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

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- (54) **LOUDSPEAKER HEAT SINK**
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- (73) Assignee: **Harman International Industries, Incorporated**, Northridge, CA (US)
- (**) Term: **15 Years**
- (21) Appl. No.: **29/646,296**
- (22) Filed: **May 3, 2018**
- (51) **LOC (12) Cl.** **14-01**
- (52) **U.S. Cl.**
USPC **D14/221**
- (58) **Field of Classification Search**
USPC ... D14/141.1, 159, 218, 219, 220, 221, 222, D14/223, 224, 224.1, 225, 227, 228, 229, D14/259, 341, 344, 345, 299
CPC . H04R 1/00; H04R 1/02; H04R 1/326; H04R 1/406; H04R 1/083; H04R 1/222; H04R 1/1041; H04R 1/023; H04R 7/00; H04R 7/20; H04R 27/00; H04R 2201/00; H04R 2400/00; H04R 17/02; H04R 29/004; H04R 29/005; H04R 19/04; H04R 2420/07; H04R 2410/00; H04R 2410/01; H04R 5/02; G02B 27/01
See application file for complete search history.

- D644,634 S * 9/2011 Cywan D14/224
- D691,595 S * 10/2013 Fuller D14/224
- D691,598 S * 10/2013 Fuller D14/224
- D713,821 S 9/2014 Hyde et al.
- D725,636 S * 3/2015 McNamara D14/205
- D738,865 S * 9/2015 Moon D14/211
- D741,841 S * 10/2015 Fuller D14/224
- D756,973 S * 5/2016 Wright D14/224
- D762,181 S * 7/2016 Lin F21V 29/83
D13/179
- D787,455 S 5/2017 Pliner et al.
- D808,935 S * 1/2018 Bullimore D14/224
- D810,050 S * 2/2018 Uemoto D14/216
- 10,038,954 B2 * 7/2018 Voishvillo H04R 9/066
- D832,239 S * 10/2018 Warden D14/222
- D833,421 S * 11/2018 Telle D14/224

