



US00D925625S

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

(10) **Patent No.:** **US D925,625 S**

(45) **Date of Patent:** **** Jul. 20, 2021**

(54) **CAM UNIT**

(71) Applicant: **SANKYO OILLESS INDUSTRY, INC.**, Tokyo (JP)

(72) Inventor: **Atsushi Morita**, Tokyo (JP)

(73) Assignee: **SANKYO OILLESS INDUSTRY, INC.**, Tokyo (JP)

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

(21) Appl. No.: **29/687,200**

(22) Filed: **Apr. 11, 2019**

(30) **Foreign Application Priority Data**

Oct. 16, 2018 (JP) 2018-022681

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

(52) **U.S. Cl.**
USPC **D15/128**

(58) **Field of Classification Search**
USPC D15/128
CPC B21D 28/32; B21D 28/20; B21D 28/325;
B21D 19/08; B21D 19/084; B21D 37/08;
B21D 37/01; B21D 22/02; B21D 5/04;
Y10T 83/8853; Y10T 83/8785; Y10T
83/8841; Y10T 83/8831; Y10T 83/885;
Y10T 83/8878; Y10T 29/49826; Y10T
74/18992; Y10T 74/2101; Y10T 74/2102
See application file for complete search history.

(56) **References Cited**

U.S. PATENT DOCUMENTS

D245,164 S * 7/1977 Persik D15/128
5,101,705 A * 4/1992 Matsuoka B21D 28/32
72/452.9
5,487,296 A * 1/1996 Gerhart B21D 19/08
72/304
5,904,064 A * 5/1999 Higuchi B21D 28/32
72/304

6,164,115 A * 12/2000 Higuchi B21D 19/08
72/315
6,220,137 B1 * 4/2001 Matsuoka B21D 28/32
72/452.9
7,114,364 B2 * 10/2006 Weigelt B21D 28/32
72/452.9
7,134,313 B2 * 11/2006 Chun B21D 28/32
72/452.9
8,327,760 B2 * 12/2012 Takahashi B21D 28/32
100/265

(Continued)

FOREIGN PATENT DOCUMENTS

JP 1620160 12/2018

OTHER PUBLICATIONS

Notification of Reasons for Refusal dated Feb. 26, 2019 in Japanese Design Application No. 2018-022681 with English Translation.

Primary Examiner — Nathaniel D. Buckner
(74) *Attorney, Agent, or Firm* — Wenderoth, Lind & Ponack, L.L.P.

