



US00D770598S

(12) **United States Design Patent** (10) **Patent No.:** **US D770,598 S**
Steele (45) **Date of Patent:** **** Nov. 1, 2016**

- (54) **TWIST LOCK CONNECTOR**
- (71) Applicant: **NORDSON CORPORATION**,
Westlake, OH (US)
- (72) Inventor: **Kyle R. Steele**, Fort Collins, CO (US)
- (73) Assignee: **Nordson Corporation**, Westlake, OH
(US)
- (**) Term: **14 Years**
- (21) Appl. No.: **29/518,204**
- (22) Filed: **Feb. 20, 2015**

Related U.S. Application Data

- (62) Division of application No. 29/423,442, filed on May 31, 2012, now Pat. No. Des. 726,287.
- (51) **LOC (10) Cl.** **23-01**
- (52) **U.S. Cl.**
USPC **D23/262**
- (58) **Field of Classification Search**
USPC D23/259-269, 386, 393; 285/12, 63,
285/88, 405; 4/252.4; D9/435-437
See application file for complete search history.

References Cited

U.S. PATENT DOCUMENTS

380,363 A	4/1888	Sturgeon	
768,359 A	8/1904	Eisenhuth	
770,049 A	9/1904	Dorgans	
2,240,330 A	4/1941	Flagg et al.	
3,245,703 A	4/1966	Manly	
D254,505 S	3/1980	Parsons et al.	
D265,418 S	7/1982	Chow et al.	
D275,316 S	8/1984	Hayes	
4,541,657 A	9/1985	Smyth	
4,700,926 A *	10/1987	Hansen	F16L 37/42 251/149.8
5,052,725 A *	10/1991	Meyer	F16L 37/0841 285/308
D327,120 S	6/1992	Ambrosi	
5,190,224 A *	3/1993	Hamilton	B05B 15/065 239/600
D345,962 S	4/1994	Clifton et al.	

D366,866 S	2/1996	Whitehead et al.	
D379,348 S	5/1997	Korinek	
5,799,987 A	9/1998	Sampson	
D402,629 S	12/1998	Benedict	
D404,714 S	1/1999	Axelsson	
6,062,763 A	5/2000	Sirois et al.	
6,252,170 B1	6/2001	Korinek	
6,402,207 B1 *	6/2002	Segal	A61M 39/10 285/330
6,677,530 B2 *	1/2004	Blaha	H01R 13/5025 174/84 R
D495,050 S	8/2004	Guala	
D517,667 S *	3/2006	Sener	D23/262
D523,821 S	6/2006	Michaud et al.	
D569,955 S	5/2008	Chen	
D570,457 S	6/2008	Brown	
D613,827 S	4/2010	Damaske et al.	
D630,320 S	1/2011	Lombardi, III et al.	
D645,547 S	9/2011	Lombardi et al.	
D651,696 S	1/2012	Giordano	
D709,996 S *	7/2014	Yu	D23/262
D716,916 S *	11/2014	Snow	D23/262
D747,444 S *	1/2016	Gledhill	D23/262
2003/0085571 A1	5/2003	Avery	
2008/0129047 A1	6/2008	Blivet et al.	
2008/0287920 A1 *	11/2008	Fangrow	A61M 39/1011 604/535

FOREIGN PATENT DOCUMENTS

FR 1238369 8/1960

OTHER PUBLICATIONS

CPC—Colder Products Company, www.colder.com—“SMCO2 1/8 Hose Barb Non-Valved in-Line Coupling Set”, <http://www.colder.com/Tabid/72/MaterialID/1/ciD/1/siD/5/tiD/1/piD/173/Products.aspx> Retrieved from the Internet on Jul. 14, 2014, 1 page.

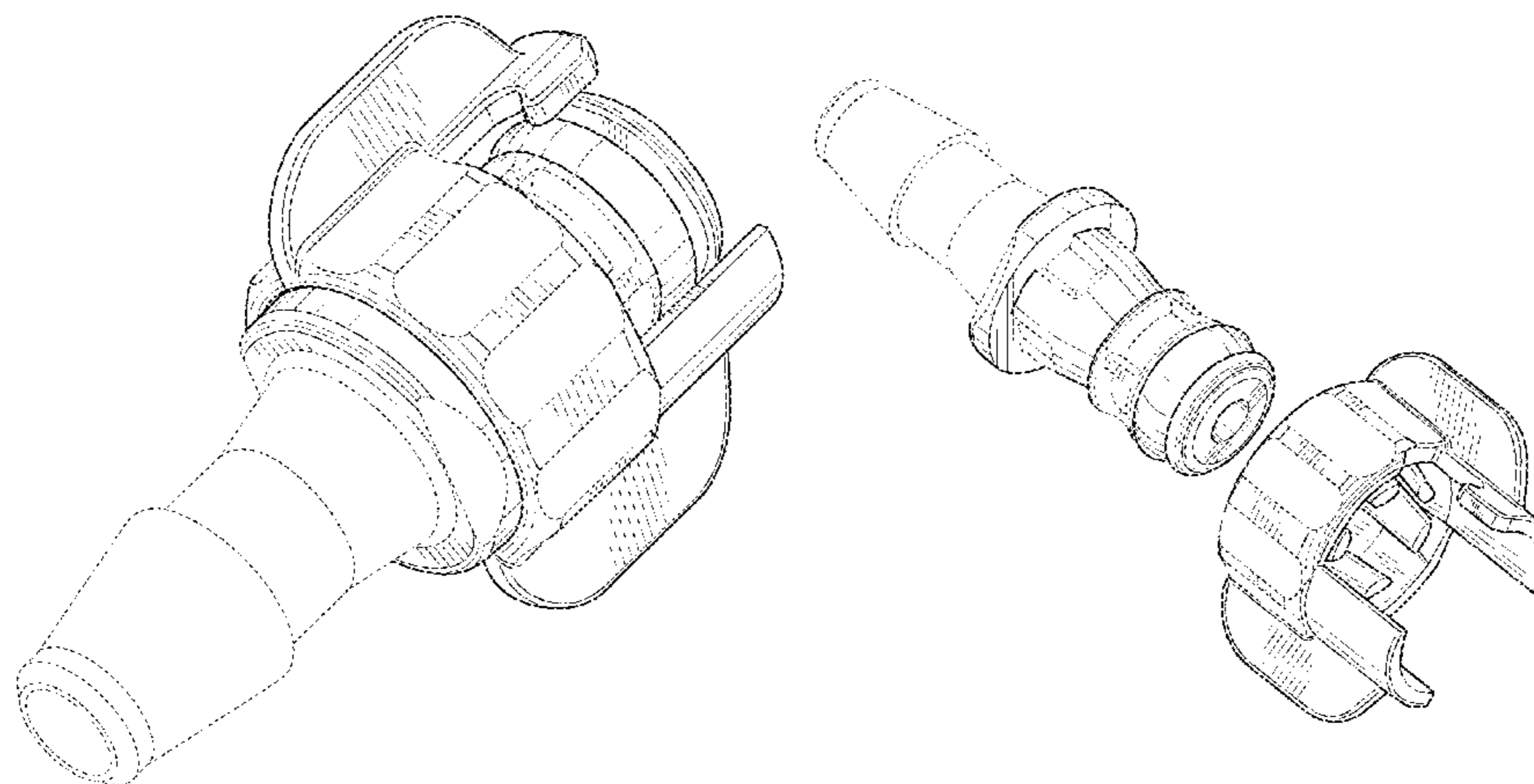
CPC—Colder Products Company, www.colder.com—“SMMP Male Plug for SMC Series Coupling Bodies”, <https://www.colder.com/Tabid/72/MaterialID/1/ciD/1/siD/5/tiD/15/piD/5285/Products.aspx>; Retrieved from the Internet on Jul. 14, 2014, 1 page.

CPC—Colder Products Company, www.colder.com search results for “SMC”, <http://www.colder.com/SearchResults.aspx?Search=smc>, Retrieved from the Internet on Jul. 14, 2014, 3 pages.

Prosecution Document, “Preliminary Amendment filed May 31, 2012”, U.S. Appl. No. 29/423,442, 4 pages.

U.S. Patent and Trademark Office, “Restriction Requirement dated May 12, 2014”, U.S. Appl. No. 29/423,442, 7 pages.

Prosecution Document, “Response to Restriction Requirement filed Jul. 14, 2014”, U.S. Appl. No. 29/423,442, 5 pages.



U.S. Patent and Trademark Office, "Ex Parte Quayle Office Action dated Aug. 15, 2014", U.S. Appl. No. 29/423,442, 39 pages.
Prosecution Document, "Response to Ex Parte Quayle Office Action filed Oct. 15, 2014", U.S. Appl. No. 29/423,442, 12 pages.
U.S. Patent and Trademark Office, "Notice of Allowance dated Nov. 19, 2014", U.S. Appl. No. 29/423,442, 7 pages.
U.S. Patent and Trademark Office, "Non-final Office Action dated Mar. 27, 2015", U.S. Appl. No. 13/826,568, 16 pages.
Prosecution Document, "Response to Non-final Office Action filed Aug. 26, 2015", U.S. Appl. No. 13/826,568, 19 pages.

* cited by examiner

Primary Examiner — Kevin Rudzinski
Assistant Examiner — John Reickel
(74) *Attorney, Agent, or Firm* — Baker & Hostetler LLP

(57) **CLAIM**

I claim the ornamental design for a twist lock connector, substantially as shown and described.

DESCRIPTION

FIG. 1 is a top, left, front isometric view of an embodiment of a twist lock connector shown in a connected environment.
FIG. 2 is a top, left, front isometric view of the twist lock connector of FIG. 1.
FIG. 3 is a top, right, front isometric view of the twist lock connector of FIG. 1.
FIG. 4 is a front elevation view of the twist lock connector of FIG. 1.
FIG. 5 is a rear elevation view of the twist lock connector of FIG. 1.
FIG. 6 is a right side elevation view of the twist lock connector of FIG. 1.
FIG. 7 is a left side elevation view of the twist lock connector of FIG. 1.

FIG. 8 is a top plan view of the twist lock connector of FIG. 1.
FIG. 9 is a bottom plan view of the twist lock connector of FIG. 1.
FIG. 10 is an exploded top, left, front, isometric view of the twist lock connector of FIG. 1.
FIG. 11 is an exploded top, right, front, isometric view of the twist lock connector of FIG. 1.
FIG. 12 is an exploded front elevation view of the twist lock connector of FIG. 1.
FIG. 13 is an exploded rear elevation view of the twist lock connector of FIG. 1.
FIG. 14 is a right side elevation view of a twist lock component of the twist lock connector of FIG. 1 separate from a male connector component.
FIG. 15 is a right side elevation view of the male connector component of the twist lock connector of FIG. 1 separate from the twist lock component.
FIG. 16 is a left side elevation view of the male connector component of the twist lock connector of FIG. 1 separate from the twist lock component.
FIG. 17 is a left side elevation view of the twist lock component of the twist lock connector of FIG. 1 separate from the male connector component.
FIG. 18 is an exploded top plan view of the twist lock connector of FIG. 1.
FIG. 19 is an exploded bottom plan view of the twist lock connector of FIG. 1; and,
FIG. 20 is an exploded front elevation view in cross section of the twist lock connector of FIG. 1 taken along line 20-20 of FIG. 18.
The broken lines shown in the drawings are for purposes of illustrating use and environment, or for defining the bounds of the claimed design, and form no part of the claimed design.

