



US00D851250S

(12) **United States Design Patent** (10) **Patent No.:** **US D851,250 S**
Weinstein et al. (45) **Date of Patent:** **** Jun. 11, 2019**

(54) **BONE STAPLE**

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Greenwald & Villanueva, PC

(71) Applicant: **ORTHOVESTMENTS, LLC**,
Marietta, GA (US)

(57) **CLAIM**

(72) Inventors: **Robert Brian Weinstein**, Atlanta, GA
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Atlanta, GA (US)

The ornamental design for a bone staple, substantially as
shown and described.

(73) Assignee: **ORTHOVESTMENTS, LLC**,
Marietta, GA (US)

DESCRIPTION

(**) Term: **15 Years**

FIG. 1 is a first perspective view of a bone staple according
to an embodiment of the design.

(21) Appl. No.: **29/546,154**

FIG. 2 is a second perspective view of the bone staple shown
in FIG. 1.

(22) Filed: **Nov. 19, 2015**

FIG. 3 is a first end view of the bone staple shown in FIG.
1.

(51) **LOC (11) Cl.** **24-03**

FIG. 4 is a second end view of the bone staple shown in FIG.
1.

(52) **U.S. Cl.**

USPC **D24/155**

FIG. 5 is a first side view of the bone staple shown in FIG.
1.

(58) **Field of Classification Search**

USPC D24/155

FIG. 6 is a second side view of the bone staple shown in FIG.
1.

(Continued)

FIG. 7 is a front view of the bone staple shown in FIG. 1.
FIG. 8 is a back view of the bone staple shown in FIG. 1.

(56) **References Cited**

U.S. PATENT DOCUMENTS

3,212,819 A 10/1965 Churchill
4,592,346 A 6/1986 Jurgutis

(Continued)

FIG. 9 is a first perspective view of a bone staple according
to another embodiment of the design.

FOREIGN PATENT DOCUMENTS

EP 1070482 A2 1/2001
EP 2361571 A2 8/2011

(Continued)

FIG. 10 is a second perspective view of the bone staple
shown in FIG. 9.

OTHER PUBLICATIONS

International Search Report & Written Opinion for PCT/US2016/
019187; dated Apr. 20, 2016; 13 pgs.

FIG. 11 is a first end view of the bone staple shown in FIG.
9.

FIG. 12 is a second end view of the bone staple shown in
FIG. 9.

FIG. 13 is a first side view of the bone staple shown in FIG.
9.

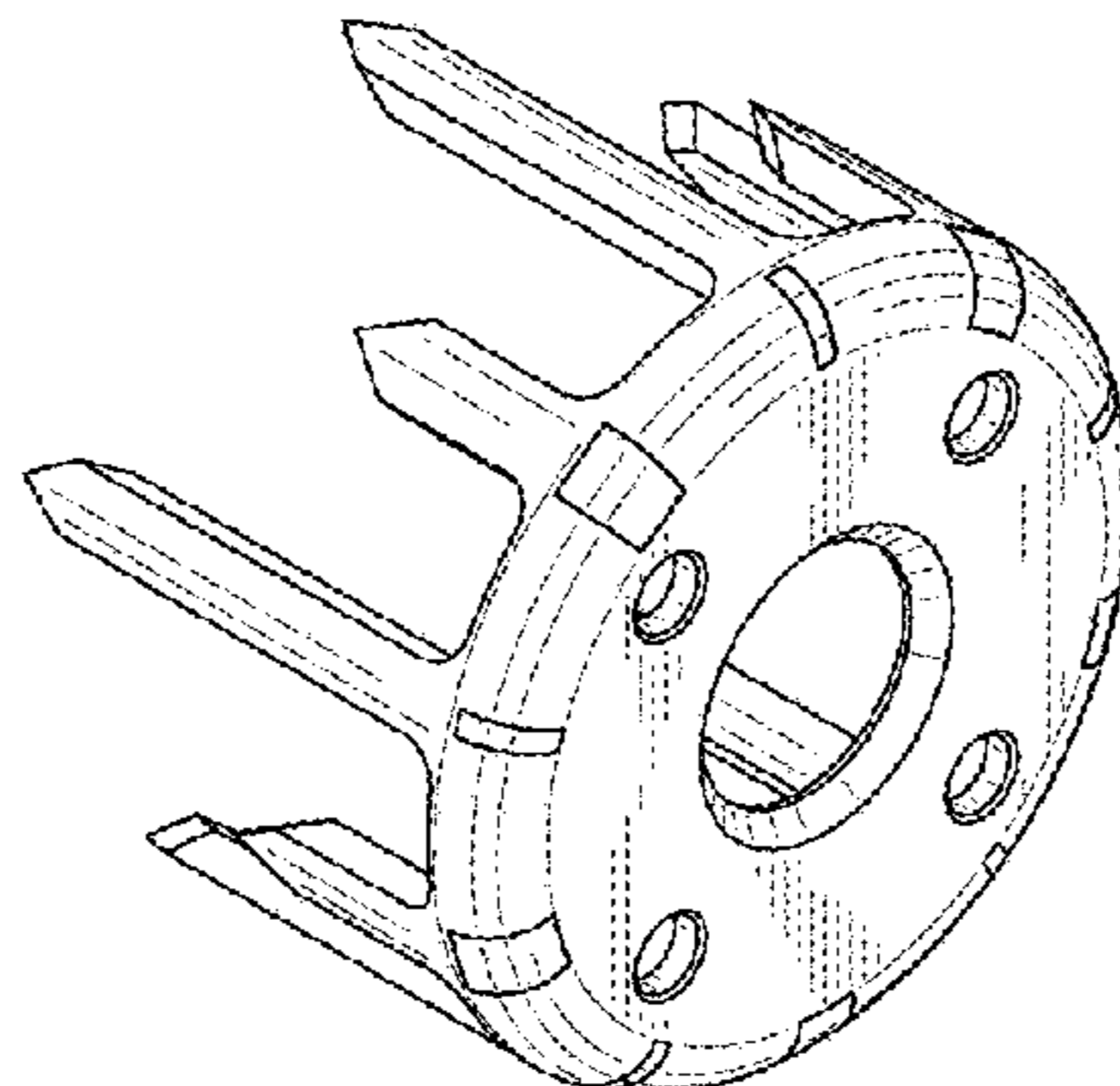
FIG. 14 is a second side view of the bone staple shown in
FIG. 9.

FIG. 15 is a front view of the bone staple shown in FIG. 9;
and,

FIG. 16 is a back view of the bone staple shown in FIG. 9.
Portions shown in broken lines are for illustrative purposes
only and form no part of the claimed design.

Primary Examiner — Charles D Hanson

1 Claim, 8 Drawing Sheets



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(58) **Field of Classification Search**

CPC A61B 17/0642; A61B 17/0682; A61B
17/0644; F16B 15/06

See application file for complete search history.

(56)

References Cited

U.S. PATENT DOCUMENTS

4,793,335 A 12/1988 Frey et al.
4,960,420 A 10/1990 Goble et al.
4,988,351 A * 1/1991 Paulos A61B 17/8625
606/232
5,250,058 A * 10/1993 Miller A61B 17/11
24/615
5,314,427 A 5/1994 Goble et al.
5,352,229 A 10/1994 Goble et al.
5,779,707 A * 7/1998 Bertholet A61B 17/8004
606/301
5,931,869 A 8/1999 Boucher et al.
5,947,969 A 9/1999 Errico et al.
6,328,743 B2 12/2001 Lerch
6,348,064 B1 2/2002 Kanner
6,482,232 B1 * 11/2002 Boucher A61B 17/0642
606/309
6,524,311 B2 2/2003 Gaines, Jr.
6,569,186 B1 5/2003 Winters et al.
6,712,822 B2 * 3/2004 Re A61B 17/0642
606/219
7,481,830 B2 1/2009 Wall et al.

7,909,826 B2 * 3/2011 Serhan A61B 17/0642
606/75
3,021,389 A1 9/2011 Molz, IV
8,062,297 B2 11/2011 Faillace et al.
8,529,609 B2 9/2013 Helgerson et al.
8,623,020 B2 1/2014 Kim et al.
8,900,281 B2 12/2014 Reisberg
9,017,331 B2 * 4/2015 Fox A61B 17/0642
606/75
9,414,865 B2 8/2016 Duggal et al.
D768,297 S * 10/2016 Nering D24/145
9,649,108 B2 * 5/2017 Weinstein A61B 17/0642
2009/0030434 A1 * 1/2009 Paz A61B 17/064
606/151
2010/0125275 A1 * 5/2010 Kinmon A61B 17/0642
606/75
2012/0130374 A1 5/2012 Bouduban et al.
2013/0110183 A1 * 5/2013 Duggal A61B 17/7064
606/328
2015/0230839 A1 * 8/2015 Riccione A61B 17/8014
606/297
2016/0242771 A1 8/2016 Weinstein et al.

