



US00D699180S

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

(10) **Patent No.:** **US D699,180 S**  
(45) **Date of Patent:** **\*\* Feb. 11, 2014**

(54) **BATTERY HOUSING**

(71) Applicant: **The Toro Company**, Bloomington, MN (US)

(72) Inventors: **Ryan J. Sweere**, Minneapolis, MN (US);  
**Darrell W. Hinklin**, Huntersville, NC (US)

(73) Assignee: **The Toro Company**, Bloomington, MN (US)

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

(21) Appl. No.: **29/459,305**

(22) Filed: **Jun. 28, 2013**

(51) **LOC (10) Cl.** ..... **13-02**

(52) **U.S. Cl.**  
USPC ..... **D13/103**

(58) **Field of Classification Search**  
USPC ..... D13/102–104, 110, 118–121, 184, 199;  
429/96–100, 163, 176  
See application file for complete search history.

(56) **References Cited**

**U.S. PATENT DOCUMENTS**

D436,917	S	*	1/2001	Hayakawa et al.	.....	D13/103
D480,354	S	*	10/2003	Hassenzahl et al.	.....	D13/103
D524,728	S	*	7/2006	Watson	.....	D13/103
D601,088	S	*	9/2009	Scheucher	.....	D13/103
D604,695	S	*	11/2009	Aglassinger	.....	D13/103
D639,730	S	*	6/2011	Kawase	.....	D13/103
D640,196	S	*	6/2011	Shuang et al.	.....	D13/119
D657,307	S	*	4/2012	Zhao	.....	D13/103
D682,194	S	*	5/2013	Jiang et al.	.....	D13/103

**OTHER PUBLICATIONS**

“Black & Decker Tools 20-Volt Max Lithium-Ion Battery LBXR20,”  
[online] [Retrieved on Sep. 23, 2013]. Document dated Jun. 5, 2012.

Retrieved from the Internet:<URL: <http://web.archive.org/web/20120605002948/http://www.blackanddecker.com/attachments/LBXR20.aspx>>; 5 pgs.  
“Black & Decker Tools 36 V Lithium Ion Battery LBXR36,” [online] [Retrieved on Sep. 20, 2013]. Document dated May 31, 2013. Retrieved from the Internet:<URL: <http://web.archive.org/web/20130531161035/http://blackanddecker.com/attachments/LBXR36.aspx>>; 4 pgs.  
“Bosch BAT619G 18-Volt Lithium-Ion HC (High Capacity) 3.0Ah Battery with Digital Fuel Gauge,” [online] [Retrieved on Sep. 20, 2013]. Product identified as available on or before Oct. 7, 2011. Retrieved from the Internet:<URL: <http://www.amazon.com/Bosch-BAT619G-18-Volt-Lithium-Ion-Capacity/dp/B005HVZTB> C/ref=sr\_1\_lie=UTF8&qid=1379685791&sr=8-1&keywords=bat619>; 8 pgs.

(Continued)

*Primary Examiner* — Rosemary K Tarcza

(74) *Attorney, Agent, or Firm* — Mueting, Raasch & Gebhardt, P.A.

