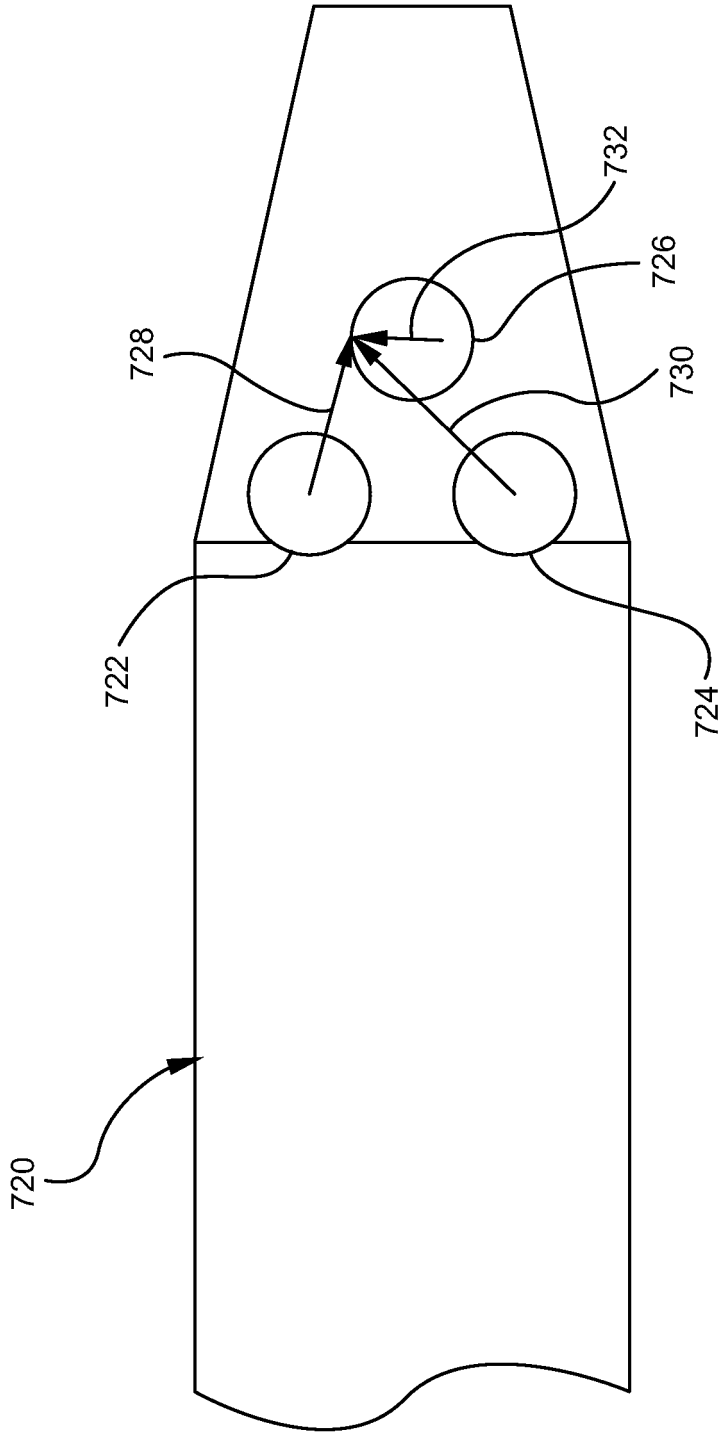



FIG. 21

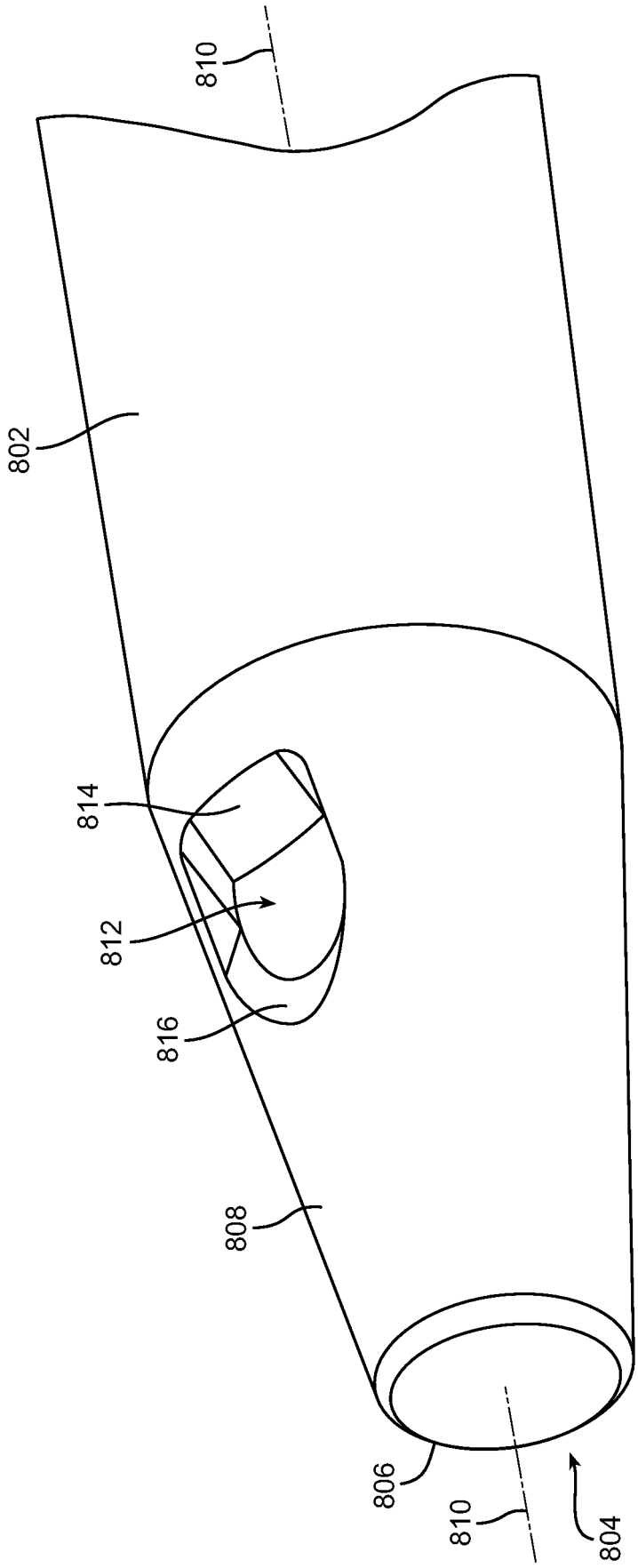



FIG. 22

