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(12) **United States Design Patent**
Kawamura

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(54) **SYRINGE PLUNGER AND PROXIMAL END OF A SYRINGE BARREL FOR A PRE-FILLED NASAL DRIP DEVICE**

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(73) Assignee: **Daikyo Seiko, Ltd.**, Tokyo (JP)

(**) Term: **14 Years**

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(51) **LOC (9) Cl.** **24-02**

(52) **U.S. Cl.** **D24/114**

(58) **Field of Classification Search** D24/112-114,
D24/133, 186, 104, 130, 127, 152, 144; 606/181,
606/185, 205, 142; 604/232, 187, 158, 164.08,
604/192, 263, 163, 181, 184, 198, 227; 433/80
See application file for complete search history.

(56) **References Cited**

U.S. PATENT DOCUMENTS

5,509,903 A * 4/1996 Grendahl et al. 604/187

(Continued)

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(57) **CLAIM**

The ornamental design for a syringe plunger and proximal end of a syringe barrel for a pre-filled nasal drip device, as shown and described.

DESCRIPTION

FIG. 1 is a front view of a pre-filled nasal drip device in an initial unused position in accordance with an embodiment of the present invention.

FIG. 2 is a top view of the pre-filled nasal drip device of FIG. 1 in the initial unused position in accordance with an embodiment of the present invention.

FIG. 3 is a left side view of the pre-filled nasal drip device of FIG. 1 in the initial unused position in accordance with an embodiment of the present invention.

FIG. 4 is a right side view of the pre-filled nasal drip device of FIG. 1 in the initial unused position in accordance with an embodiment of the present invention.

FIG. 5 is a cross-sectional view of the pre-filled nasal drip device of FIG. 1 taken along line 5—5 of FIG. 3 in accordance with an embodiment of the present invention.

FIG. 6 is a cross-sectional view of the pre-filled nasal drip device of FIG. 1 taken along line 6—6 of FIG. 3 in accordance with an embodiment of the present invention.

FIG. 7 is a perspective view of the pre-filled nasal drip device of FIG. 1 in accordance with an embodiment of the present invention.

FIG. 8 is a front view of the pre-filled nasal drip device of FIG. 1 having a substance disposed within an interior of the syringe barrel and in the initial unused position in accordance with an embodiment of the present invention.

FIG. 9 is a front view of the pre-filled nasal drip device of FIG. 8 in a first advanced position in which the syringe plunger is partially inserted within the syringe barrel in accordance with an embodiment of the present invention.

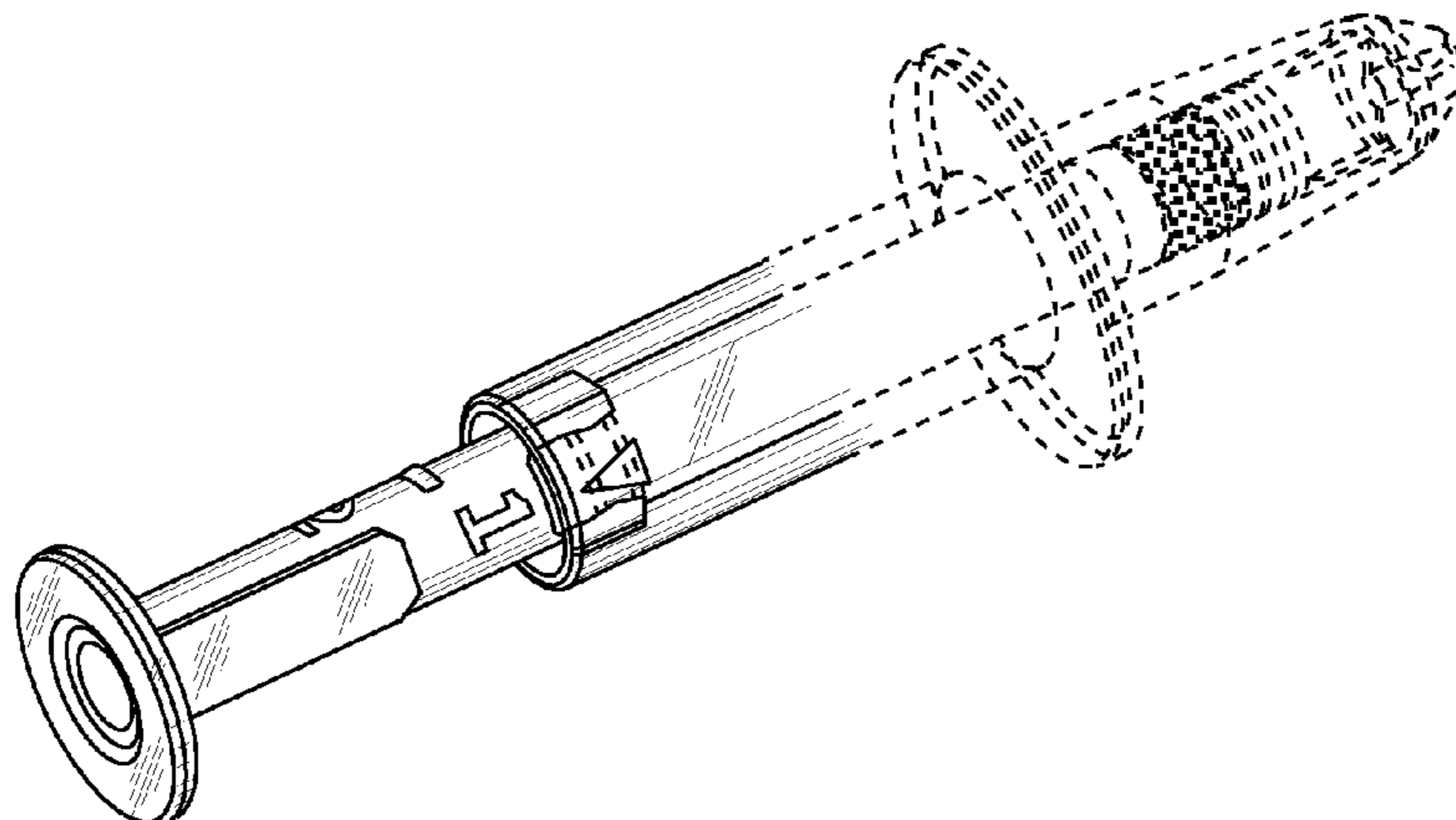
FIG. 10 is a front view of the pre-filled nasal drip device of FIG. 9 in a second advanced position in which the syringe plunger is further inserted within the syringe barrel in accordance with an embodiment of the present invention.