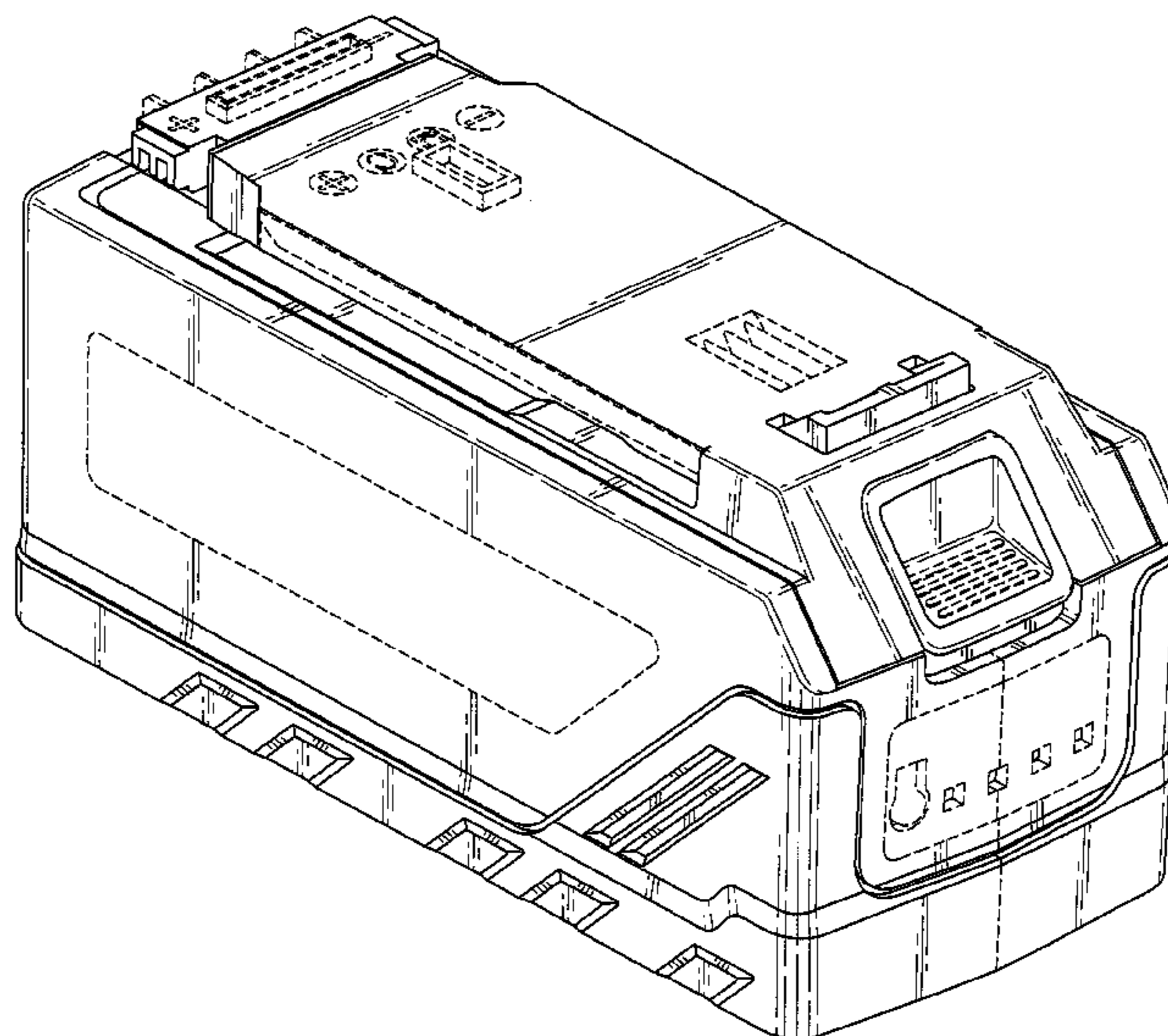
(57) **CLAIM**

The ornamental design for a battery housing, as shown and described.

**DESCRIPTION**

FIG. 1 is a left front perspective view of a battery housing showing the new design;  
FIG. 2 is a front elevational view thereof;  
FIG. 3 is a left side elevational view thereof;  
FIG. 4 is a right side elevational view thereof;  
FIG. 5 is a rear elevational view thereof;  
FIG. 6 is a top plan view thereof; and,  
FIG. 7 is a bottom plan view thereof.  
The features shown in broken lines in the figures are for illustrative purposes only and form no part of the claimed design.

**1 Claim, 7 Drawing Sheets**



(56)

## References Cited

## OTHER PUBLICATIONS

“Bosch BAT818 SlimPack 36-Volt 1.3 Amp Hour Litheon Slide Style Battery,” [online] [Retrieved on Sep. 20, 2013]. Product identified as available on or before Apr. 1, 2004. Retrieved from the Internet<URL: [http://www.amazon.com/Bosch-BAT818-SlimPack-36-Volt-Litheon/dp/B000JTBPFQ/ref=sr\\_1\\_1?ie=UTF8&qid=1379686188&sr=8-1&keywords=bat818+slim+pack](http://www.amazon.com/Bosch-BAT818-SlimPack-36-Volt-Litheon/dp/B000JTBPFQ/ref=sr_1_1?ie=UTF8&qid=1379686188&sr=8-1&keywords=bat818+slim+pack)>; 5 pgs.

“Bosch BAT836 Standard 36-Volt 2.0 Amp Hour Litheon Slide Style Battery,” [online] [Retrieved on Sep. 20, 2013]. Product identified as available on or before Jul. 2, 2004. Retrieved from the Internet:<URL: [http://www.amazon.com/Bosch-BAT836-Standard-36-Volt-Litheon/dp/B000JTBPF6/ref=sr\\_1\\_1?ie=UTF8&qid=1379686427&sr=8-1&keywords=bat836](http://www.amazon.com/Bosch-BAT836-Standard-36-Volt-Litheon/dp/B000JTBPF6/ref=sr_1_1?ie=UTF8&qid=1379686427&sr=8-1&keywords=bat836)>; 6 pgs.

“Greenworks 20V 2.6Ah Lithium Ion Battery Model 29612,” [online] [Retrieved on Sep. 20, 2013]. Document dated May 10, 2012. Retrieved from the Internet:<URL: <http://web.archive.org/web/20120510132458/http://greenworkstools.com/product-detail/20V%202.6Ah%20Li-ION%20Battery>> 1 pg.

“Greenworks 20V 6Ah Li-Ion Extended Run Time Battery Model No. 29212,” [online] [Retrieved on Sep. 20, 2013]. Document dated May 11, 2012. Retrieved from the Internet:<URL: <http://web.archive.org/web/20120511221720/http://greenworkstools.com/product-detail/20V%206Ah%20Li-ION%20Battery>> 1 pg.

“Greenworks 24V 2Ah Li-Ion Battery,” [online] [Retrieved on Sep. 20, 2013]. Document dated Oct. 6, 2011. Retrieved from the Internet:<URL: <http://web.archive.org/web/20111006092759/http://greenworkstools.com/product-detail/24V-2Ah-Li-ION-Battery>> 1 pg.

“Greenworks 24V 4Ah Li-Ion Battery,” [online] [Retrieved on Sep. 20, 2013]. Document dated Oct. 6, 2011. Retrieved from the Internet:<URL: <http://web.archive.org/web/20111006092954/http://greenworkstools.com/product-detail/24v-4Ah-Li-ION-Battery>> 1 pg.

