



US00D925627S

(12) **United States Design Patent** (10) **Patent No.:** **US D925,627 S**
Sewell et al. (45) **Date of Patent:** **** Jul. 20, 2021**

(54) **MICROTRENCHER BLADE**

FOREIGN PATENT DOCUMENTS

(71) Applicant: **The Charles Machine Works, Inc.**,
Perry, OK (US)

KR 301017001.0000 * 7/2019

(72) Inventors: **Cody L. Sewell**, Perry, OK (US);
Michael C. Walgren, Lake Havasu
City, AZ (US)

OTHER PUBLICATIONS

Ditch Witch Catalog, Earliest available date Dec. 31, 2016 [Online],
[Site visited Jul. 1, 2020] Available From Internet, URL:<https://
www.ditchwitch.com/catalog/diggingsystems/html5/index.html?
page=68&noflash> (Year: 2016).*

(73) Assignee: **The Charles Machine Works, Inc.**,
Perry, OK (US)

Primary Examiner — Sheryl Lane
Assistant Examiner — Mark T. Philipps

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

(74) *Attorney, Agent, or Firm* — Tomlinson McKinstry,
P.C.

(21) Appl. No.: **29/681,544**

(57) **CLAIM**

(22) Filed: **Feb. 26, 2019**

The ornamental design for a microtrencher blade, as shown
and described.

(51) **LOC (13) Cl.** **15-09**

(52) **U.S. Cl.**
USPC **D15/139**

DESCRIPTION

(58) **Field of Classification Search**

USPC D15/77, 133, 138, 139; D8/66, 5, 8, 9,
D8/20; 144/176, 218, 231, 235, 241,
144/294; 83/840; 241/194, 294
CPC A01G 23/067; B02C 4/305; B02C 7/12;
B02C 18/18; B02C 13/28; B02C 13/2804;
B27G 13/00; B27G 13/10; B27L 11/00;
B26D 2001/0046; B26D 2001/006; B26D
2001/0066; B27B 3/30; B27B 3/28;
B23D 45/00; B23D 45/12; B23D 45/16;
B23D 45/003

FIG. 1 is a front view of a microtrencher blade showing our
new design, with the rear view being identical thereto;
FIG. 2 is a front, top and left perspective view thereof;
FIG. 3 is a rear top and right perspective view thereof;
FIG. 4 is a rear, top and left perspective view thereof;
FIG. 5 is a side view thereof;
FIG. 6 is an enlarged fragmentary view thereof, taken from
FIG. 5;
FIG. 7 is an enlarged front fragmentary view of the tooth
portion of the microtrencher blade taken from FIG. 1;
FIG. 8 is an enlarged rear fragmentary view thereof; and,
FIG. 9 is an enlarged fragmentary view thereof, taken from
FIG. 2.

See application file for complete search history.

The broken line elements are included for the purposes of
illustrating portions of the microtrencher blade and form no
part of the claimed design. Broken lines in alternating
dot-dash format represent an unclaimed border of the
claimed design. The broken lines in alternating Long Dash-
Short Dash format in FIGS. 1, 2, and 5 represent callout
locations for the expanded fragmentary views thereof.