FIG. 11 is a top view of the pre-filled nasal drip device of FIG. 10 in a third advanced position in which the syringe plunger is still further inserted within the syringe barrel in accordance with an embodiment of the present invention; and,

FIG. 12 is a top view of the pre-filled nasal drip device of FIG. 11 in a fourth advanced position in which the syringe plunger is yet further inserted within the syringe barrel in accordance with an embodiment of the present invention.

The broken lines shown in FIGS. 1-12 are provided for the purpose of showing environment only, and form no portion of the claimed design.

1 Claim, 6 Drawing Sheets



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U.S. PATENT DOCUMENTS

D401,325 S	*	11/1998	Hjertman et al.	D24/114	D545,429 S	*	6/2007	Hays	D24/114
D419,671 S	*	1/2000	Jansen	D24/112	D548,867 S	*	8/2007	Chue	D24/130
D447,797 S	*	9/2001	Odell et al.	D24/112	D552,773 S	*	10/2007	Greenberg	D24/130
D461,555 S	*	8/2002	Binet et al.	D24/114	D557,337 S	*	12/2007	Isaacs	D24/114
D506,549 S	*	6/2005	Woods	D24/130	D578,210 S	*	10/2008	Muta et al.	D24/114
D542,406 S	*	5/2007	Knight et al.	D24/130	D595,406 S	*	6/2009	Kawamura	D24/130