“Greenworks 40V 2Ah Li-Ion Battery,” [online] [Retrieved on Sep. 20, 2013]. Document dated Oct. 6, 2011. Retrieved from the Internet:<URL: <http://web.archive.org/web/20111006090807/http://greenworkstools.com/product-detail/40V-2Ah-Li-ION-Battery>> 1 pg.

“Greenworks 40V 4Ah Li-Ion Battery Model 29282,” [online] [Retrieved on Sep. 20, 2013]. Document dated May 10, 2012. Retrieved from the Internet:<URL: <http://web.archive.org/web/20120510131748/http://greenworkstools.com/product-detail/40V-4Ah-Li-ION-Battery>> 1 pg.

“Greenworks G-Max 40V 2Ah Li-Ion Battery Model 29462,” [online] [Retrieved on Sep. 20, 2013]. Document dated May 12,

2013. Retrieved from the Internet:<URL: <http://web.archive.org/web/20130512193011/http://greenworkstools.com/product-detail/G-MAX-40V-2Ah-Li-ION-Battery>> 1 pg.

“Greenworks G-Max 40V 4Ah Li-Ion Battery Model 29472,” [online] [Retrieved on Sep. 20, 2013]. Document dated May 12, 2013. Retrieved from the Internet:<URL: <http://web.archive.org/web/20130512195528/http://greenworkstools.com/product-detail/G-MAX-40V-4Ah-Li-ION-Battery>> 1 pg.

“Ryobi® 40 Volt Lithium-Ion Battery Pack, OP4015, OP4026,” Operator Instructions. Techtronic Industries North America, Inc., Anderson, SC, May 16, 2012; 6 pgs.

“Ryobi® 40-Volt Slim Pack Accessory Battery,” Model # OP4015A, [online] [Retrieved on Sep. 20, 2013]. Retrieved from the Internet:<URL: <http://www.homedepot.com/p/t/203800507?productId=203800507&storeId=10051&langId=-1&catalogId=10053>> 2pgs.

Cage, Chuck “Ryobi’s 40 V Li-Ion Garden Tool Line,” *Toolmonger*, May 1, 2012; [online] [Retrieved on Sep. 20, 2013]. Retrieved from the Internet:<URL: <http://toolmonger.com/2012/05/01/ryobis-40v-li-ion-garden-tool-line>>9 pgs.

“Toro® 20V Battery and Charger, Model Nos. 88500 and 88502,” Operator’s Manual, Form No. 3376-813 Rev A. The Toro Company, Bloomington, MN. 2012; 4 pgs.

“Toro 88502 Li-ion Replacement Battery, 20-volt Max,” [online] [Retrieved on Sep. 20, 2013]. Product available on or before Jun. 1, 2012. Retrieved from the Internet:<URL: [http://www.amazon.com/Toro-88502-Replacement-Battery-20-volt/dp/B0087W89E2/ref=sr\\_1\\_2?ie=UTF8&qid=1379690491&sr=8-2&keywords=toro+20V+battery](http://www.amazon.com/Toro-88502-Replacement-Battery-20-volt/dp/B0087W89E2/ref=sr_1_2?ie=UTF8&qid=1379690491&sr=8-2&keywords=toro+20V+battery)>; 5 pgs.

“Toro 88506 24-volt Max Li-Ion Battery for Toro String Trimmers,” [online] [Retrieved on Sep. 20, 2013]. Product available on or before Jun. 1, 2012. Retrieved from the Internet:<URL: [http://www.amazon.com/Toro-88506-24-volt-Battery-Trimmers/dp/B00CUB3714/ref=sr\\_1\\_2?s=lawn-garden&ie=UTF8&qid=1379689457&sr=1-2&keywords=Toro+24V+battery](http://www.amazon.com/Toro-88506-24-volt-Battery-Trimmers/dp/B00CUB3714/ref=sr_1_2?s=lawn-garden&ie=UTF8&qid=1379689457&sr=1-2&keywords=Toro+24V+battery)>; 4 pgs.

“Toro 88504 Extended Range Lithium ion Battery, 24-Volt,” [online] [Retrieved on Sep. 20, 2013]. Product available on or before Jun. 1, 2012. Retrieved from the Internet:<URL: <http://www.amazon.com/Toro-88504-Extended-Lithium-Battery/dp/B007KENYO8>>; 5 pgs.

“Toro® 24V Battery and Charger, Model Nos. 88503; 88504; 88506 Operator’s Manual,” Form No. 3376-341 Rev A. The Toro Company, Bloomington, MN. 2012; 12 pgs.

“WORX WA3512.1 18 Volt Lithium-Ion Cordless Tool Battery,” [online] [Retrieved on Sep. 23, 2013]. Product identified as available on May 24, 2011. Retrieved from the Internet<URL: [http://www.sears.com/shc/s/p\\_10153\\_12605\\_SPM4221780001P?PDP\\_REDIRECT=false](http://www.sears.com/shc/s/p_10153_12605_SPM4221780001P?PDP_REDIRECT=false)>; 2 pgs.