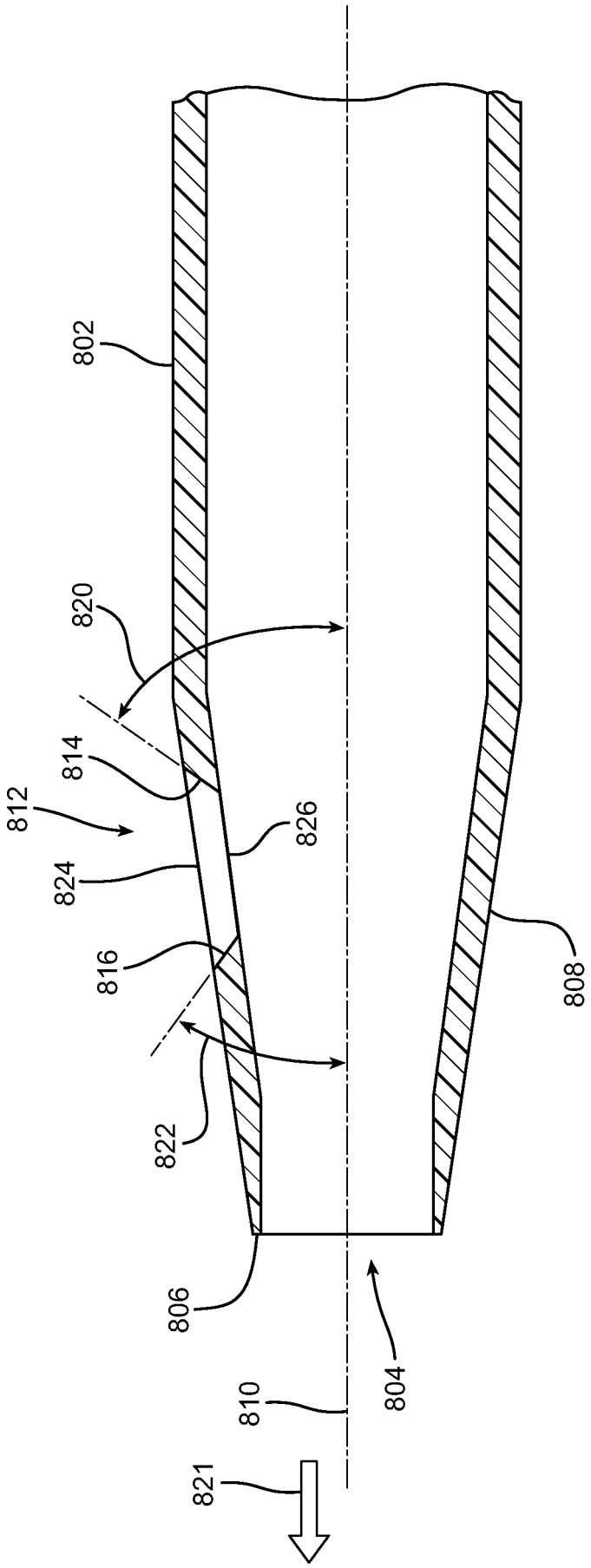



FIG. 23

FIG. 24A

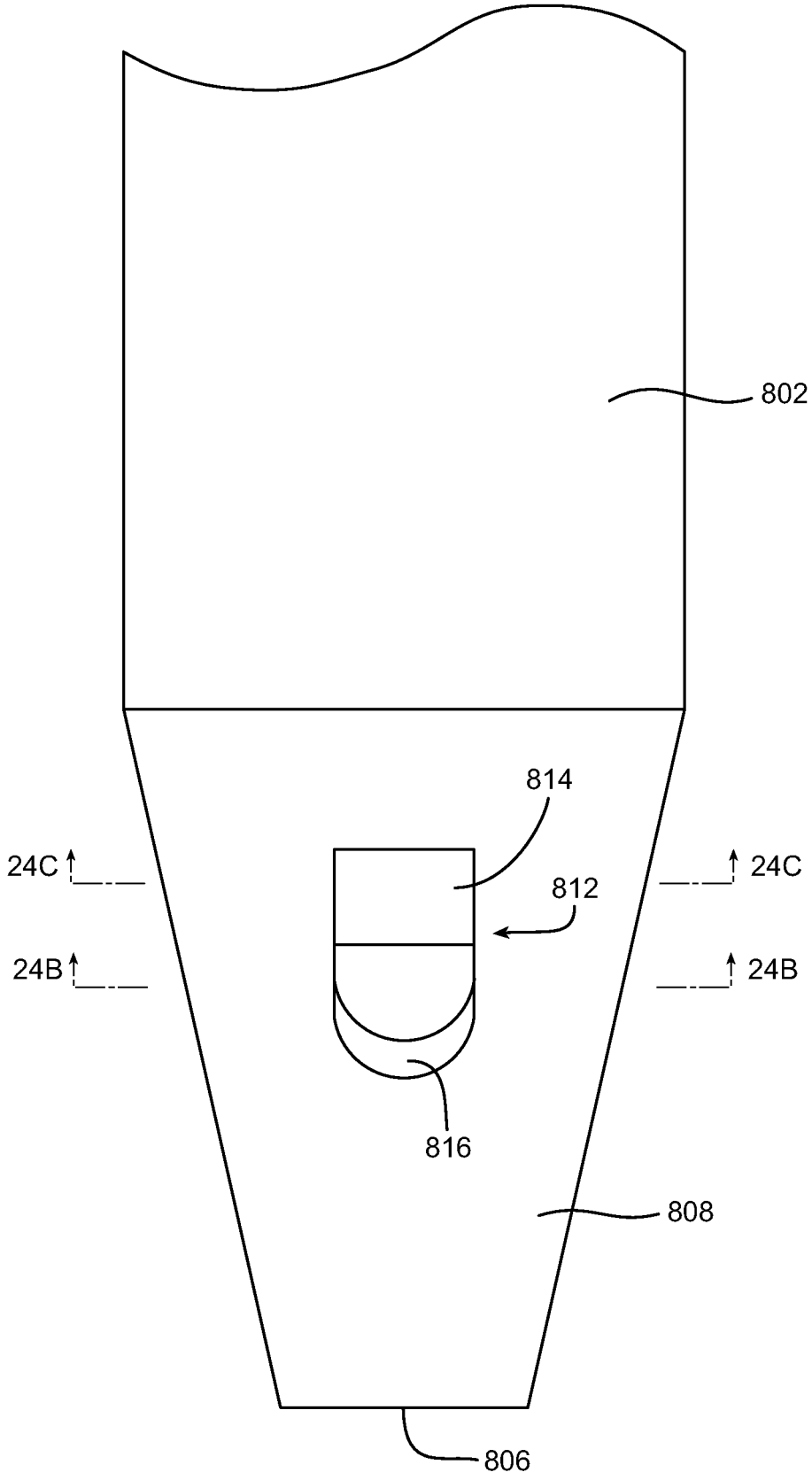


