



US00D681677S

(12) **United States Design Patent**
Shea et al.

(10) **Patent No.:** **US D681,677 S**
(45) **Date of Patent:** **** May 7, 2013**

(54) **METERING VALVE FOR A FUEL CELL**

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

(21) Appl. No.: **29/384,249**

(22) Filed: **Jan. 28, 2011**

Related U.S. Application Data

(62) Division of application No. 29/317,155, filed on Apr. 23, 2008, now Pat. No. Des. 633,922.

(51) **LOC (9) Cl.** **15-01**

(52) **U.S. Cl.**
USPC **D15/5**

(58) **Field of Classification Search** D15/1-5;
55/337; 60/274, 199, 324; 123/41.67, 46 R,
123/198 E, 495; 137/375, 625.46, 637.3;
221/1, 94, 402.1; 251/30.04, 129.02, 129.17,
251/368, 288; 227/9, 10, 130, 156, 402.1,
227/402.15

See application file for complete search history.

(56) **References Cited**

U.S. PATENT DOCUMENTS

D130,911 S 12/1941 Meyer
D257,062 S 9/1980 Swartz et al.
D309,112 S 7/1990 Ziegler
5,115,944 A 5/1992 Nikolich
D420,462 S 2/2000 Menter

D449,872 S 10/2001 Lohde et al.
6,302,297 B1 10/2001 Richardson et al.
6,786,378 B2 9/2004 Wagdy et al.
6,796,478 B2 9/2004 Shkolnikov et al.
7,302,969 B2 12/2007 Hasegawa et al.
7,392,922 B2 7/2008 Vanstaen et al.
7,441,560 B2 10/2008 Sonoda et al.
7,445,136 B2* 11/2008 Lin 222/402.1
7,478,740 B2 1/2009 Shea et al.
7,481,412 B2 1/2009 Ishikawa et al.
D590,840 S* 4/2009 Shea et al. D15/5
7,571,841 B2 8/2009 Gibson et al.
7,591,249 B2 9/2009 Wagdy et al.
D633,922 S* 3/2011 Shea et al. D15/5
2008/0110953 A1* 5/2008 Gibson et al. 227/10

* cited by examiner

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(57) **CLAIM**

The ornamental design for a metering valve for a fuel cell, as shown and described.

DESCRIPTION

FIG. 1 is a top perspective view of a first embodiment of the present metering valve;

FIG. 2 is a front view of same;

FIG. 3 is a right side view of the present metering valve;