1 Claim, 17 Drawing Sheets

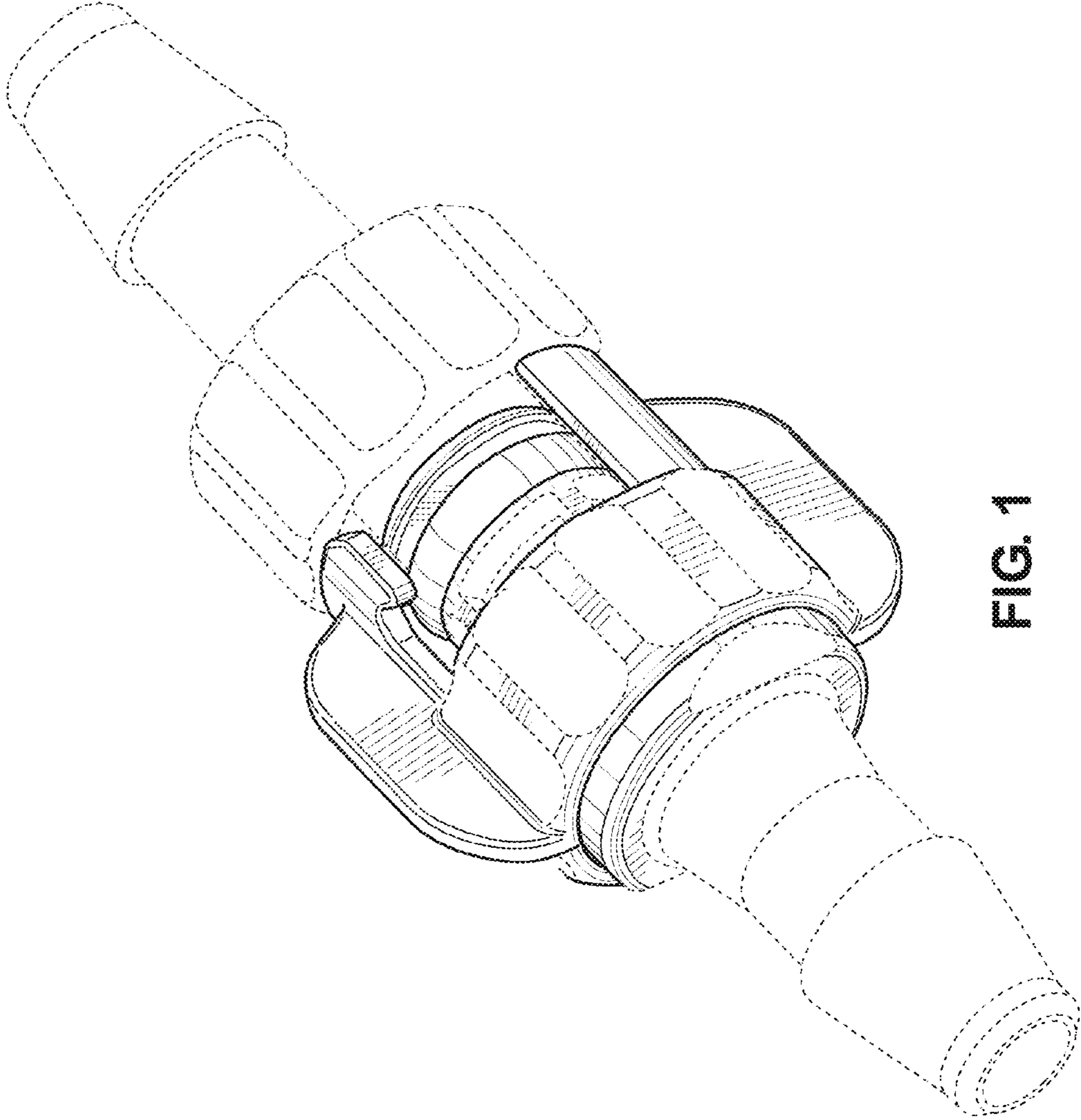


FIG. 1

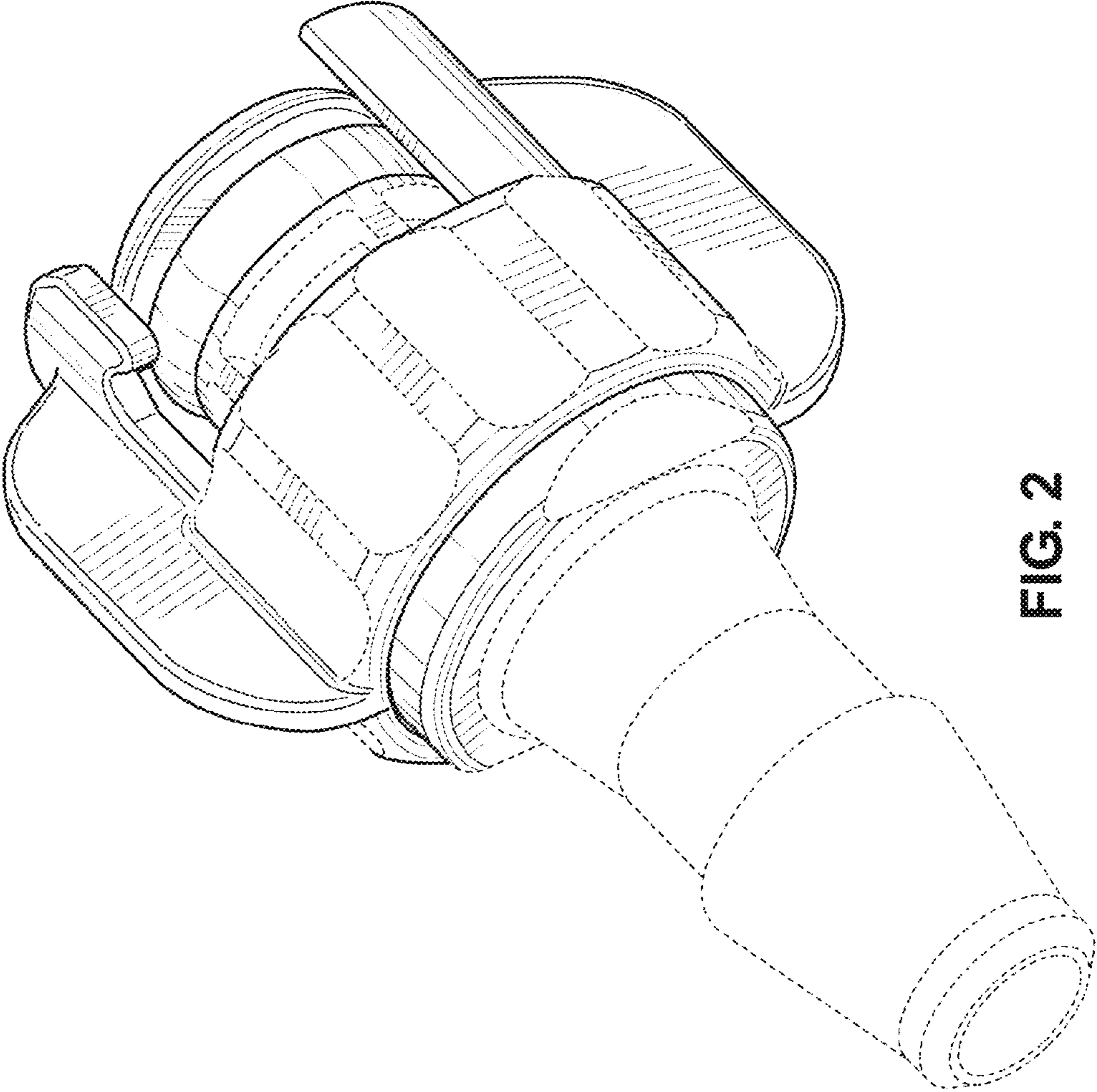


FIG. 2

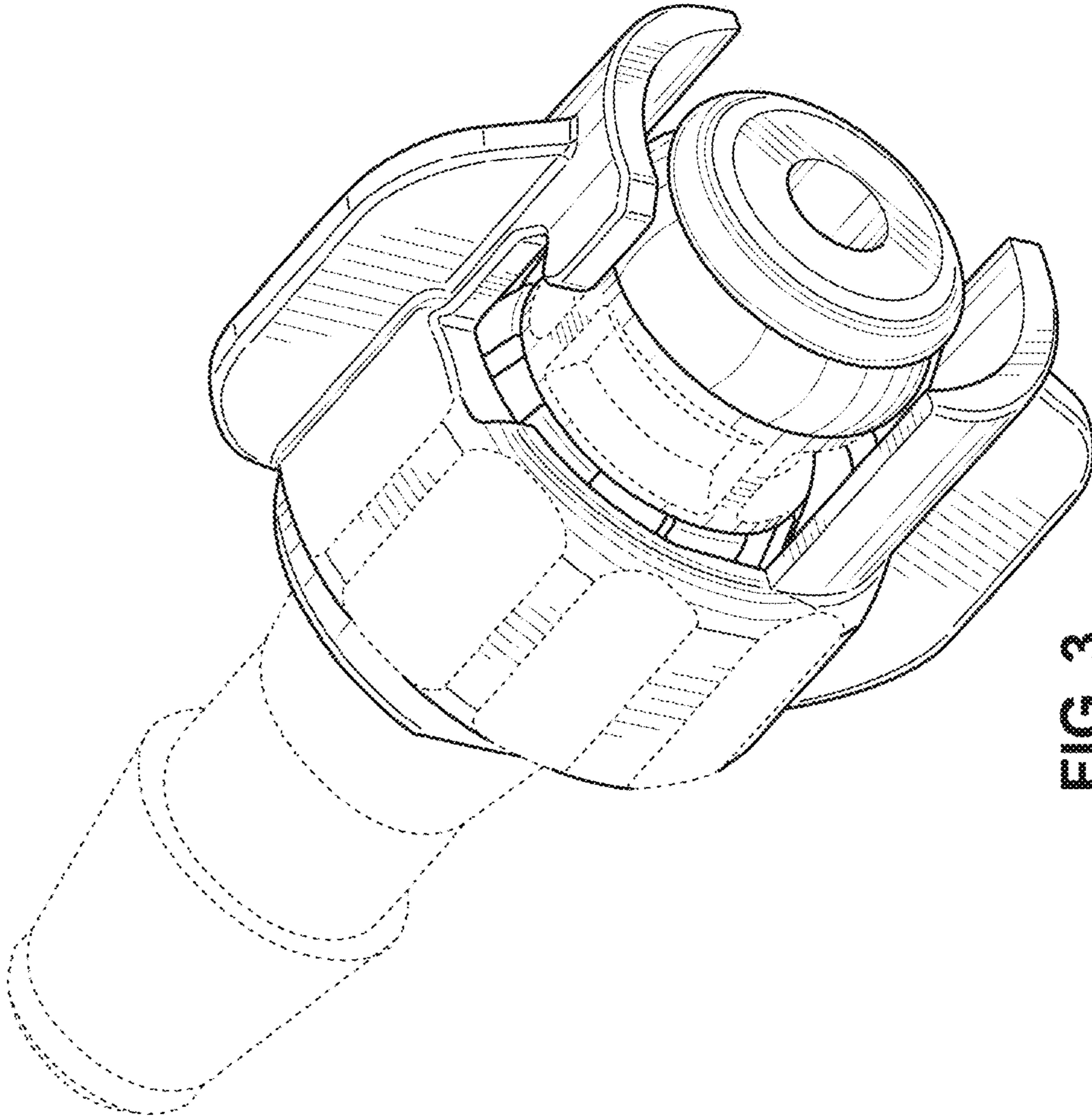