\* cited by examiner

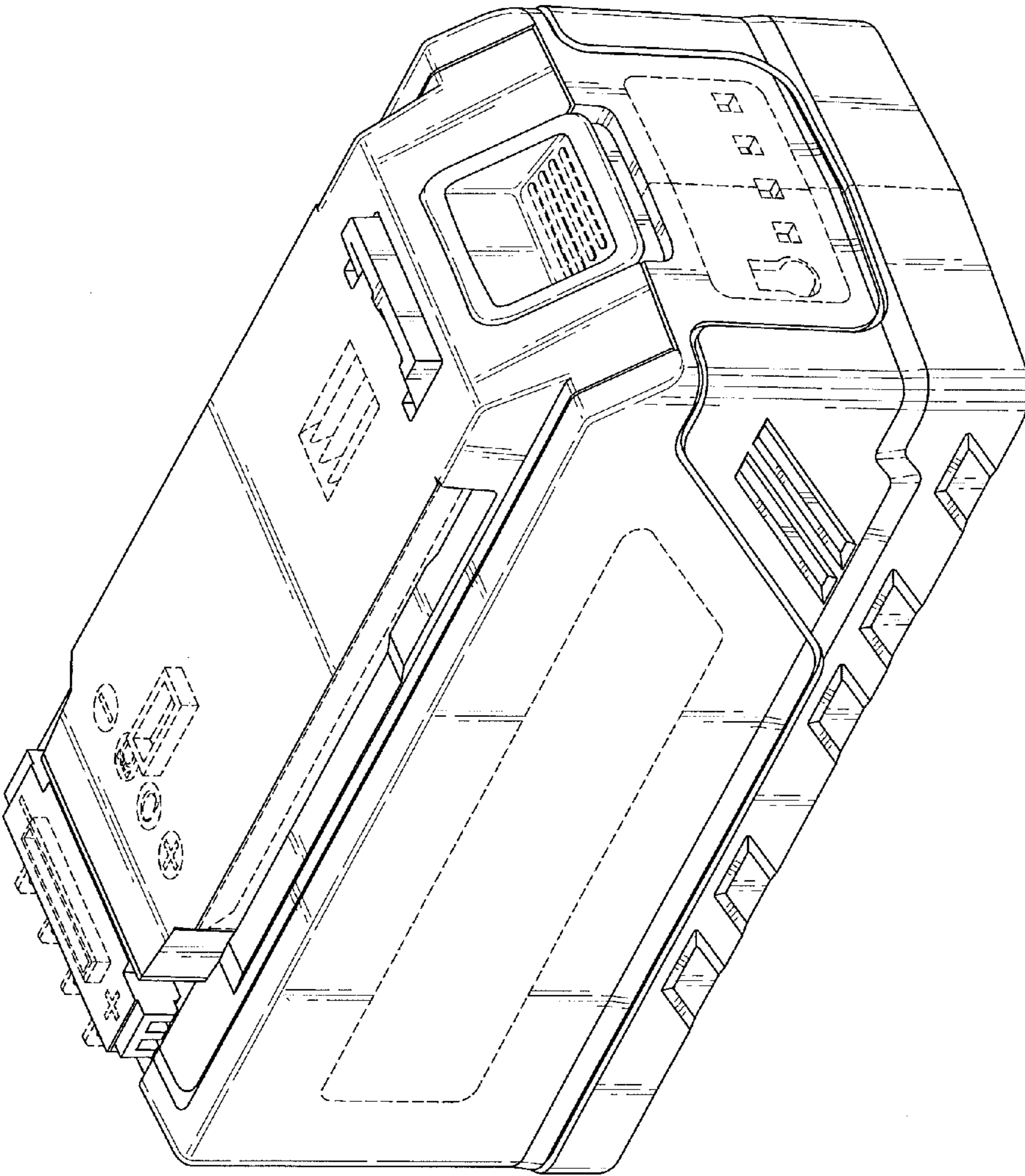