FOREIGN PATENT DOCUMENTS

FR 2715290 A1 7/1995
FR 2980966 A1 4/2013
FR 2991569 A1 12/2013
WO 2006122194 A1 11/2006

* cited by examiner

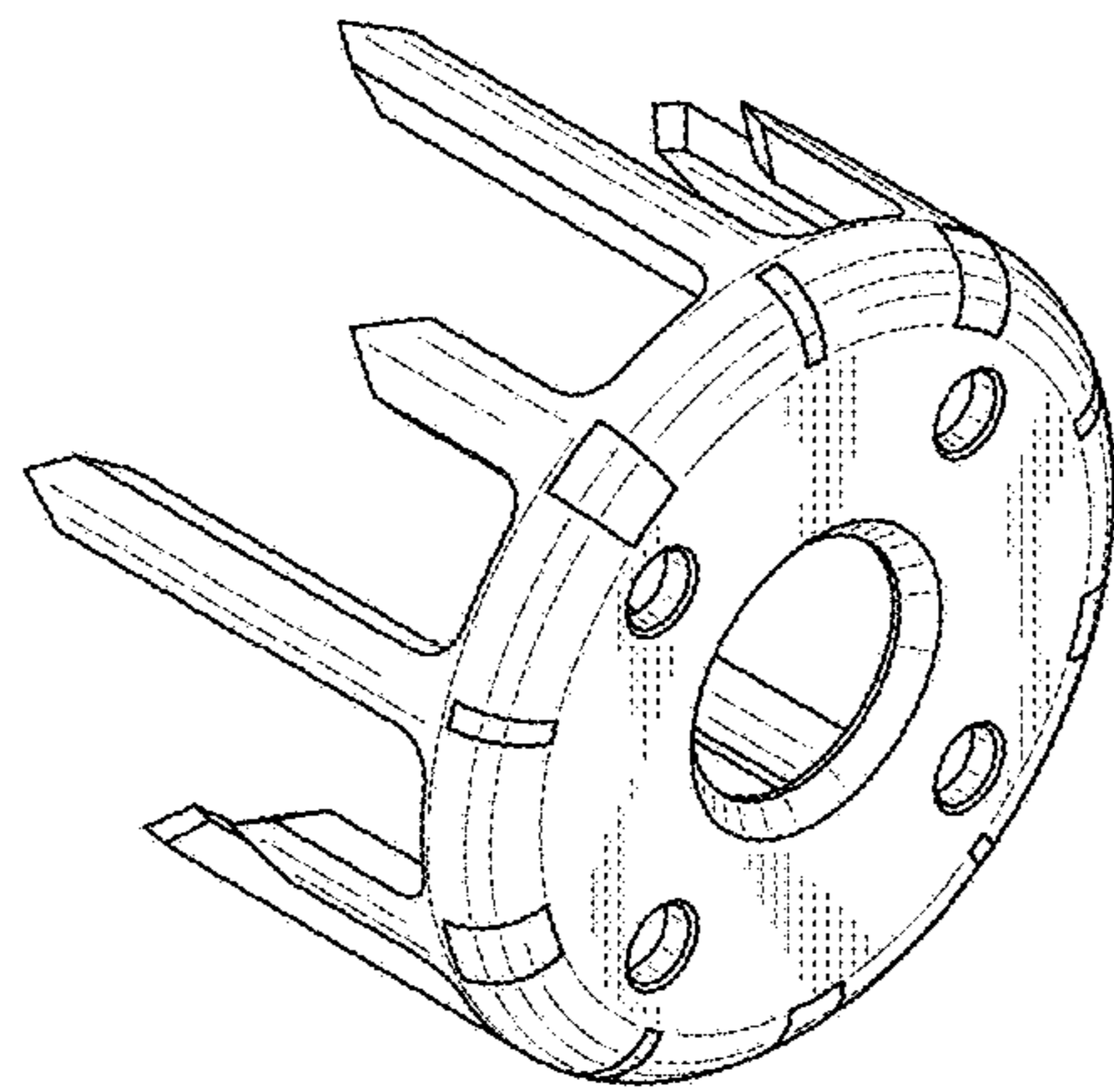


FIG. 1

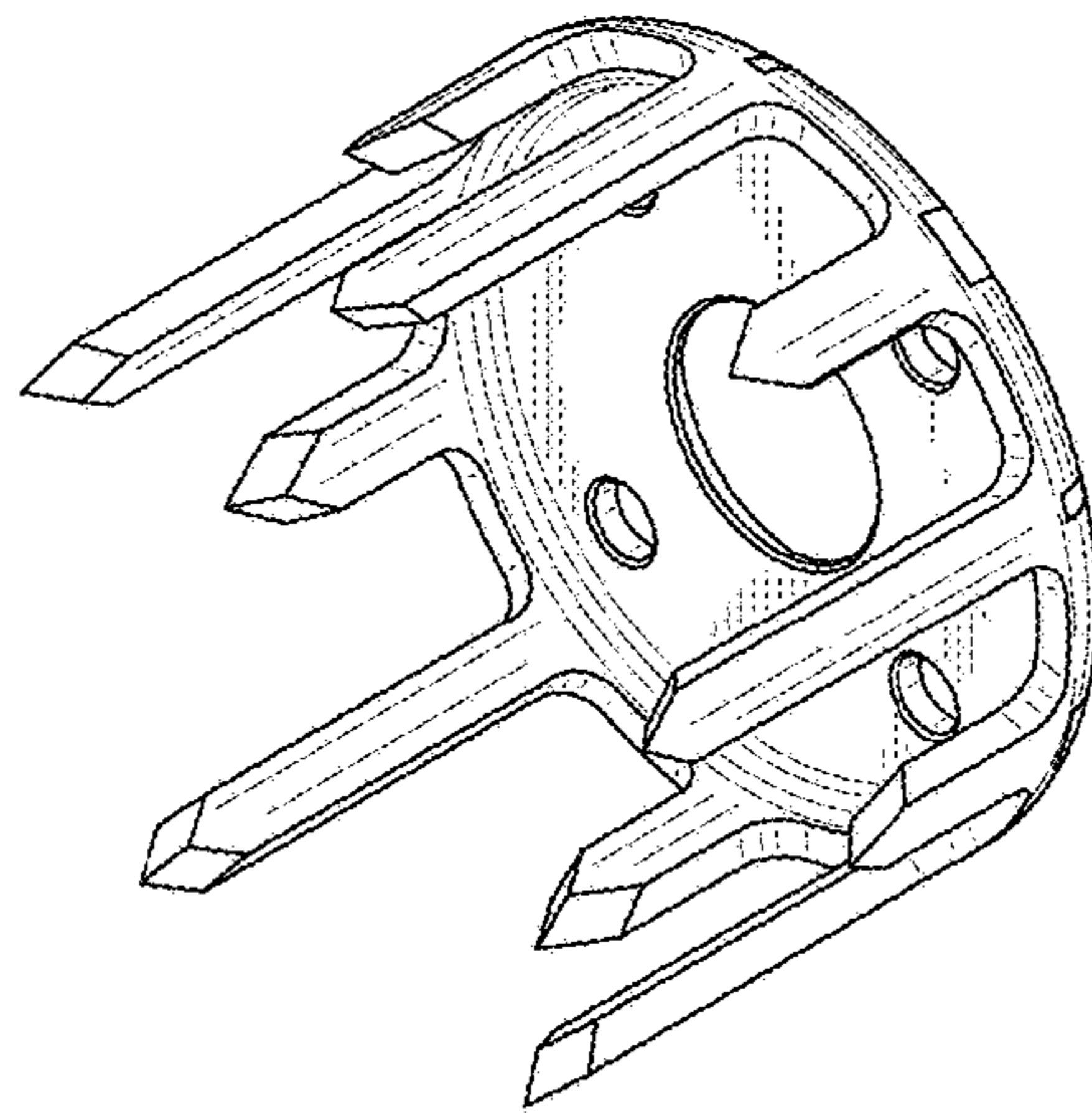


FIG. 2

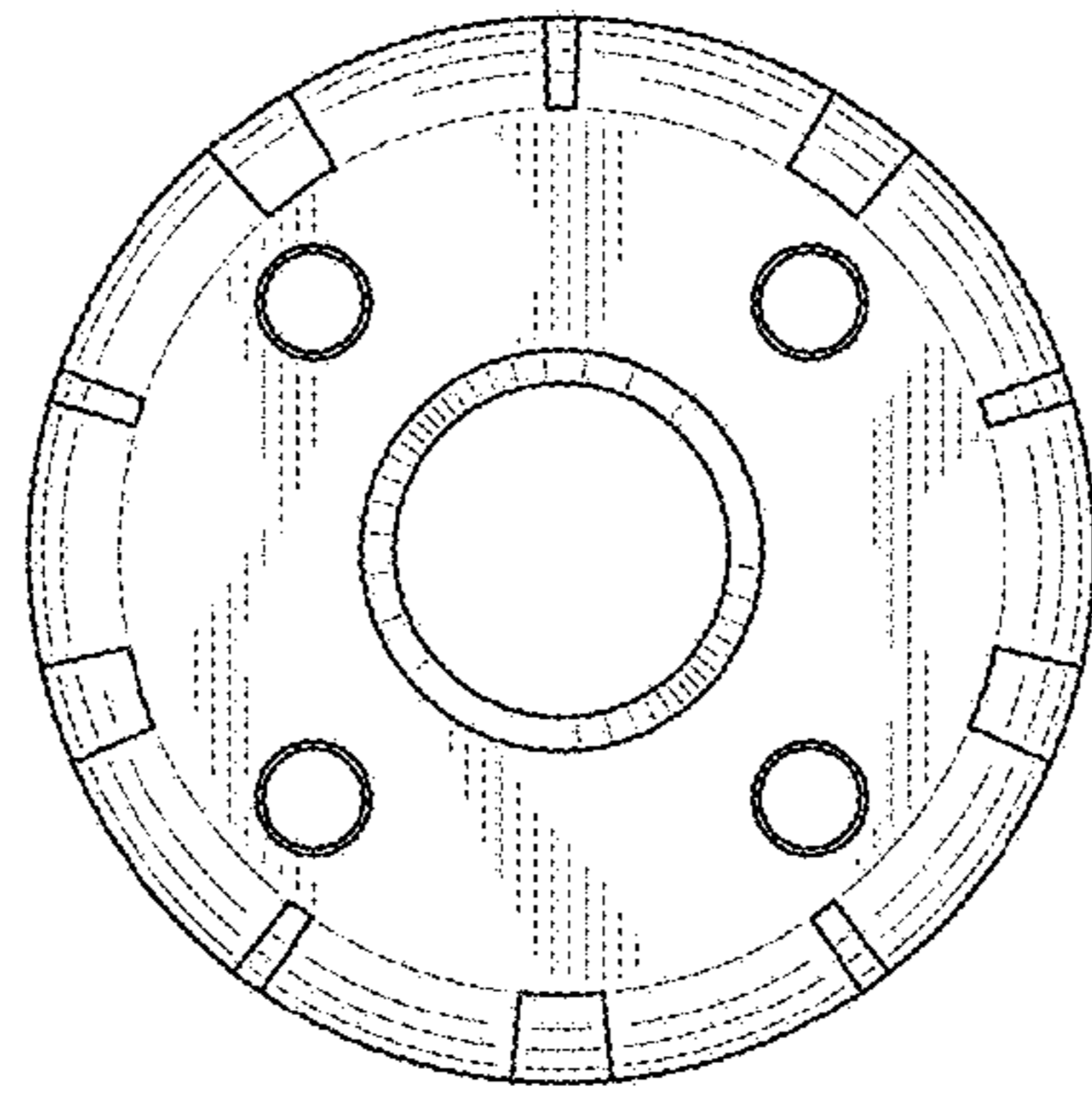