* cited by examiner

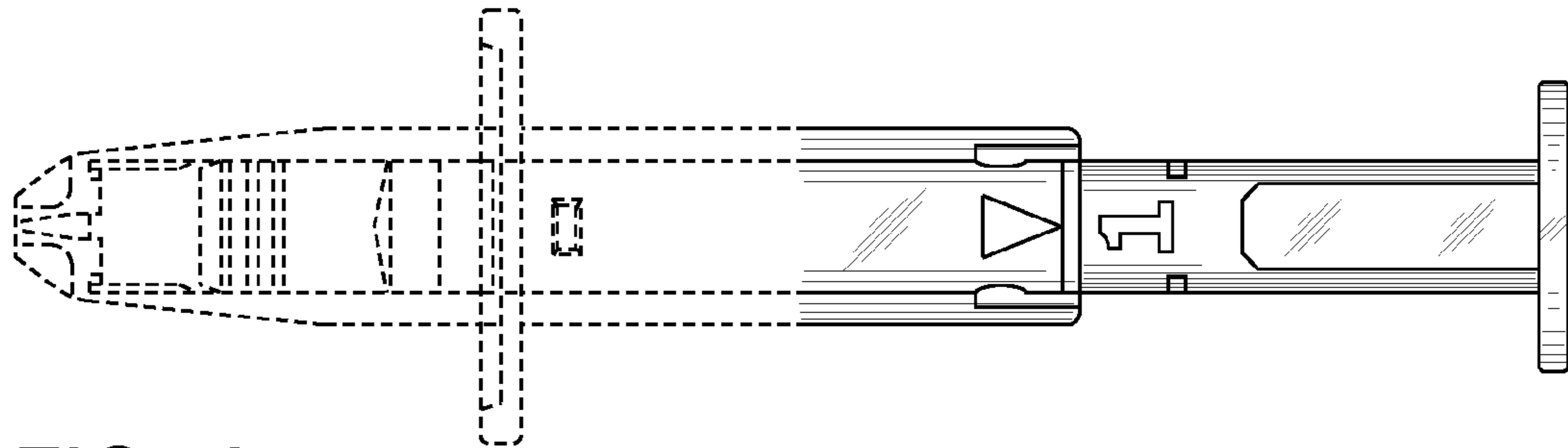


FIG. 1

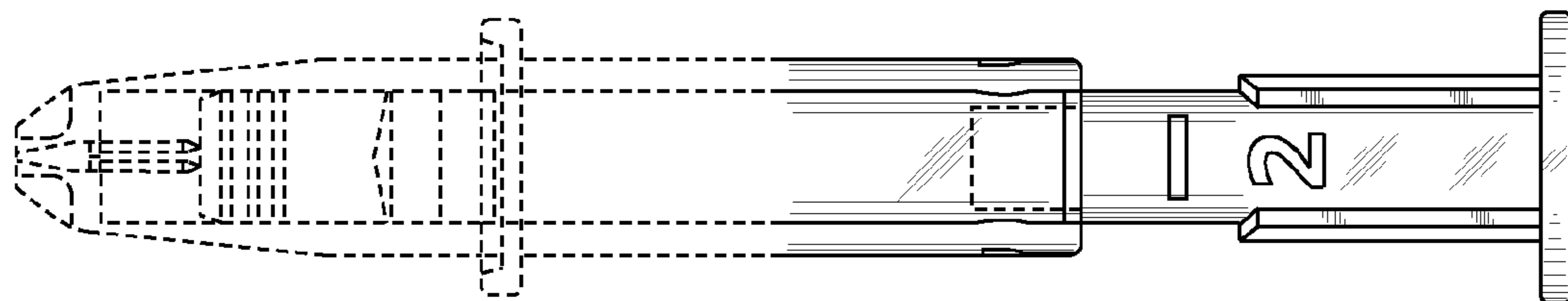