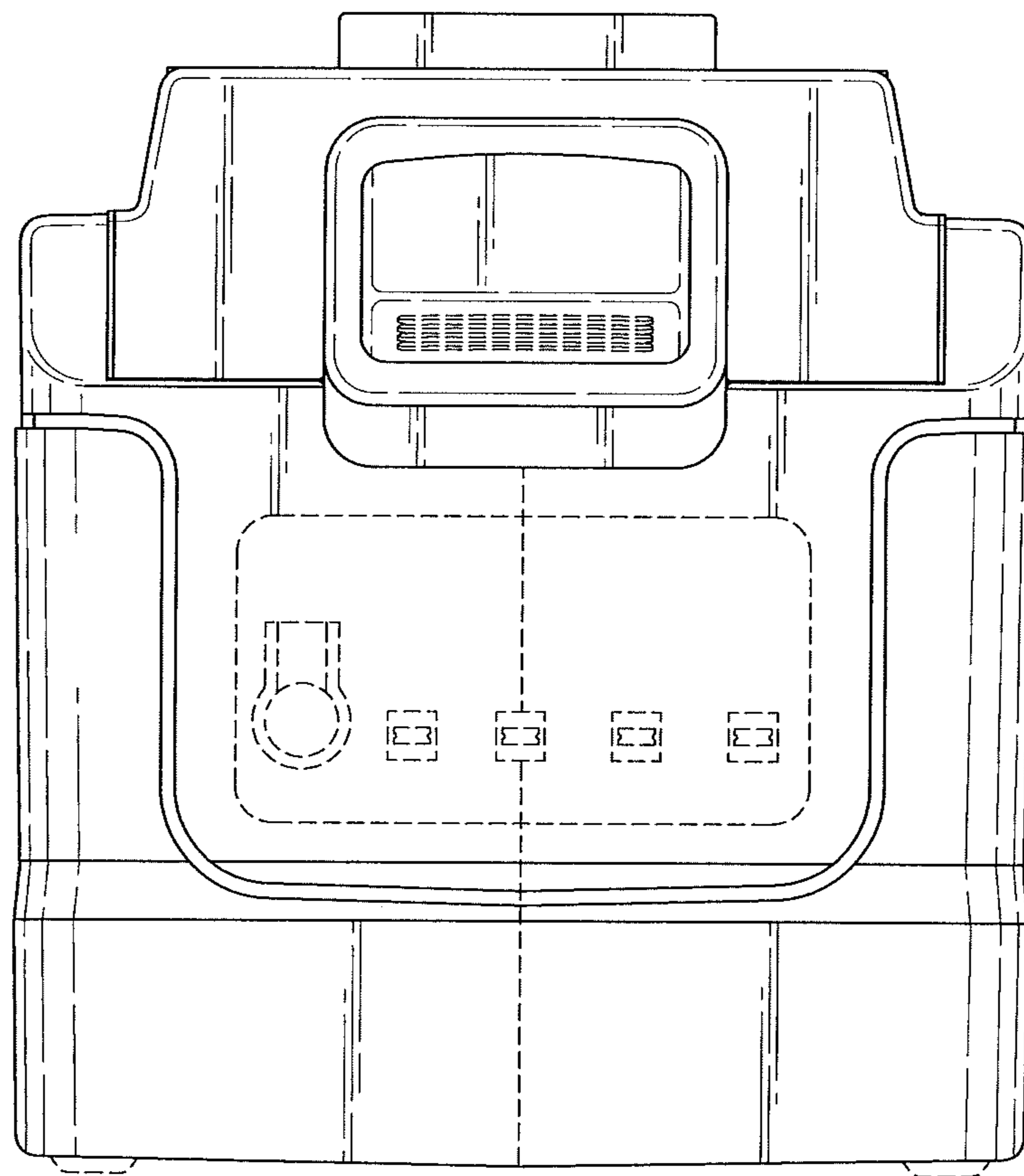