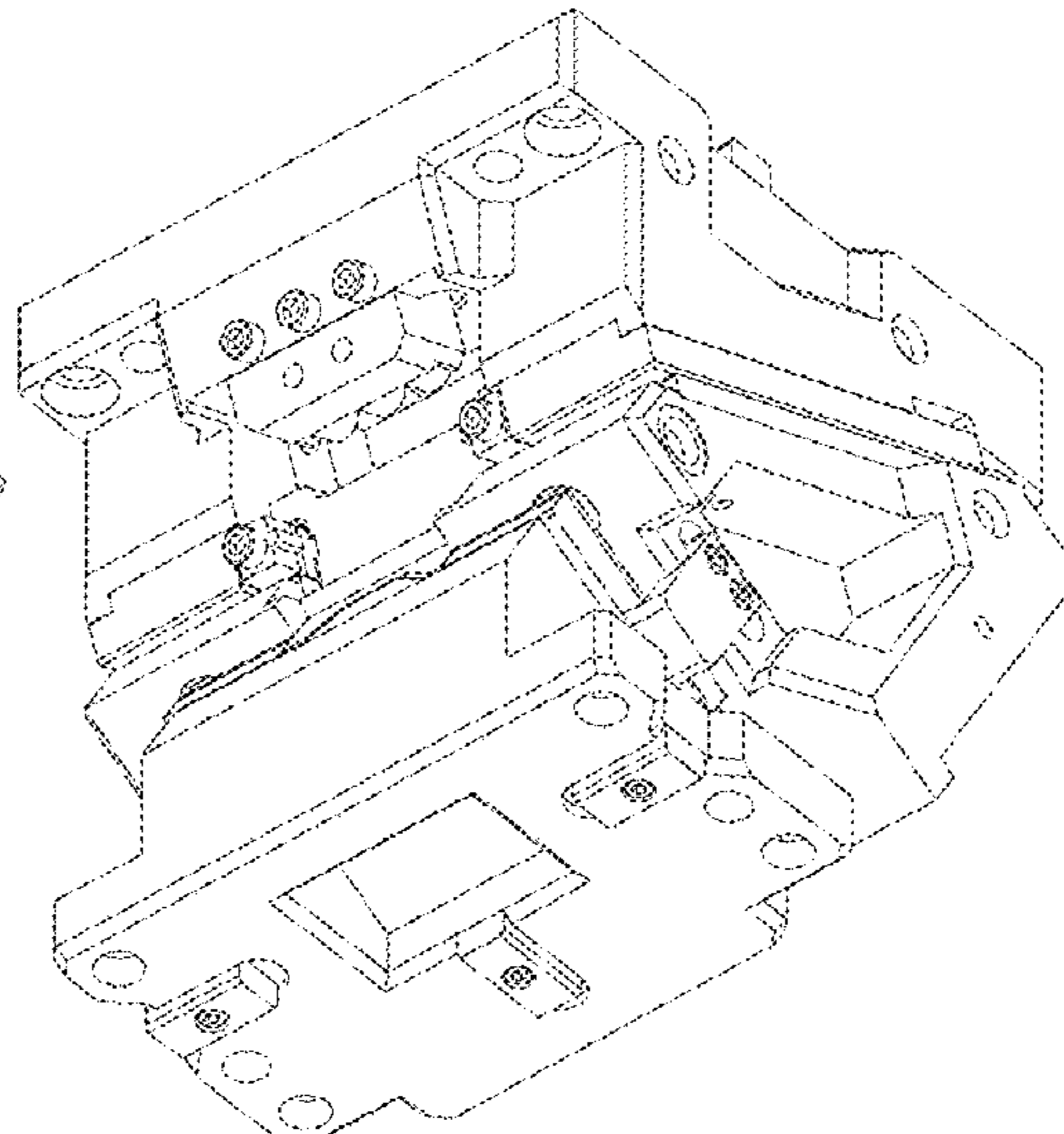
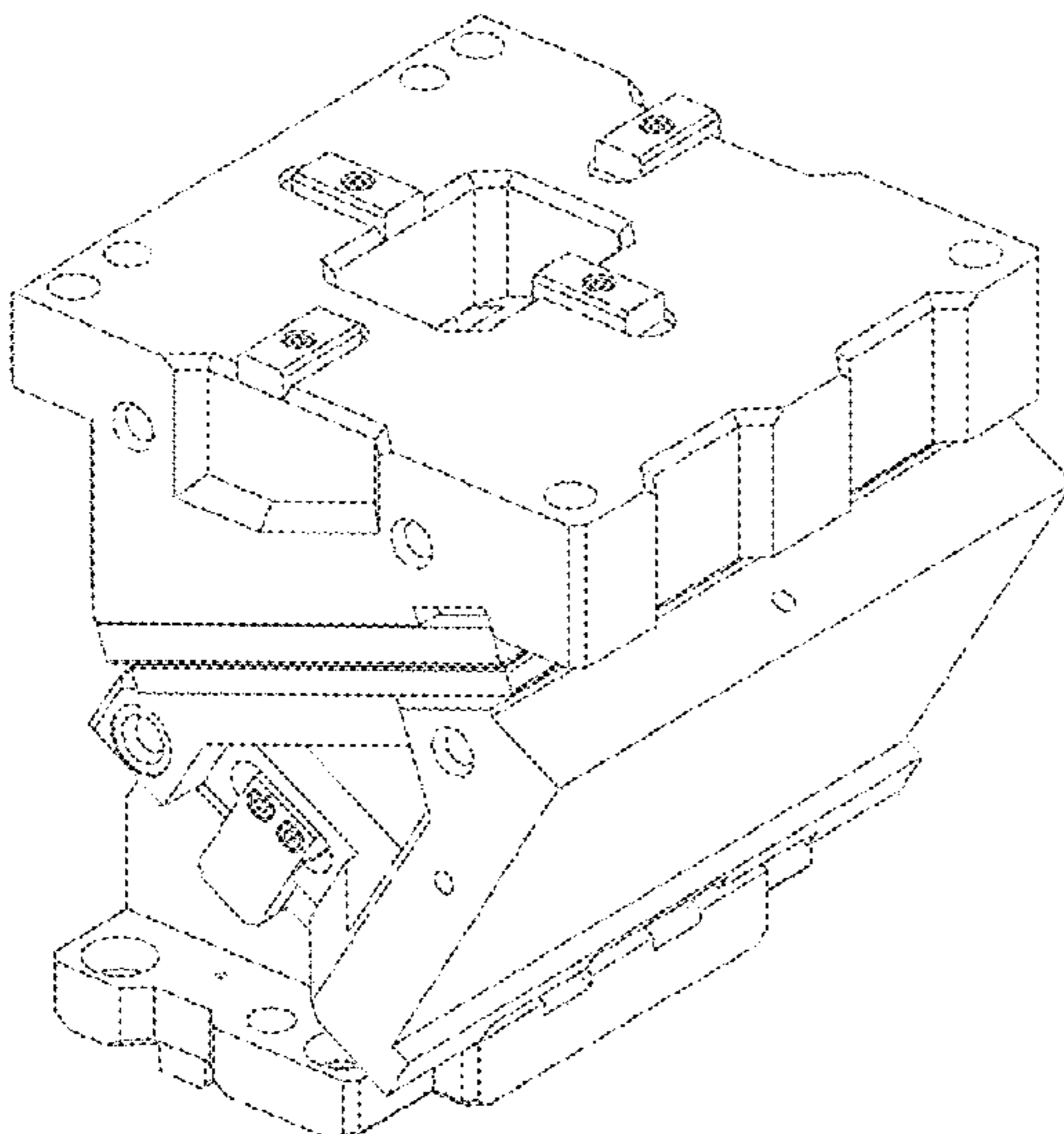
(57) **CLAIM**

The ornamental design for a cam unit, as shown and described.

DESCRIPTION

FIG. 1 is a bottom view of a cam unit;
FIG. 2 is a front view thereof;
FIG. 3 is a left side view thereof;
FIG. 4 is a rear view thereof;
FIG. 5 is a perspective view thereof;
FIG. 6 is a perspective view thereof;
FIG. 7 is a right side view thereof; and,
FIG. 8 is a top view thereof.
The broken lines of FIGS. 7 and 8 illustrate portions of the cam unit that form no part of the claimed design.