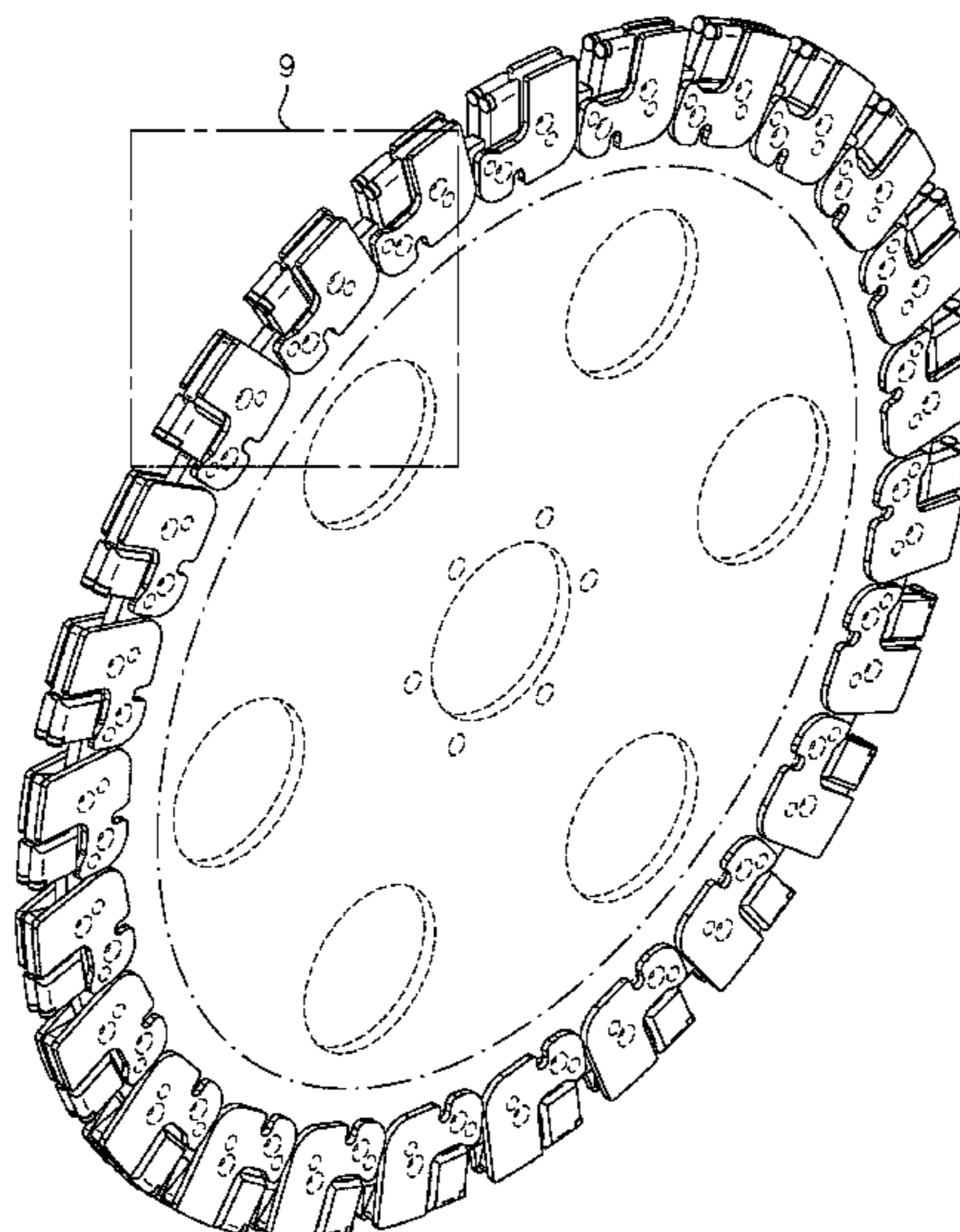
(56) **References Cited**

U.S. PATENT DOCUMENTS

2,675,603 A * 4/1954 Goehle B23D 61/04
407/33
3,287,793 A * 11/1966 Battersby B23D 61/02
407/61

(Continued)

1 Claim, 7 Drawing Sheets



(56)