Fig. 1

*Fig. 2*



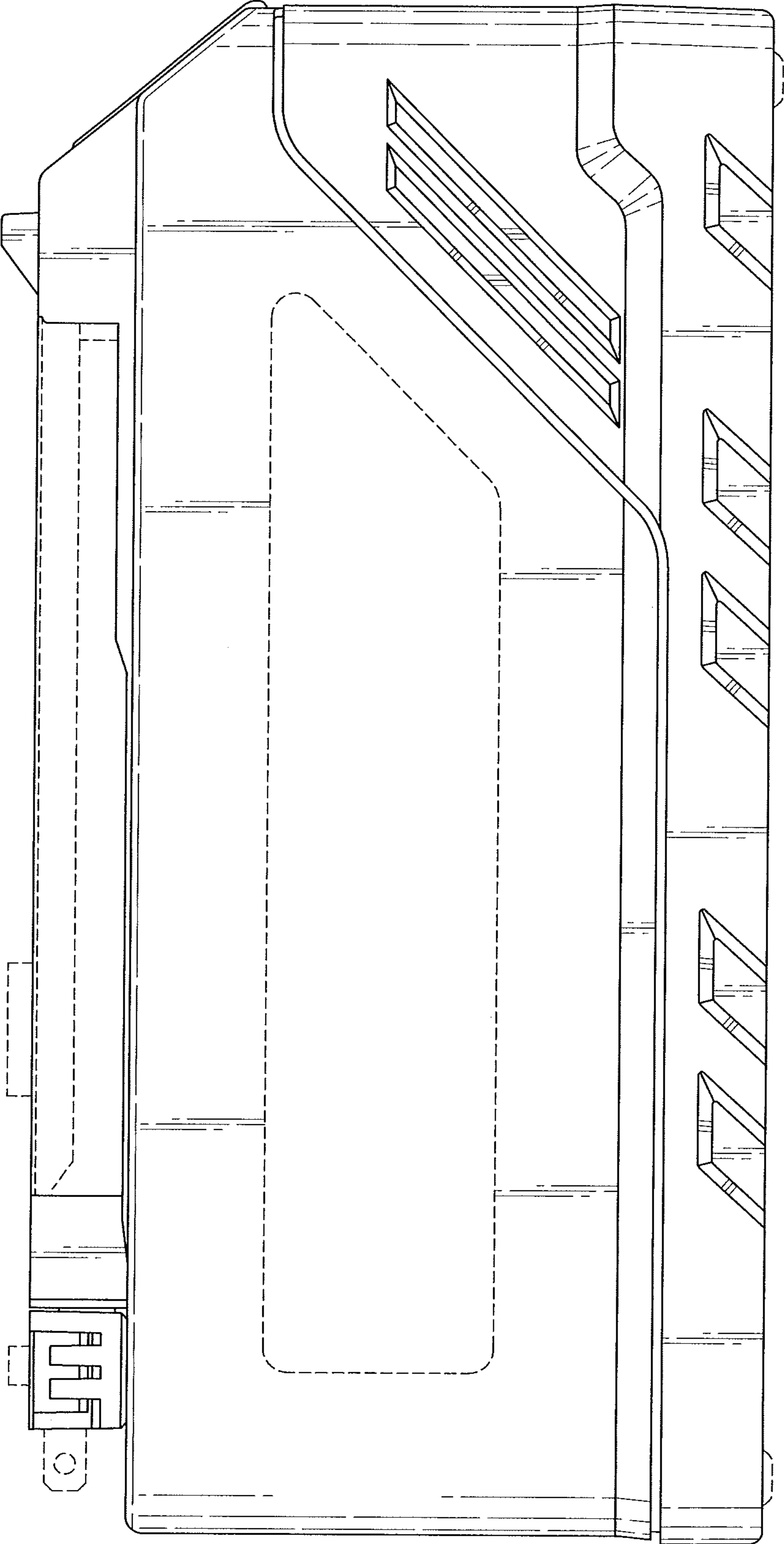


Fig. 3