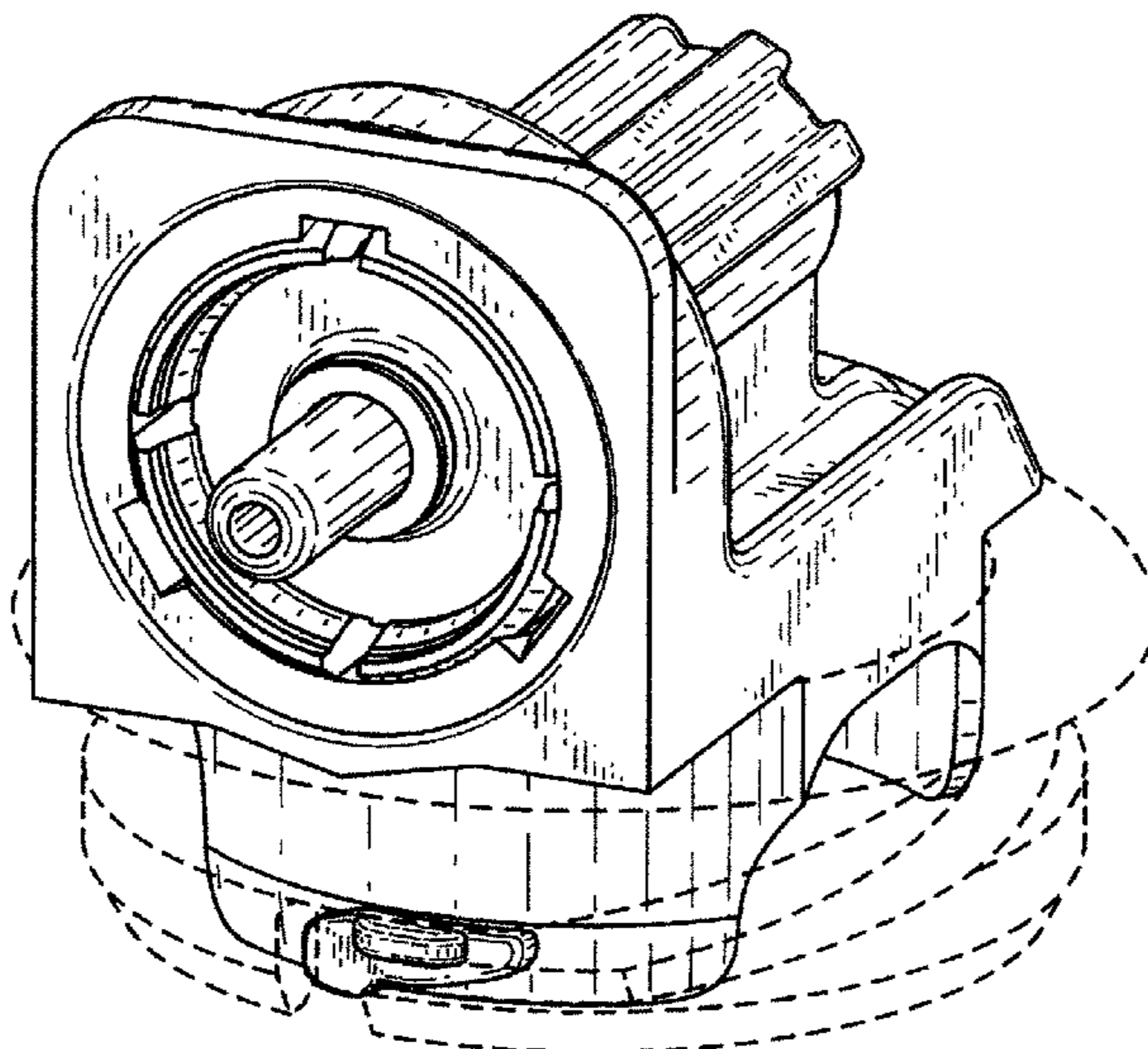
FIG. 4 is a left side view of same;

FIG. 5 is a rear view of the present metering valve; and,

FIG. 6 is a top view of same.

The subject matter shown in broken lines in the drawings is submitted for environment purposes only and does not form part of the claimed invention.