FIG. 3

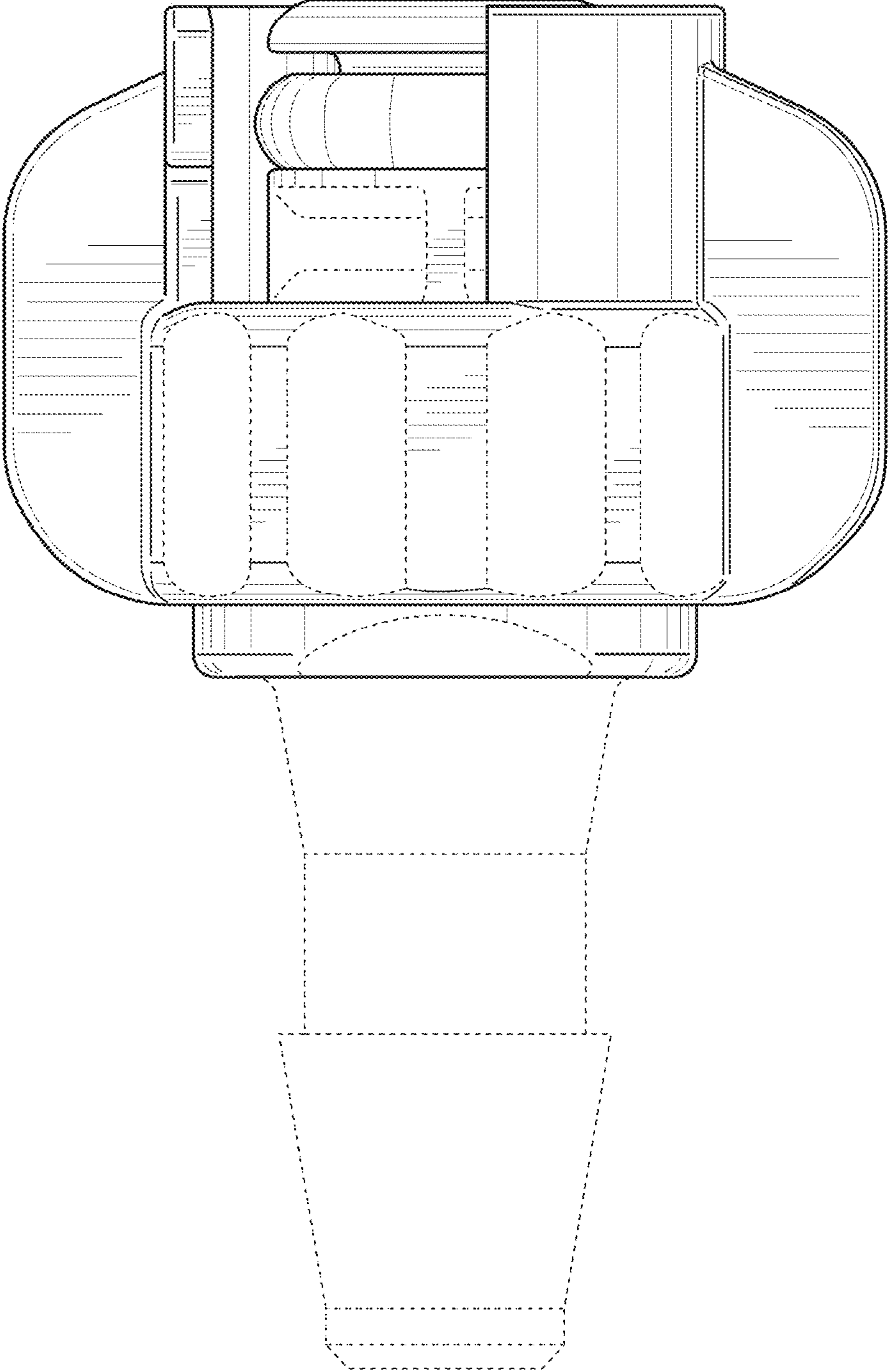


FIG. 4

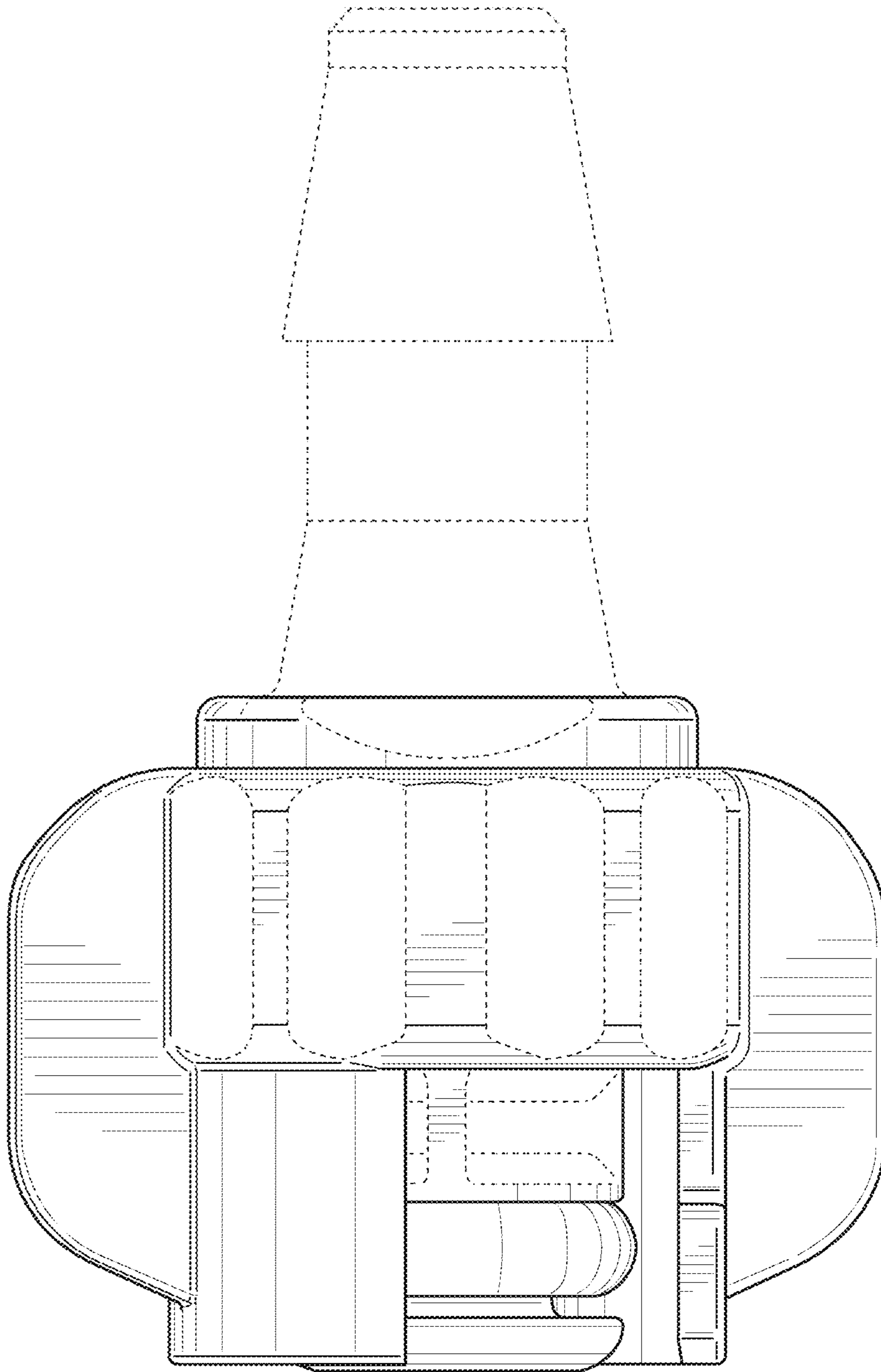


FIG. 5

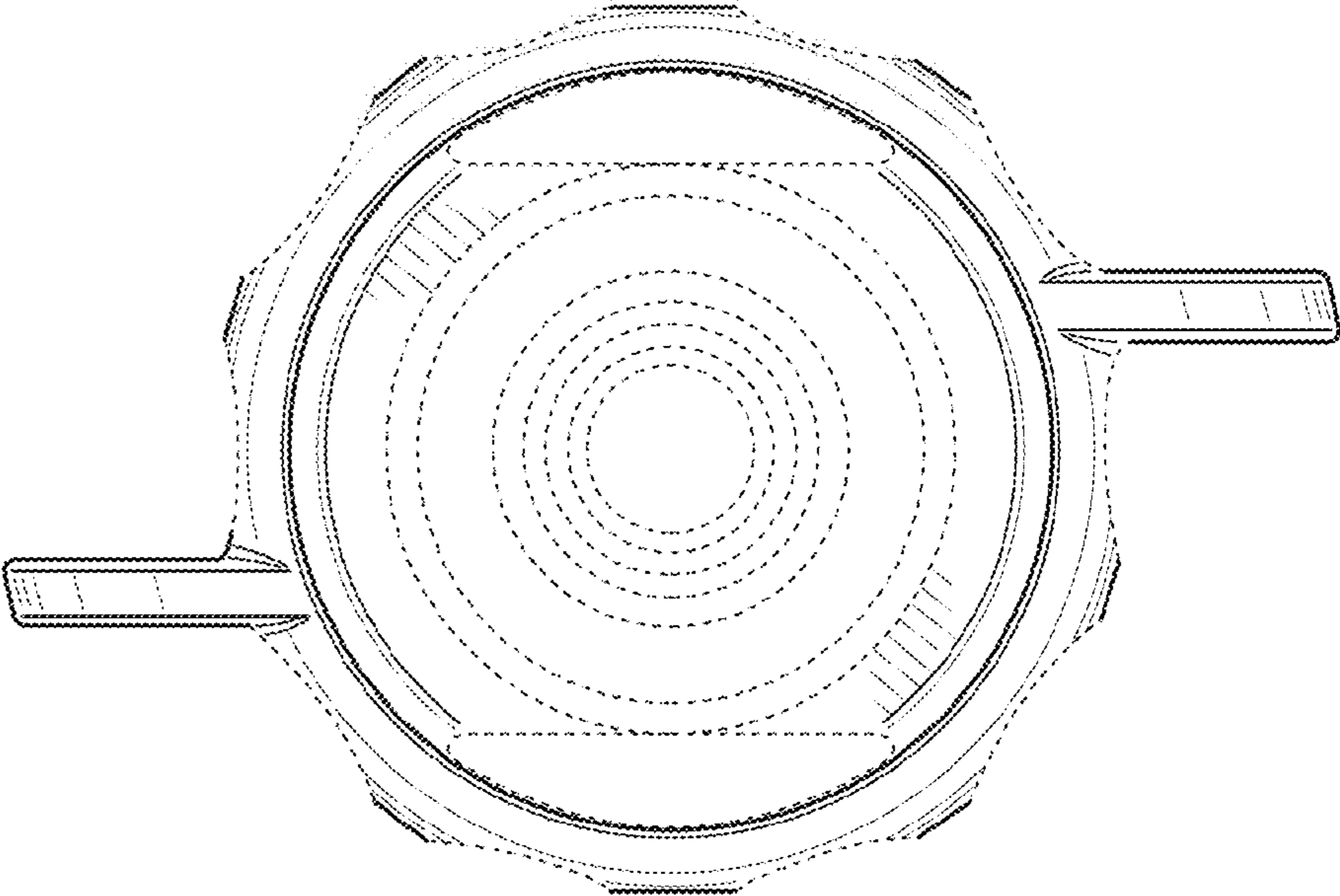


FIG. 6