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(57) **CLAIM**

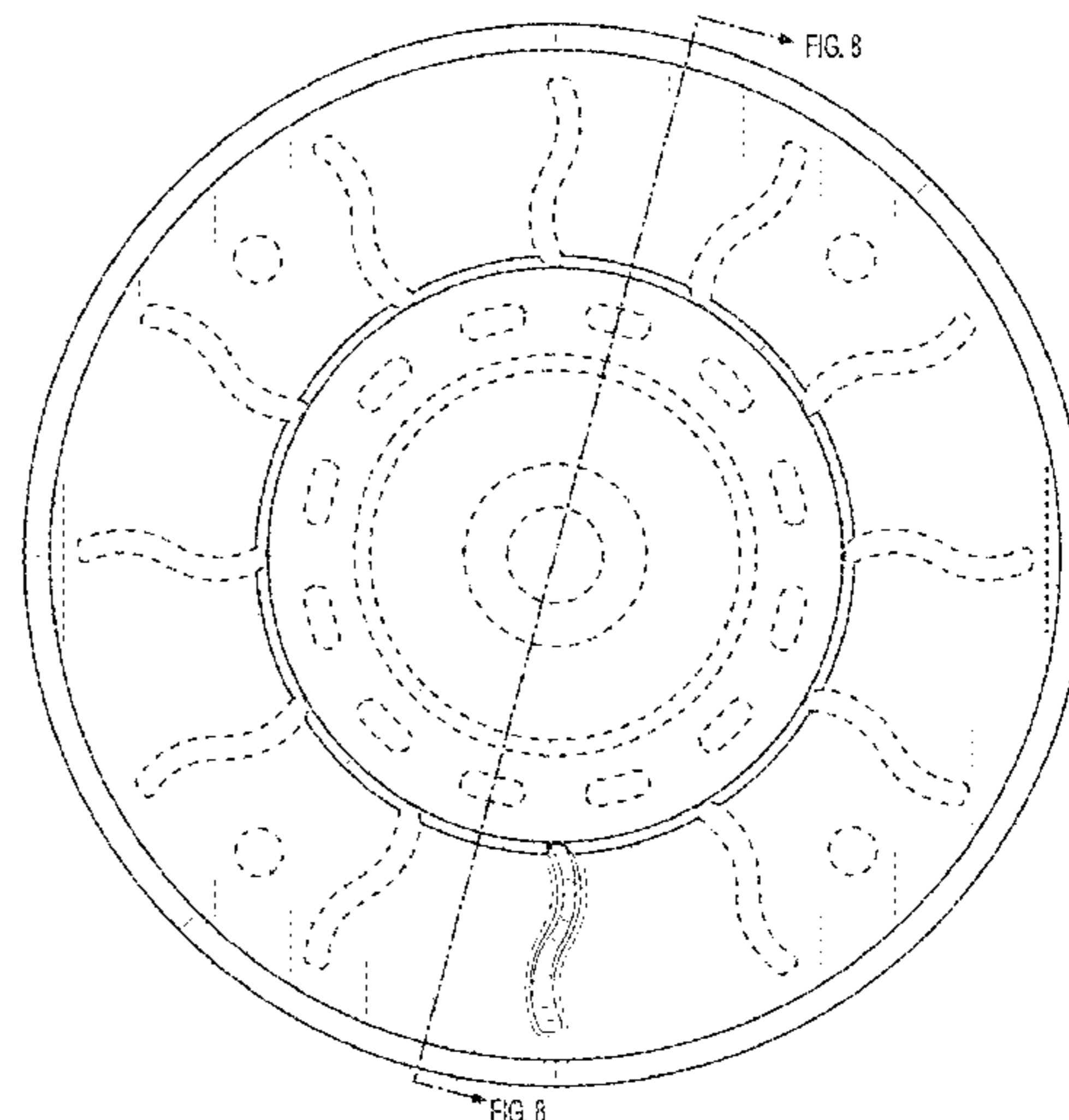
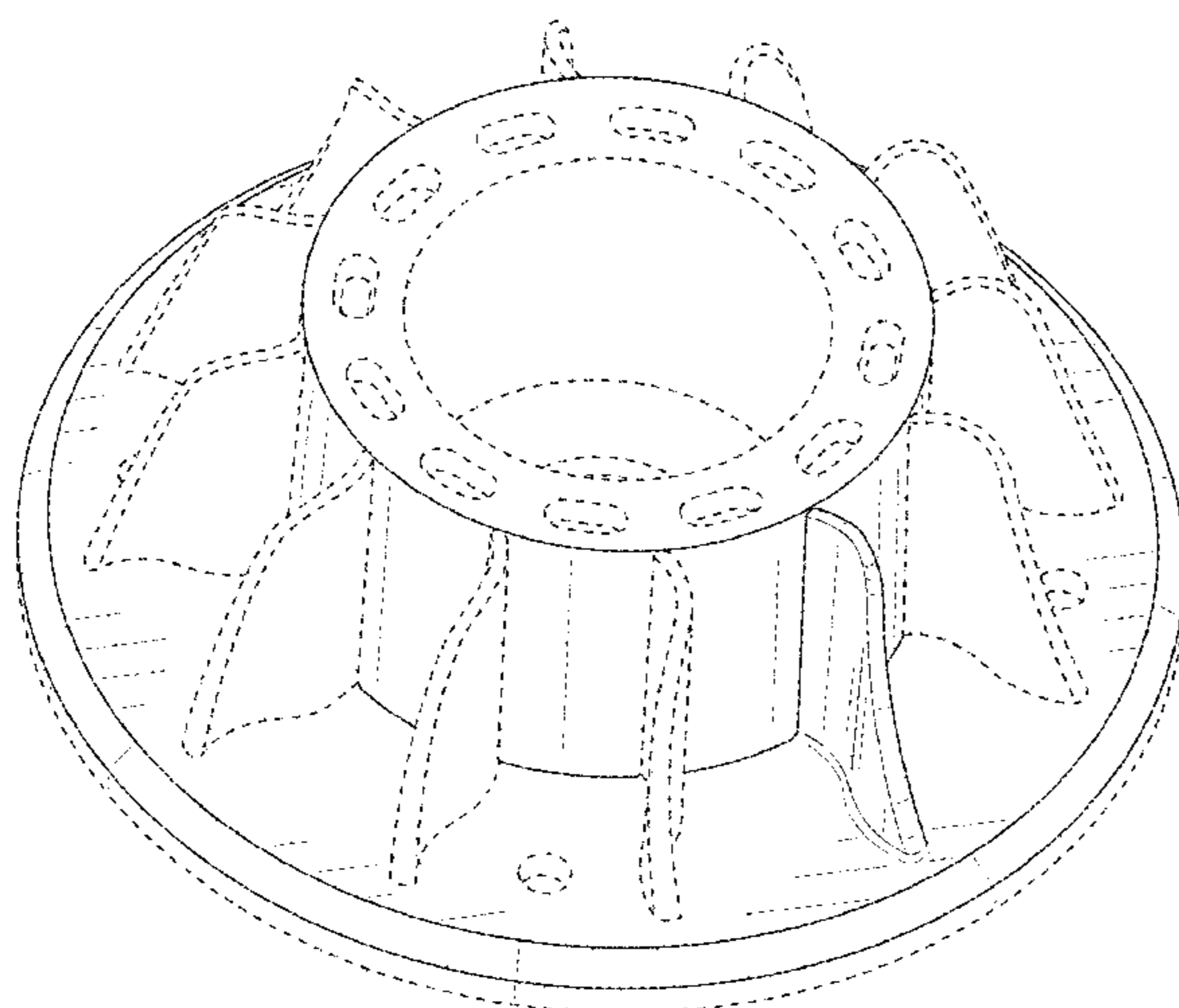
The ornamental design for a loudspeaker heat sink, as shown and described.