1 Claim, 4 Drawing Sheets



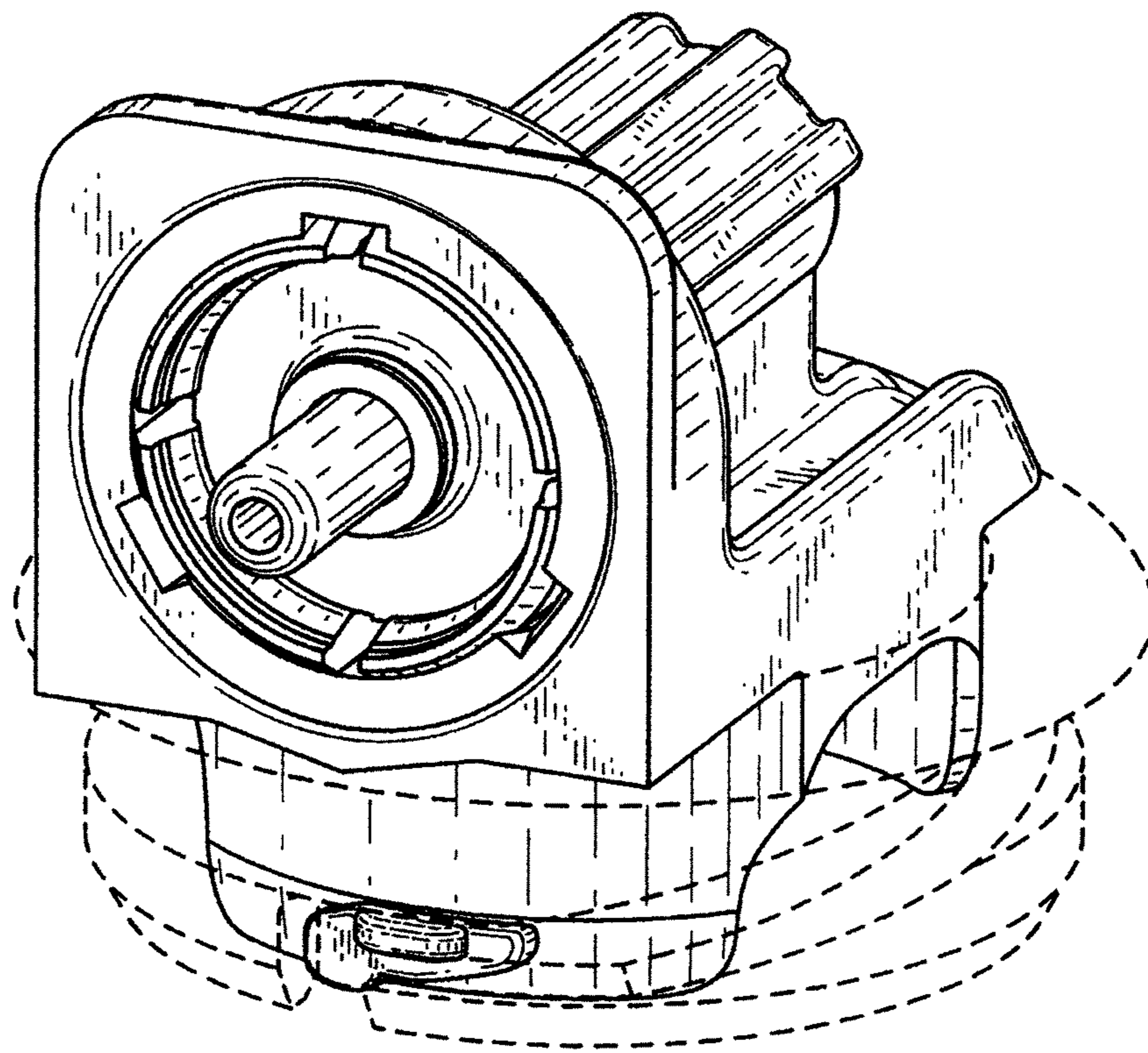


Fig. 1