FIG. 24B

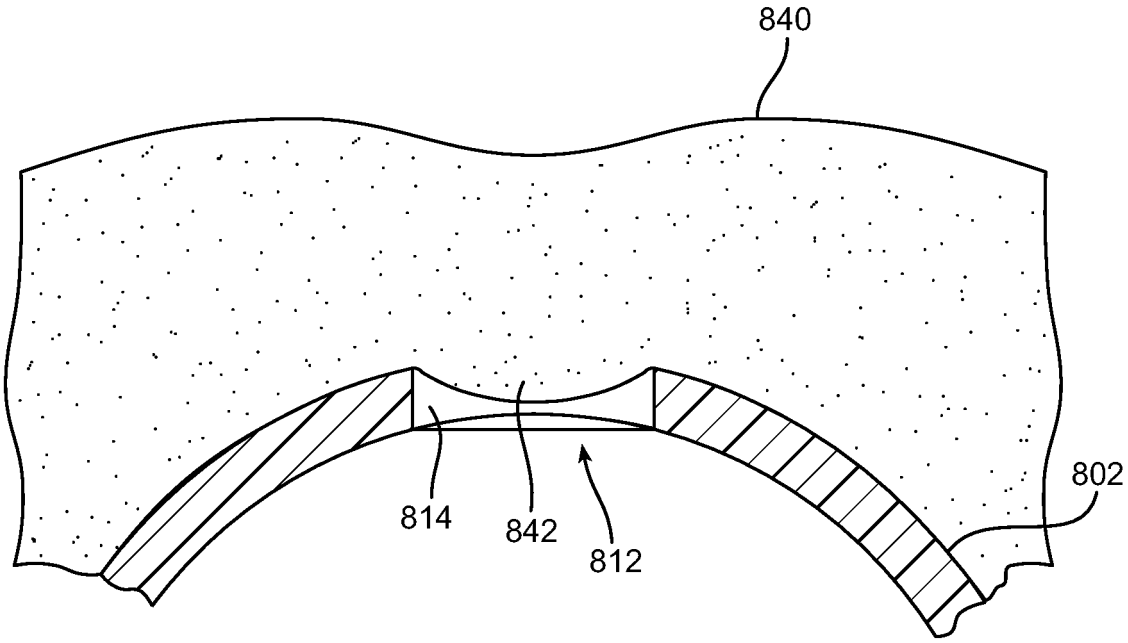
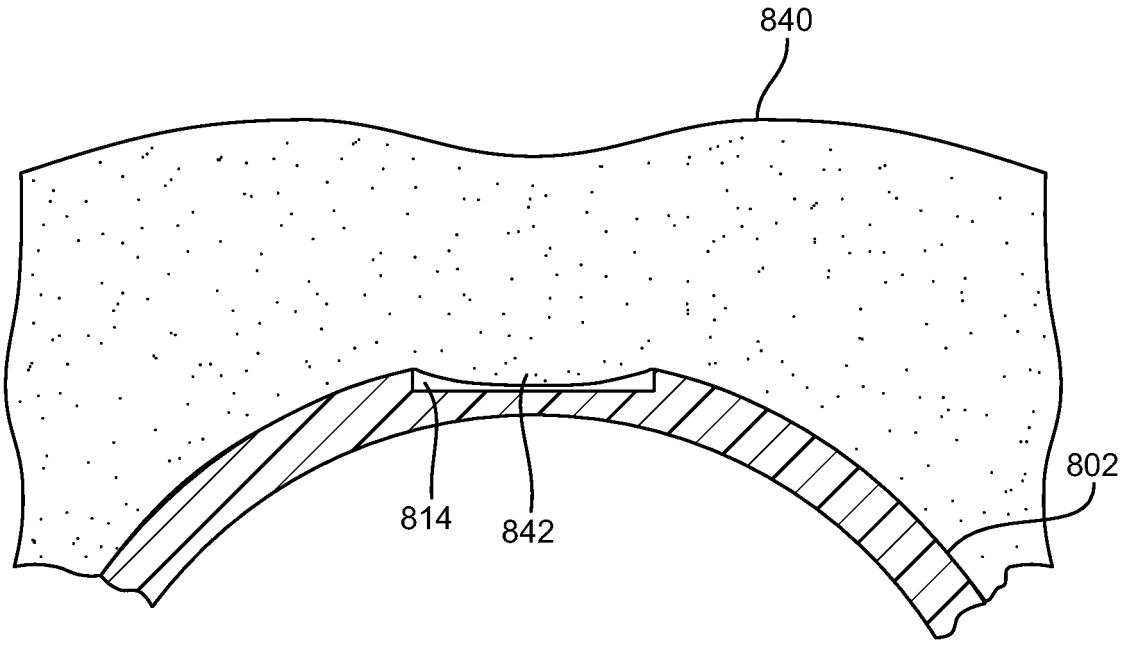