FIG. 2

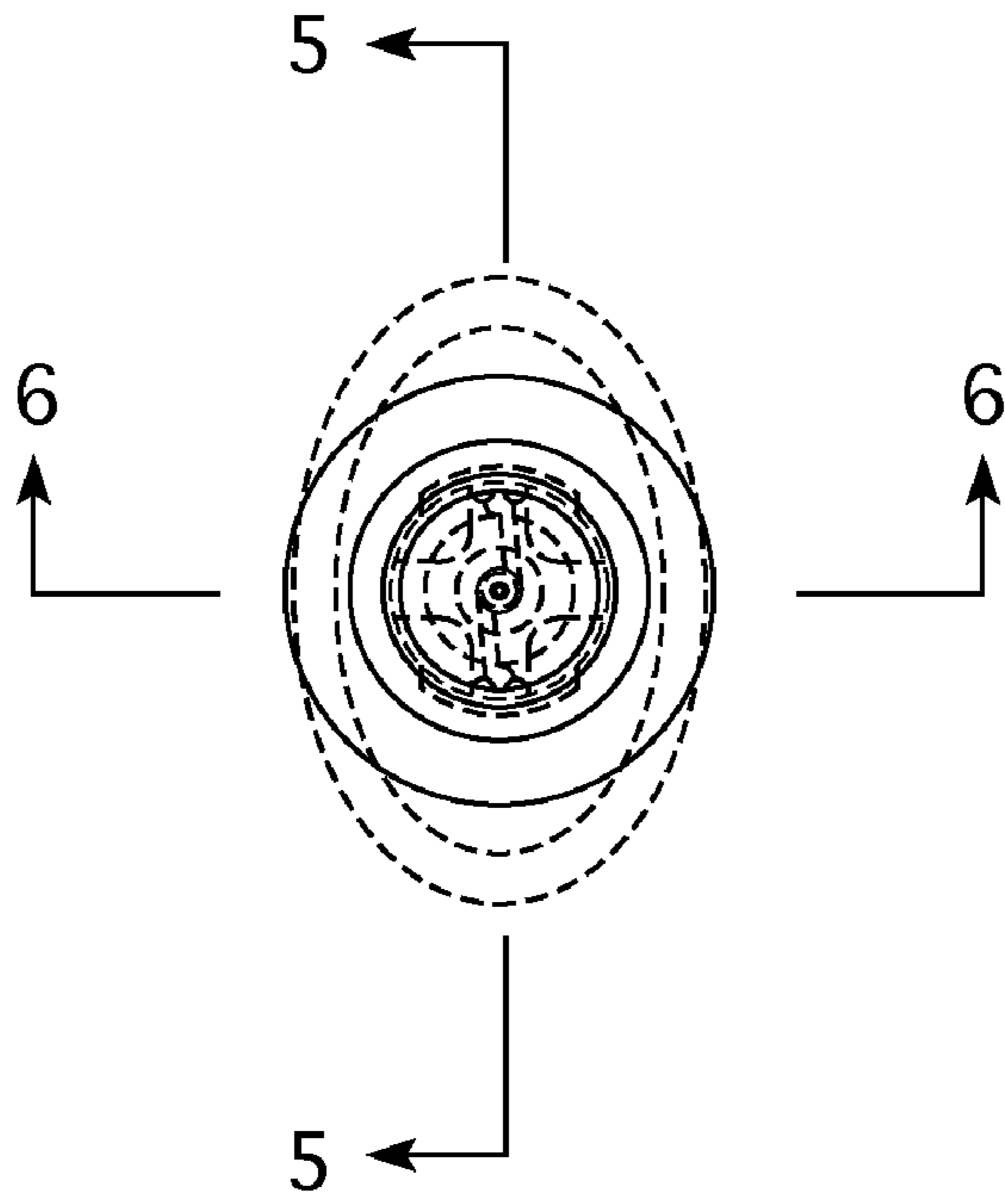


FIG. 3

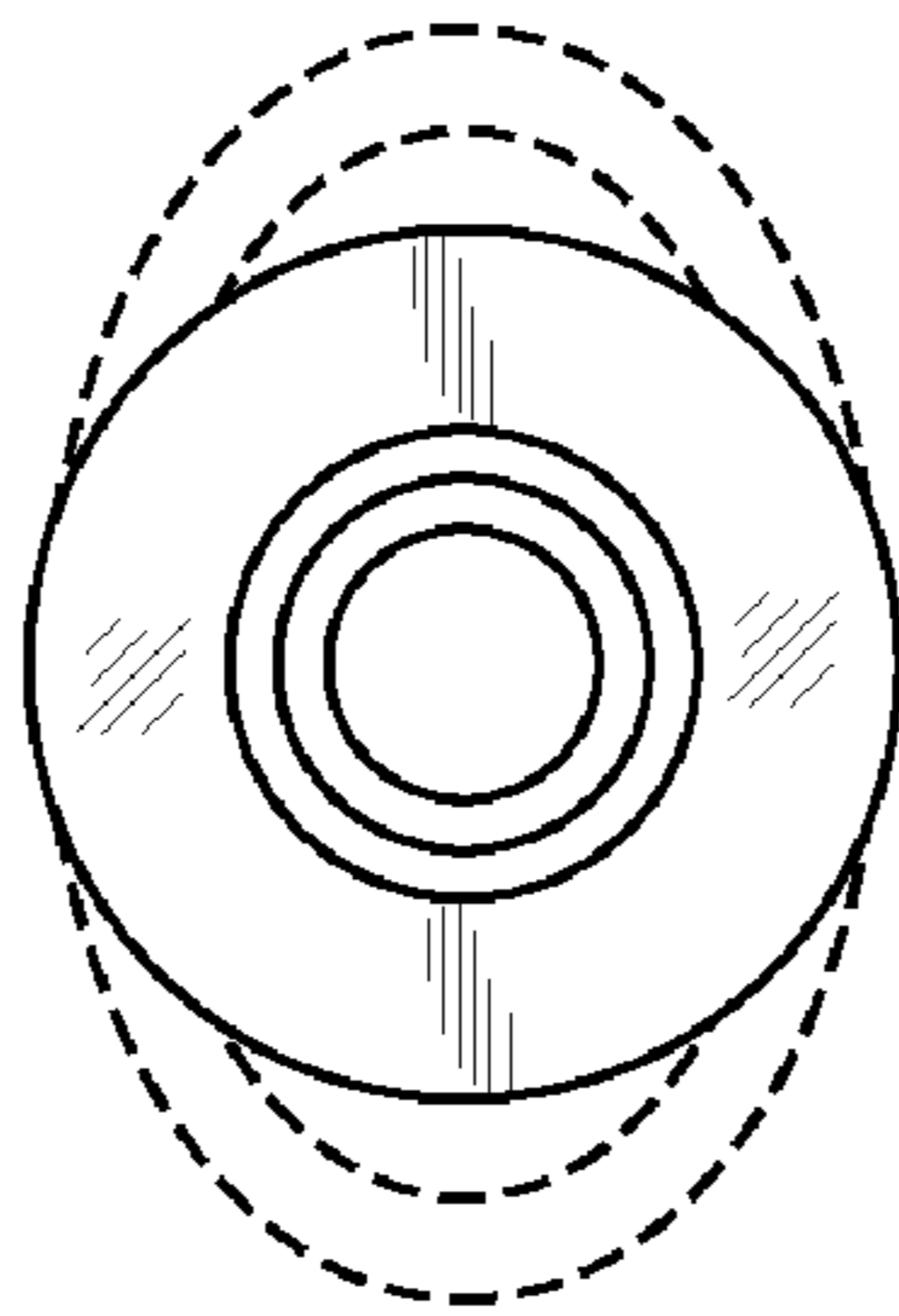