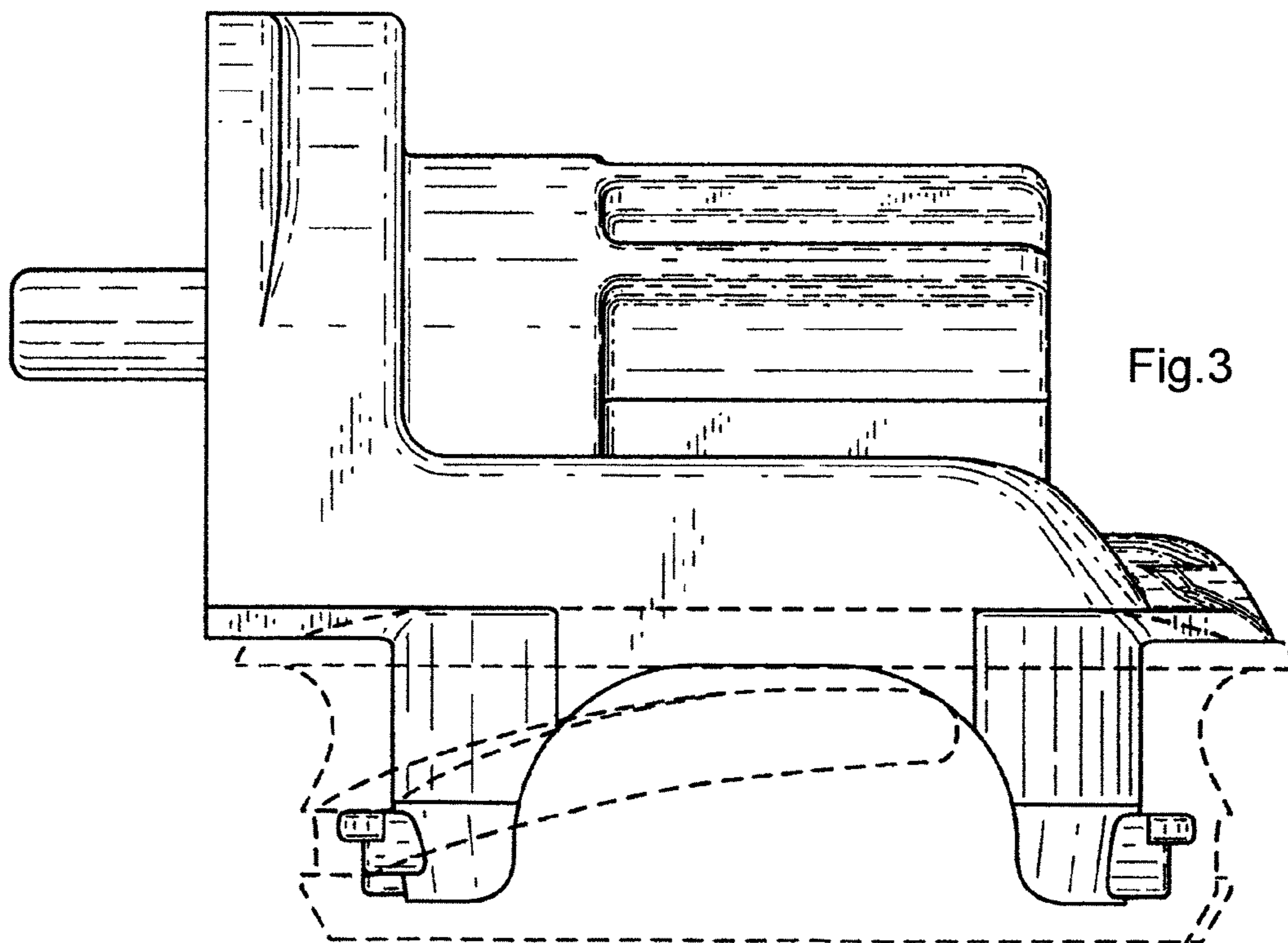
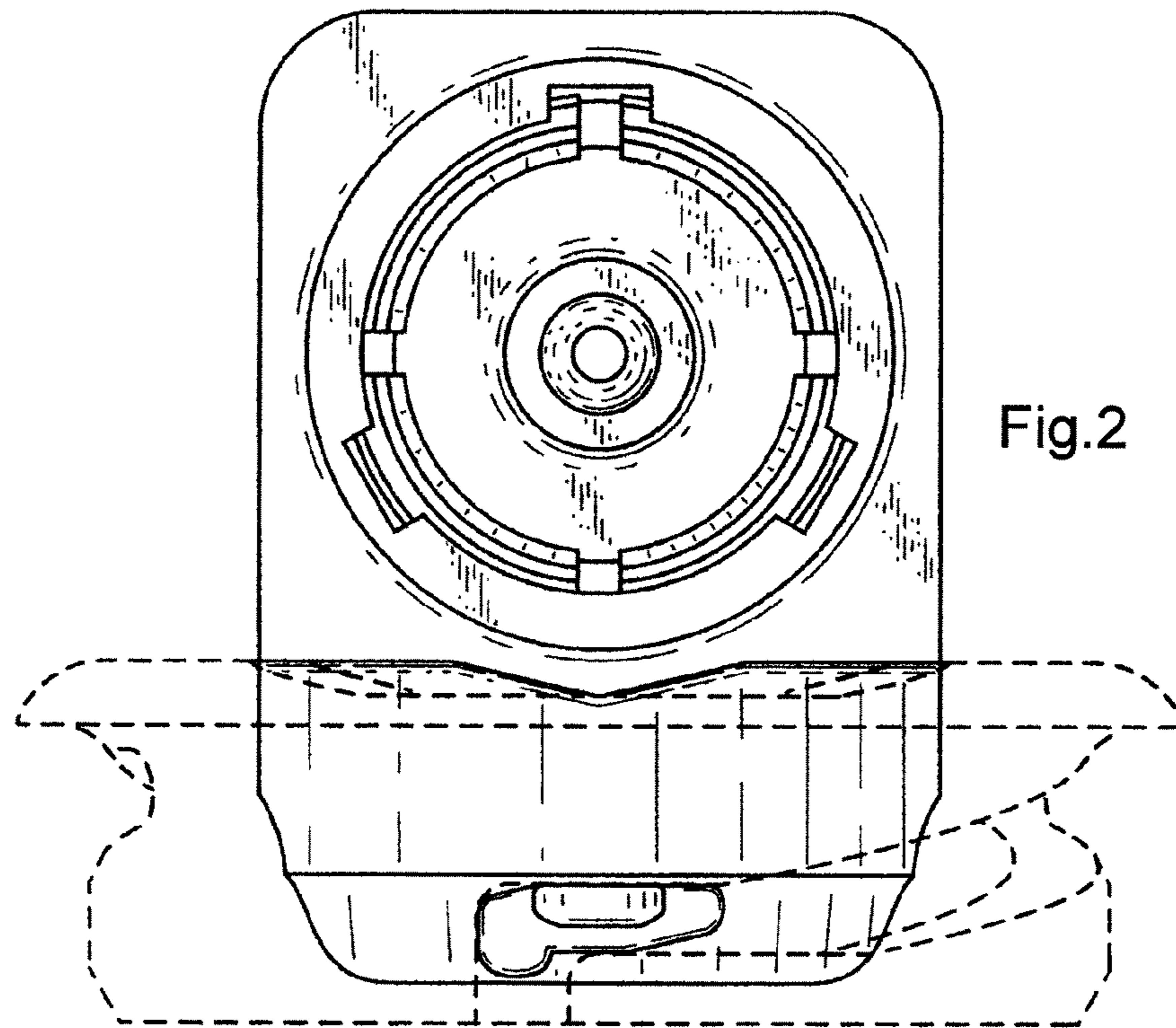