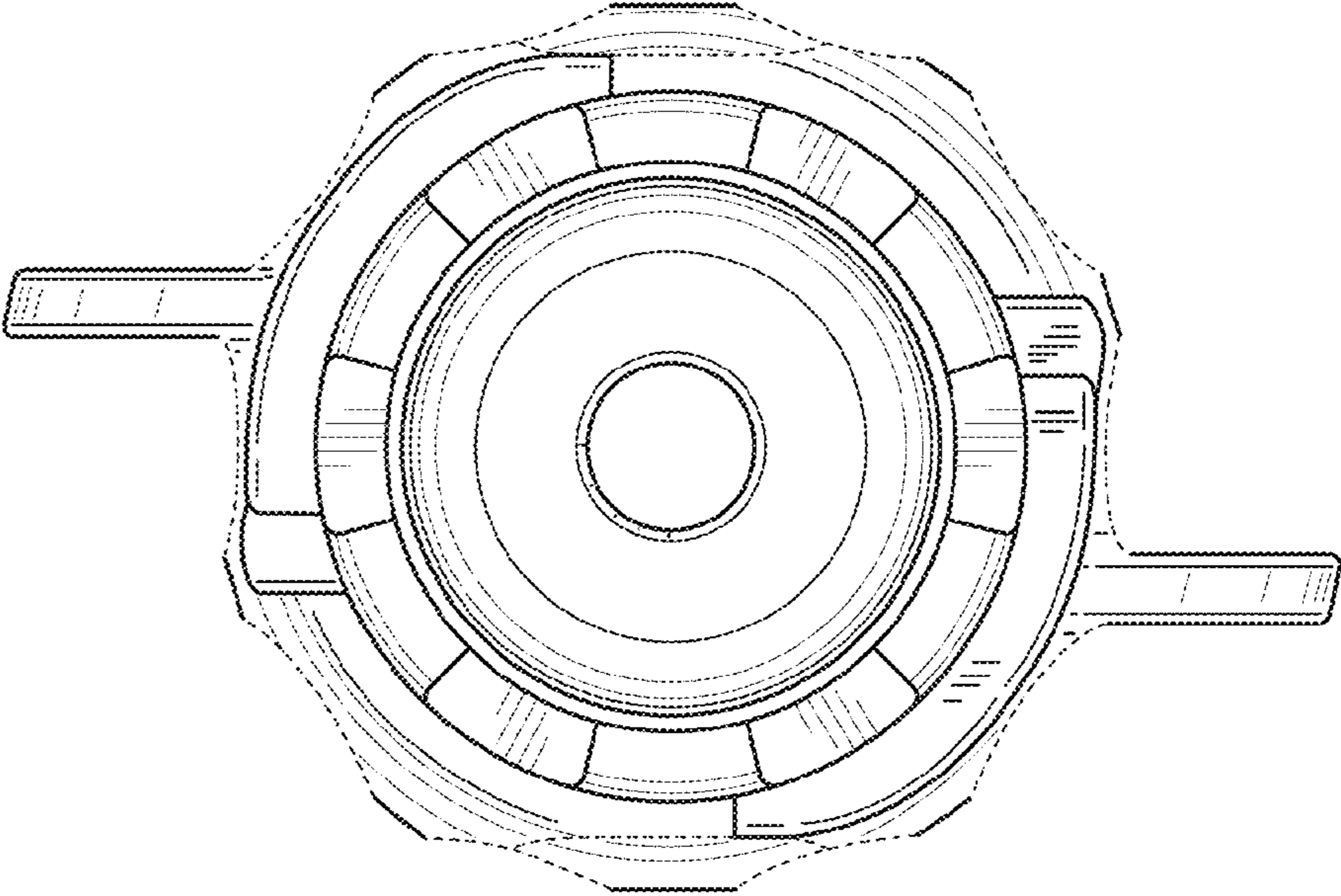


FIG. 7

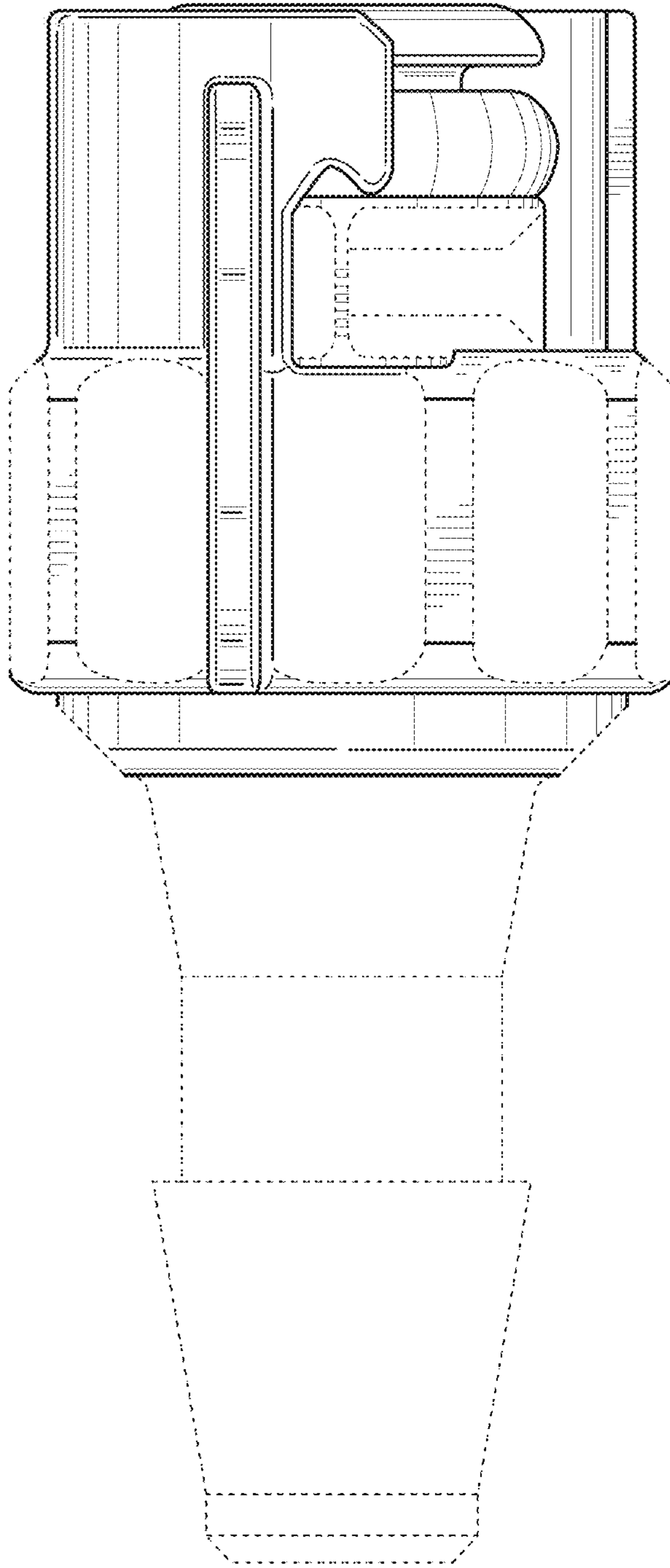


FIG. 8

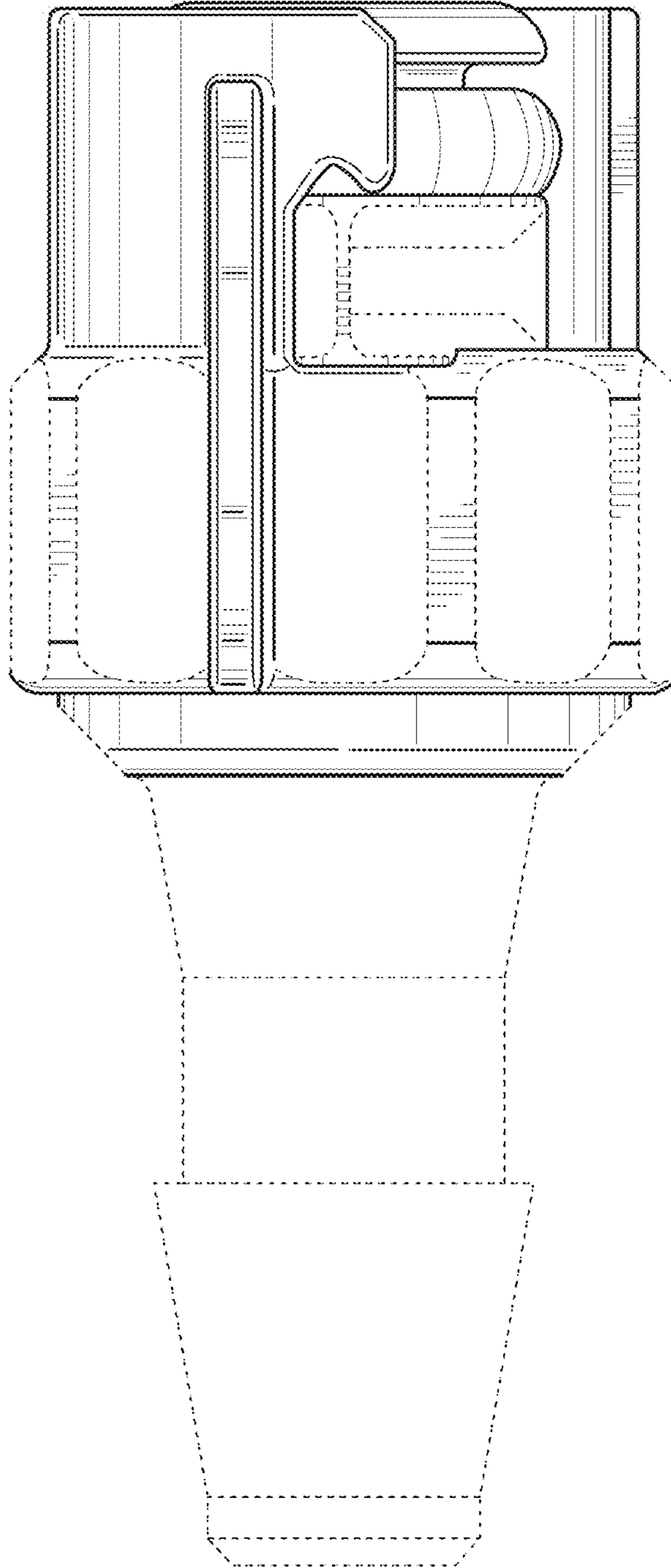


FIG. 9