1 Claim, 8 Drawing Sheets



(56)

References Cited

U.S. PATENT DOCUMENTS

8,332,062	B2 *	12/2012	Kako	G06F 30/00
					700/98
8,689,600	B2 *	4/2014	Weigelt	B21D 28/32
					72/452.9
8,863,566	B2 *	10/2014	Weigelt	B21D 19/08
					72/452.9
2011/0167954	A1 *	7/2011	Shibata	B21D 37/01
					74/567

* cited by examiner

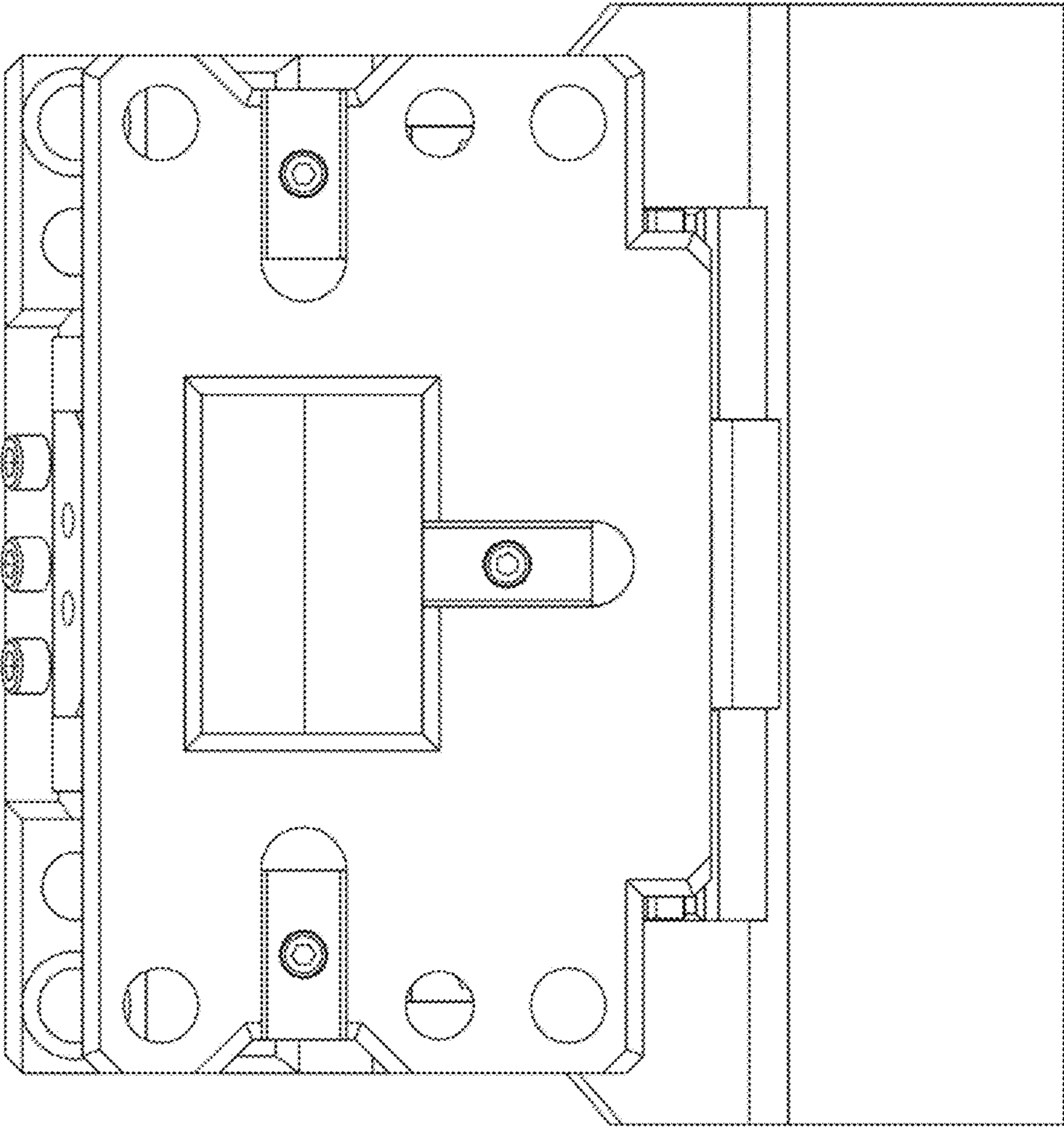