DESCRIPTION

FIG. 1 is a perspective view of a loudspeaker heat sink showing the new design;
 FIG. 2 is a front elevational view thereof;
 FIG. 3 is a rear elevational view thereof;
 FIG. 4 is a side elevational view thereof;
 FIG. 5 is an opposite side elevational view thereof;
 FIG. 6 is a top plan view thereof;
 FIG. 7 is a bottom plan view thereof; and,
 FIG. 8 is a cross-sectional view thereof, taken along line 8-8 of FIG. 2.
 The broken lines in the drawings depict portions of the loudspeaker heat sink that form no part of the claimed design.

1 Claim, 8 Drawing Sheets

- (56) **References Cited**
U.S. PATENT DOCUMENTS
- D480,709 S * 10/2003 Proni D14/216
- D483,744 S * 12/2003 Vosse D14/224
- D578,113 S * 10/2008 Yagihashi D14/224
- D615,532 S * 5/2010 Dodd D14/221
- D637,582 S * 5/2011 Wada D14/216



(56)

References Cited

U.S. PATENT DOCUMENTS

2004/0202535 A1* 10/2004 Lin F04D 29/281
415/84
2008/0025549 A1* 1/2008 Avera H04R 9/022
381/397
2013/0259692 A1* 10/2013 Chen F04D 29/26
416/195