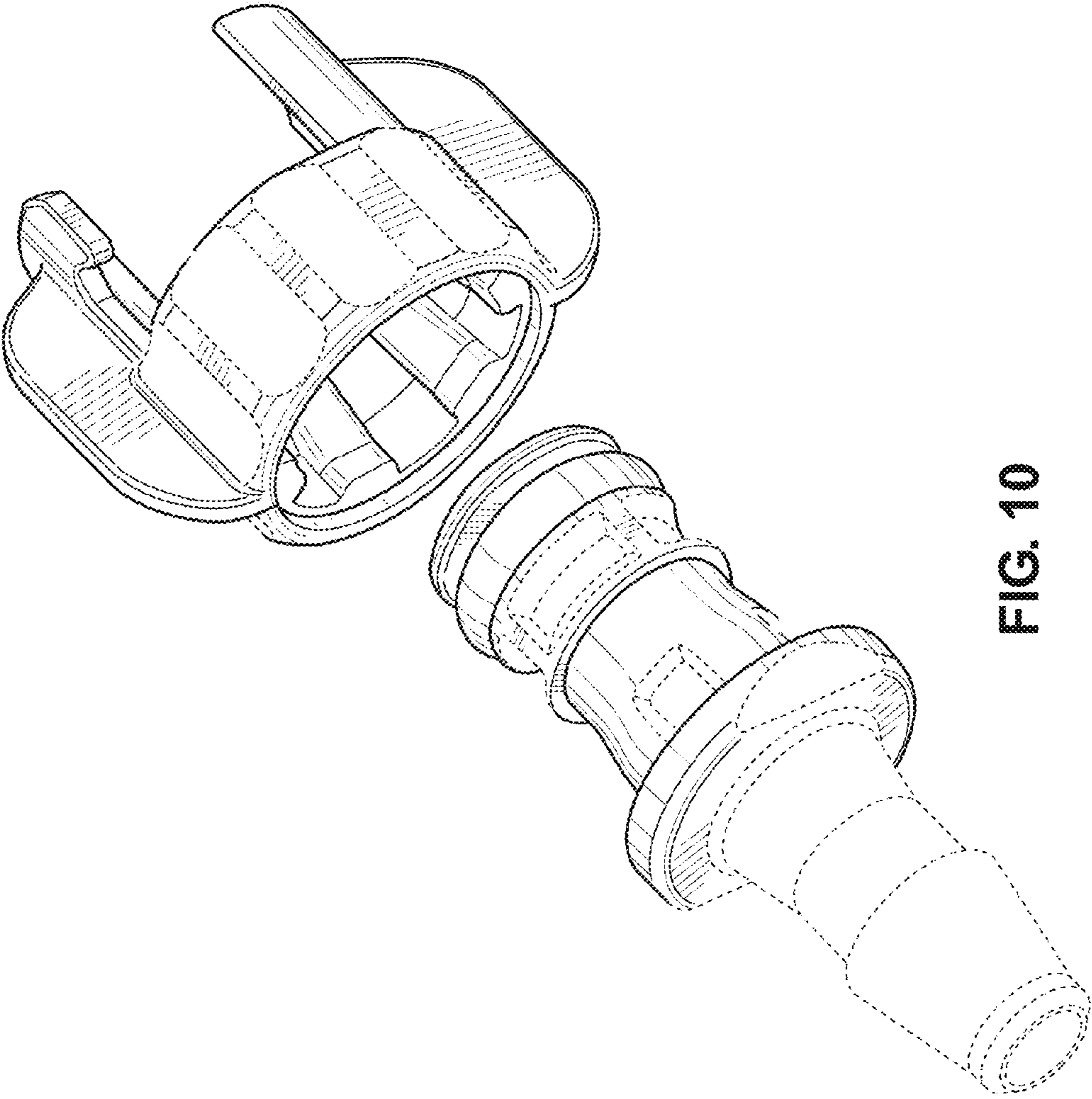


FIG. 10

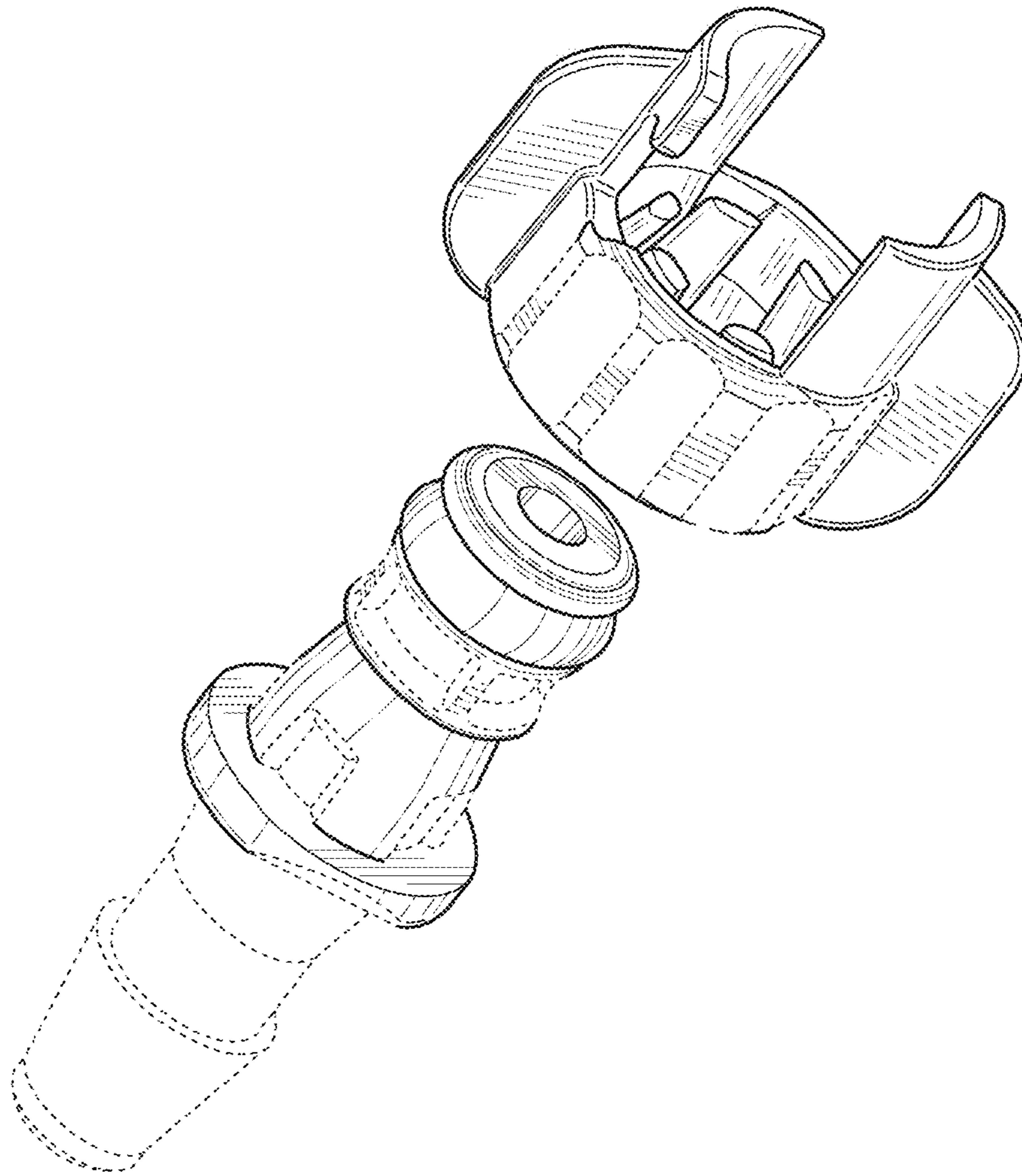


FIG. 11

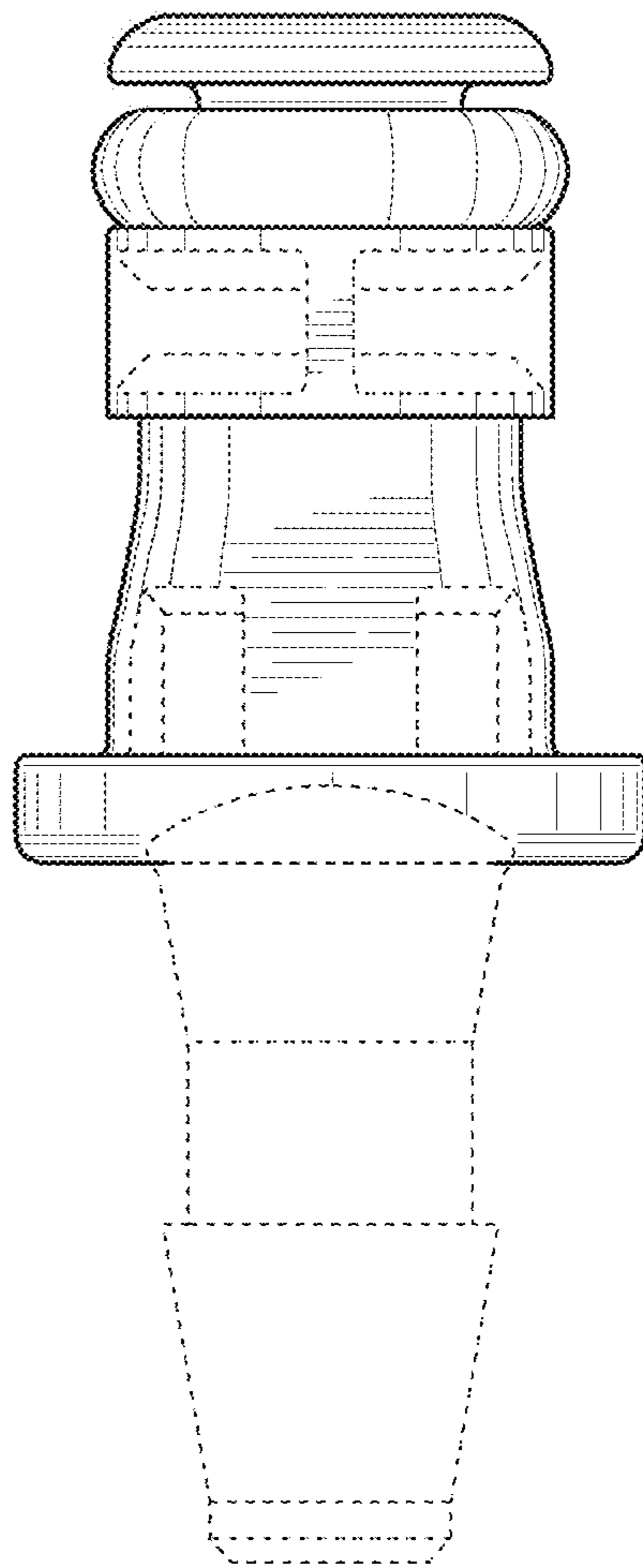
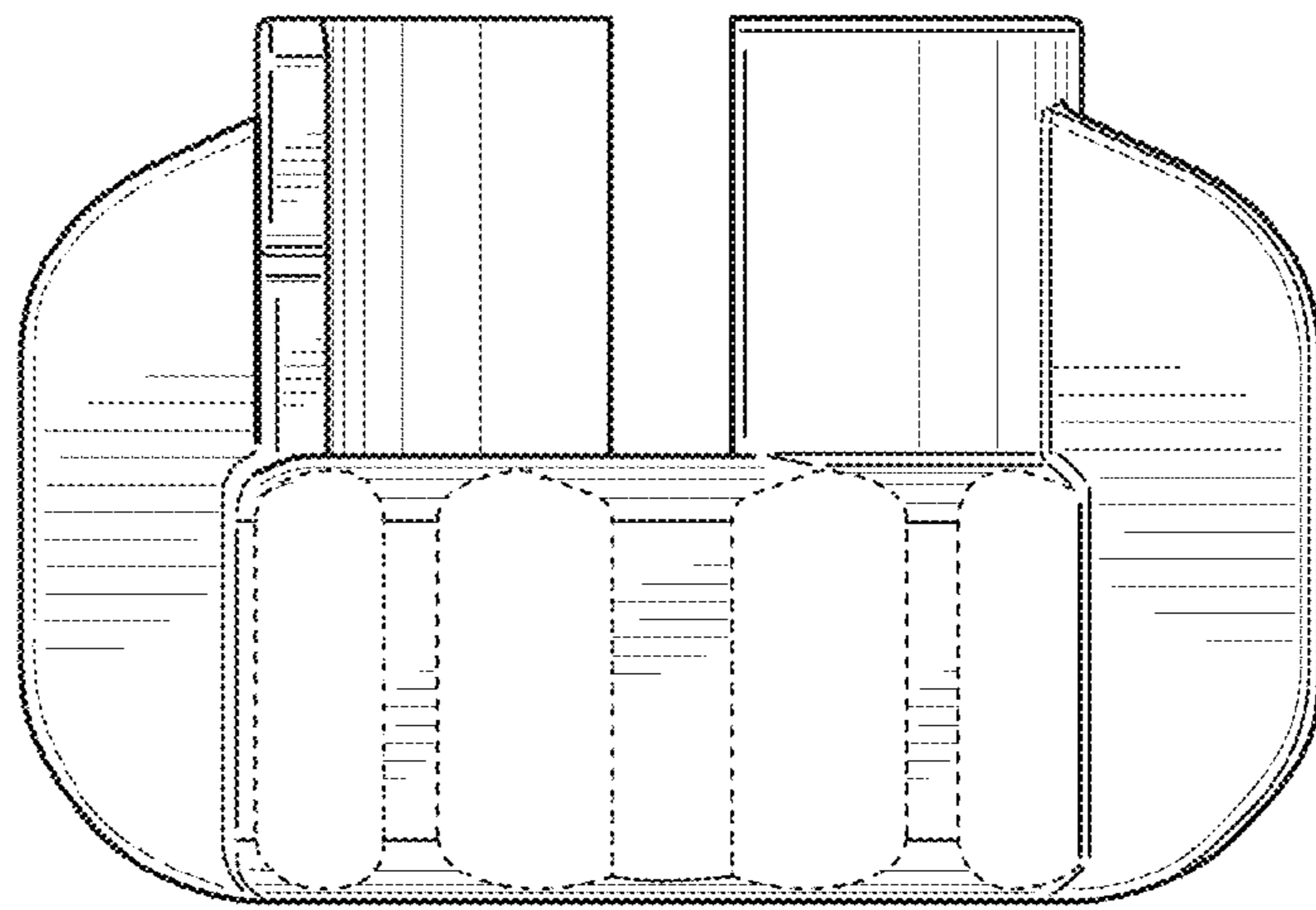