FIG. 4

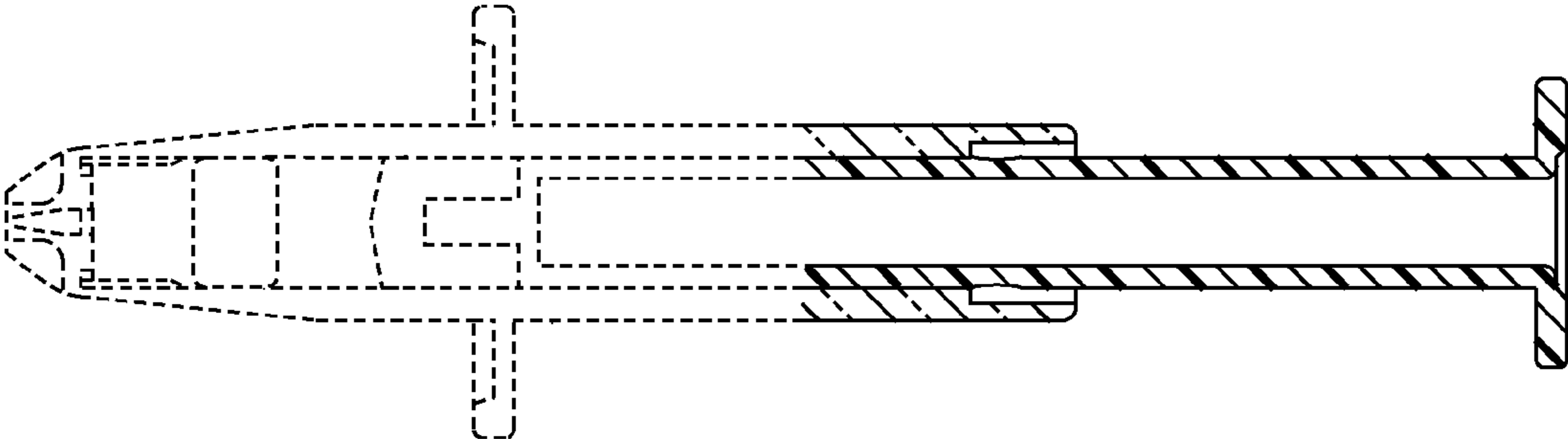


FIG. 5

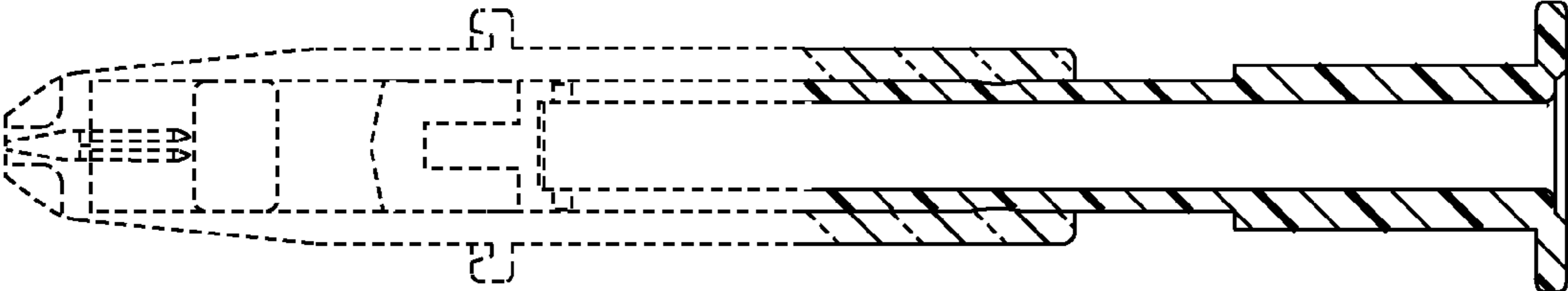