FIG. 24C



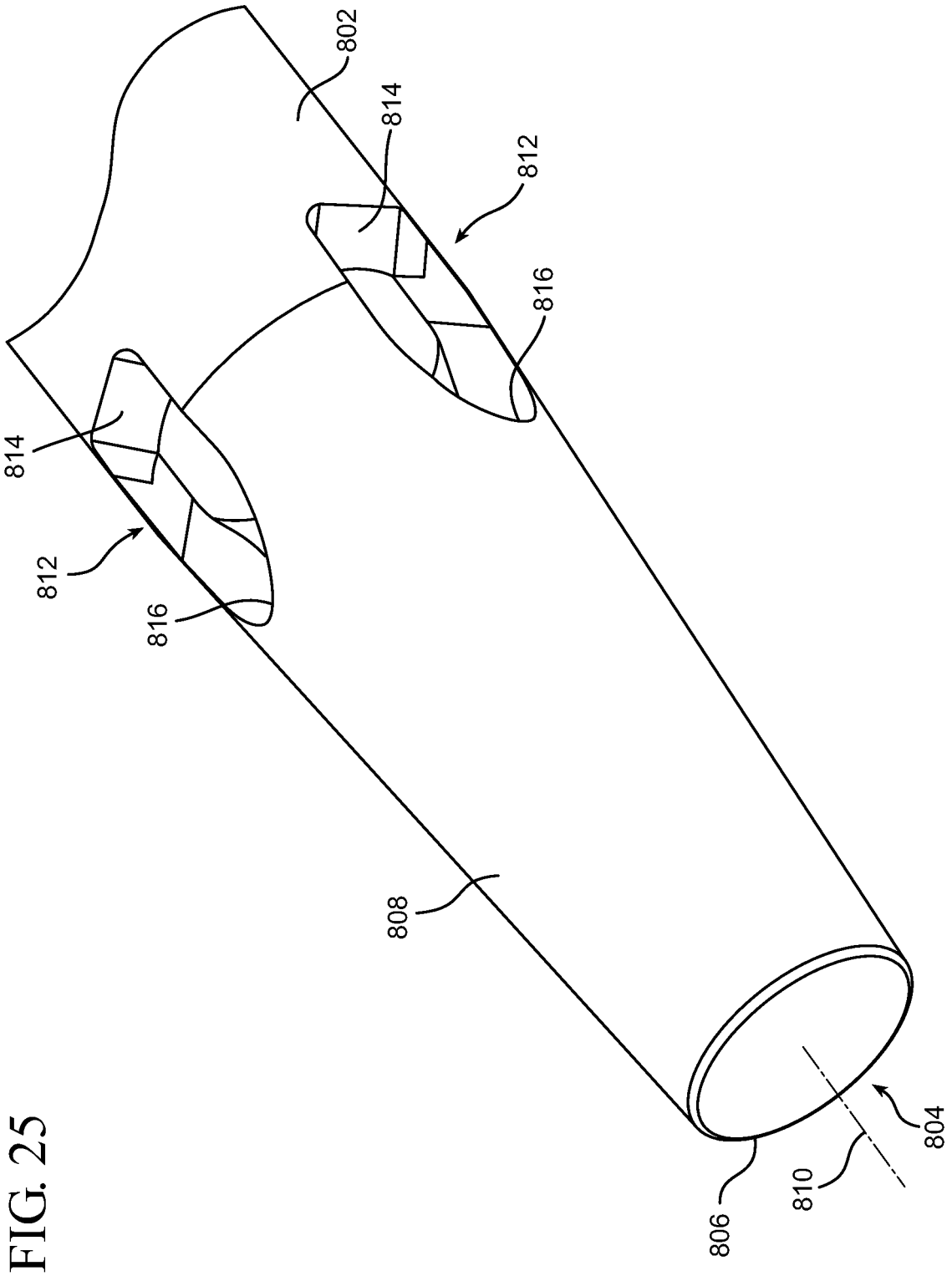



FIG. 25

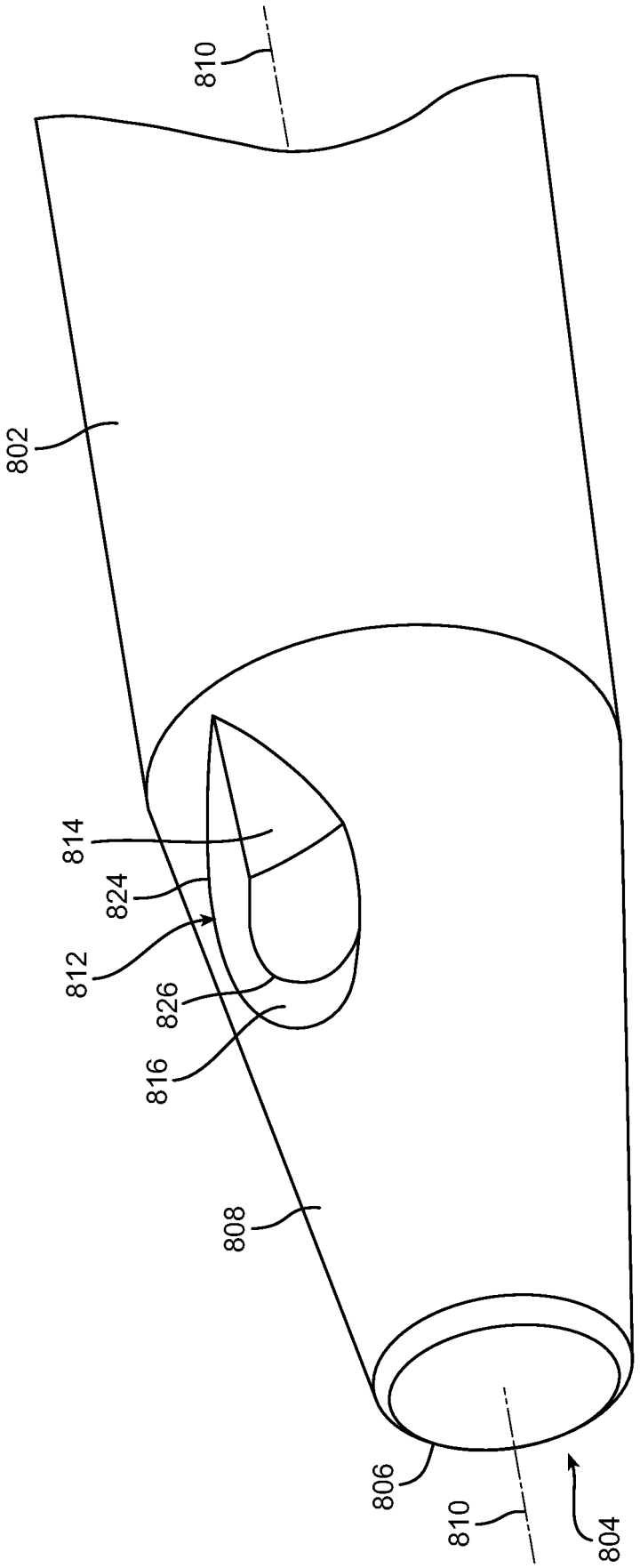