FIG. 3

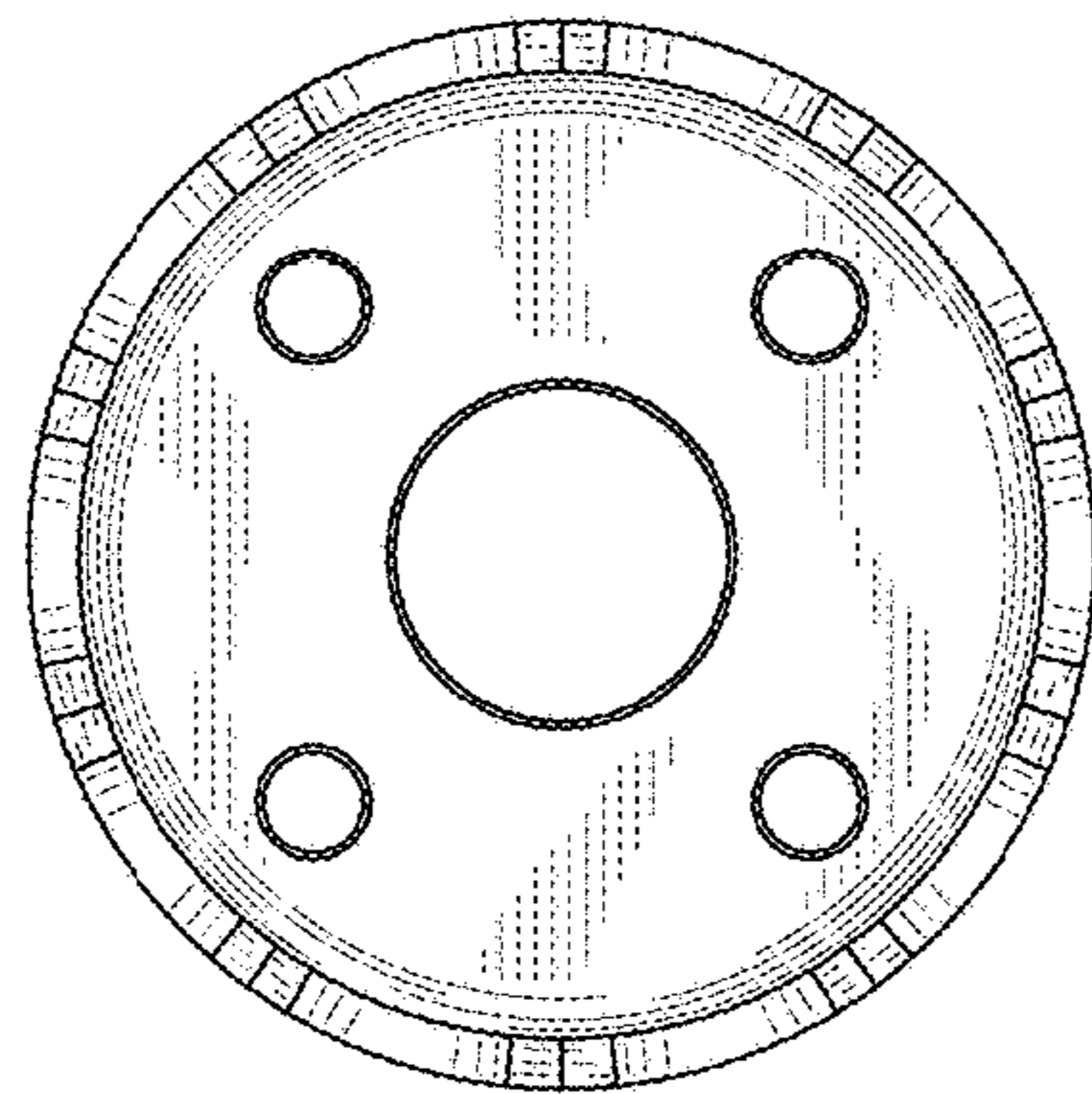


FIG. 4

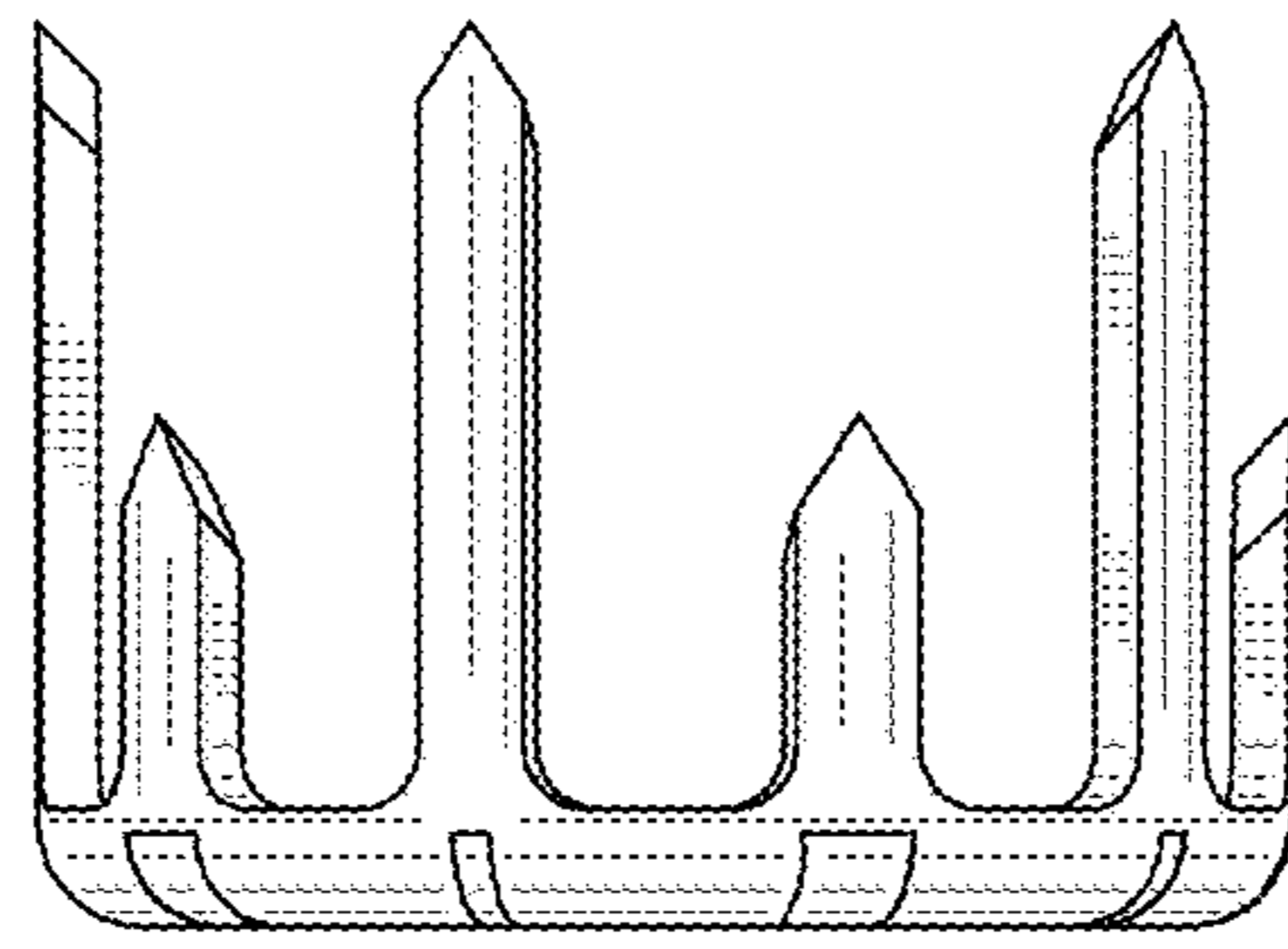


FIG. 6