FIG. 6

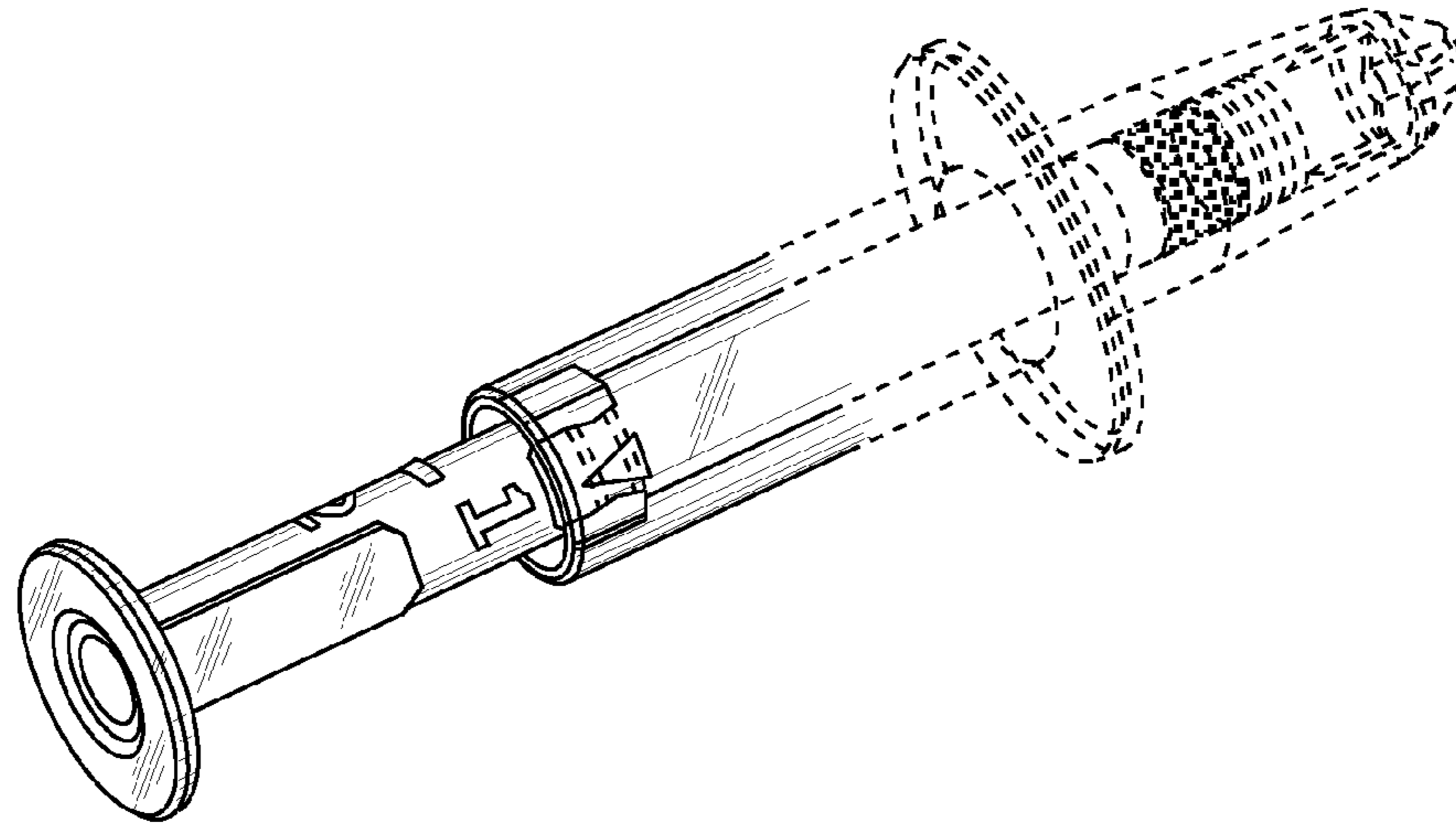


FIG. 7

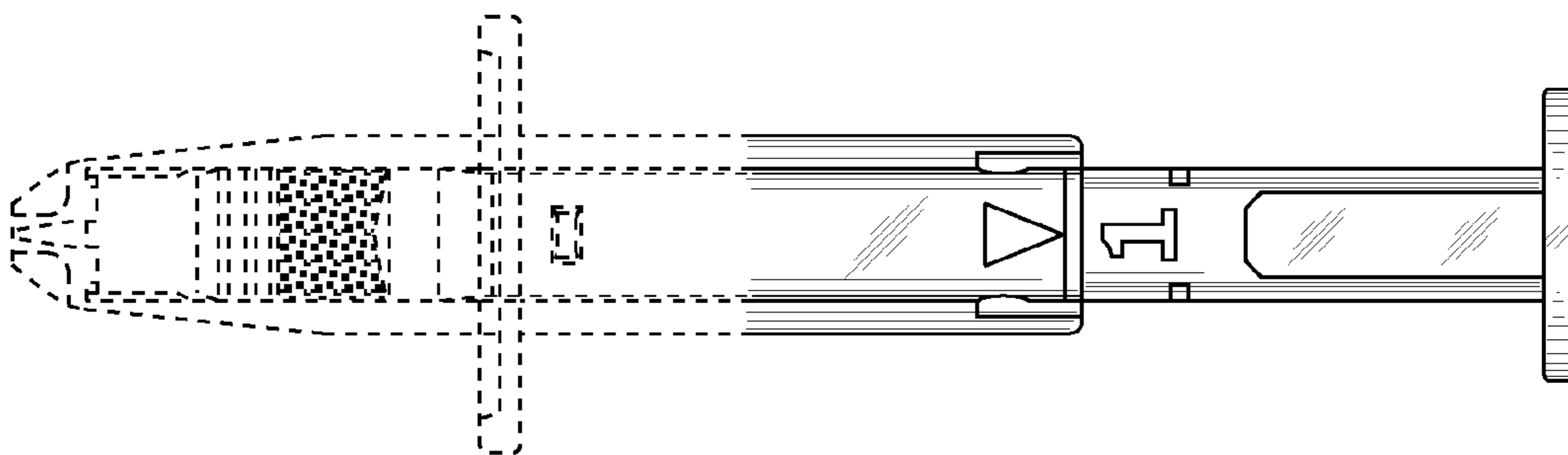