FIG. 26

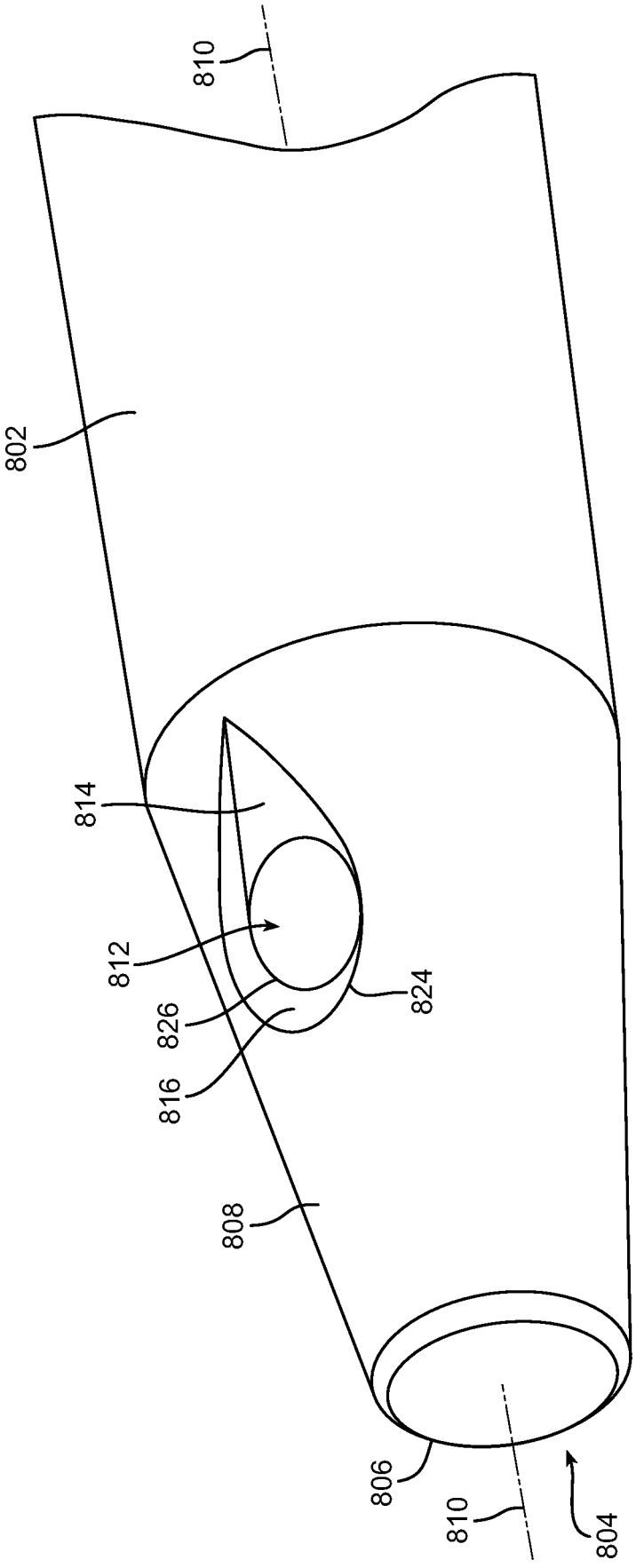



FIG. 27

FIG. 28A

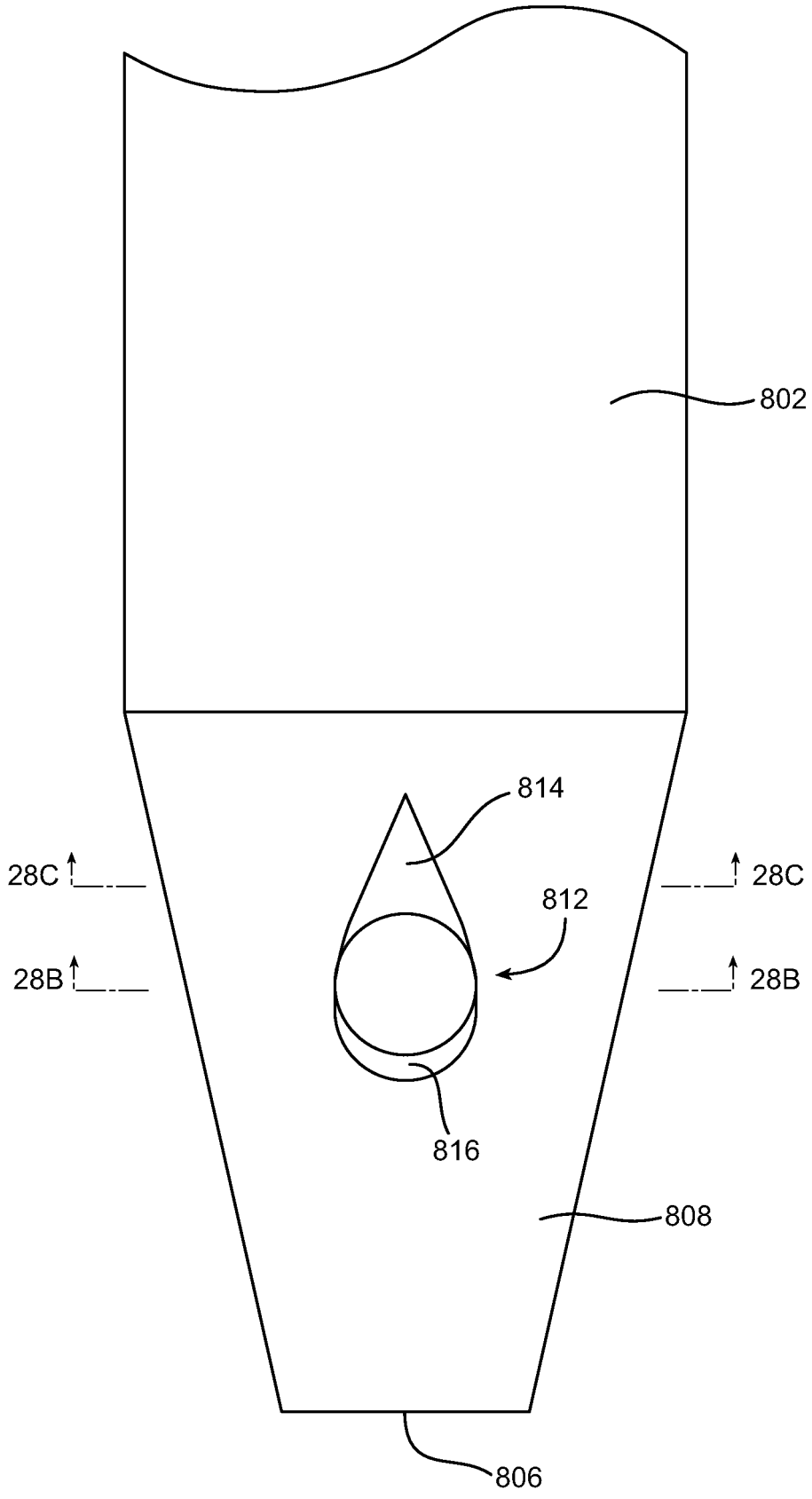