Fig.4

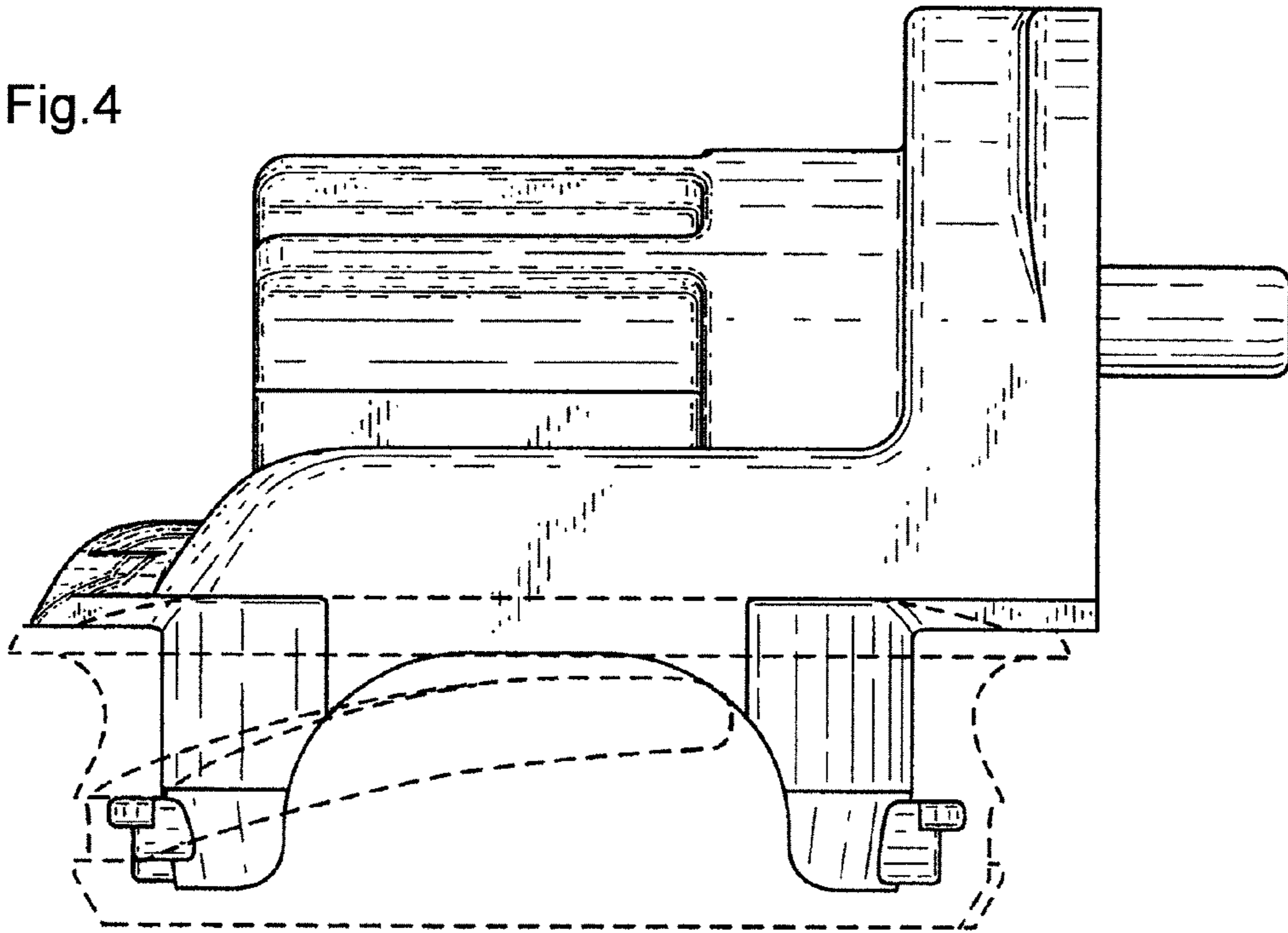