* cited by examiner

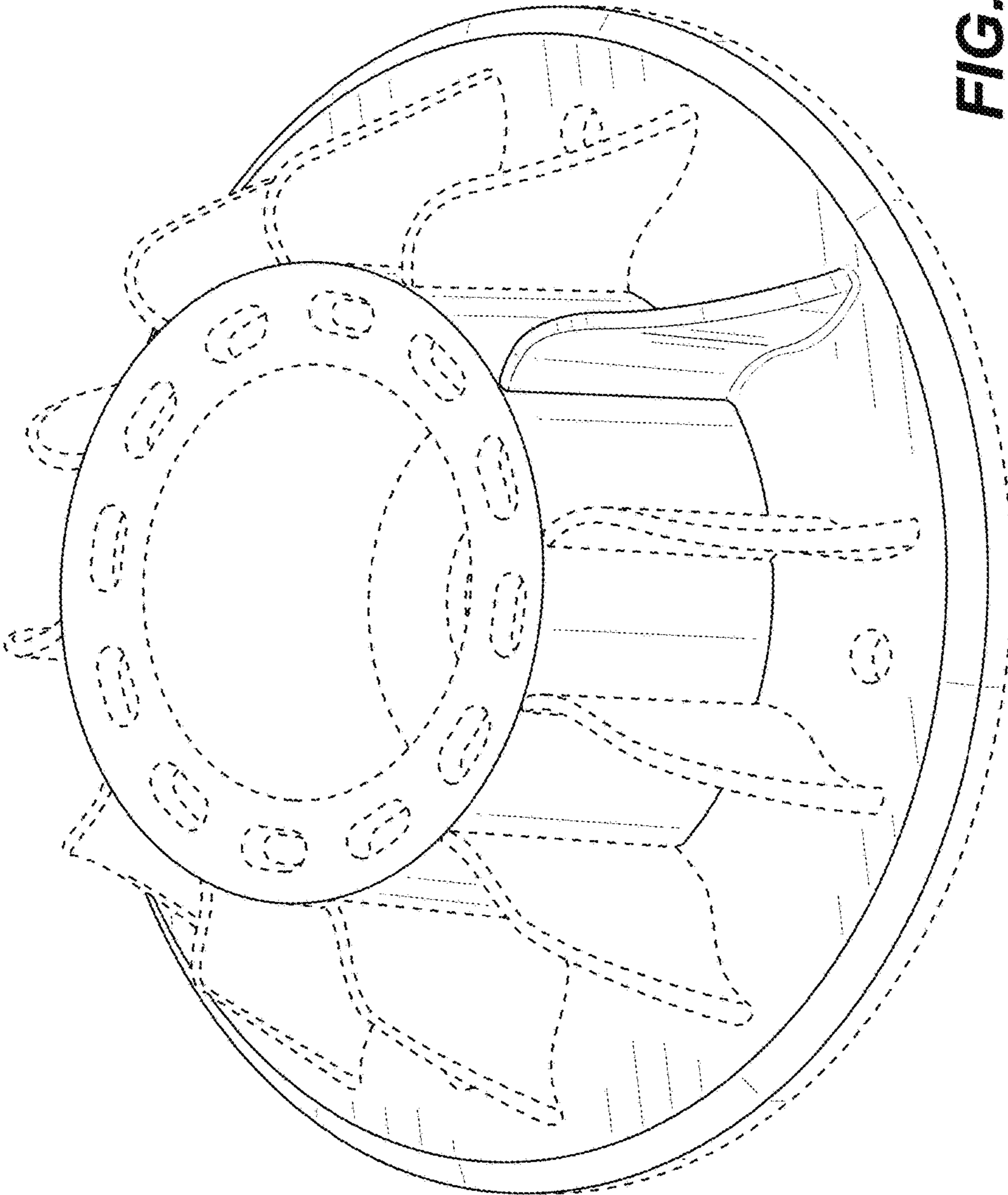


FIG. 1