FIG. 1

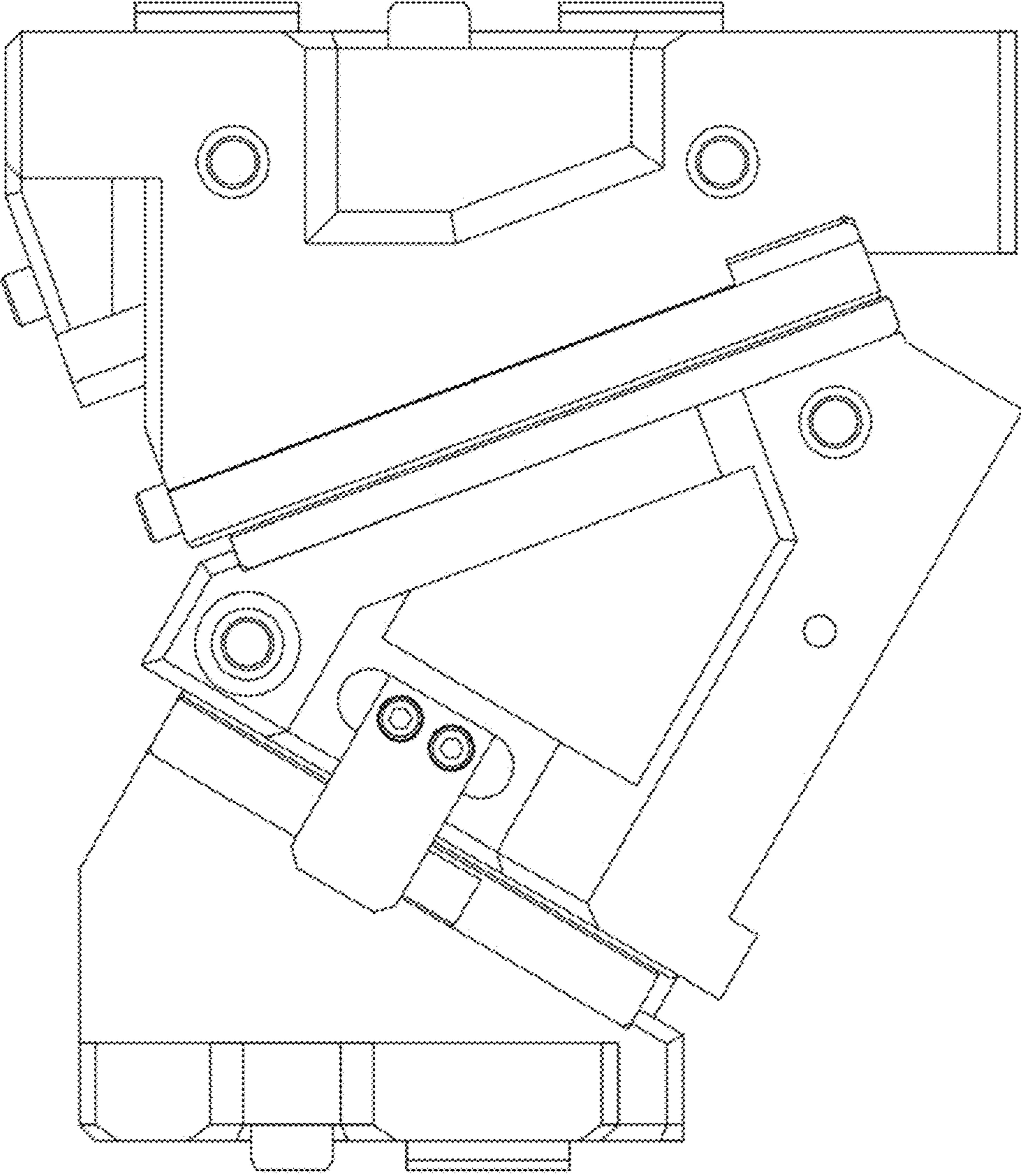


FIG. 2

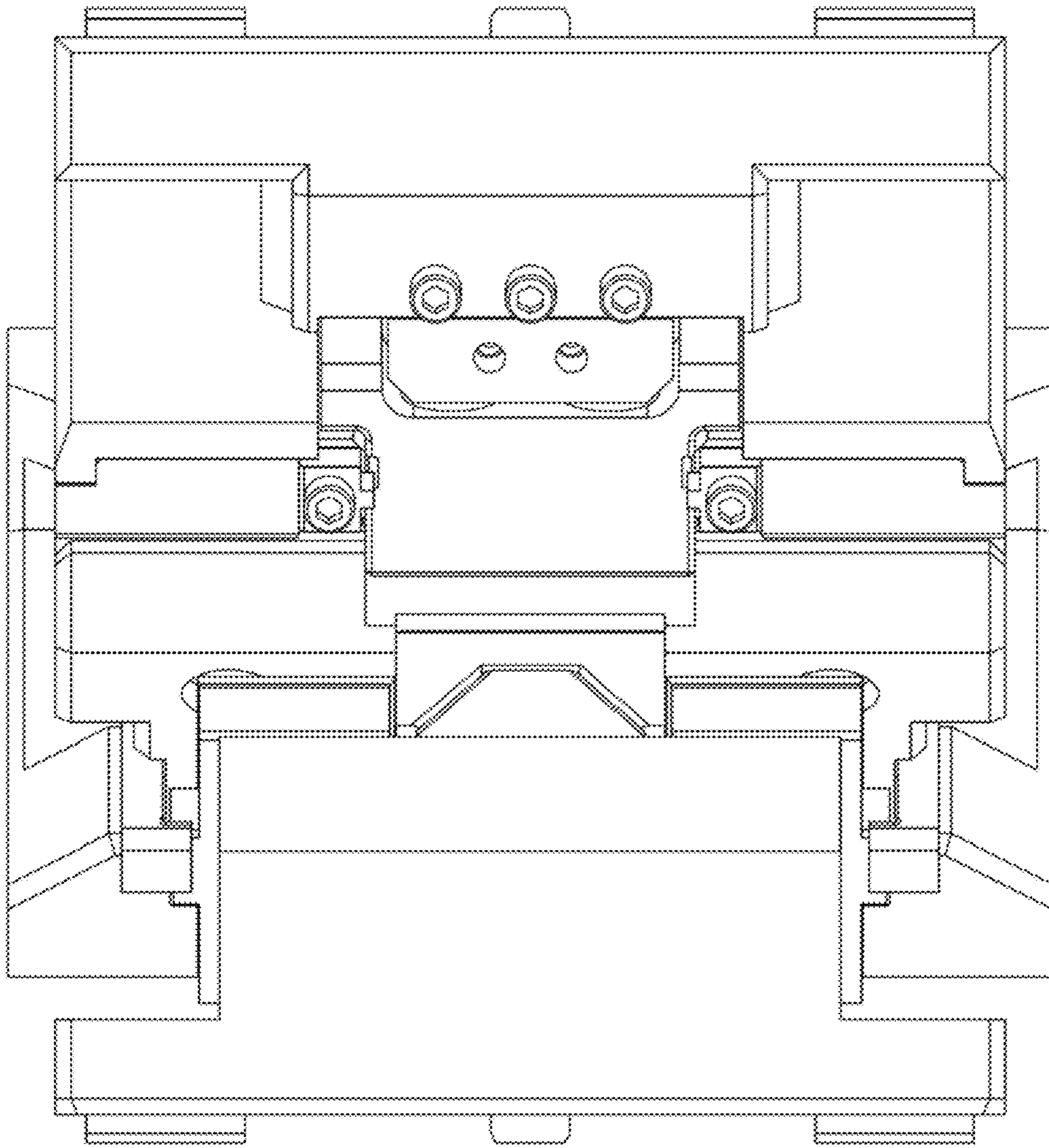


FIG. 3