References Cited

U.S. PATENT DOCUMENTS

3,818,561	A *	6/1974	Montana	.....	B23D 61/06 407/46	2002/0002892	A1 *	1/2002	DiSabatino	.....	A01G 23/091 83/835
4,011,783	A *	3/1977	Mobley	.....	B23D 61/021 83/846	2003/0029297	A1 *	2/2003	Haughton	.....	B27B 33/08 83/853
4,114,494	A *	9/1978	Budke	.....	B23D 61/021 83/835	2007/0095190	A1 *	5/2007	Asada	.....	B23D 61/04 83/848
4,222,298	A *	9/1980	James	.....	B23D 61/021 144/218	2008/0017009	A1 *	1/2008	Setliff	.....	B23D 61/04 83/848
4,563,929	A *	1/1986	Ringlee	.....	A01G 23/091 144/241	2008/0142118	A1 *	6/2008	Corfe	.....	A01G 23/091 144/34.1
4,604,933	A *	8/1986	Leshner	.....	B23D 61/021 83/839	2010/0170379	A1 *	7/2010	MacLennan	.....	B23D 65/00 83/840
D293,074	S *	12/1987	Inoue	.....	D15/133	2011/0100510	A1 *	5/2011	Hinchliff	.....	B27G 13/10 144/230
5,129,296	A *	7/1992	Wayne	.....	B23D 45/00 144/218	2012/0132052	A1 *	5/2012	Chen	.....	B23D 61/023 83/838
5,211,212	A *	5/1993	Carlson	.....	A01G 23/091 144/241	2013/0125724	A1 *	5/2013	MacLennan	.....	B23D 61/021 83/469
5,647,264	A *	7/1997	Proulx	.....	B23D 61/021 83/840	2013/0161428	A1 *	6/2013	Hongo	.....	B02C 13/2804 241/73
5,758,561	A *	6/1998	Curtsinger	.....	B23D 61/025 83/676	2014/0196818	A1 *	7/2014	Weinberg	.....	A01G 23/067 144/235
6,364,227	B1 *	4/2002	Dorscht	.....	B02C 13/2804 241/197	2014/0260878	A1 *	9/2014	Bird	.....	B23D 61/025 83/835
6,386,469	B1 *	5/2002	Meister	.....	B26D 7/2614 241/294	2015/0083275	A1 *	3/2015	Paumier	.....	B27B 33/20 144/24.12
D459,171	S *	6/2002	Hong	.....	D8/20	2016/0044876	A1 *	2/2016	Green	.....	B23D 61/06 144/235
D492,170	S *	6/2004	Auger	.....	D8/20	2016/0135388	A1 *	5/2016	Leonardi	.....	A01G 23/067 144/235
D559,638	S *	1/2008	Park	.....	D15/139	2017/0012572	A1 *	1/2017	Takano	.....	B23D 45/12
7,815,136	B2 *	10/2010	Arnston	.....	B02C 18/146 241/294	2017/0120355	A1 *	5/2017	Brutscher	.....	B23D 61/025
8,898,913	B1 *	12/2014	Lones	.....	B28D 1/04 30/375	2017/0350093	A1 *	12/2017	Sewell	.....	E02F 5/08
D796,291	S *	9/2017	Sewell	.....	D15/133	2018/0215031	A1 *	8/2018	Sundberg	.....	F16B 43/00
D796,292	S *	9/2017	Sewell	.....	D15/133	2018/0272447	A1 *	9/2018	Ando	.....	B23D 61/04
10,704,227	B2 *	7/2020	Sewell	.....	E02F 5/08	2018/0290149	A1 *	10/2018	Ver Steeg	.....	B02C 18/18
10,751,817	B1 *	8/2020	Smith	.....	B23D 63/12	2019/0001424	A1 *	1/2019	Baratta	.....	B23D 61/023
2002/0000150	A1 *	1/2002	Kurelek	.....	B23D 61/04 83/835	2019/0240861	A1 *	8/2019	Daining	.....	A01G 23/067
						2020/0047267	A1 *	2/2020	Nakano	.....	B23D 61/025
						2020/0139463	A1 *	5/2020	Bird	.....	B23D 61/021
						2020/0222998	A1 *	7/2020	Hall	.....	B23D 61/021
						2020/0316700	A1 *	10/2020	Elliston	.....	B23D 61/021