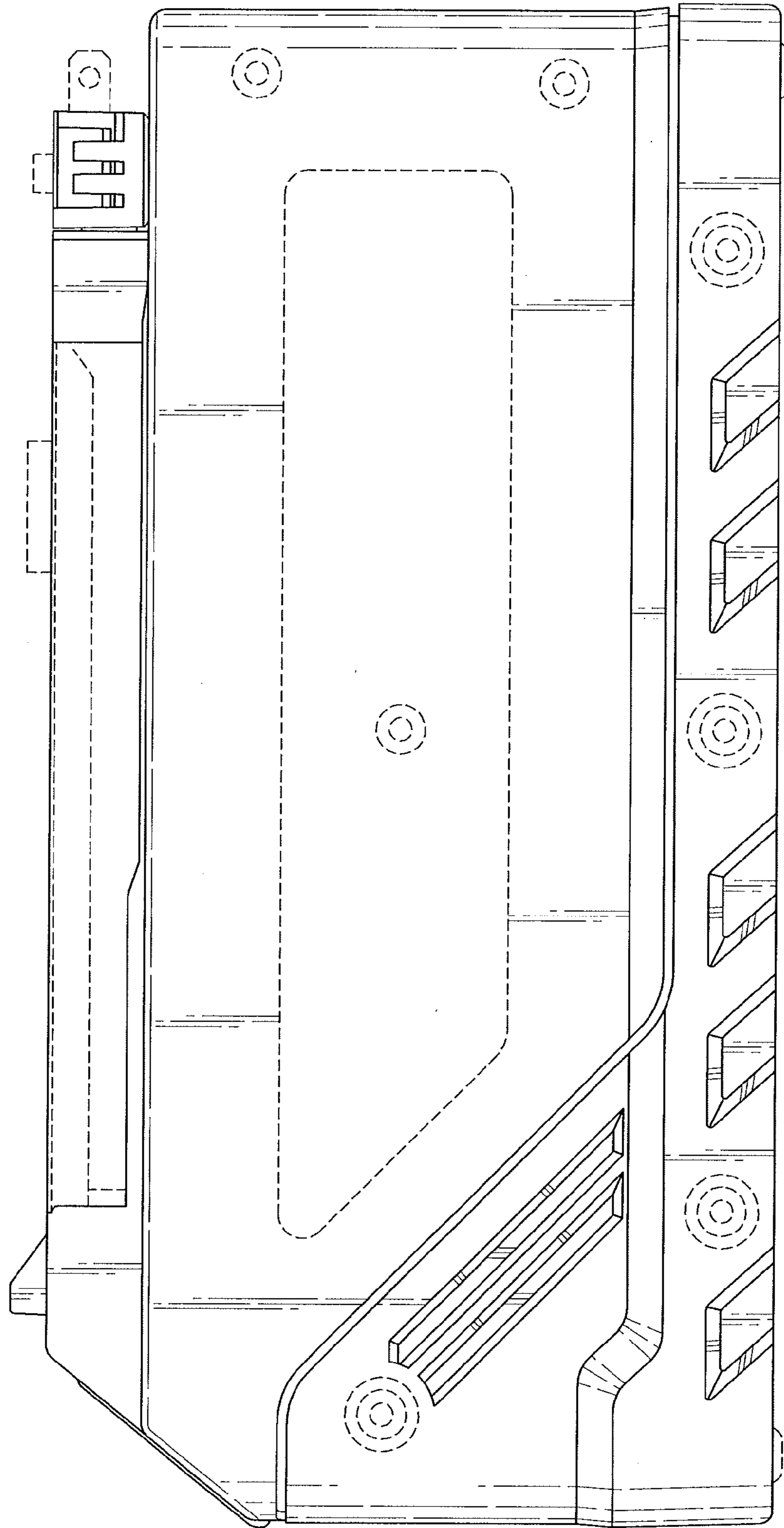
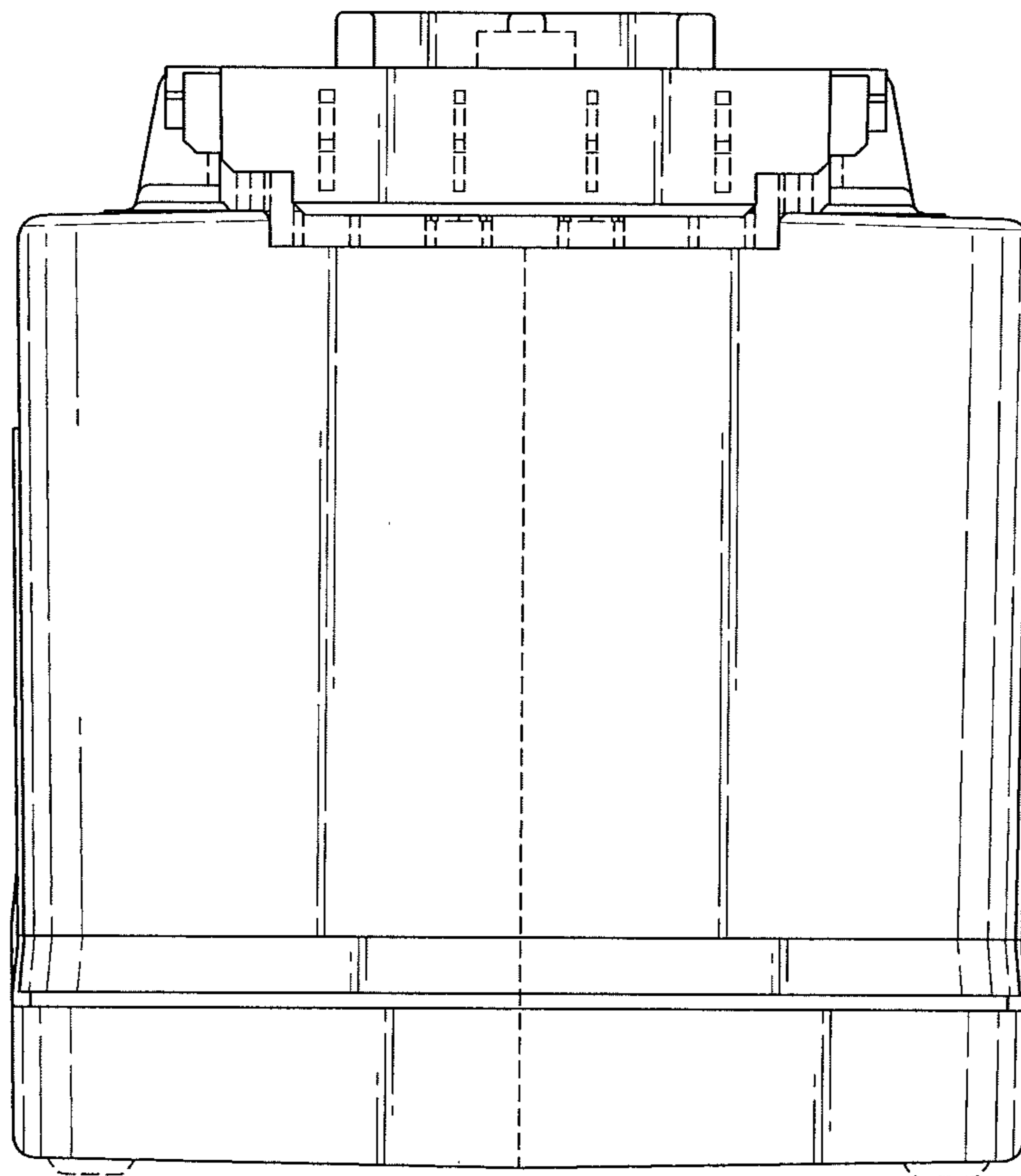