FIG. 8

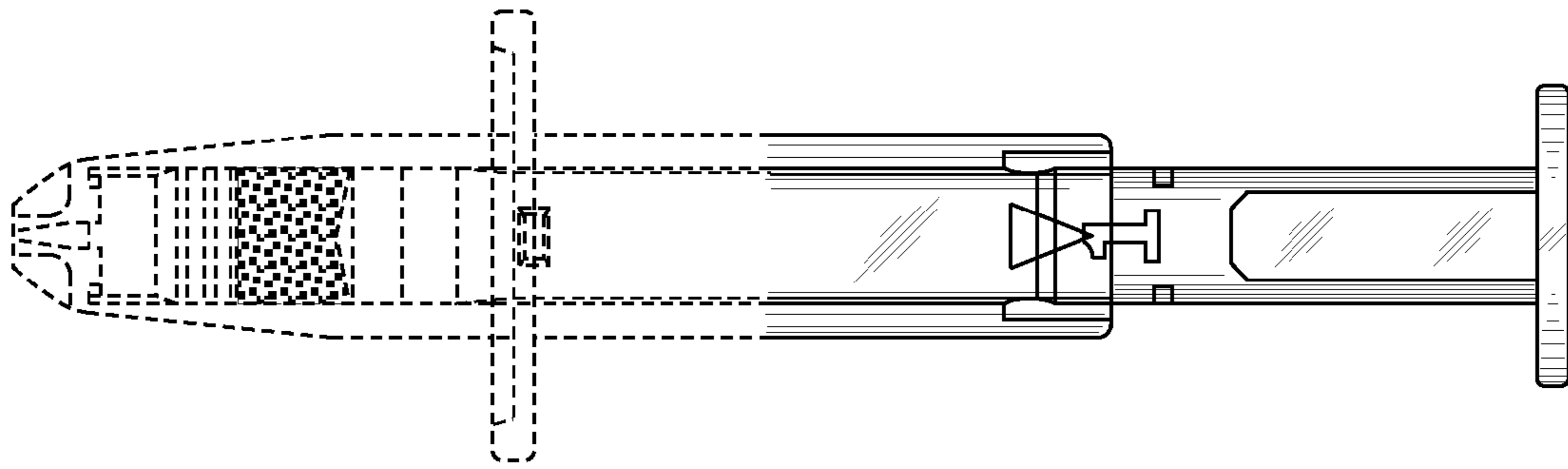


FIG. 9

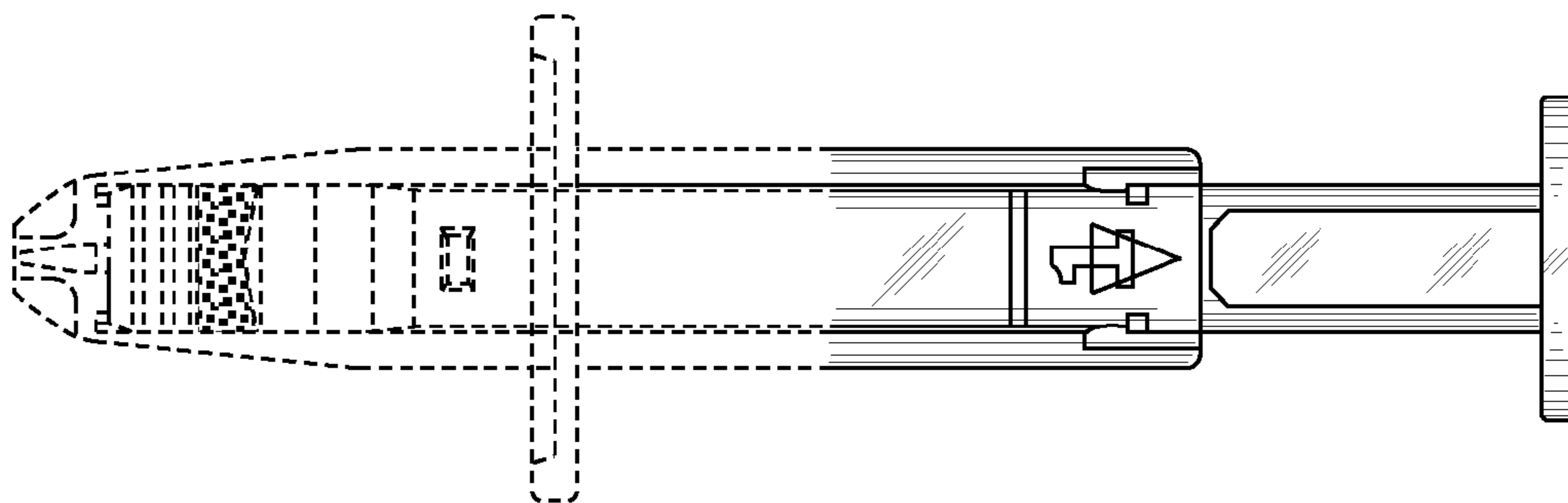


FIG. 10