* cited by examiner

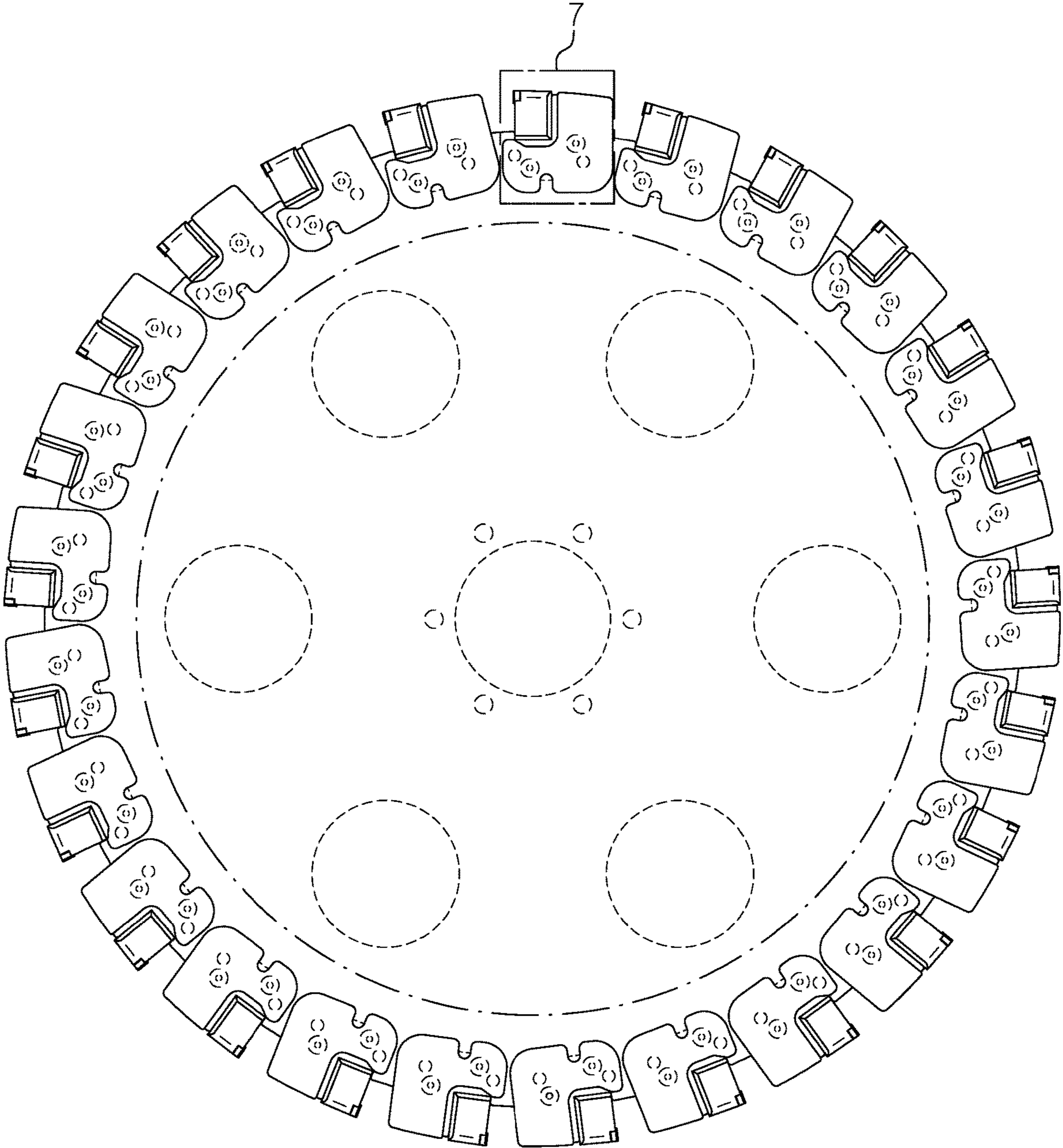


FIG. 1