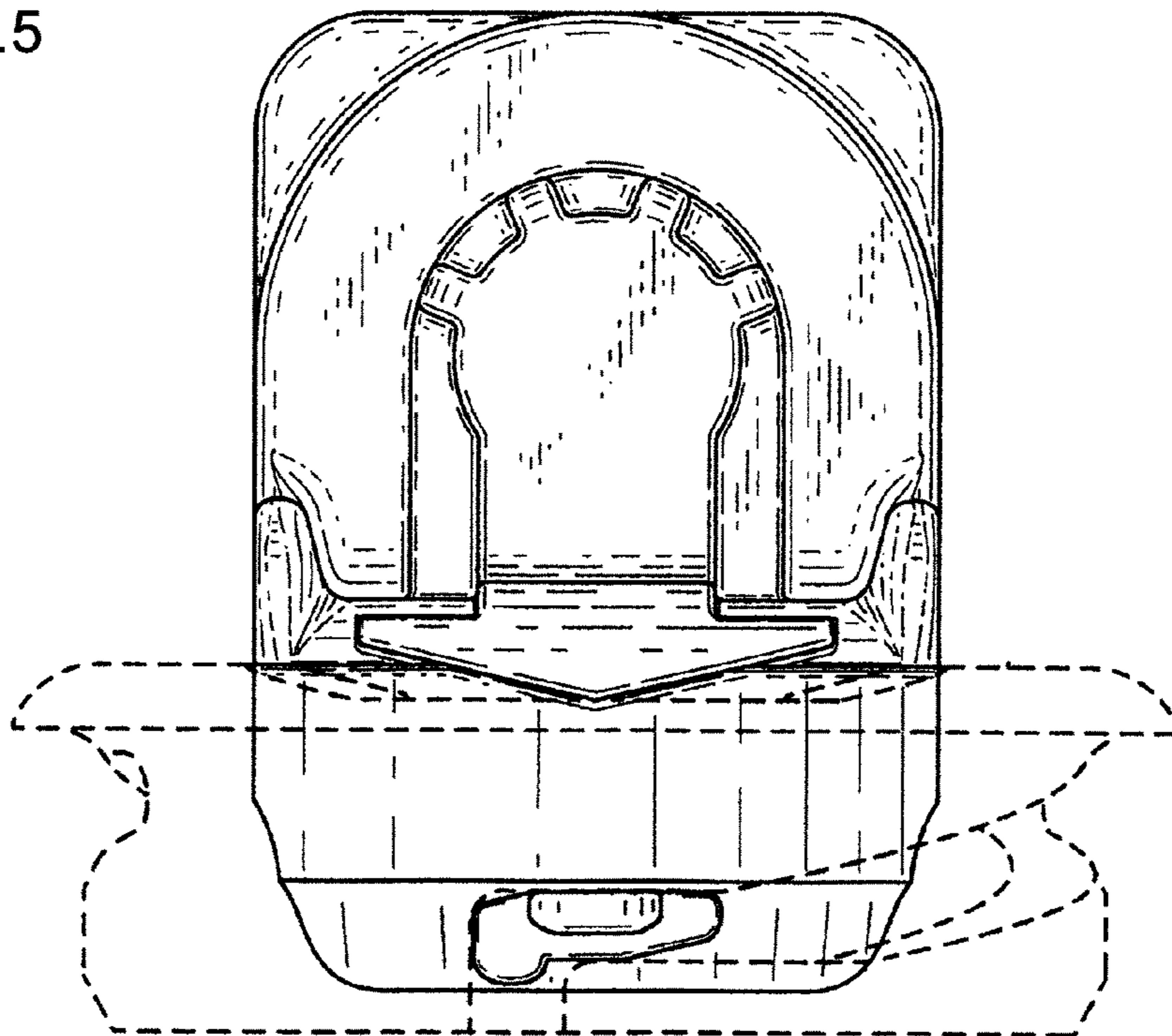