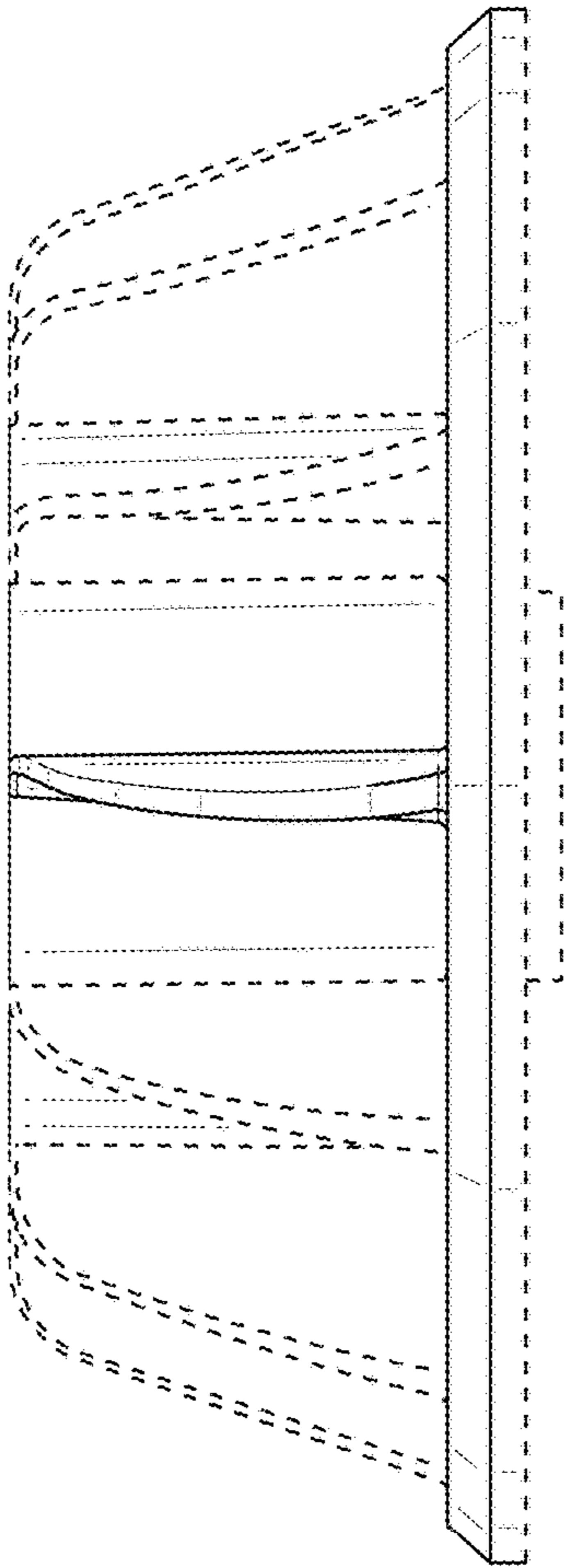


FIG. 2

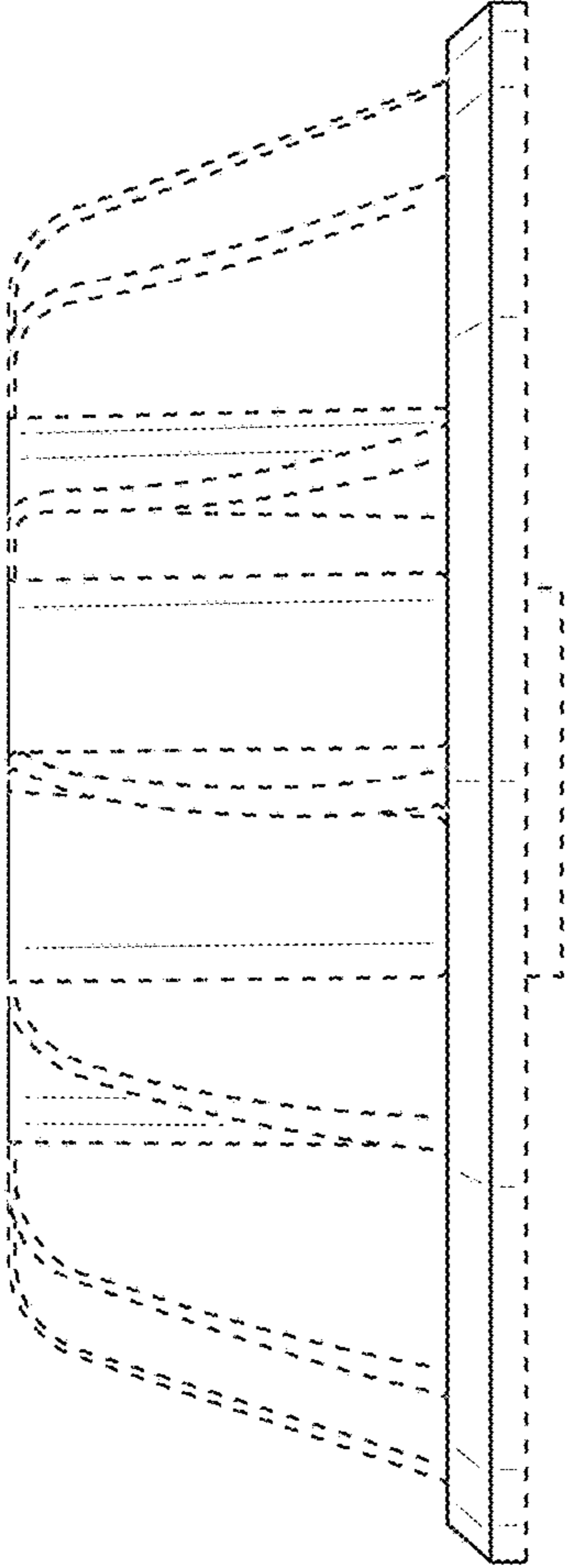


FIG. 3