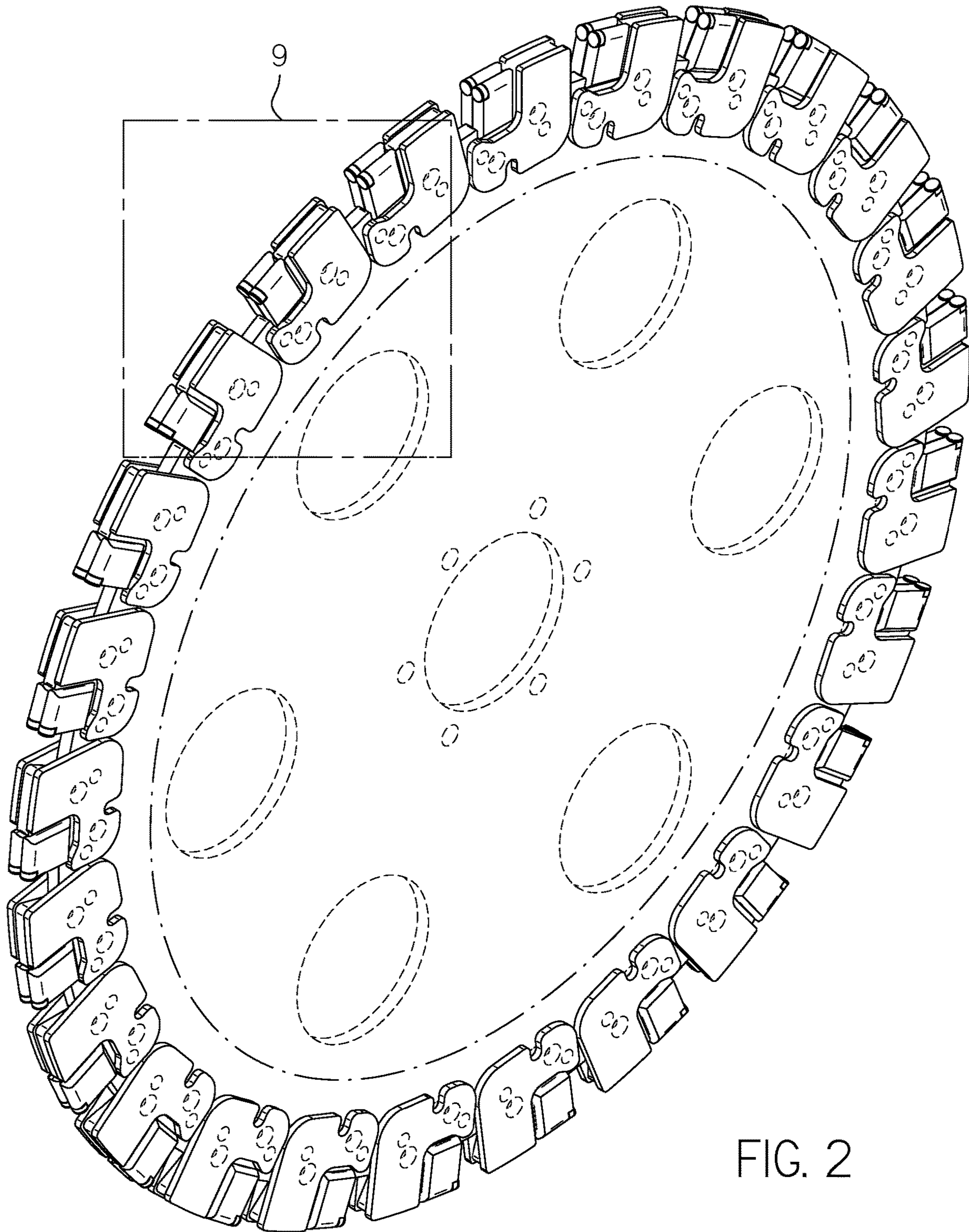


FIG. 2

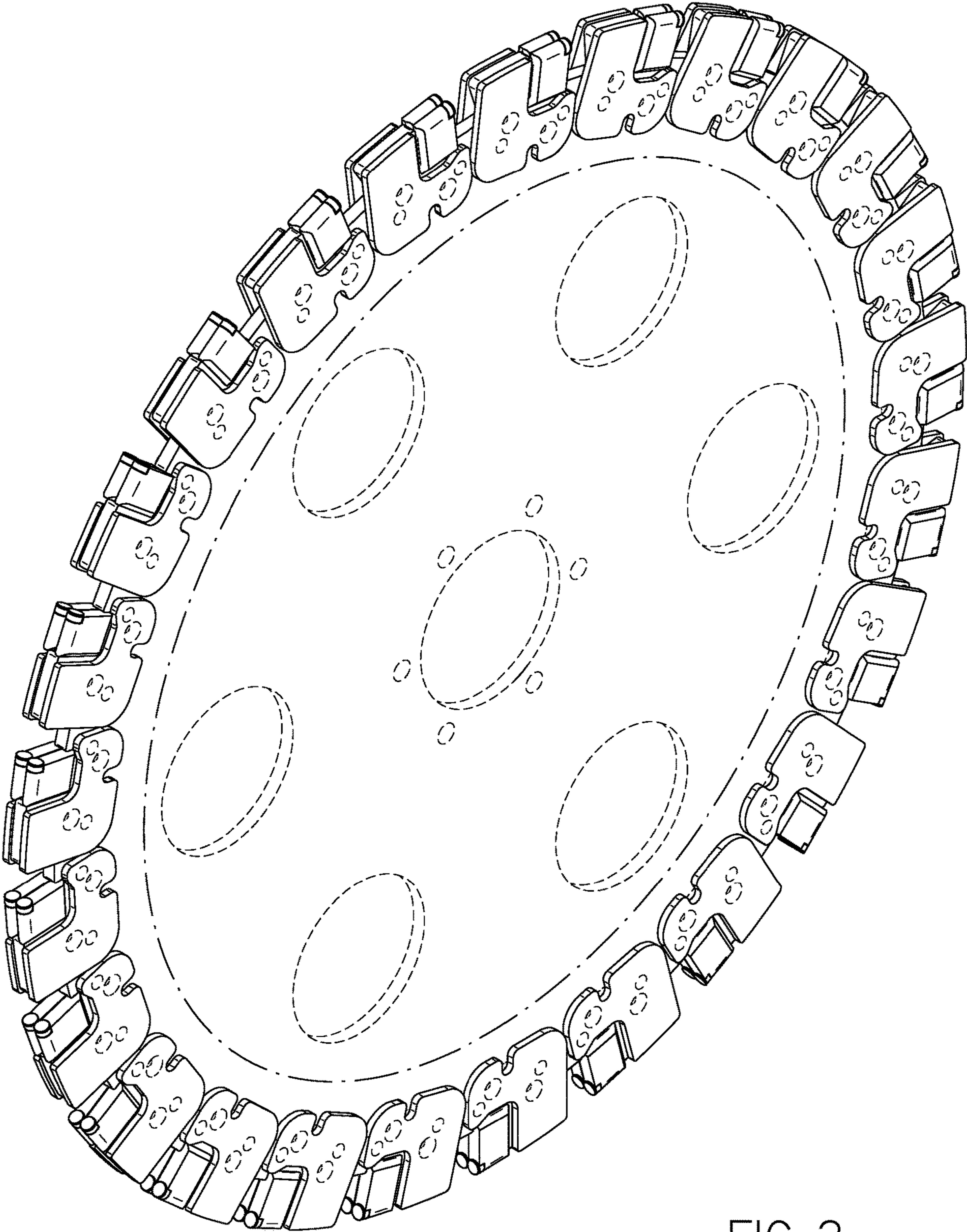


FIG. 3