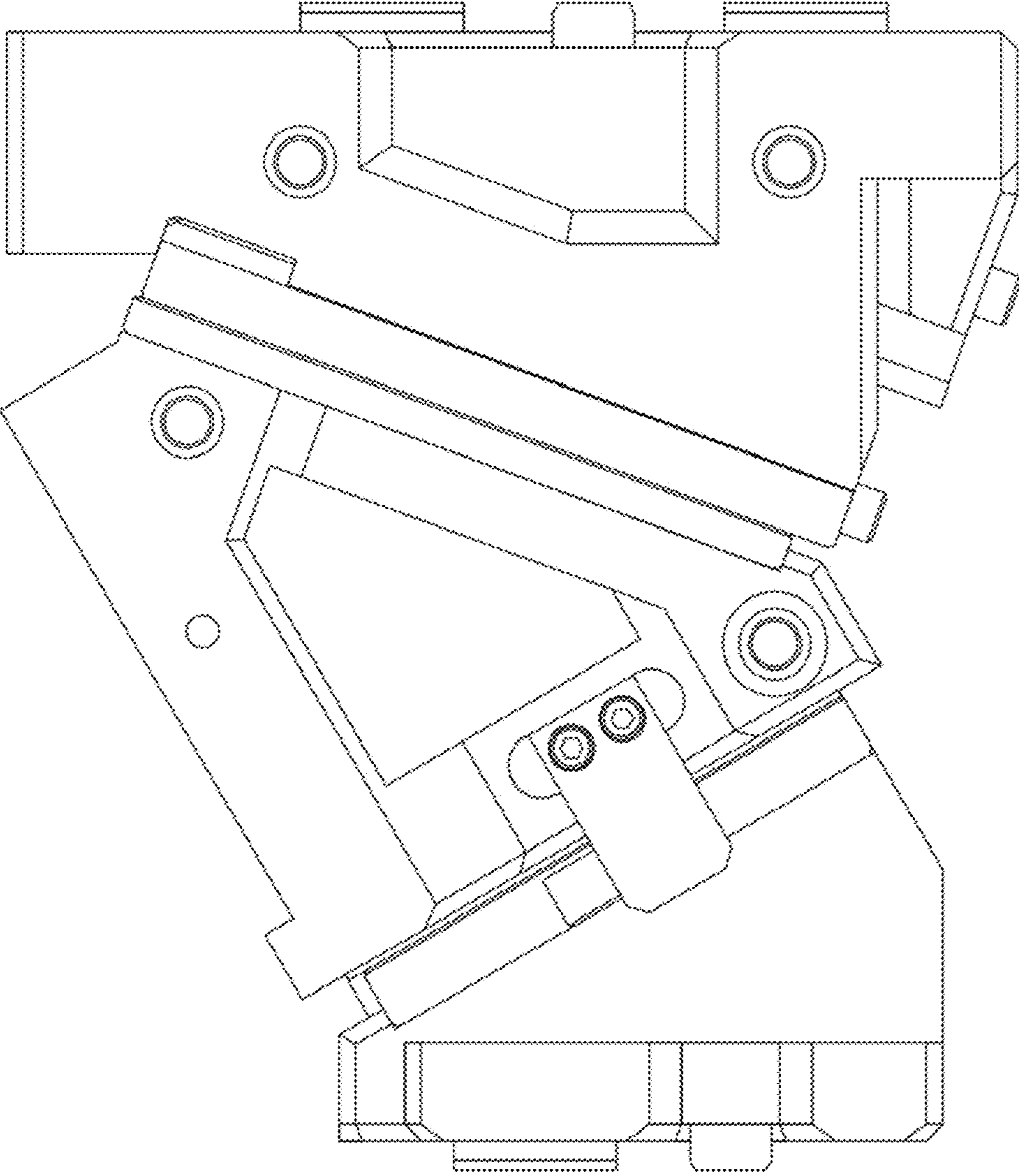


FIG. 4

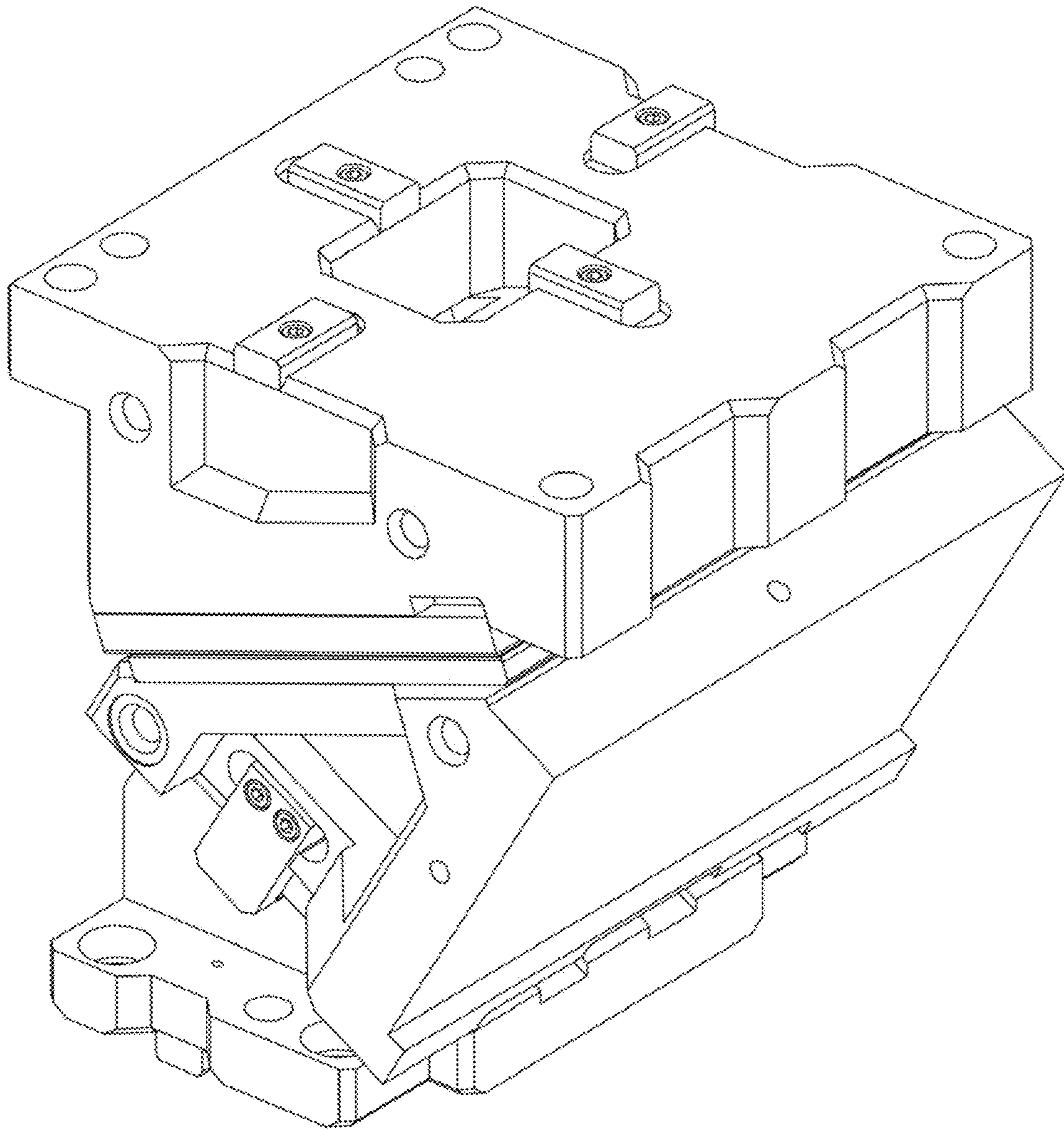


FIG. 5

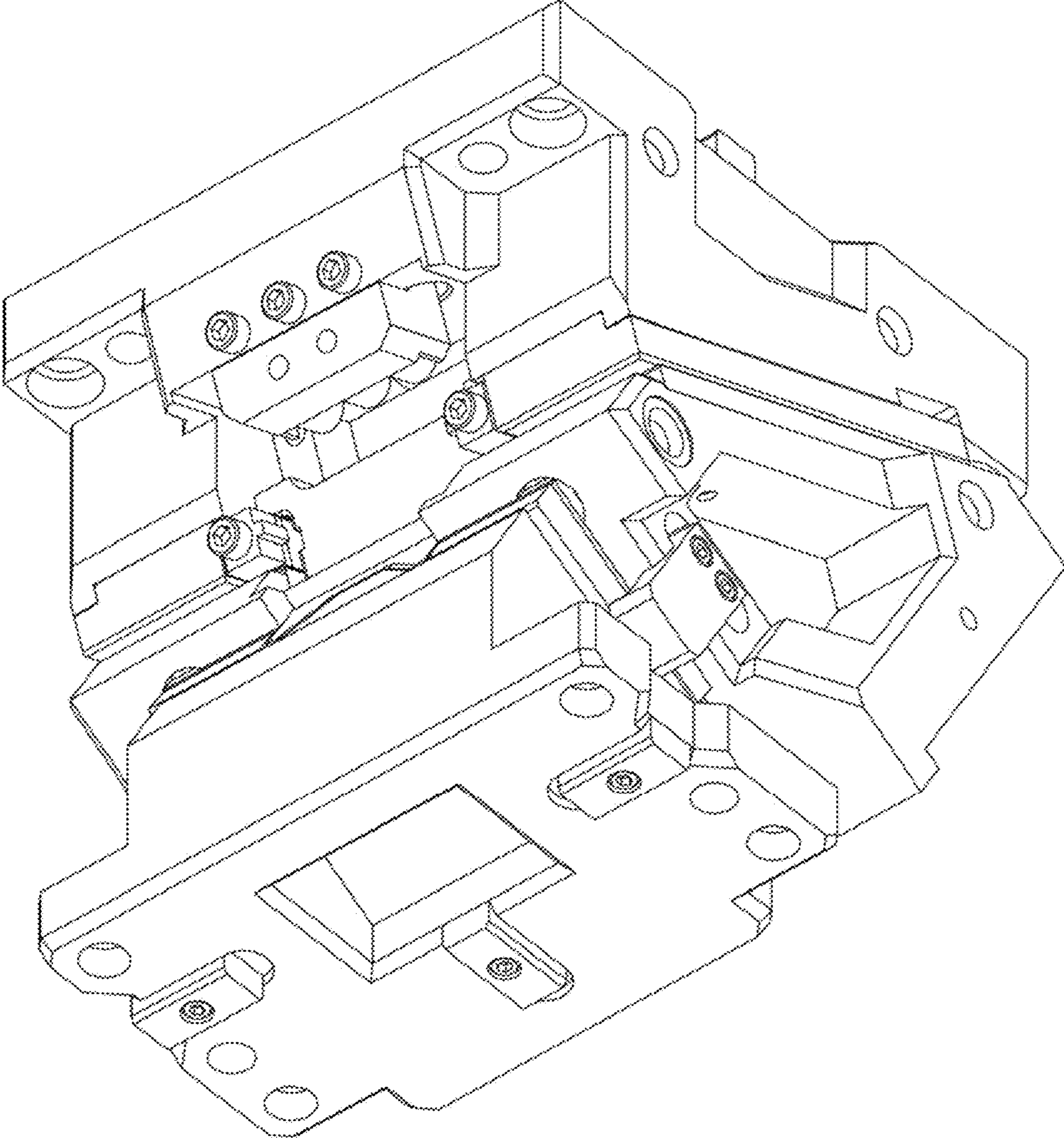