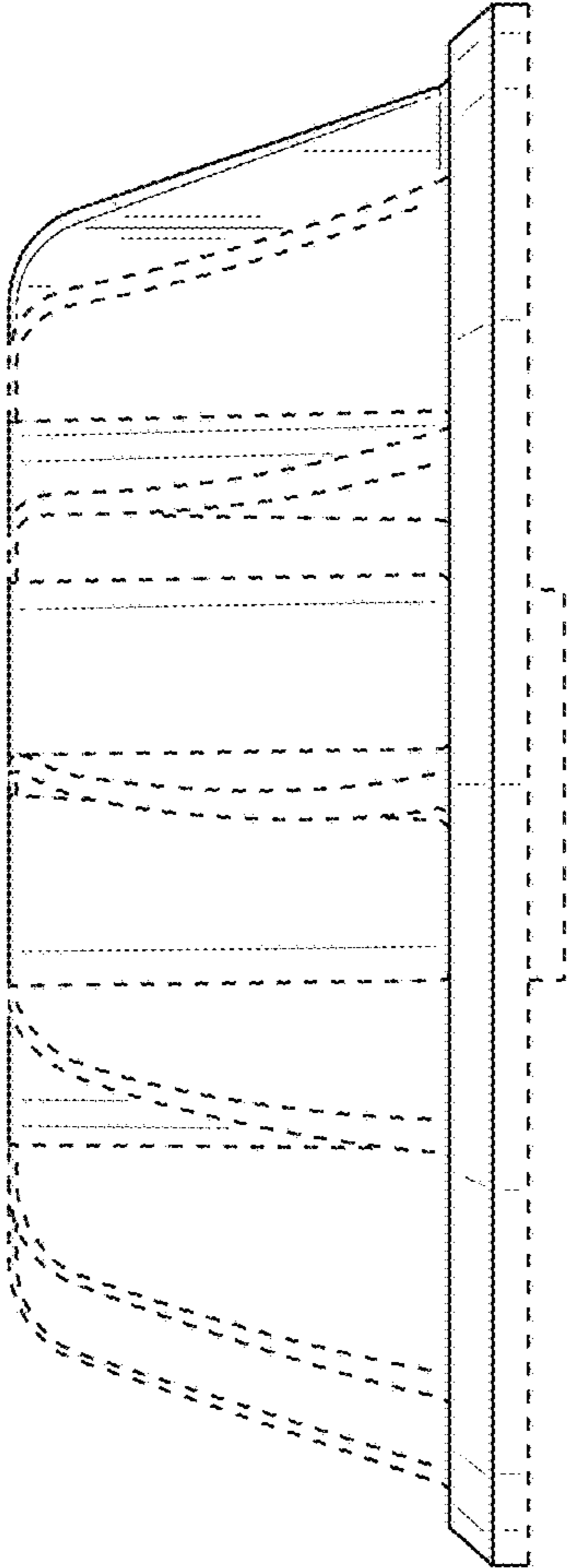


FIG. 4

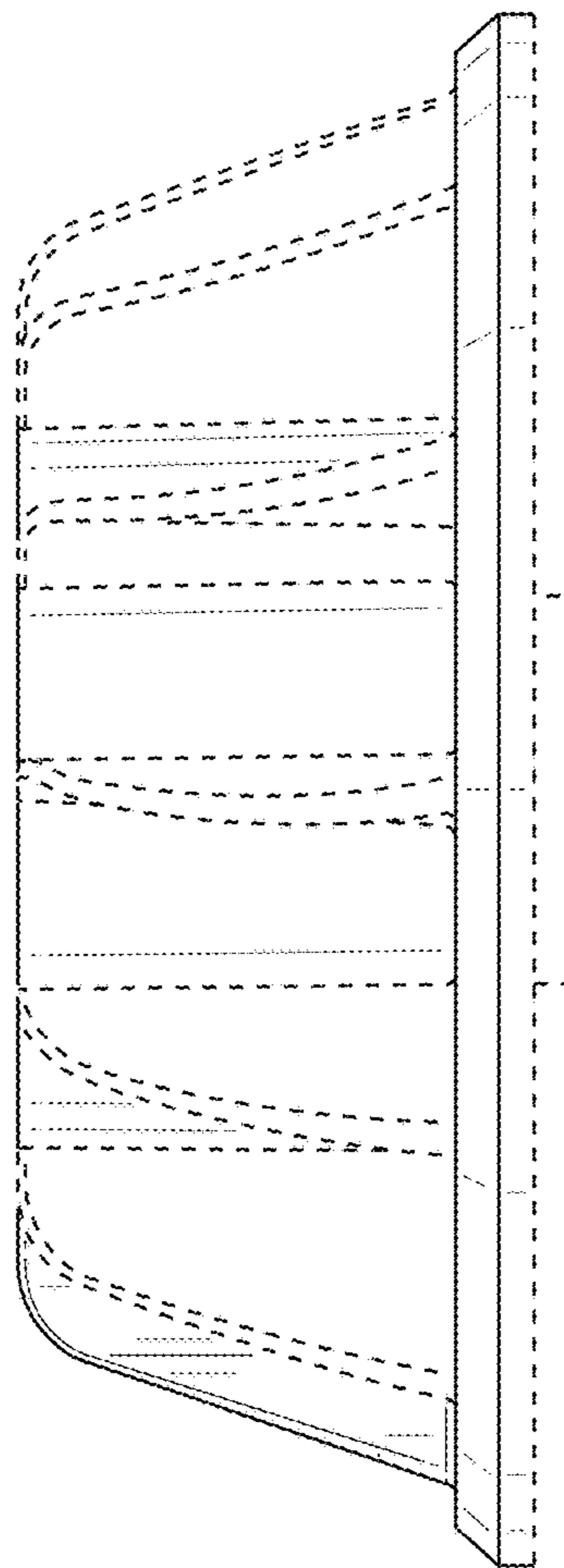