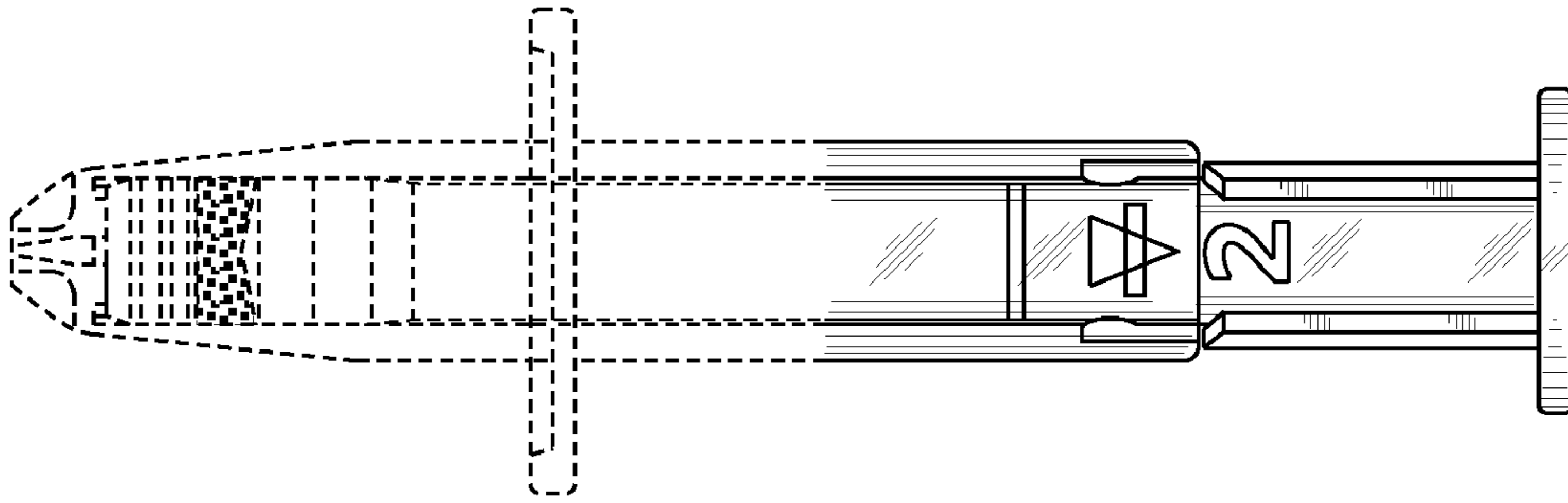


FIG. 11

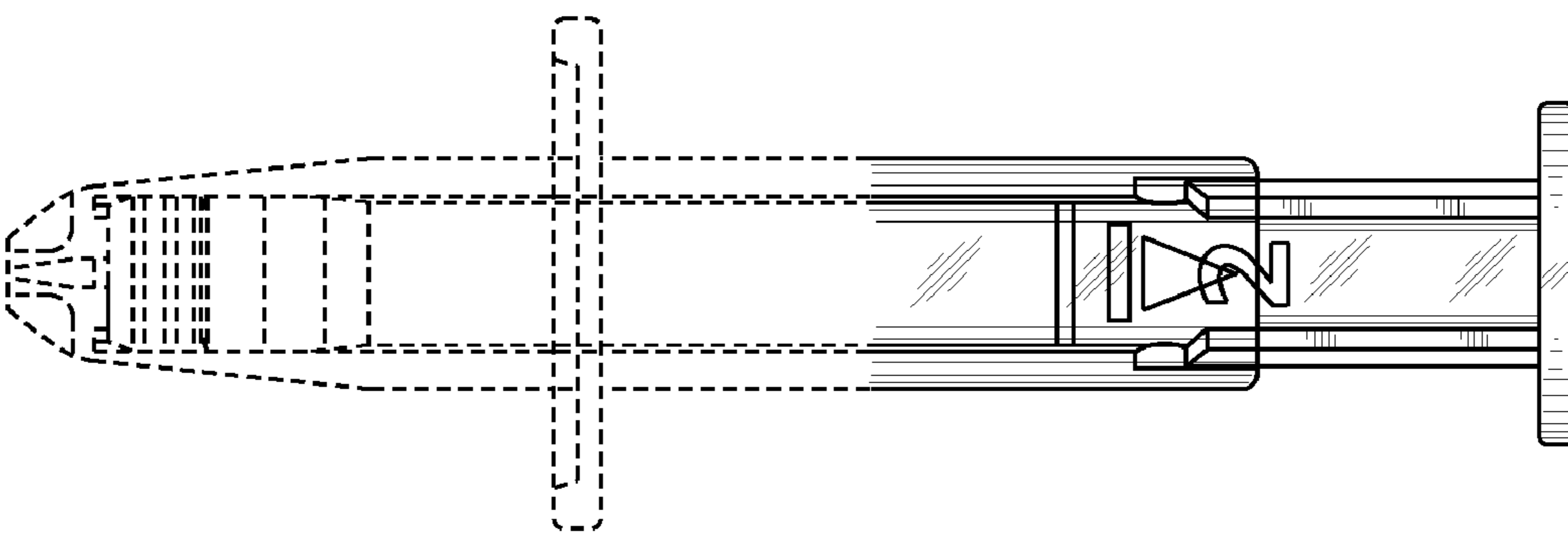


FIG. 12