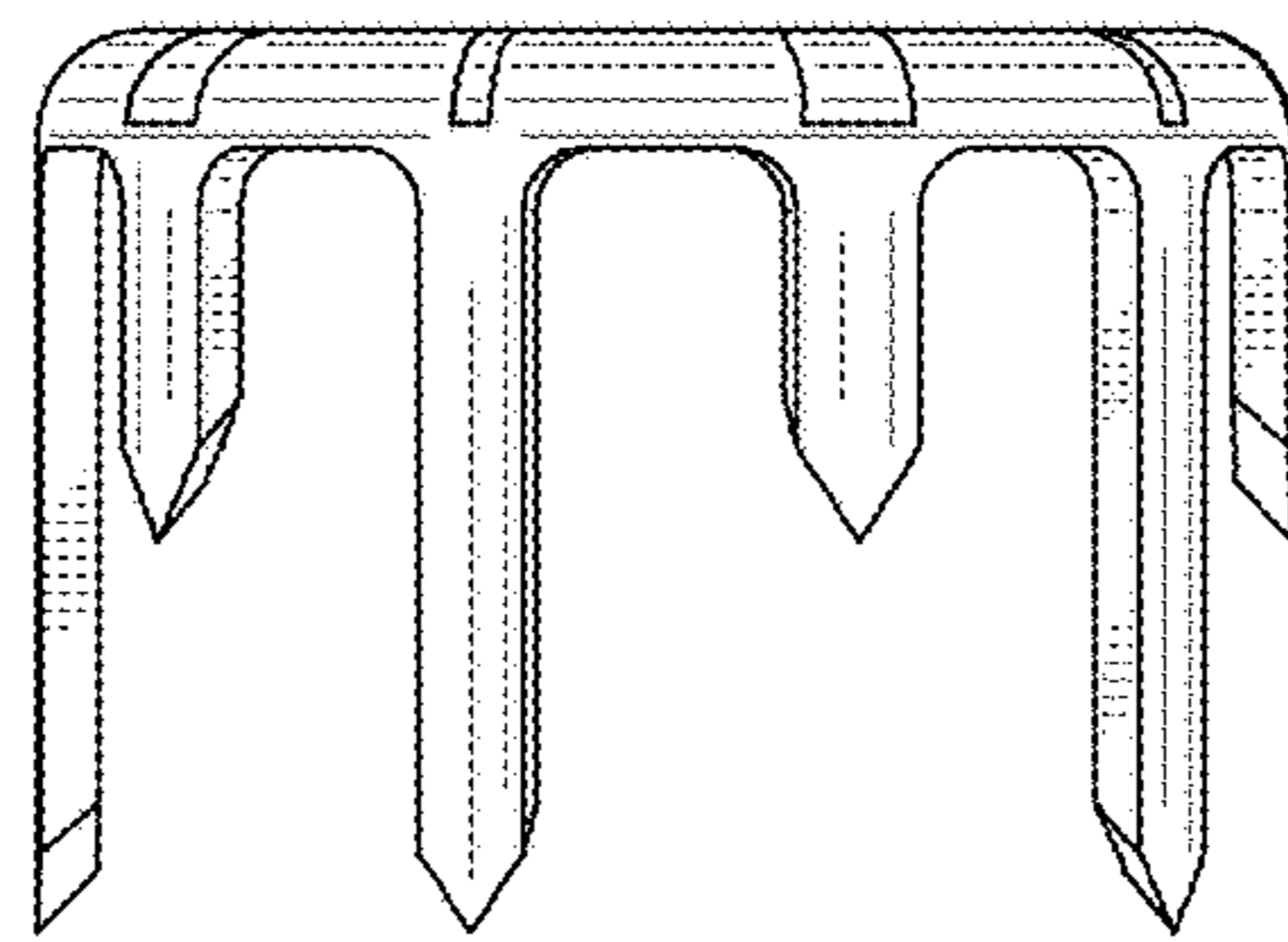


FIG. 5

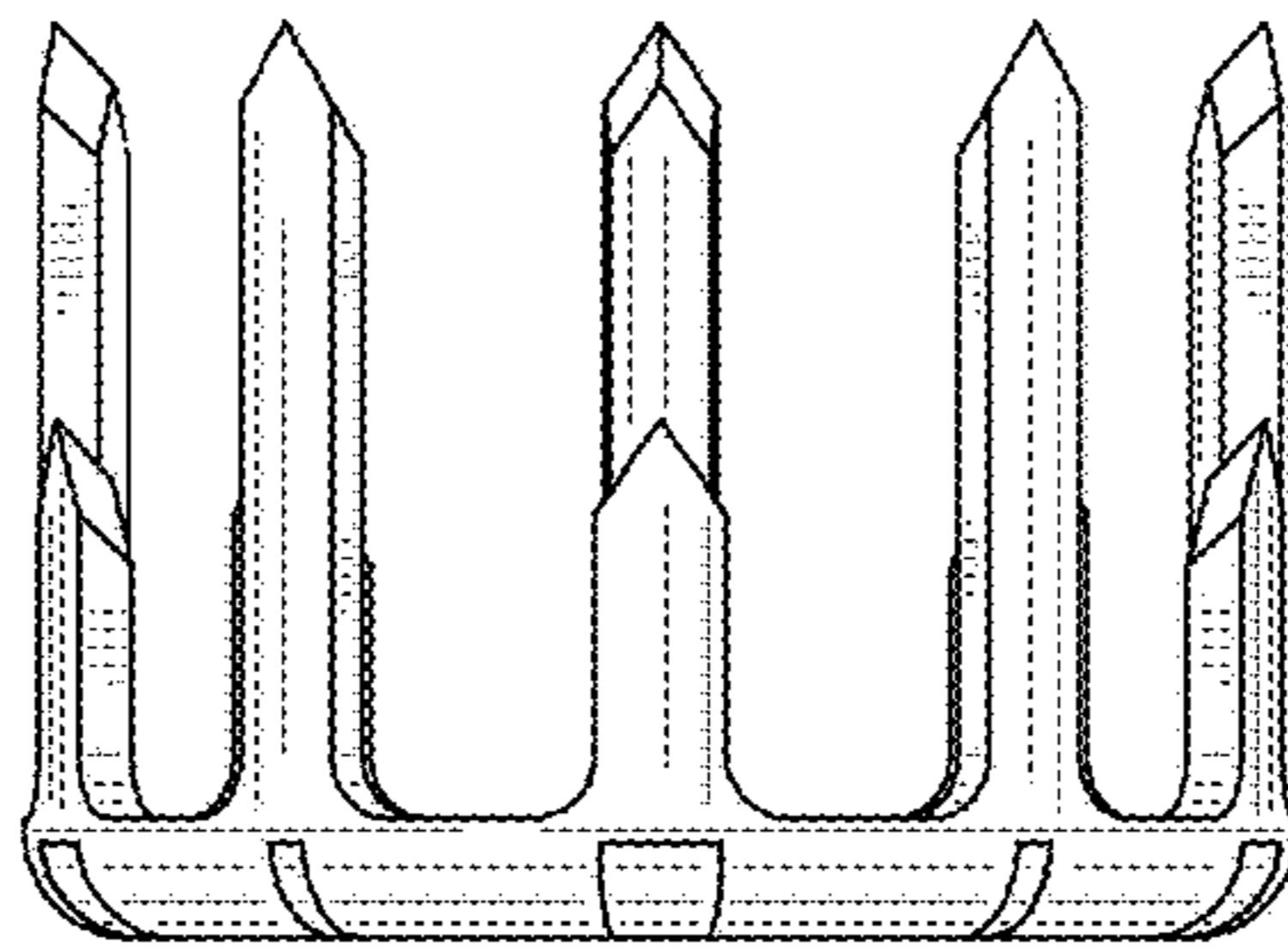


FIG. 7

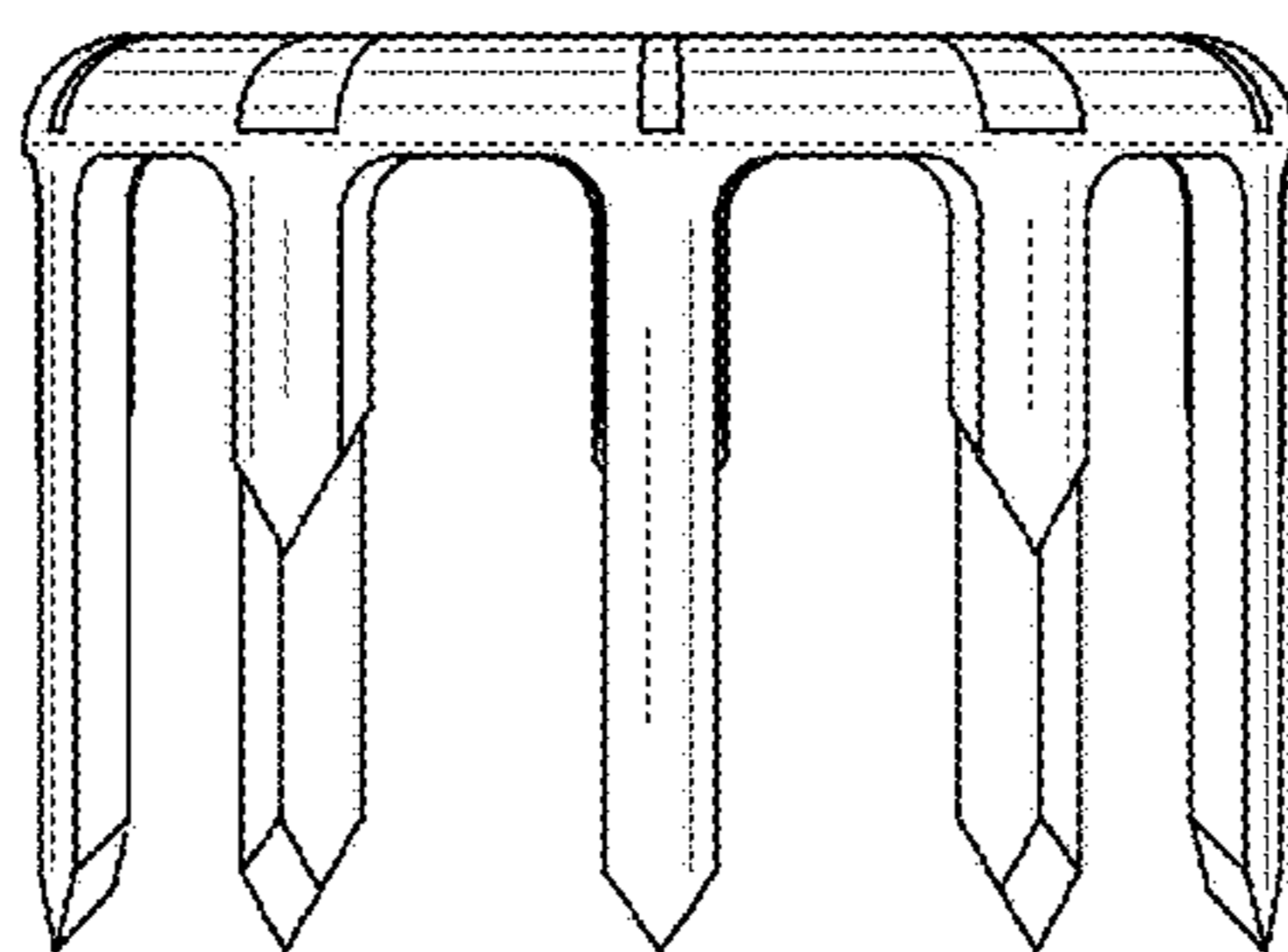


FIG. 8