FIG. 28B

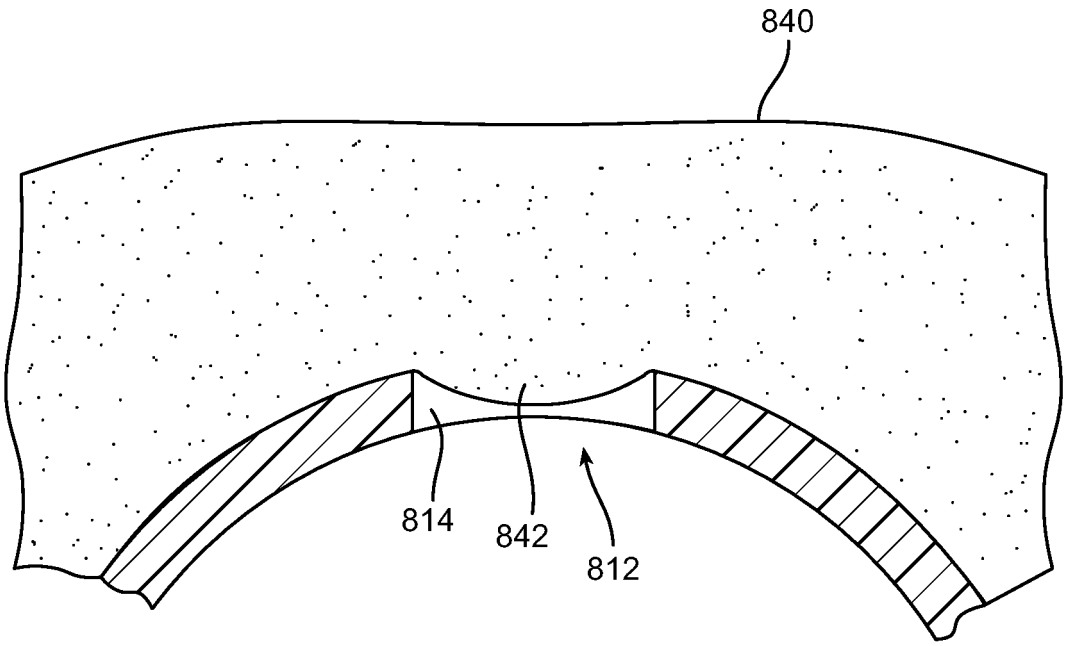
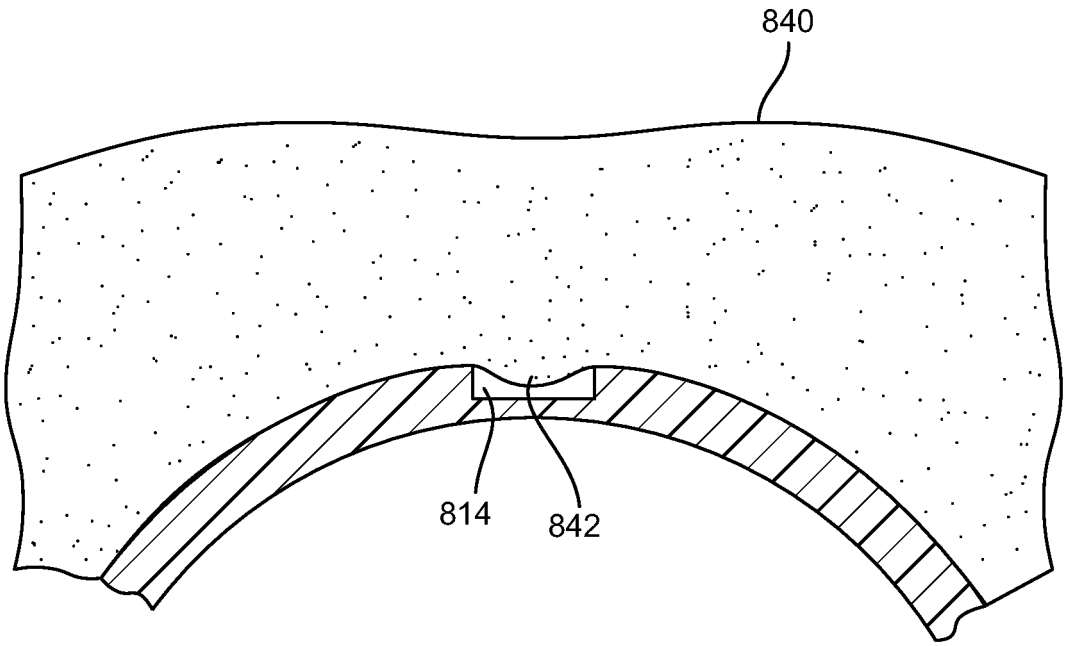