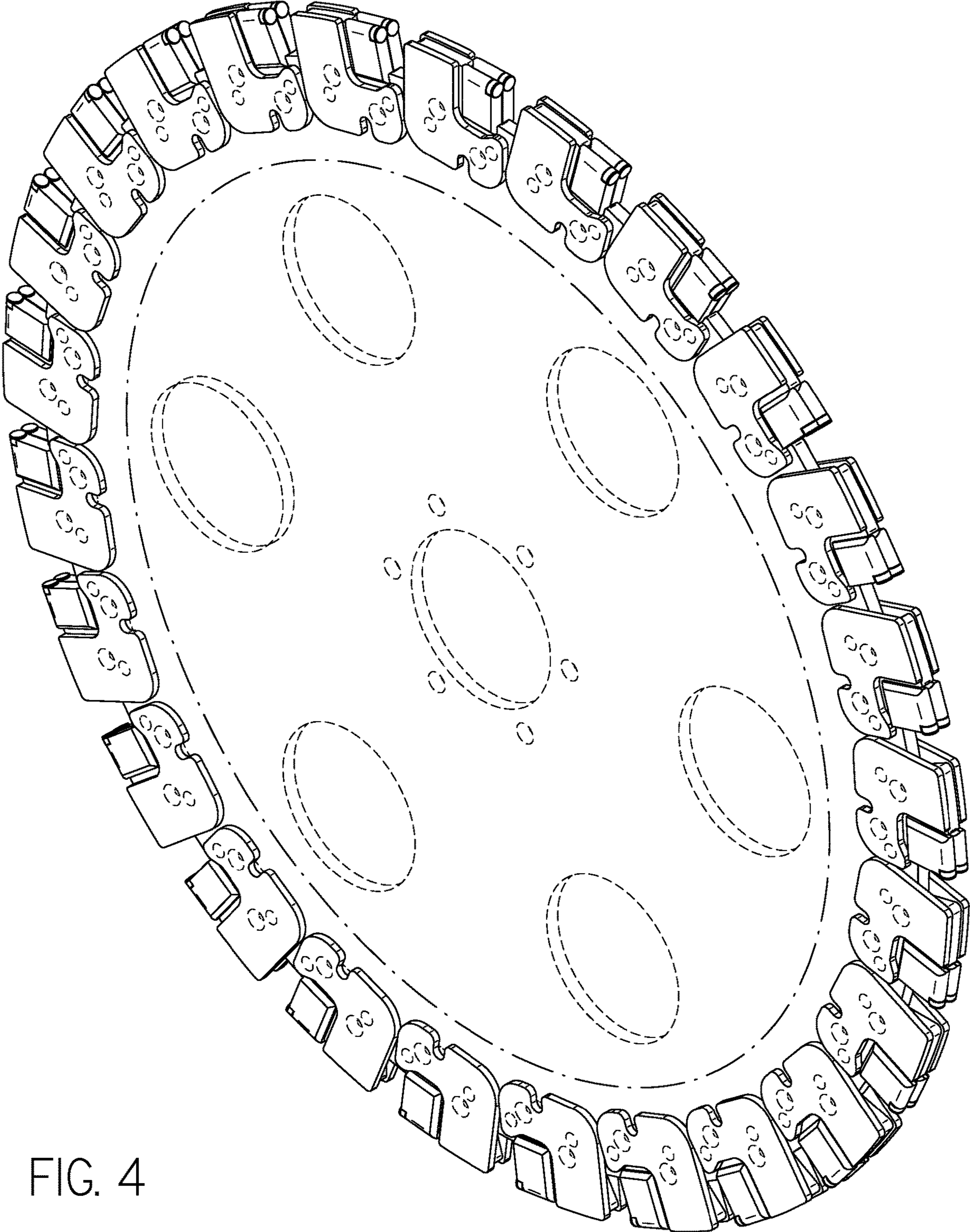


FIG. 4

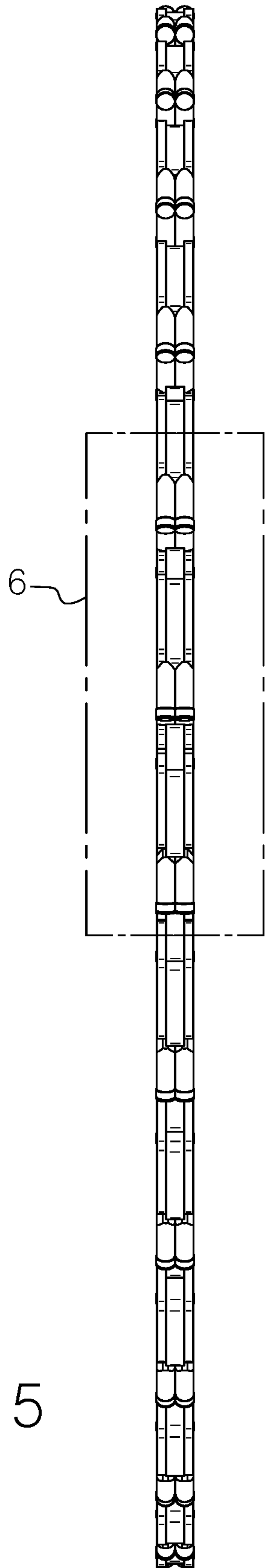


