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Kornacki et al.

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(45) **Date of Patent:** **** Apr. 2, 2019**

(54) **BUILDING AUTOMATION DEVICE**

G05D 23/1931; G02F 1/33308; H01H 9/02; H05B 37/02

See application file for complete search history.

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(56)

References Cited

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U.S. PATENT DOCUMENTS

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

(21) Appl. No.: **29/590,757**

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(51) **LOC (11) Cl.** **13-03**

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

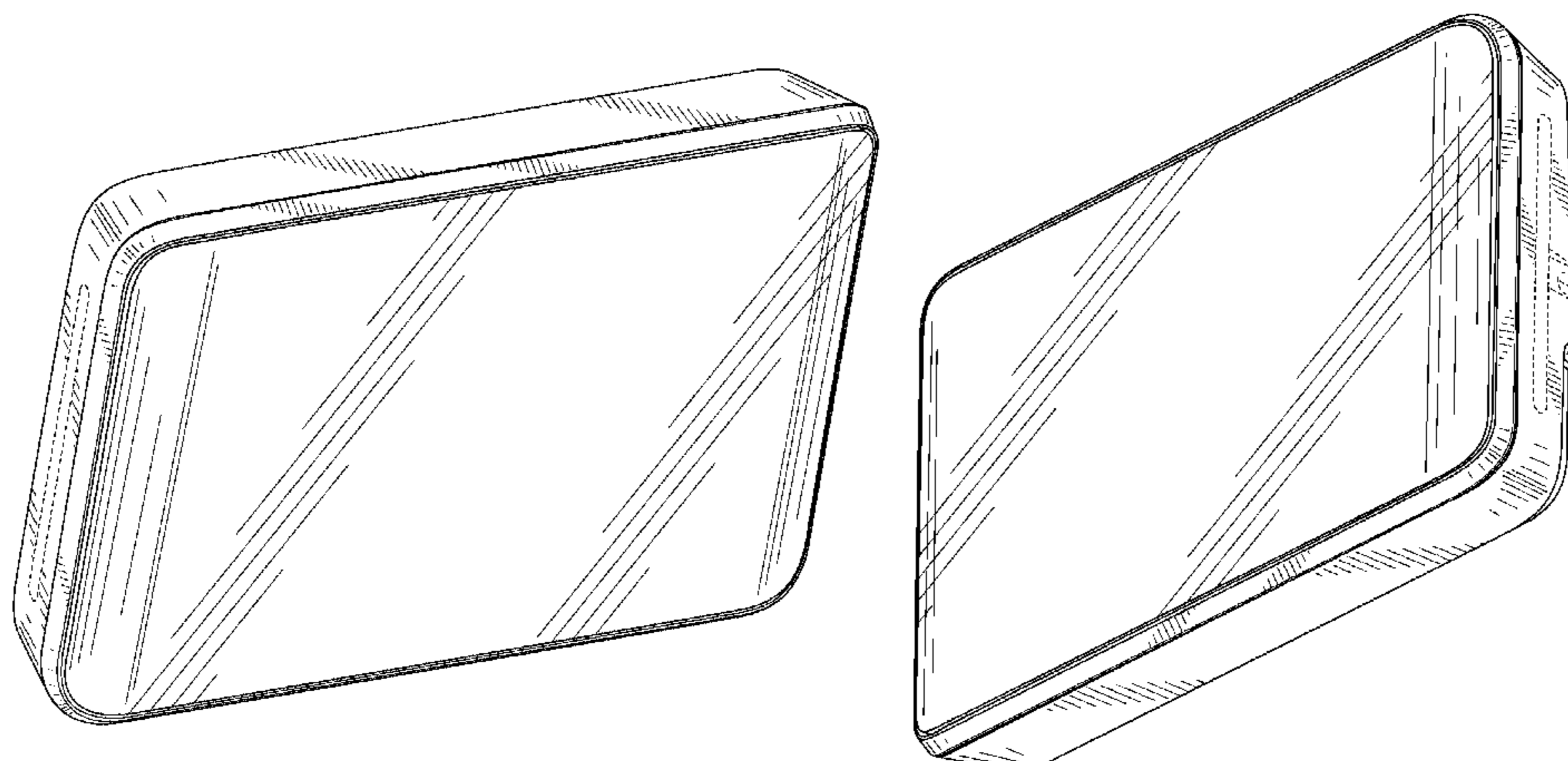
USPC **D13/162**; D13/168; D10/50

(58) **Field of Classification Search**

USPC D13/162, 168; D10/49, 50, 104.1, 106.1, D10/106.95; D14/218, 336, 341, 371, D14/375

CPC F24F 11/00; F24F 11/0012; F24F 11/0086; F24F 11/0009; F24F 2011/0057; F24F 2011/0073; F24F 2011/0091; G05B 19/0426; G05B 19/409; G05B 15/02; G06F 1/1601; G06F 3/041; G06F 3/044; G06F 3/0482; G06F 3/0488; G06F 3/0489; G05D 23/1902; G05D 23/1905;