FIG. 28C



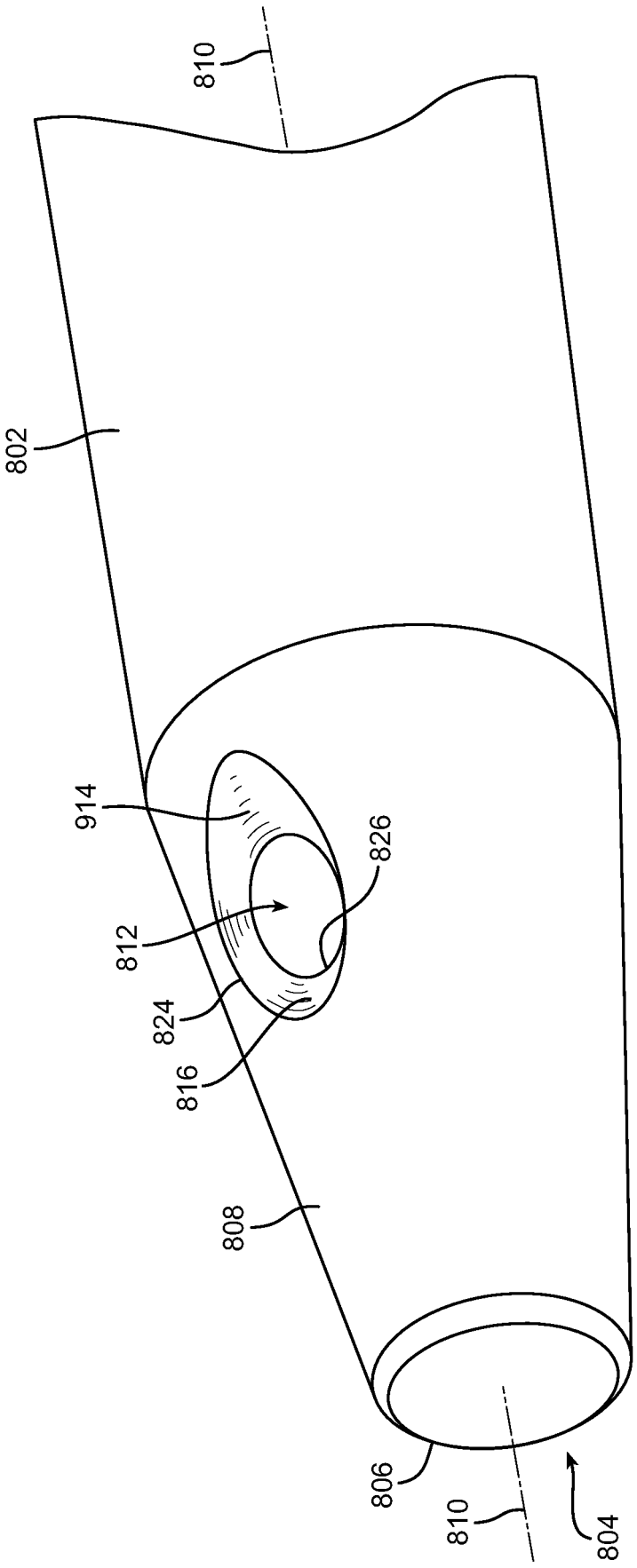



FIG. 29

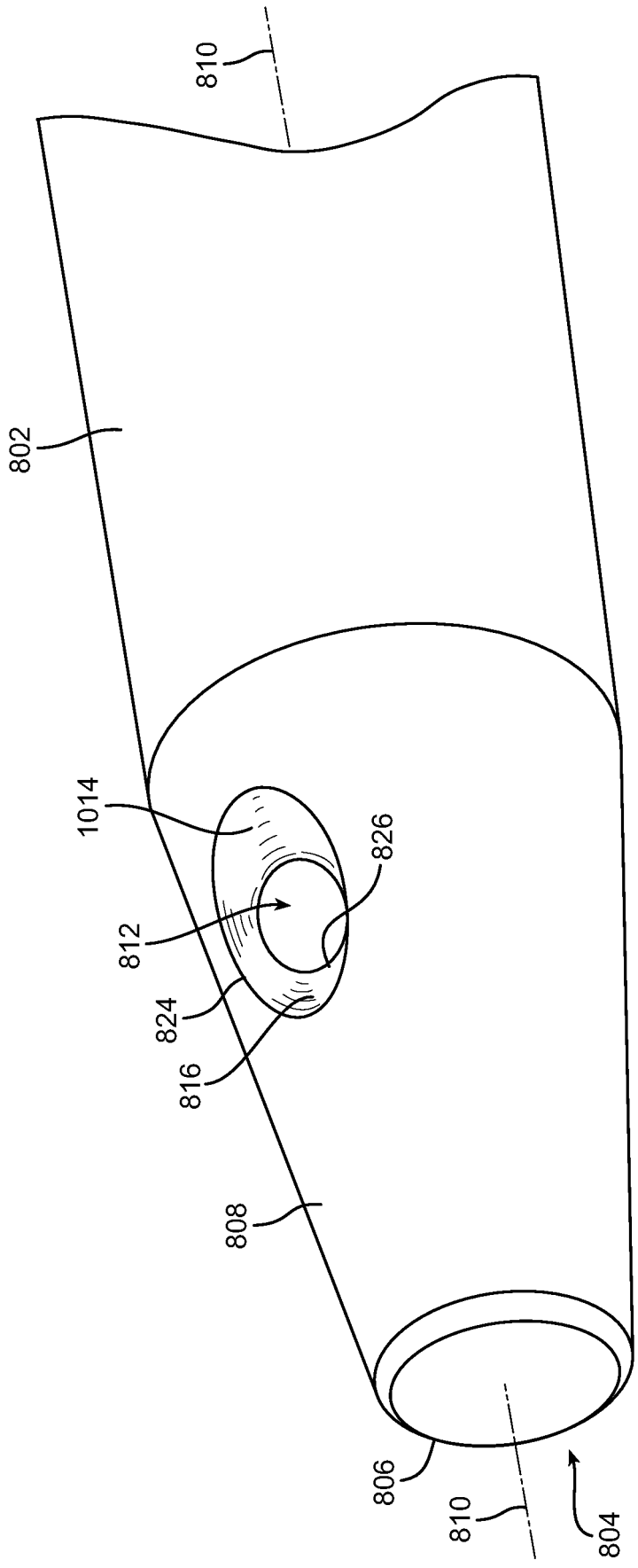