FIG. 5

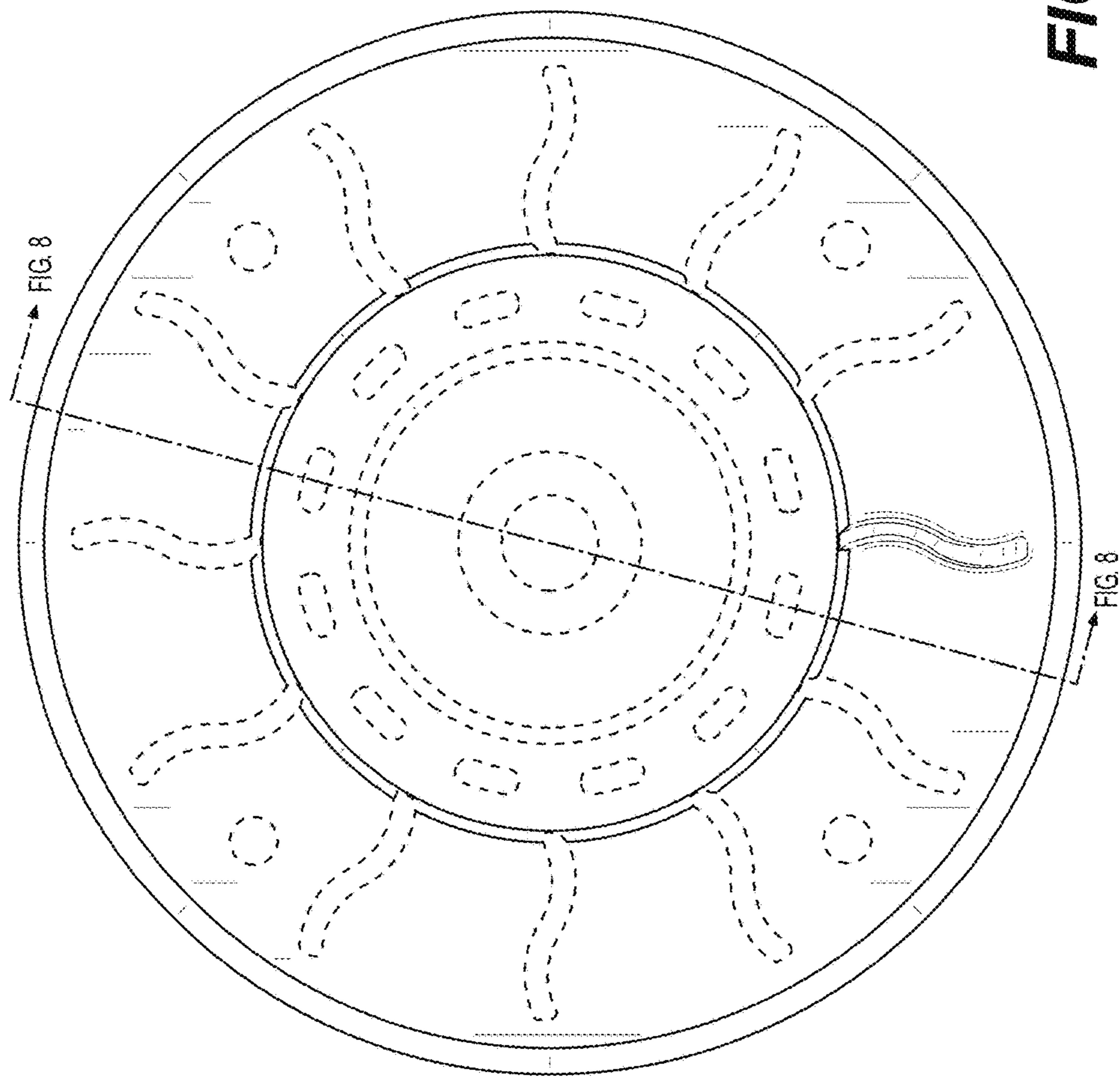


FIG. 6