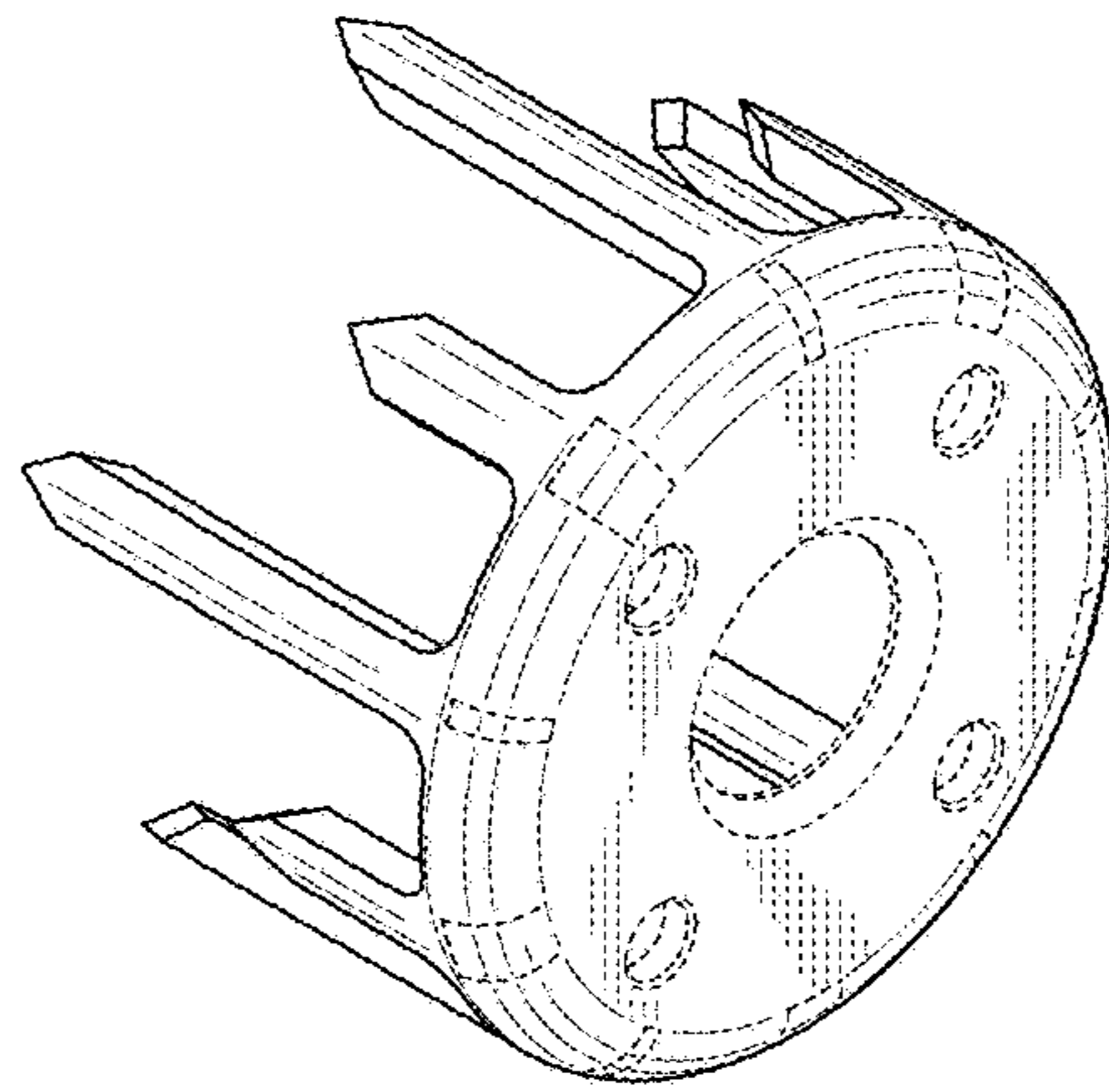


FIG. 9

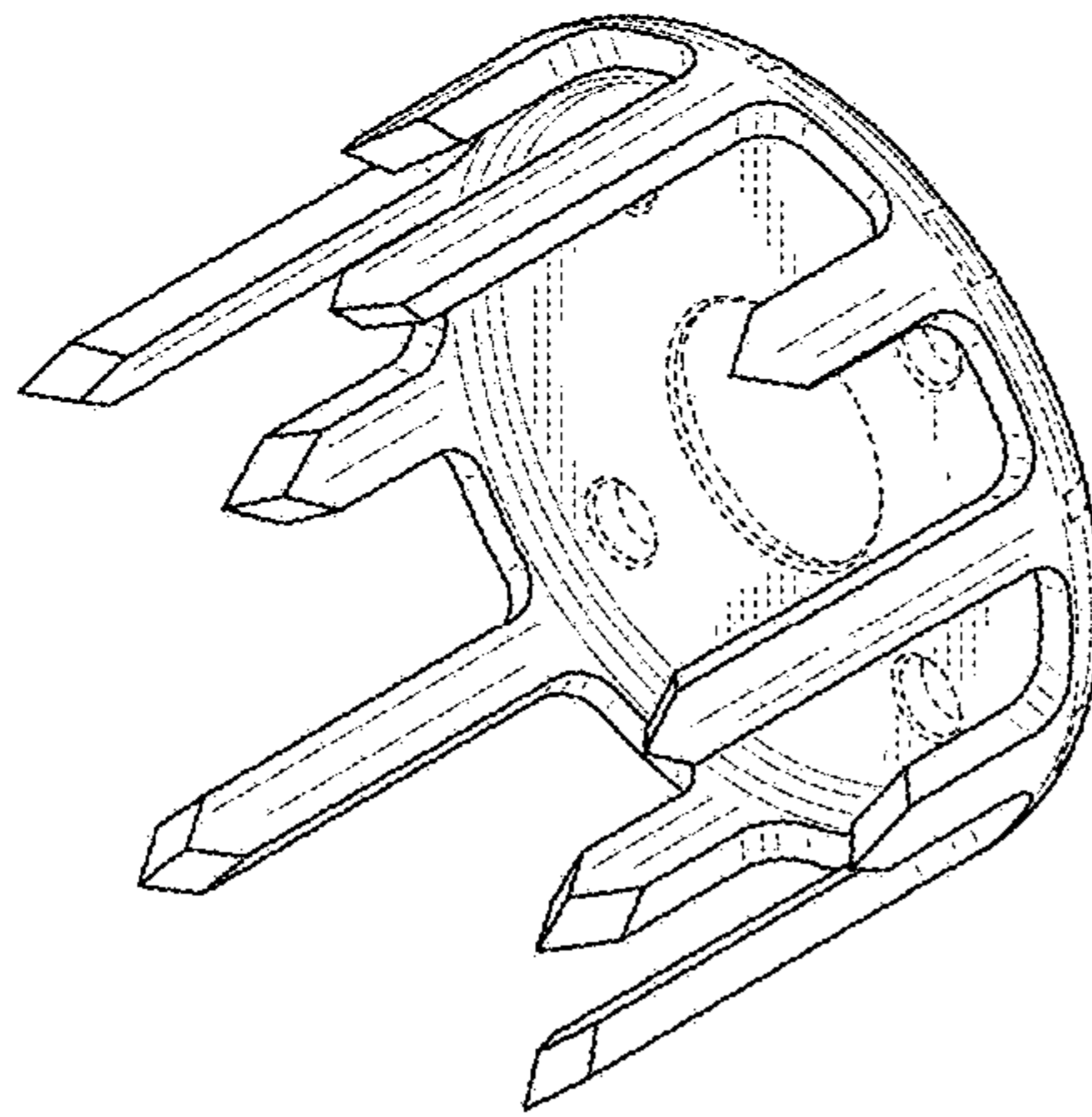


FIG. 10

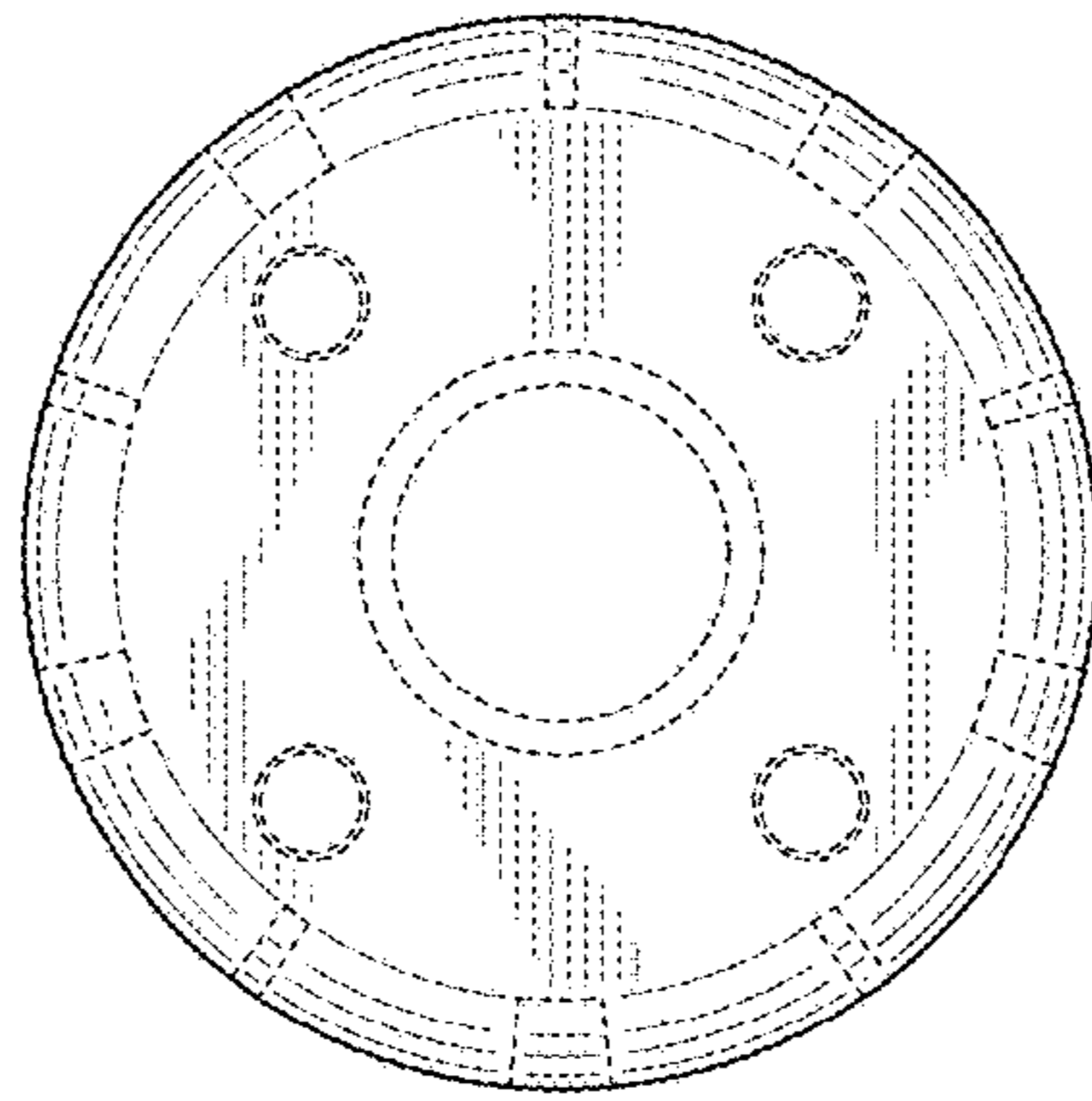