1,664,171 A	3/1928	Hicks	
1,871,008 A	8/1932	Rentz	
2,954,456 A	9/1960	Calhoun et al.	
3,050,866 A	8/1962	Macemon	
3,165,624 A	1/1965	Cunningham	
3,294,158 A	12/1966	Baljet	
3,359,965 A	12/1967	Milligan	
3,408,480 A	10/1968	Peltak et al.	
3,448,243 A	6/1969	Ripple	
3,488,475 A	1/1970	Gronwoldt	
3,543,003 A	11/1970	Dincher et al.	
3,588,774 A	6/1971	Caveney	
3,596,058 A	7/1971	Steiner	
3,627,984 A	12/1971	Bollinger	
3,737,624 A	6/1973	Eilenberger	
3,876,469 A	4/1975	Schimke	
4,273,990 A	6/1981	Steiner et al.	
4,311,898 A	1/1982	McMillan	
4,430,521 A	2/1984	Ofield et al.	
4,467,179 A	8/1984	Ali et al.	
4,761,537 A	8/1988	Hayes	
5,105,730 A	4/1992	Smith	
D333,574 S *	3/1993	Ackeret D6/300
5,597,033 A	1/1997	Cali	
5,825,973 A	10/1998	Lehoe et al.	
5,884,690 A	3/1999	Zussman et al.	
5,963,708 A	10/1999	Wong	
6,085,985 A	7/2000	Laselva	
6,207,236 B1	3/2001	Araki et al.	
D518,744 S	4/2006	Rosen	
D556,061 S	11/2007	Rosen	
D560,686 S	1/2008	Kim	
D582,802 S	12/2008	Branson et al.	
D592,982 S	5/2009	Burt et al.	
D606,537 S *	12/2009	Ferrari D14/341
7,789,129 B1	9/2010	Barden	
D637,992 S *	5/2011	Tom D14/138 G
D648,641 S	11/2011	Wallaert et al.	
D648,642 S	11/2011	Wallaert et al.	
D652,034 S *	1/2012	Ferrari D14/341
8,149,222 B2 *	4/2012	Hsieh G06F 3/041 345/173
D666,198 S *	8/2012	Van Den Nieuwenhuizen D14/341
D666,510 S	9/2012	Beland et al.	