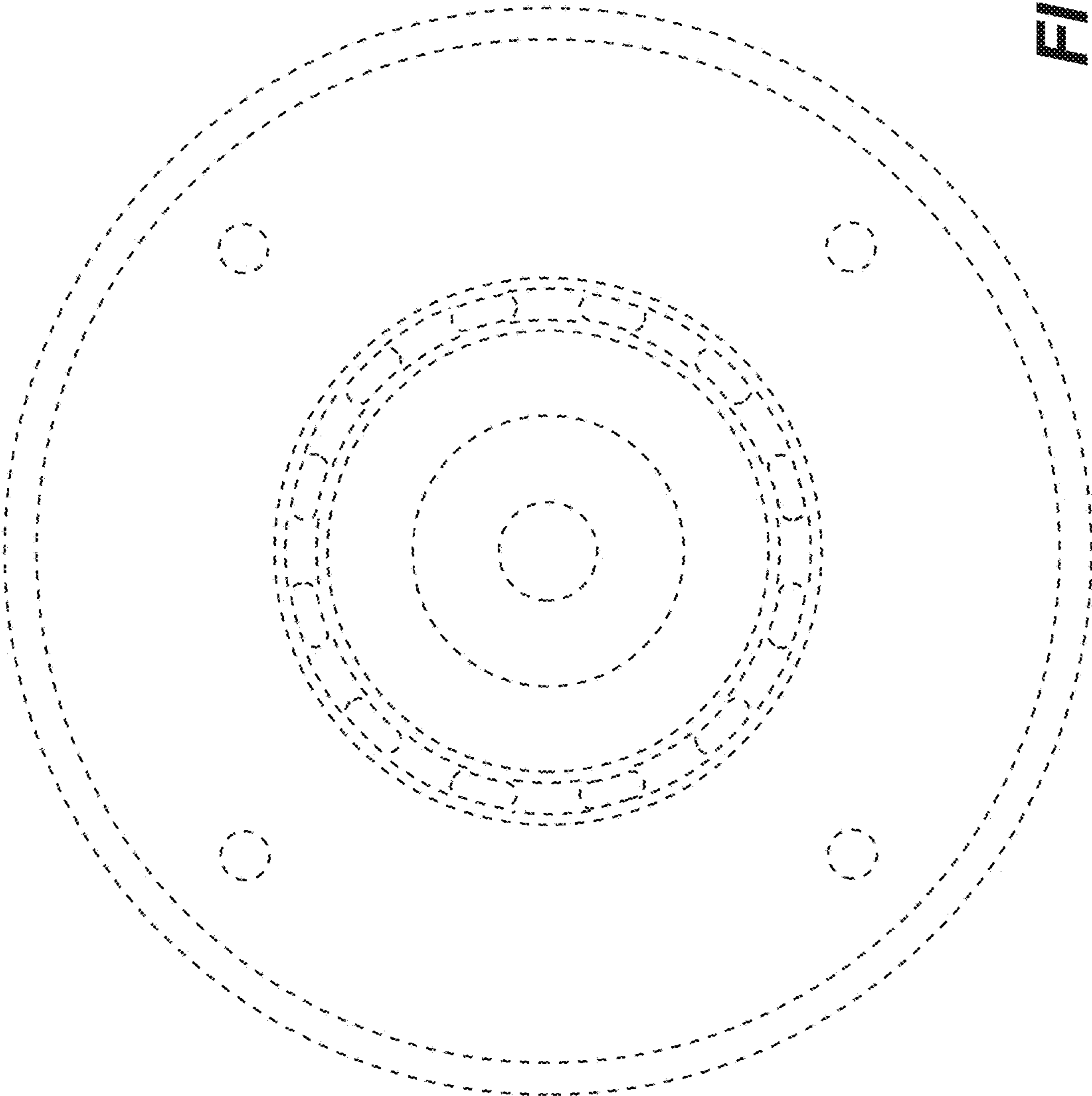


FIG. 7

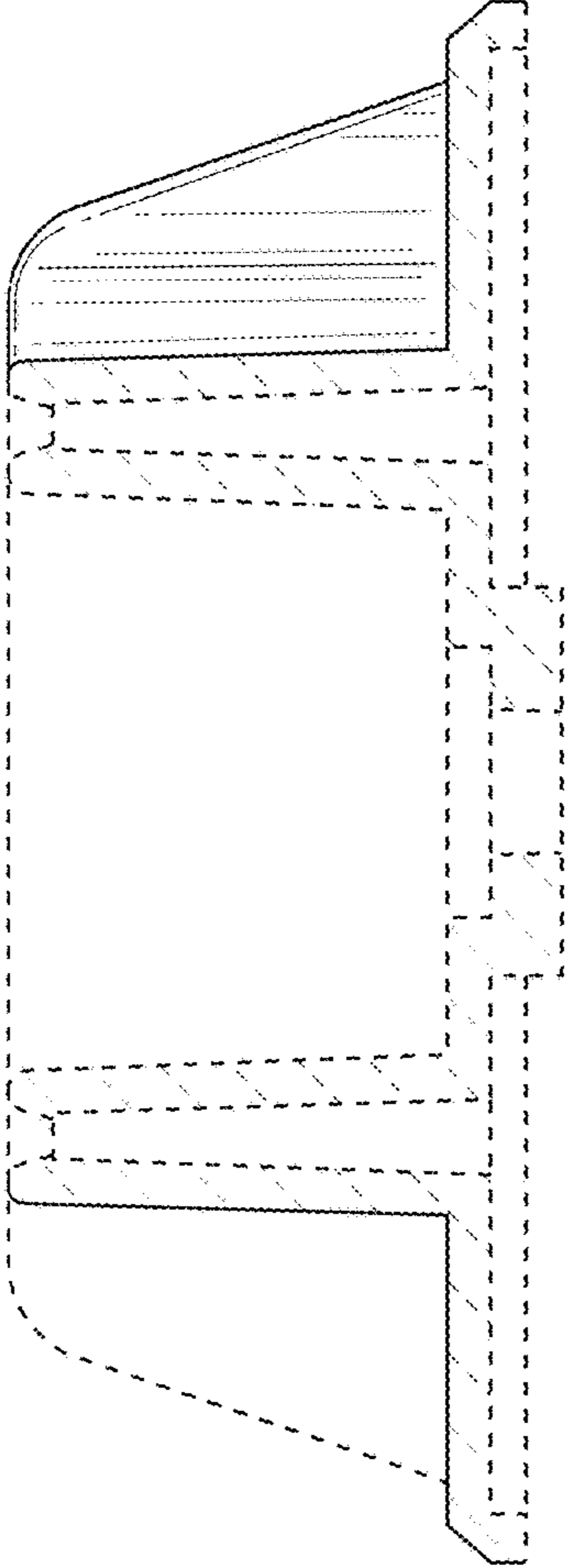


FIG. 8