Fig. 4

*Fig. 5*



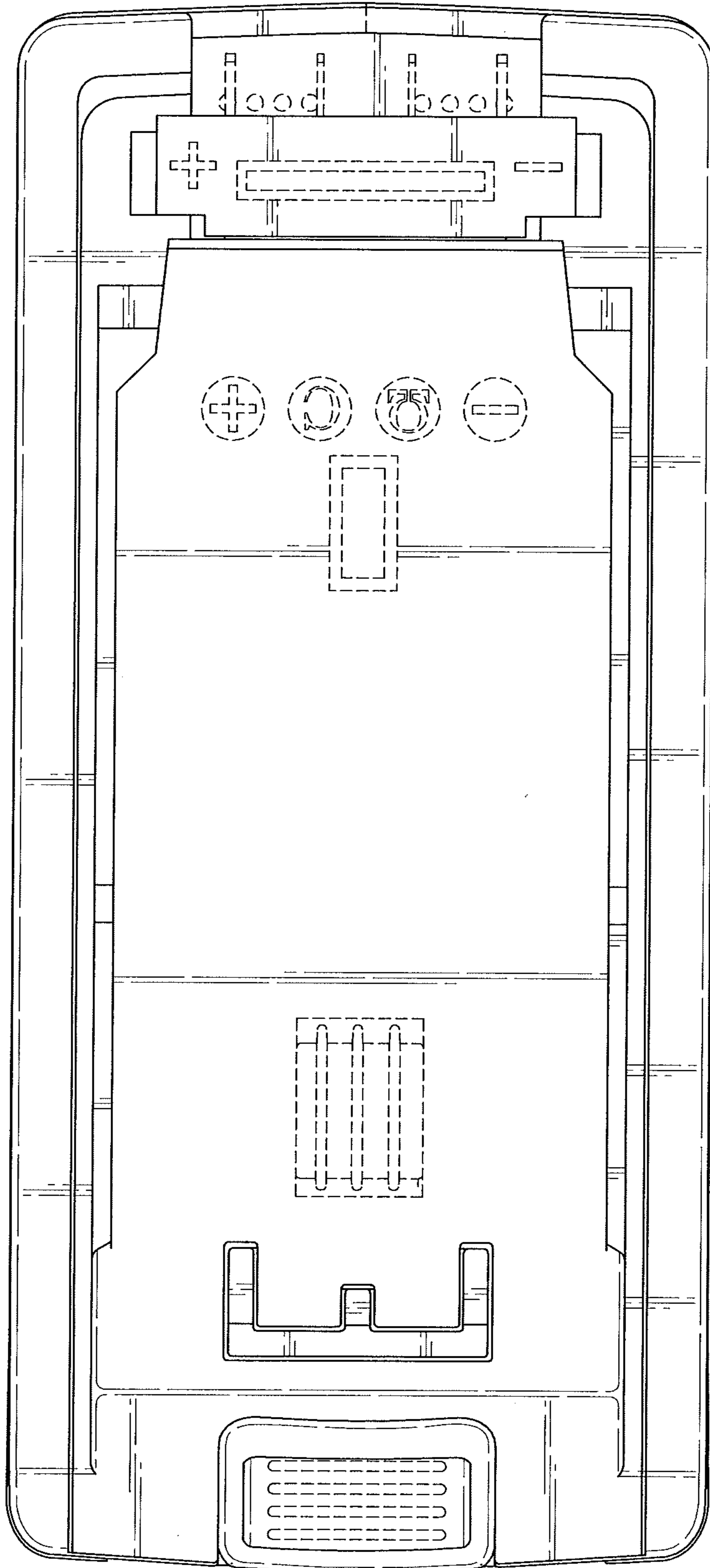


Fig. 6



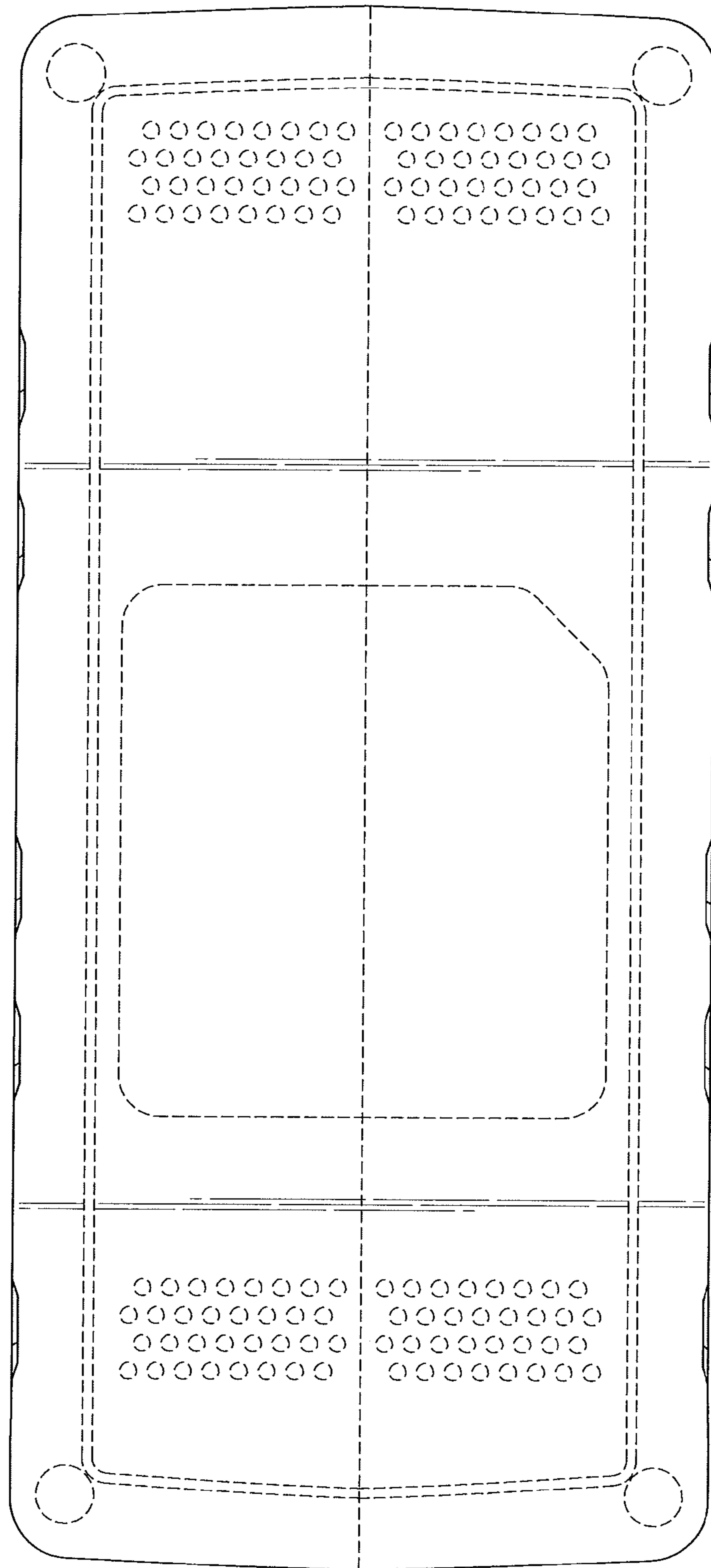


Fig. 7