FIG. 5

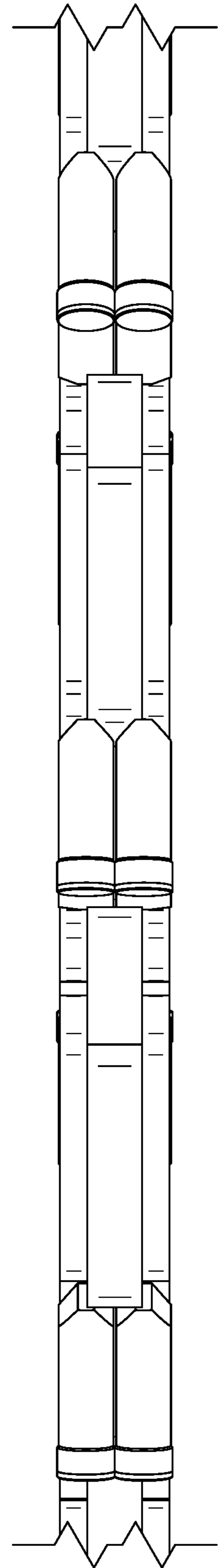


FIG. 6

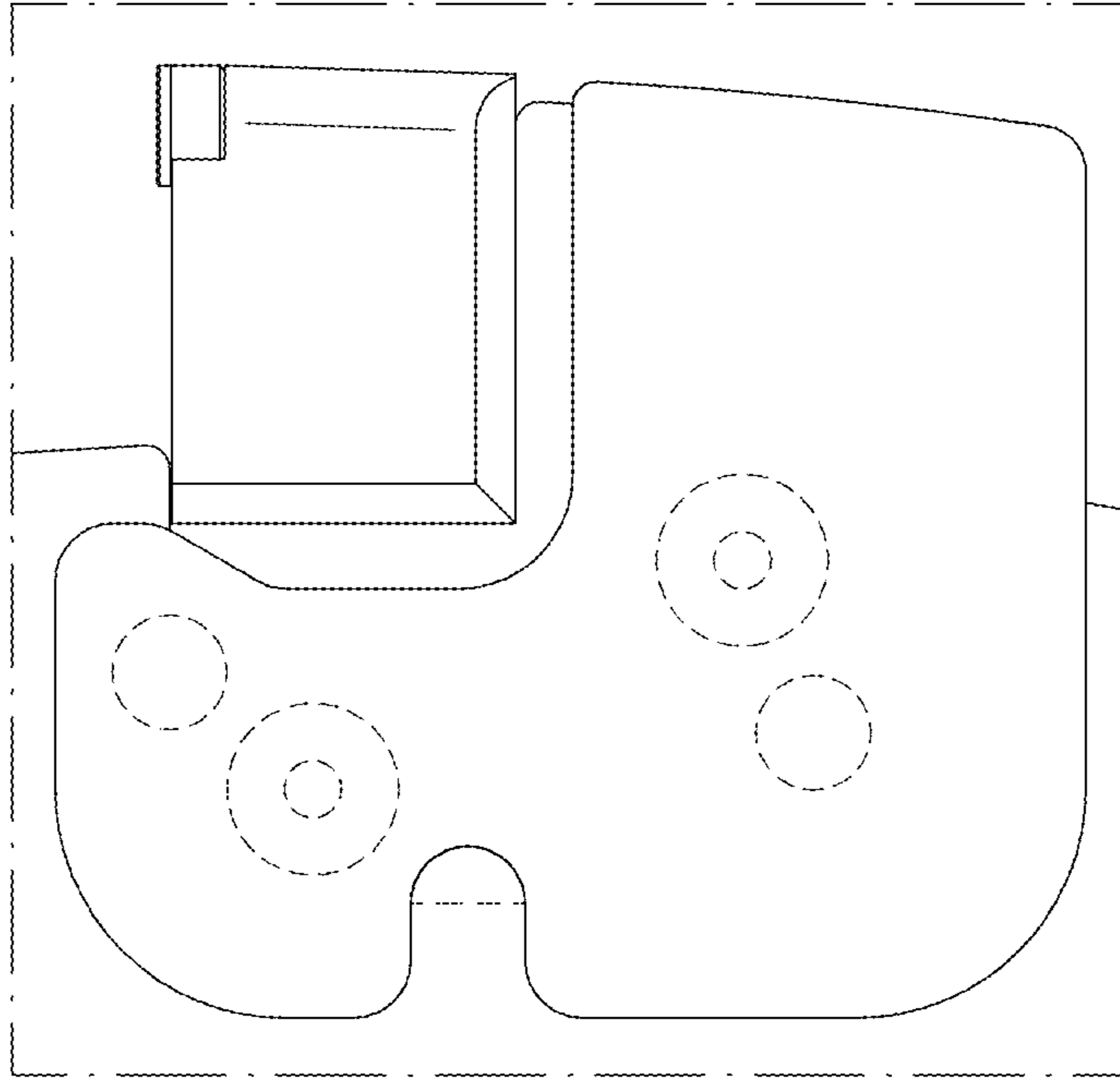