Fig.5



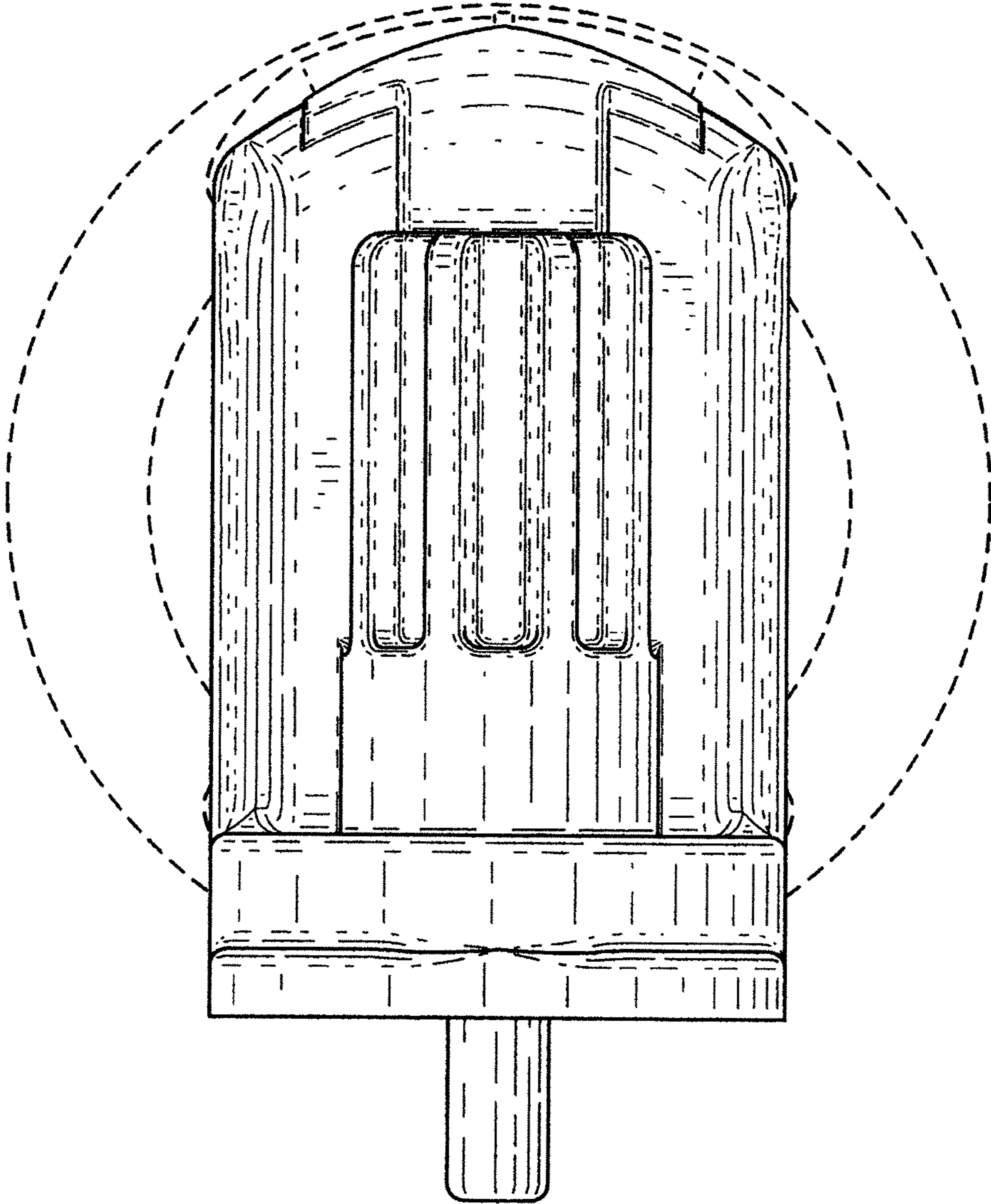


Fig.6