FIG. 11

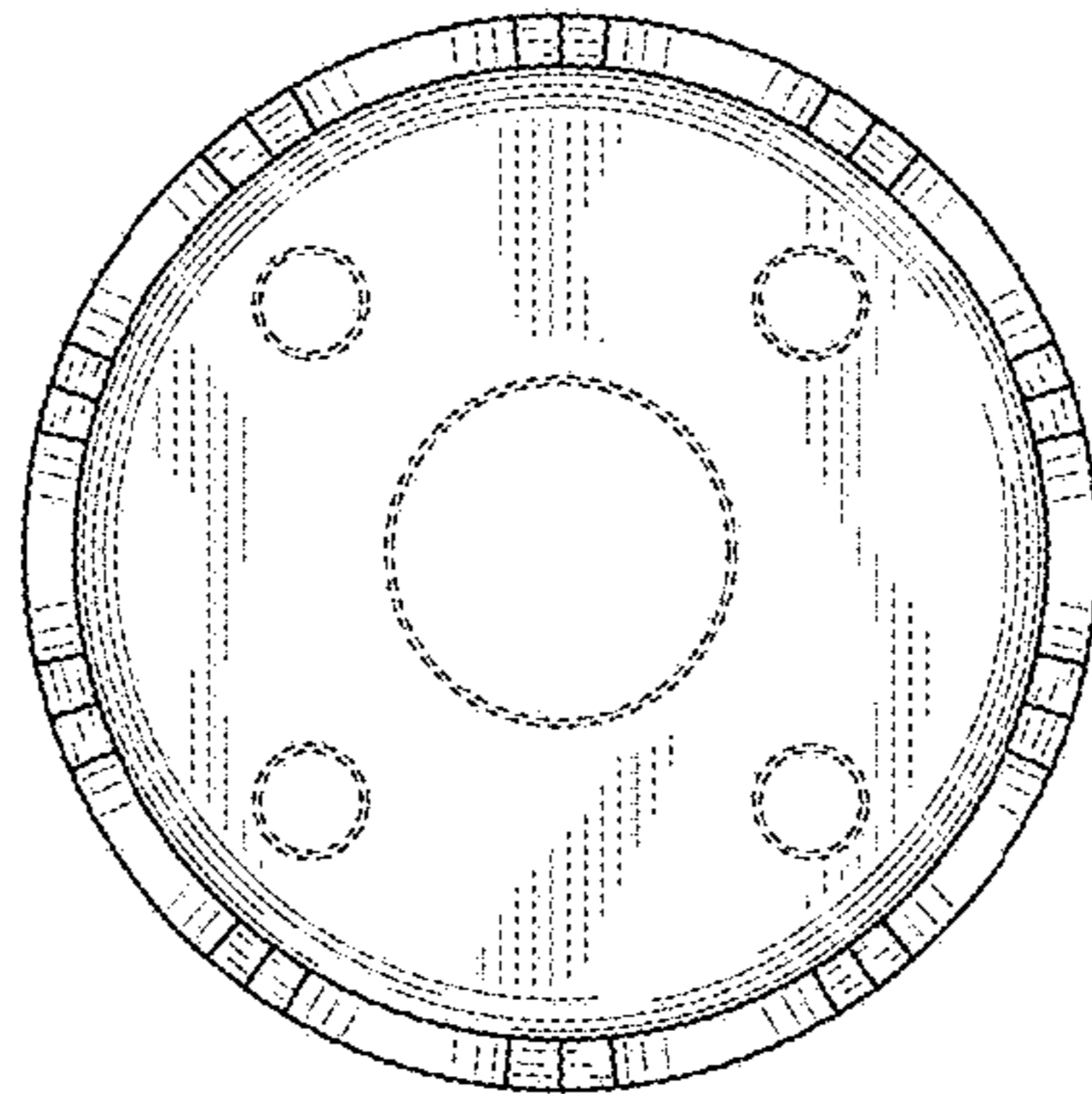


FIG. 12

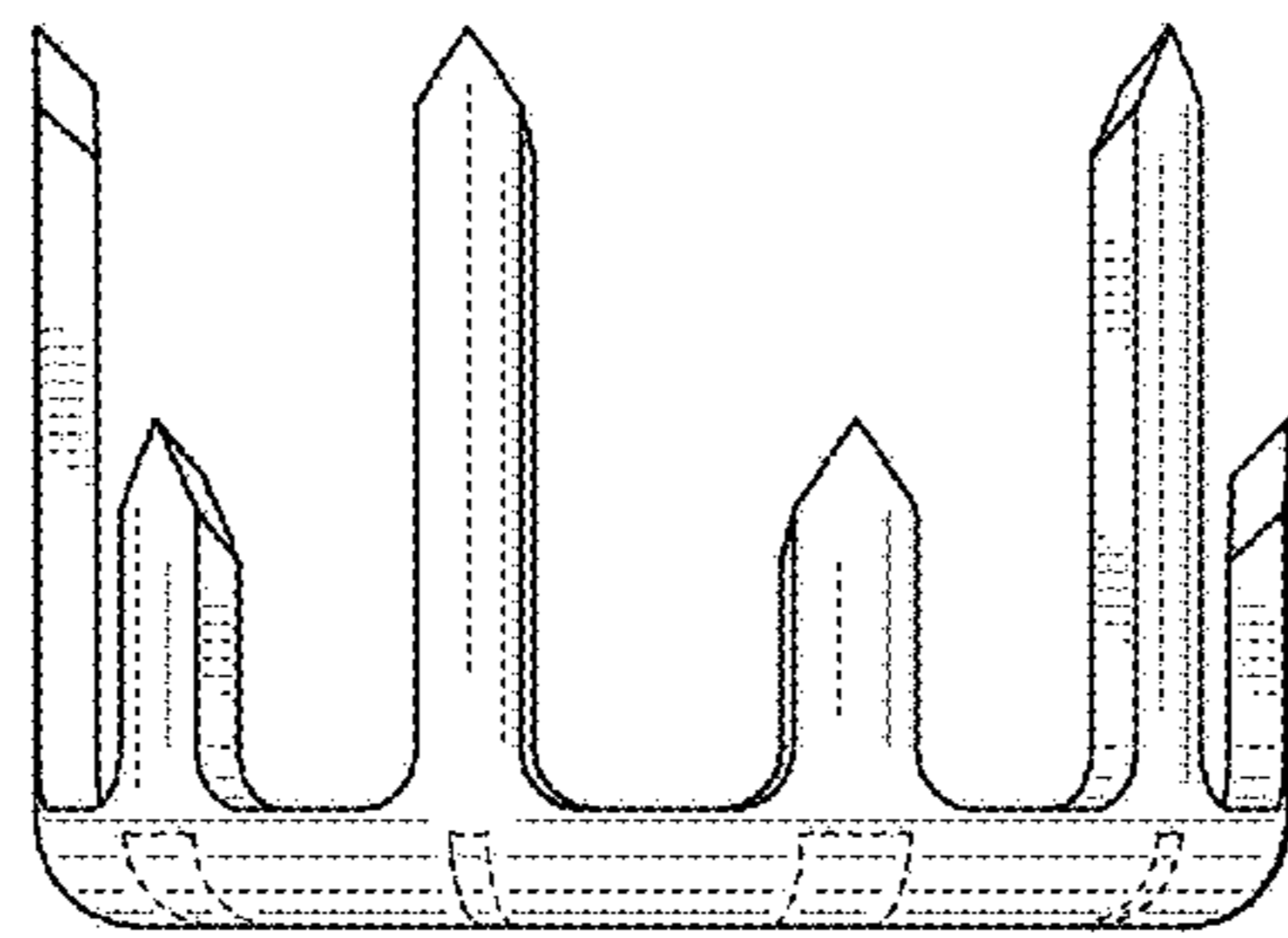


FIG. 14