FIG. 12

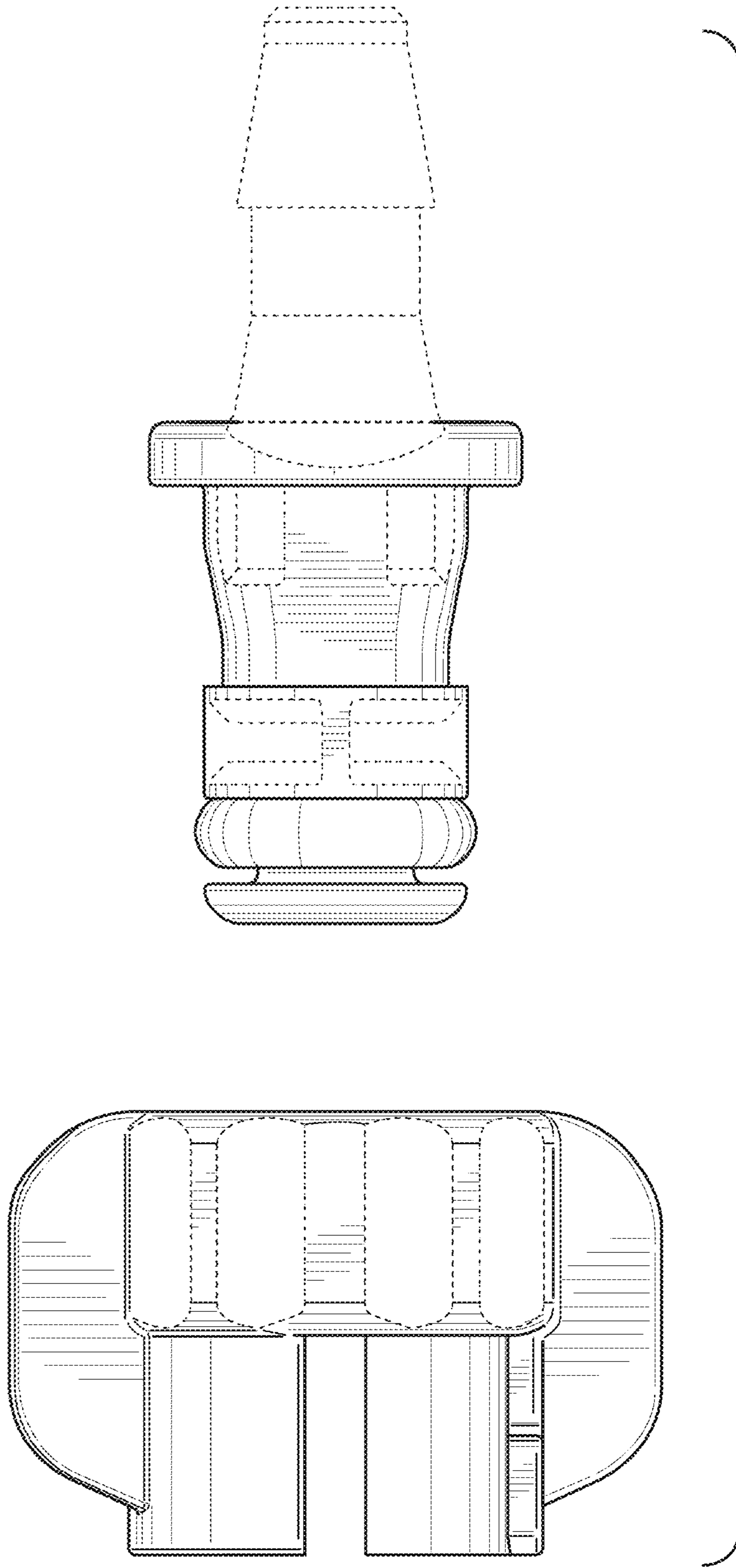


FIG. 13

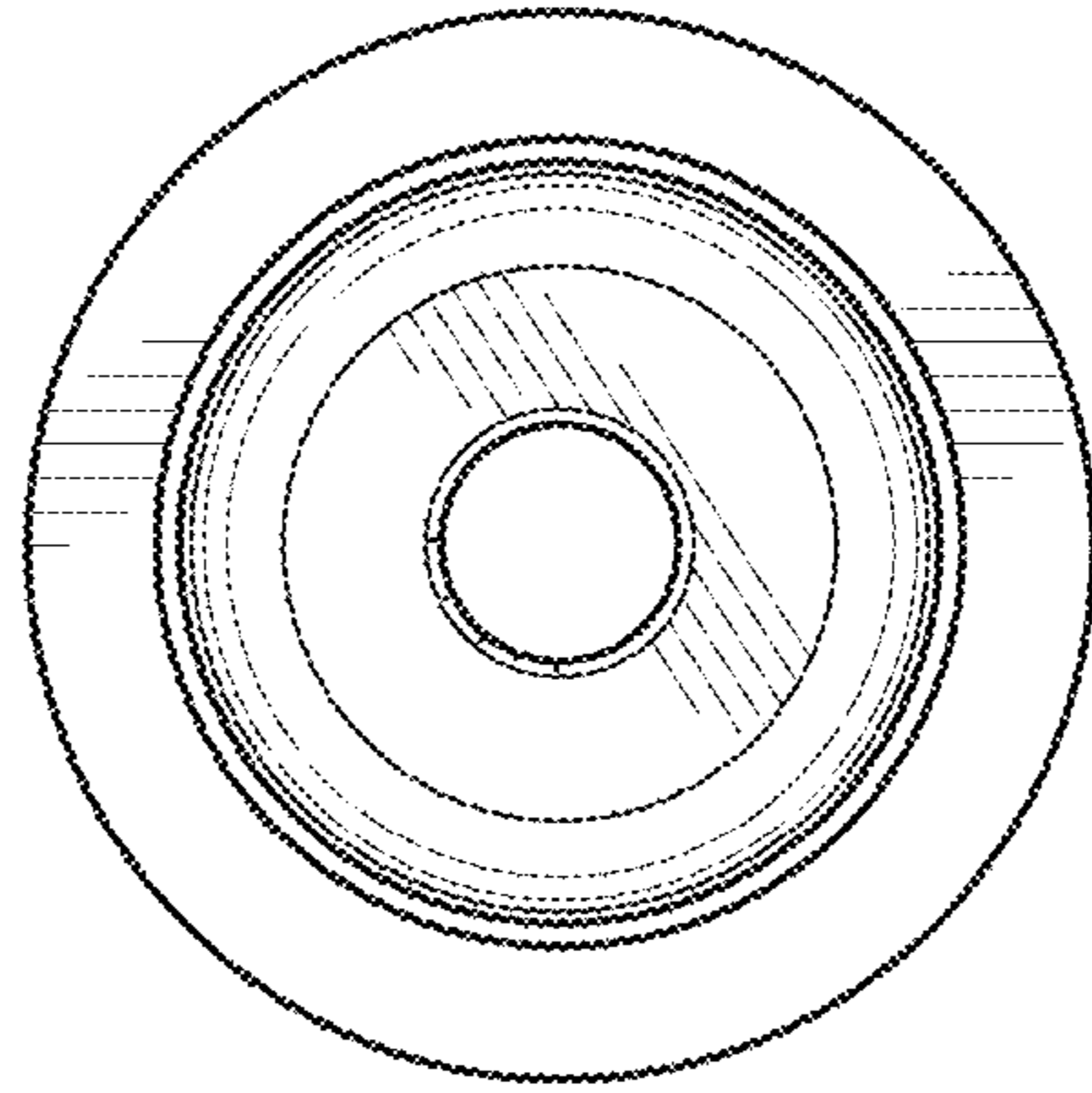


FIG. 15

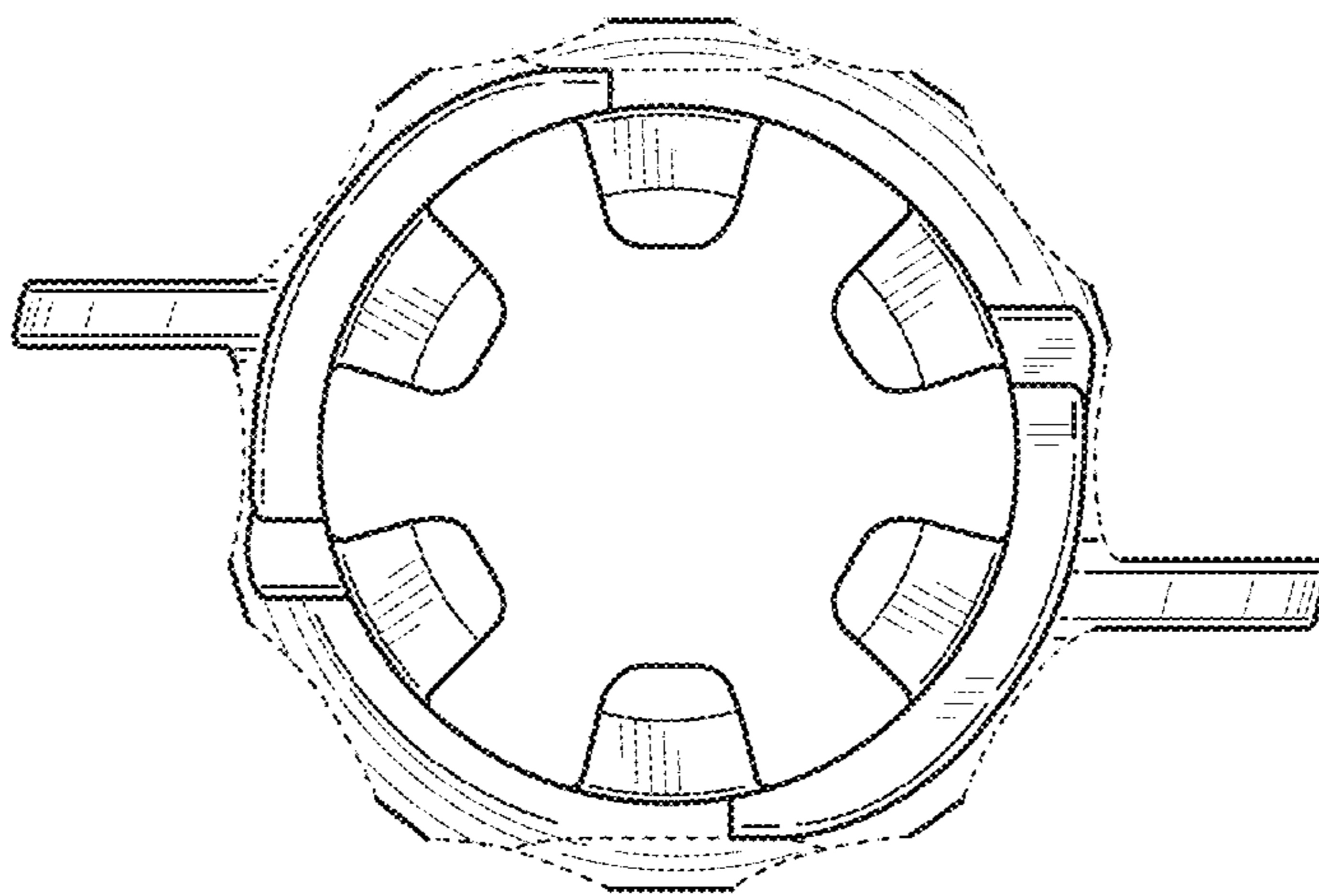