FIG. 7

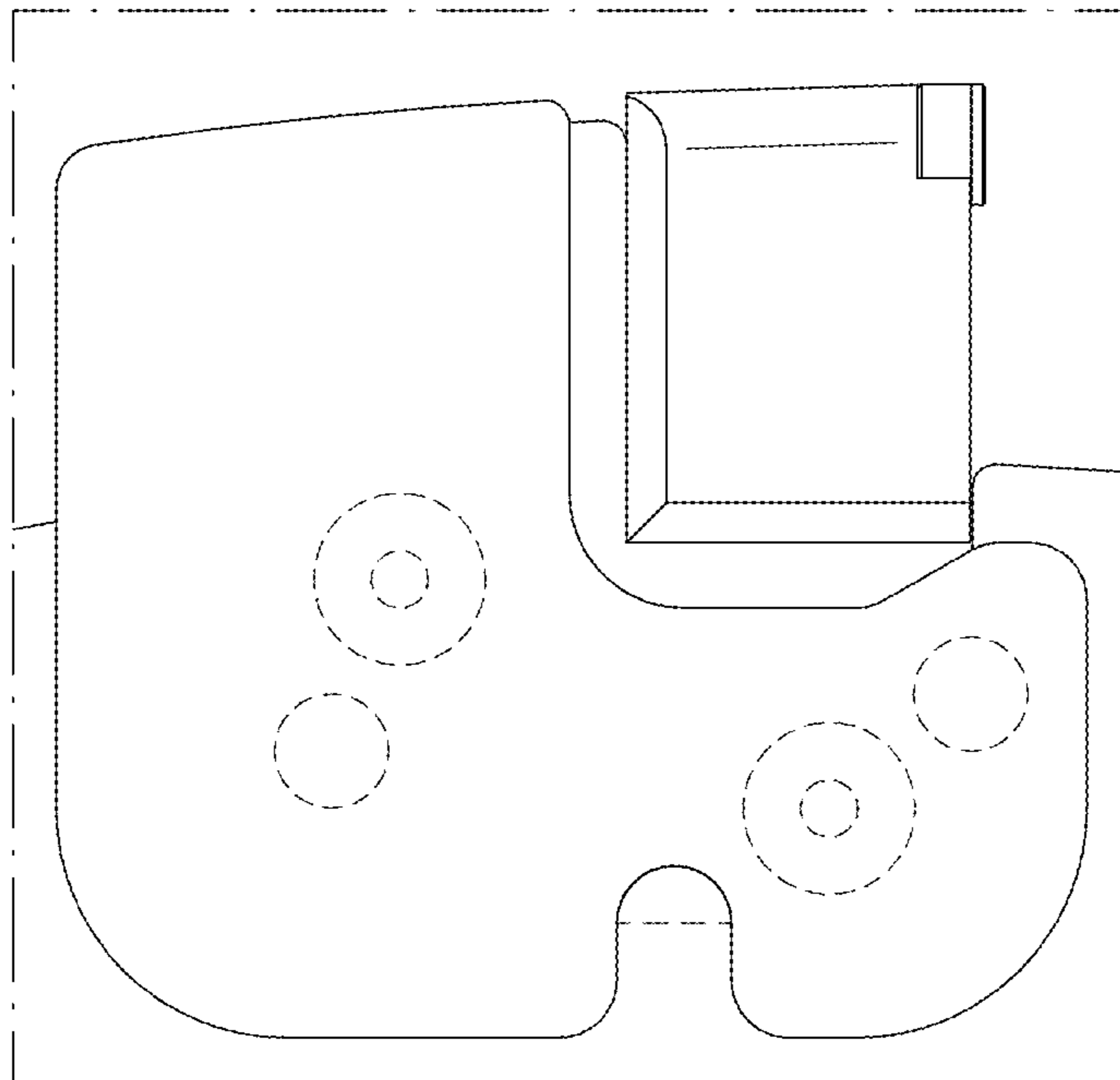


FIG. 8

FIG. 9