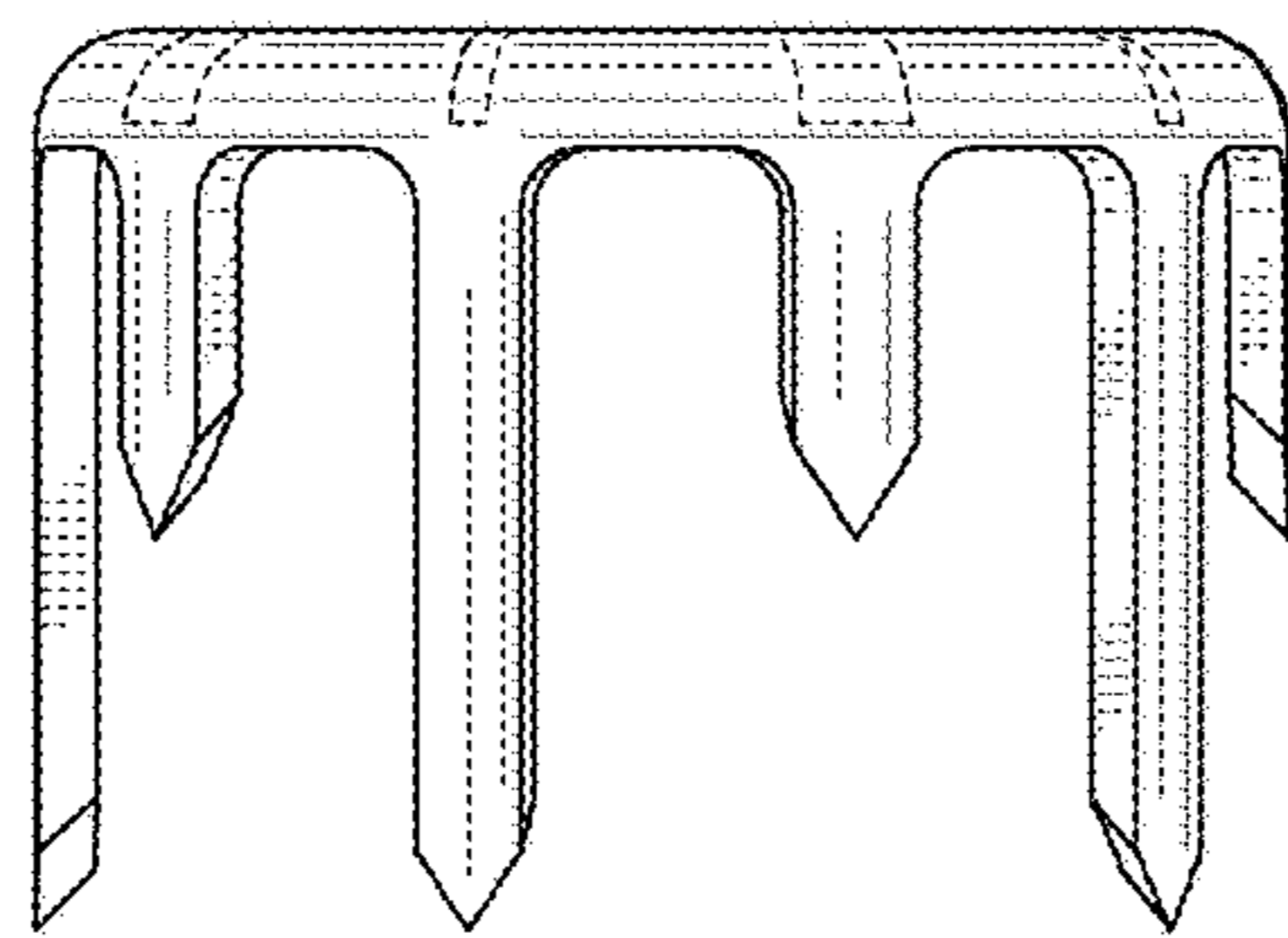


FIG. 13

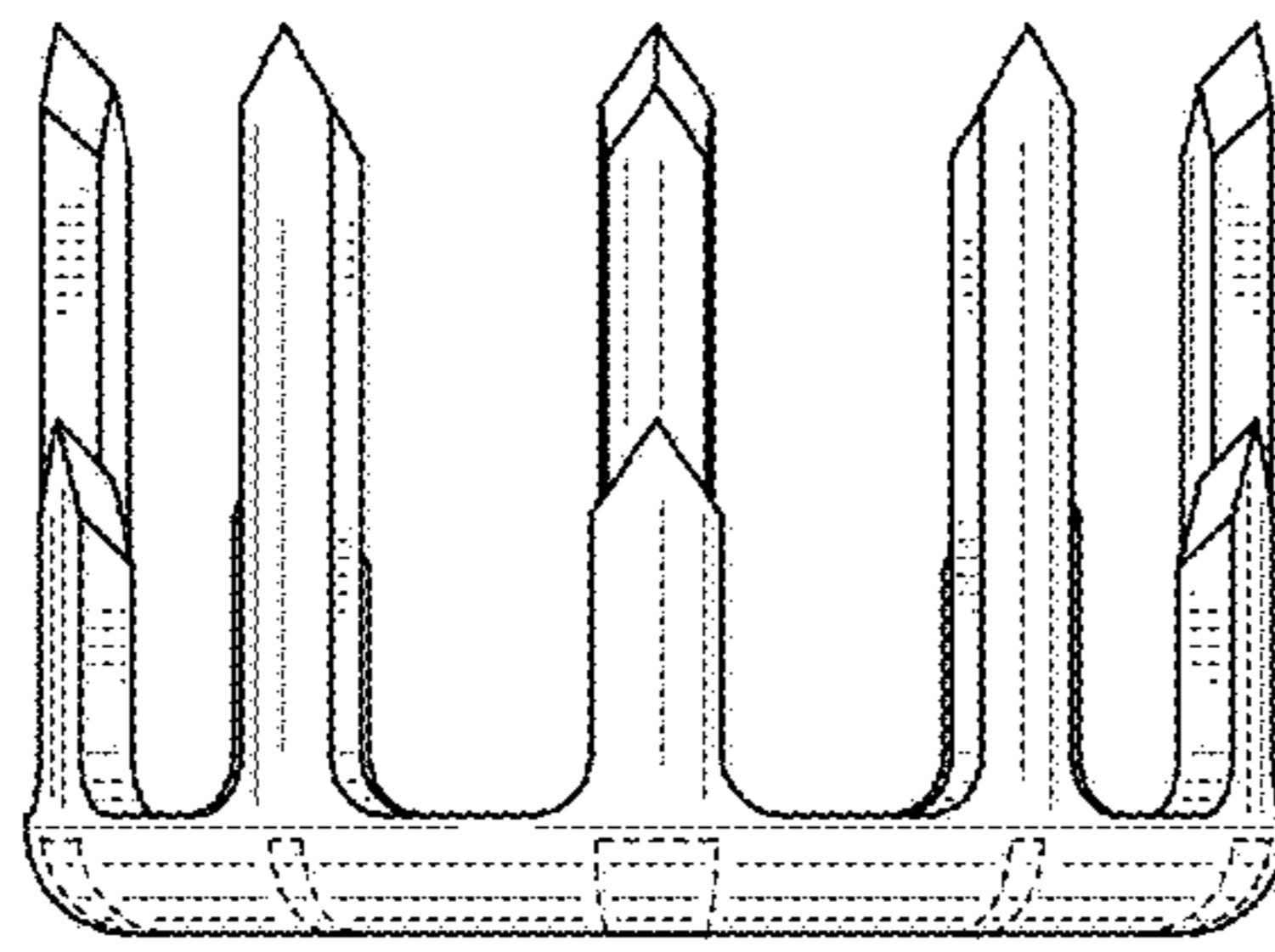


FIG. 15

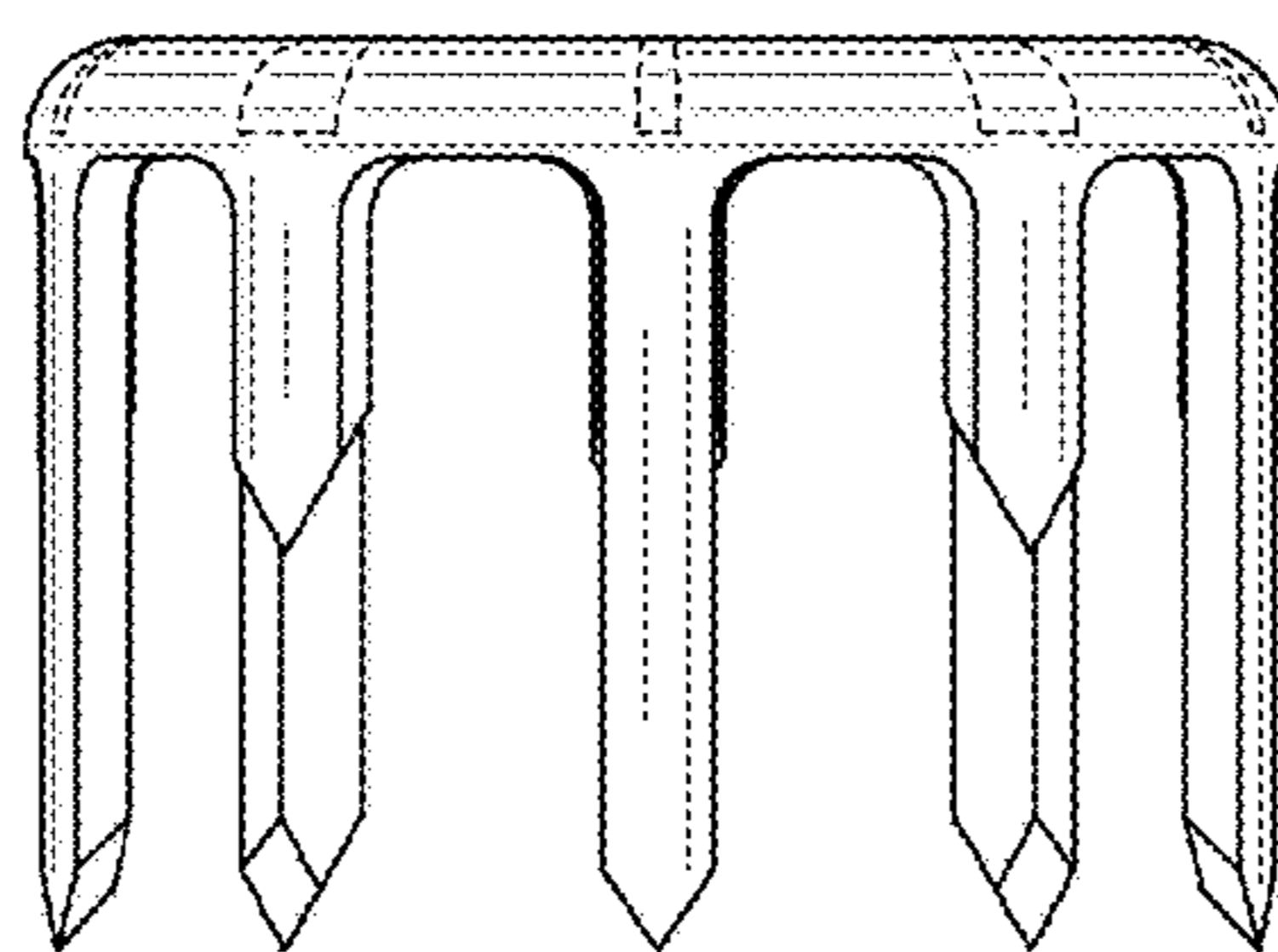


FIG. 16