FIG. 14

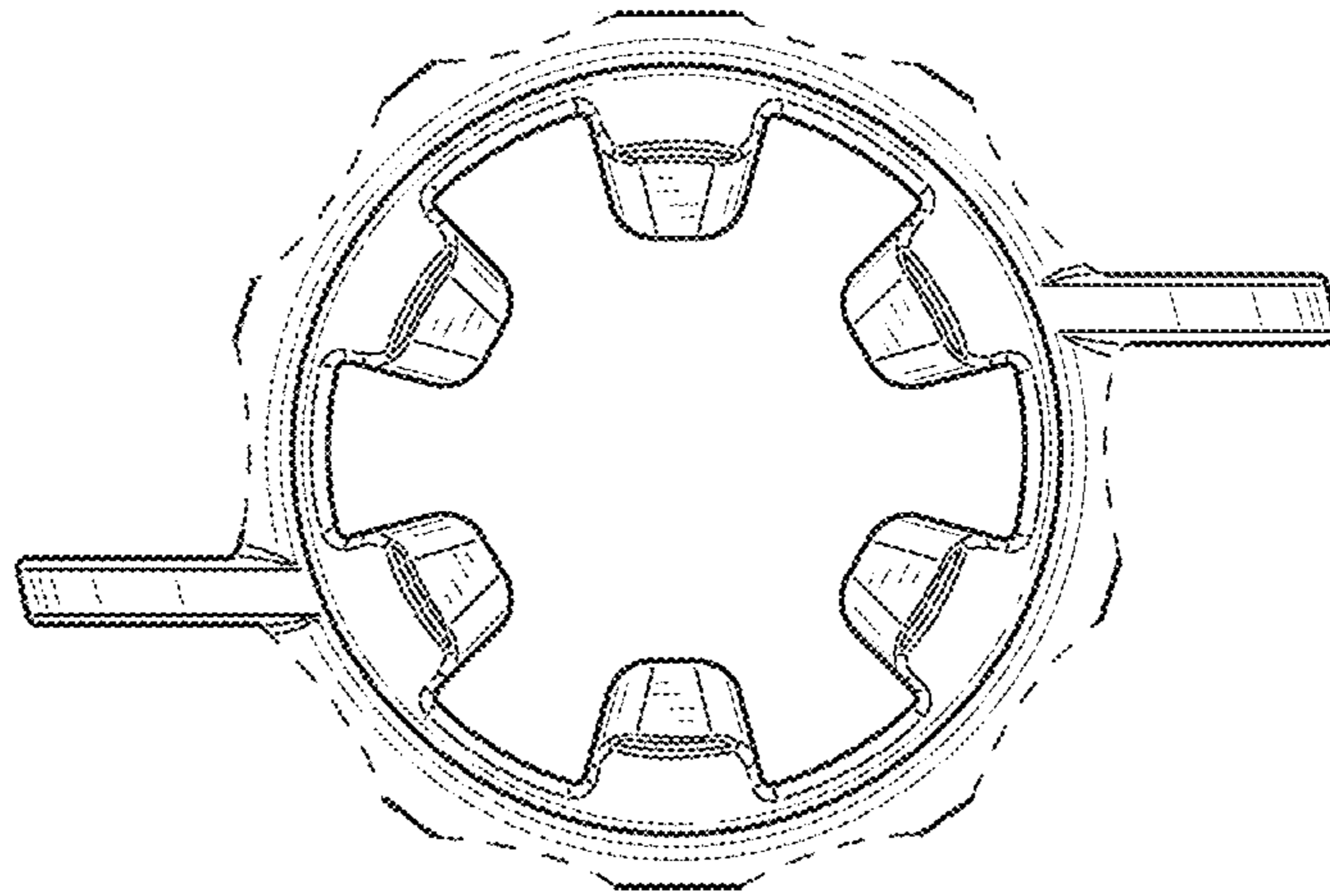


FIG. 17

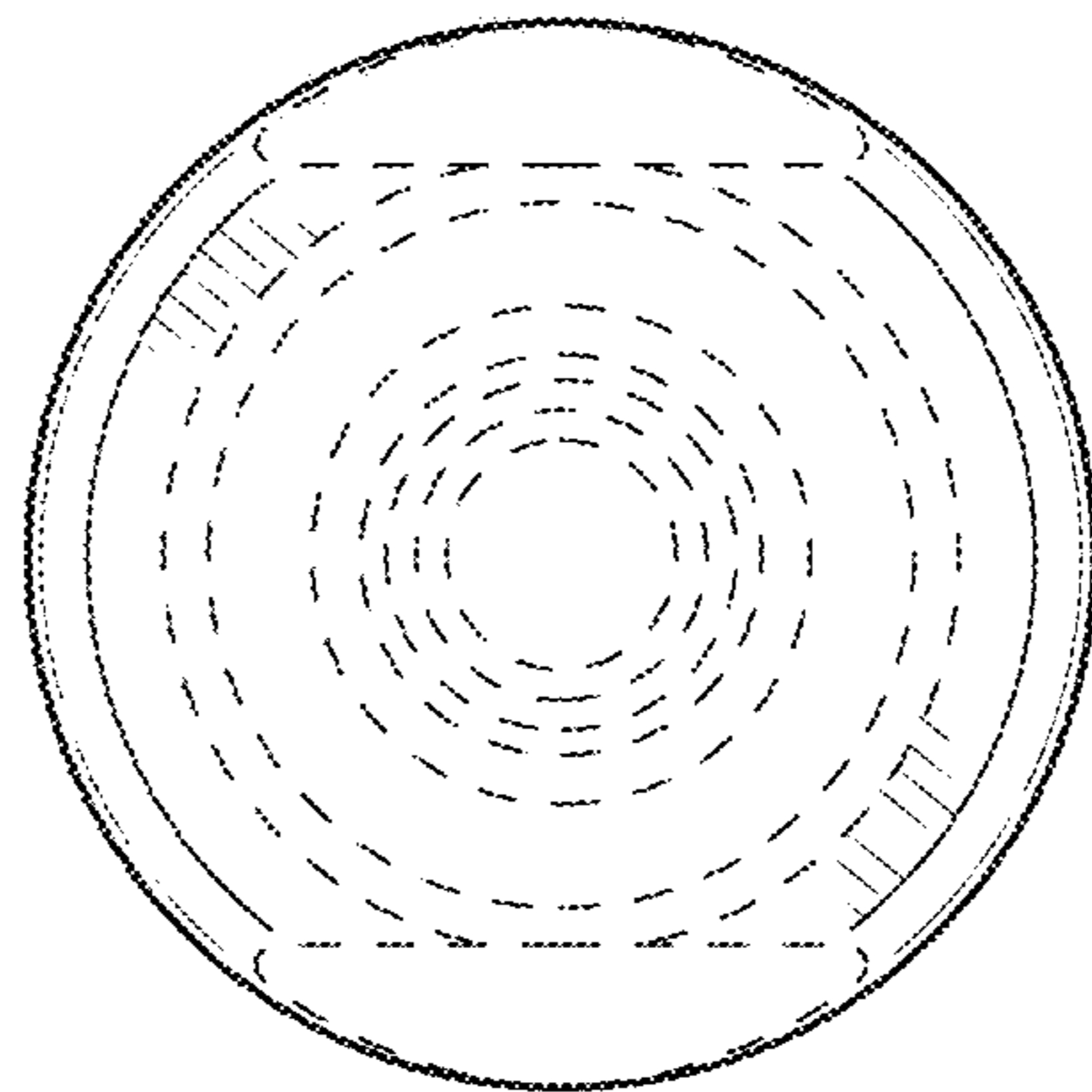


FIG. 16