FIG. 30

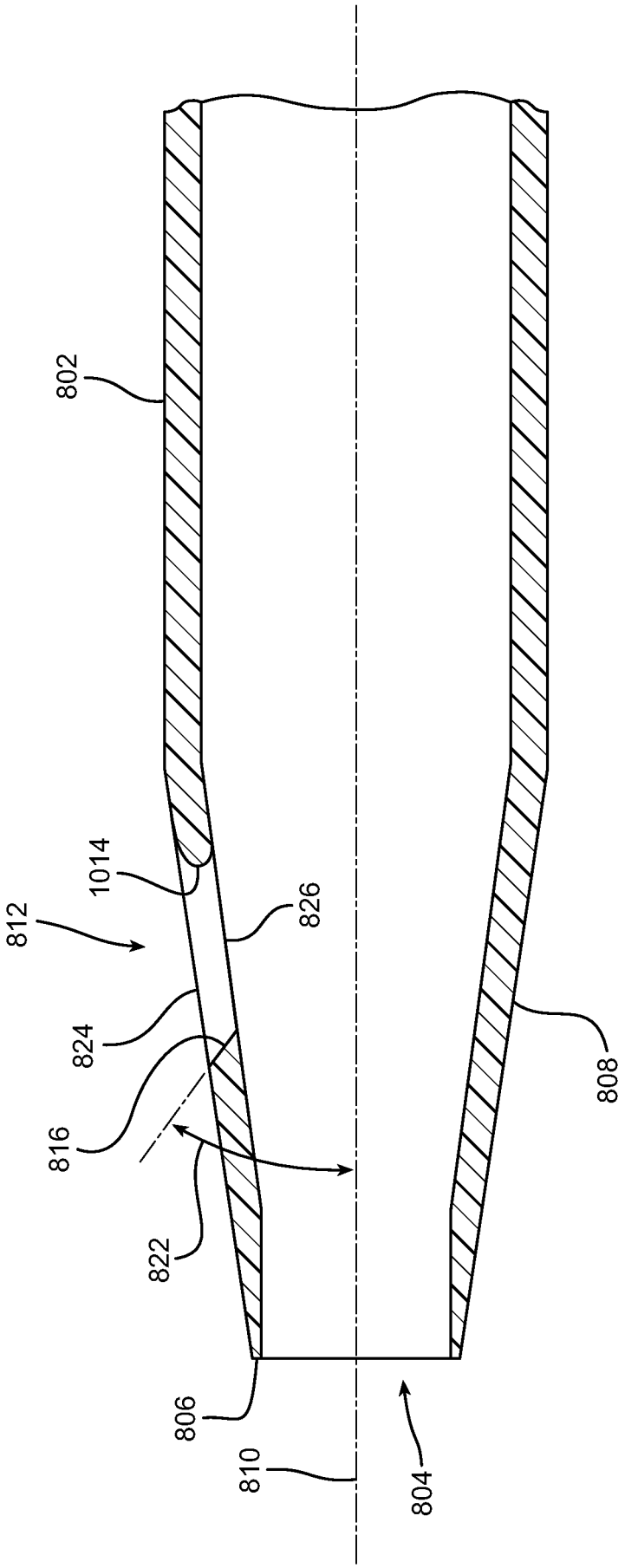



FIG. 31

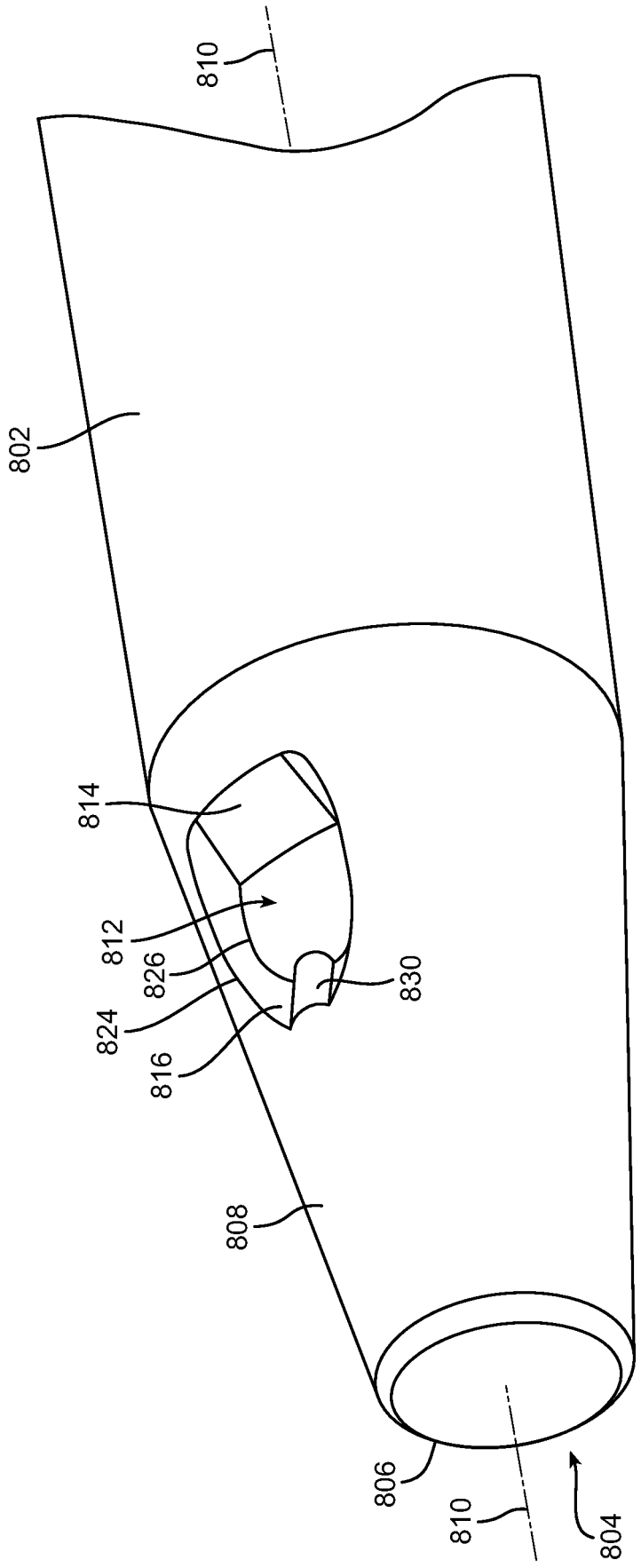



FIG. 32