FIG. 6

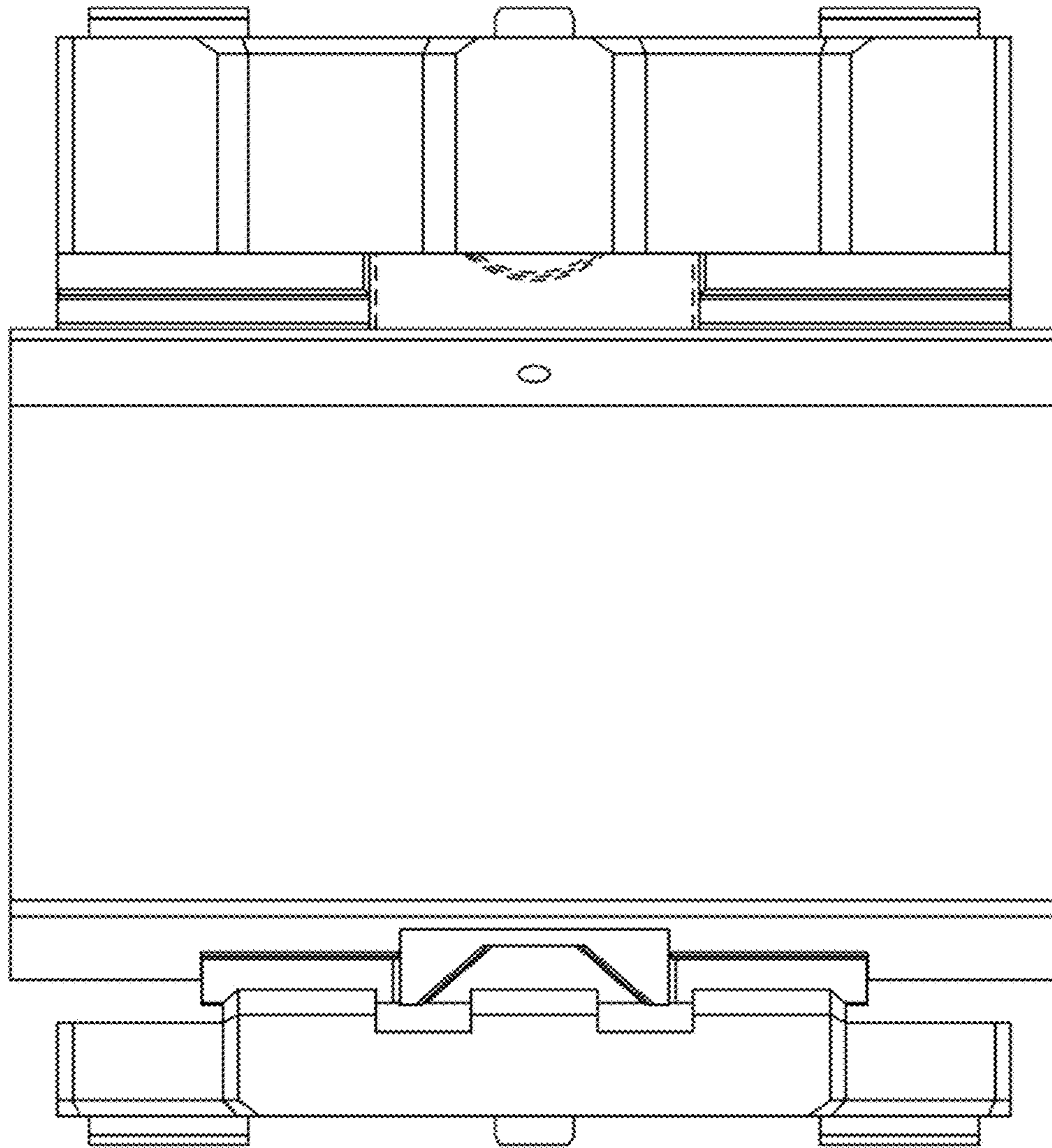


FIG. 7

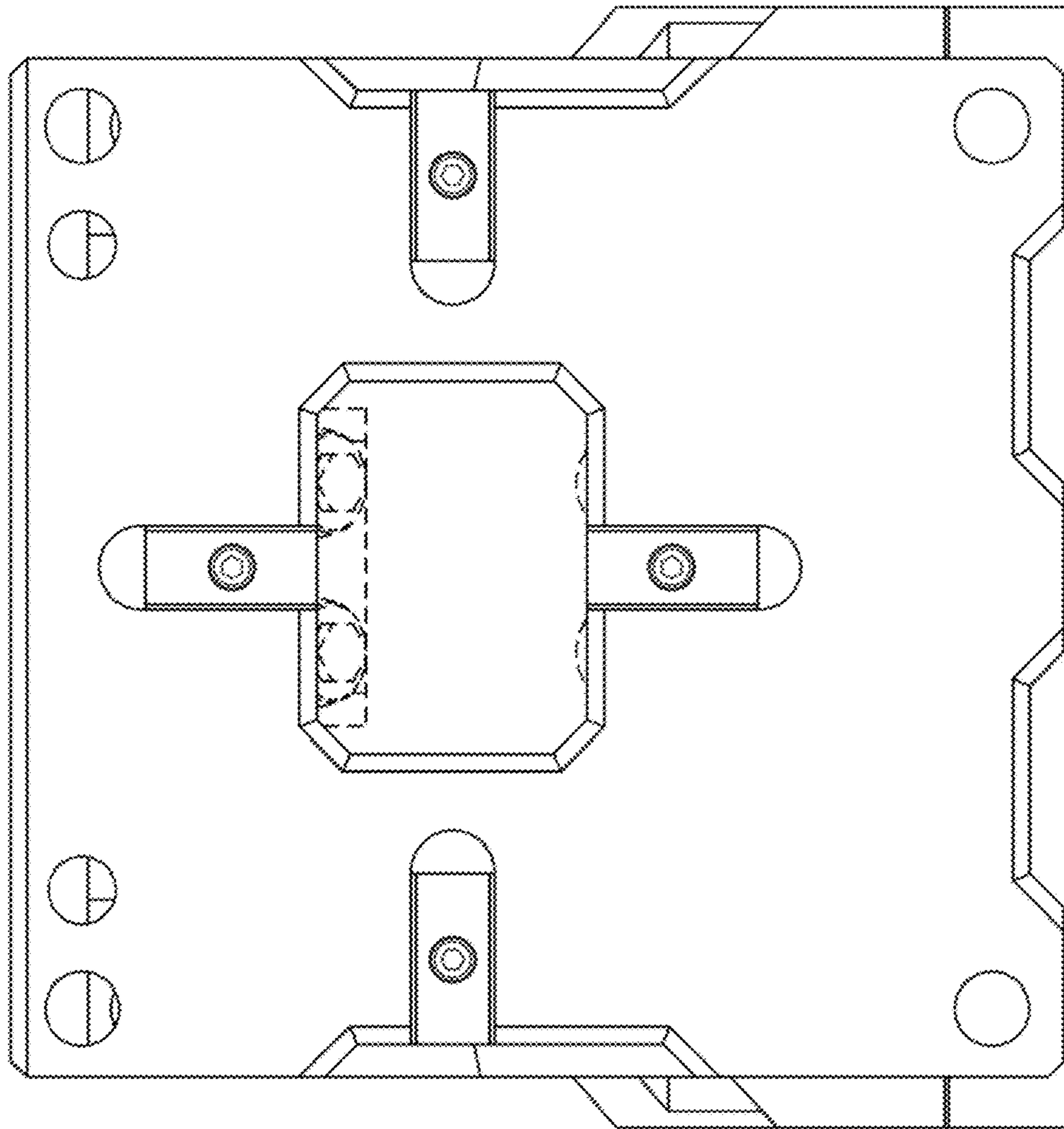


FIG. 8