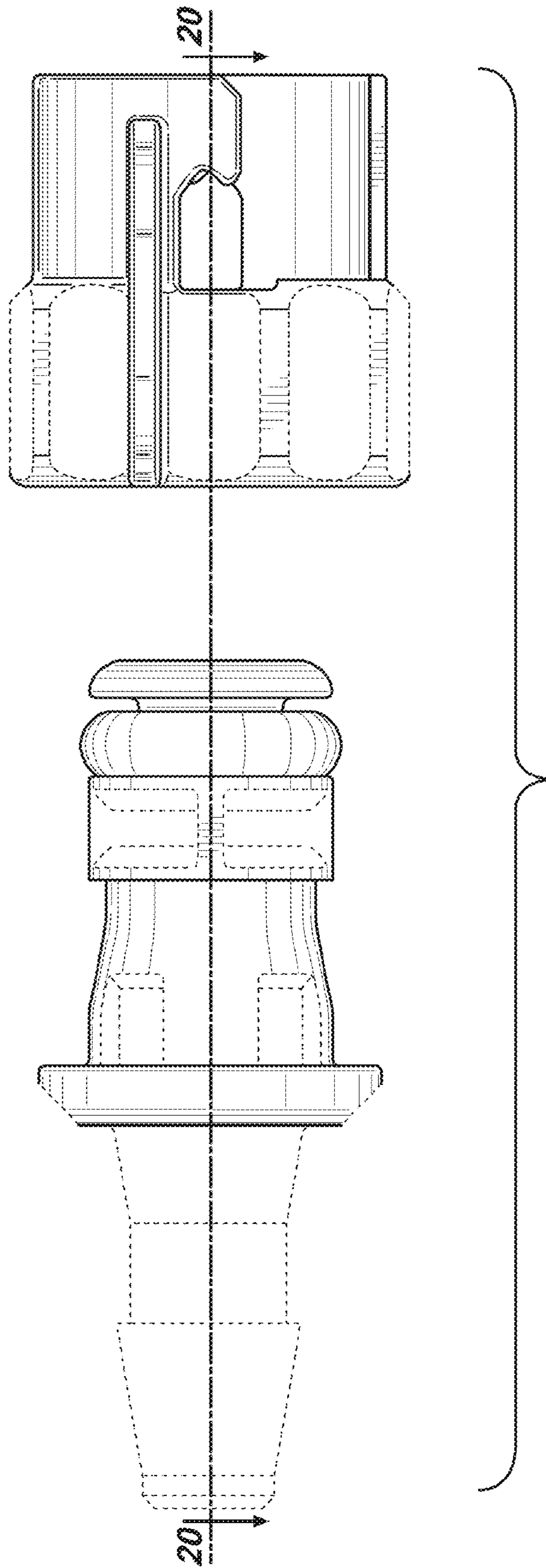


FIG. 18

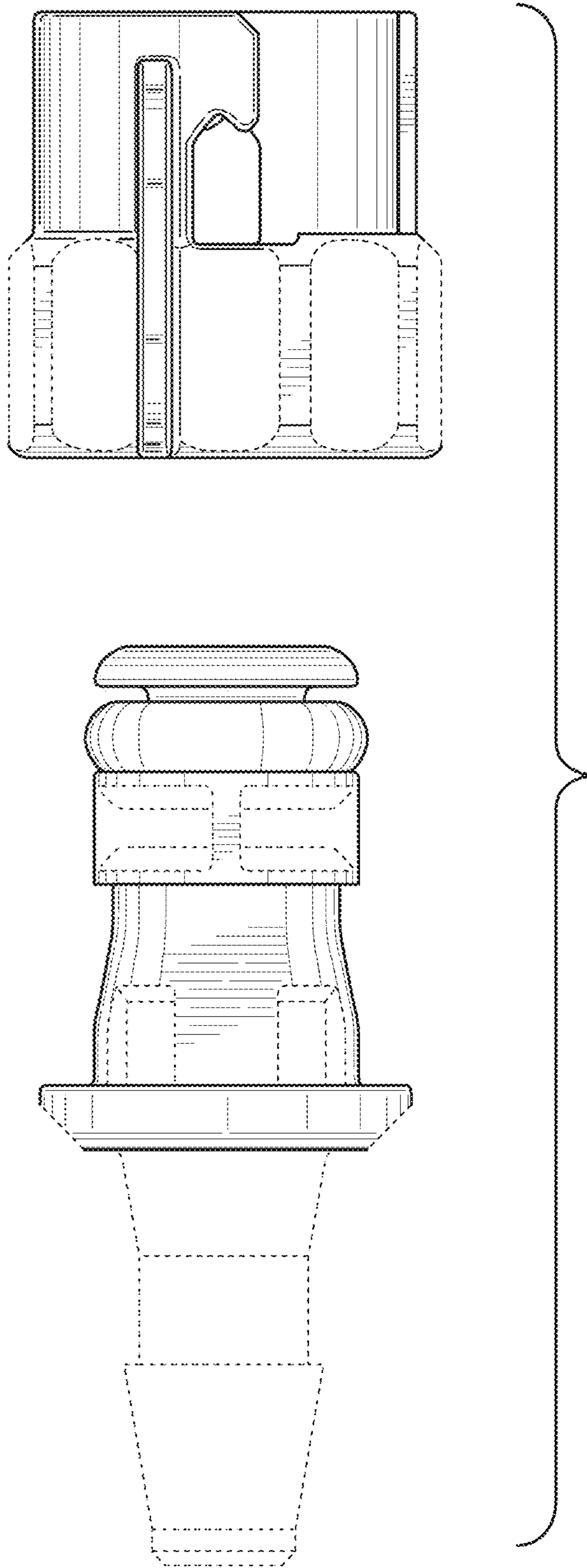


FIG. 19

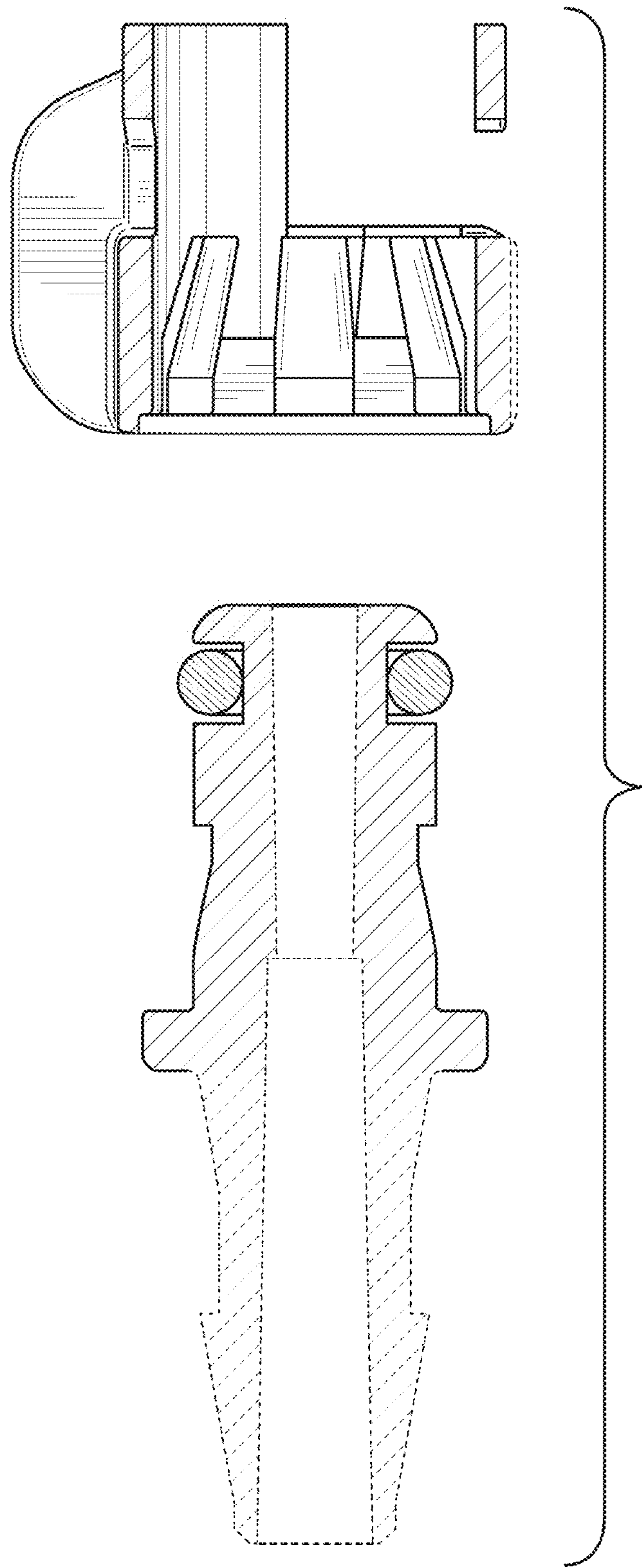


FIG. 20