US D844,570 S

D672,666 S	12/2012	Rhodes et al.	CN	301318218	8/2010
D673,467 S *	1/2013	Lee D10/50	CN	301318220	8/2010
D675,204 S *	1/2013	Hofer D14/138 G	CN	301367662	10/2010
D676,768 S	2/2013	Eyring et al.	CN	301379502	11/2010
D676,769 S	2/2013	Eyring et al.	CN	301425146	12/2010
D677,660 S *	3/2013	Groene D14/341	CN	301437651	1/2011
D678,084 S	3/2013	Beland et al.	CN	301596683	6/2011
D679,205 S	4/2013	Eyring et al.	CN	301640279	8/2011
D684,872 S *	6/2013	Bias D10/49	CN	301671557	9/2011
D687,388 S *	8/2013	Baumgartner D13/162	CN	301900552	5/2012
D688,955 S	9/2013	Deligiannis et al.	CN	301936315	5/2012
D694,195 S *	11/2013	Gammon D13/162	CN	301936316	5/2012
D694,718 S *	12/2013	Baumgartner D13/168	CN	301966054	6/2012
D699,130 S	2/2014	Rhodes et al.	CN	301966088	6/2012
D705,094 S	5/2014	Eyring et al.	CN	302009181	7/2012
D708,977 S	7/2014	Corso et al.	CN	302009186	7/2012
D715,165 S	10/2014	Deligiannis et al.	CN	302042060	8/2012
D715,166 S	10/2014	Rhodes	CN	302042135	8/2012
D717,673 S	11/2014	Eyring et al.	CN	302062604	9/2012
D727,180 S	4/2015	Lai et al.	CN	302244026	12/2012
D729,793 S *	5/2015	Hickok D14/126	CN	302269957	1/2013
D733,591 S	7/2015	Golden et al.	CN	302313577	2/2013
D734,179 S	7/2015	Golden et al.	CN	302360122	3/2013
D737,155 S	8/2015	Gmyr et al.	CN	302503612	7/2013
D738,232 S	9/2015	Eyring et al.	CN	302517156	7/2013
D738,755 S	9/2015	Druce	CN	302908442	8/2014
D738,756 S	9/2015	Jiang et al.	CN	302908443	8/2014
D743,349 S *	11/2015	Leeland D10/50	CN	303030615	12/2014
D744,433 S	12/2015	Baumgartner et al.	CN	301936456	5/2015
D748,082 S *	1/2016	Lee D14/248	CN	303238413	6/2015
D751,426 S	3/2016	Edgar	CN	303246894	6/2015
D752,568 S *	3/2016	Kang D14/248	CN	303255433	6/2015
D753,106 S *	4/2016	Chao D14/341	CN	303255434	6/2015
D758,217 S	6/2016	Kumfer et al.	CN	303337349	8/2015
D763,707 S	8/2016	Sinha et al.	CN	303375958	9/2015
D769,231 S *	10/2016	Kwak D14/242	CN	303385632	9/2015
D770,449 S *	11/2016	Bae D14/341	CN	303394163	9/2015
D772,735 S	11/2016	Mansueto et al.	CN	303451296	11/2015
D778,245 S *	2/2017	Feldstein D13/162	CN	303603907	3/2016
D787,465 S *	5/2017	Levi D14/138 G	CN	303653904	4/2016
D796,352 S *	9/2017	Morneau D10/49	CN	303709538	6/2016
D801,288 S *	10/2017	Kim D13/168	CN	303717815	6/2016
D812,048 S *	3/2018	Mazz D14/341	CN	303717816	6/2016
9,976,774 B1	5/2018	Markow	CN	303717817	6/2016
D828,816 S *	9/2018	Spors D13/162	CN	303717819	6/2016
2001/0020646 A1	9/2001	Hebert	CN	303717823	6/2016
2006/0182429 A1	8/2006	Shapiro et al.	CN	303726743	6/2016
2008/0029613 A1	2/2008	Friedlich	CN	303726744	6/2016
2008/0178567 A1	7/2008	Varrichio et al.	CN	303737244	7/2016
2009/0085713 A1	4/2009	Tsang	CN	303737245	7/2016
2011/0011560 A1	1/2011	Bono	CN	303789869	8/2016
2012/0055651 A1	3/2012	Coe et al.	CN	303814825	8/2016
2012/0298330 A1	11/2012	Mysse	EM	941031-001	2/1994
2013/0161489 A1 *	6/2013	Gardner, Jr. G09G 3/3406	EM	946447-001	11/1994
		250/208.1	EM	946448-001	11/1994
2013/0279142 A1 *	10/2013	Wang H05K 7/02	EM	000907720-0001	4/2008
		361/809	EM	001944638-0001	11/2011
2014/0043256 A1 *	2/2014	Wu H01H 9/02	EM	002016436-0001	3/2012
		345/173	EM	001345771-0031	9/2012
2014/0273616 A1	9/2014	Eichert	EM	002103713-0001	9/2012
2014/0300567 A1 *	10/2014	Inata G06F 3/0488	EM	002165068-0001	1/2013
		345/173	EM	002221440-0004	4/2013
2015/0021064 A1 *	1/2015	Wang H05K 5/0243	EM	002297606-0001	8/2013
		174/50	EM	002299909-0002	8/2013
2015/0062087 A1 *	3/2015	Cho G02F 1/13338	EM	002379198-0001	12/2013
		345/175	EM	002418830-0040	3/2014
2016/0273785 A1	9/2016	Marino et al.	EM	002433060-0005	3/2014
2016/0324026 A1 *	11/2016	Kang A45C 5/02	EM	002476010-0001	6/2014
2017/0097193 A1	4/2017	Stanley et al.	EM	002526251-0003	8/2014
			EM	002609768-0001	1/2015
			EM	002763698-0016	9/2015
			EM	002767970-0003	9/2015
			EM	002842880-0004	10/2015
			EM	003074640-0003	4/2016
			EM	003339936-0001	8/2016
			IN	239736-0001	9/2011
			JP	D1527751	5/2015
			KR	300513953.0000	12/2008
			KR	300559936.0000	4/2010
FOREIGN PATENT DOCUMENTS					
CN	302042137	8/2005			
CN	3677789	8/2007			
CN	300763793	4/2008			
CN	301076701	12/2009			
CN	301262175	6/2010			
CN	301318189	8/2010			

KR	300559937.0000	4/2010
KR	300563103.0000	5/2010
KR	300563104.0000	5/2010
KR	300597072.0000	4/2011
KR	300597075.0000	4/2011
KR	300597078.0000	4/2011
KR	300597085.0000	4/2011
KR	300597095.0000	4/2011
KR	300597103.0000	4/2011
KR	300597104.0000	4/2011
KR	300597105.0000	4/2011
KR	300597106.0000	4/2011
KR	300597109.0000	4/2011
KR	300743169.0000	5/2014
KR	300788997.0000	3/2015
KR	300803551.0000	6/2015
KR	300810461.0000	8/2015
WO	WO- D075763-002	3/2011
WO	WO- D088823-003	11/2015

FIG. 2 is a bottom, front, right perspective view thereof;
 FIG. 3 is a front view thereof;
 FIG. 4 is a rear view thereof;
 FIG. 5 is a right side view thereof;
 FIG. 6 is a left side view thereof;
 FIG. 7 is a top view thereof;
 FIG. 8 is a bottom view thereof;
 FIG. 9 is a top, front, left perspective view of an embodiment of the claimed design;
 FIG. 10 is a bottom, front, right perspective view thereof;
 FIG. 11 is a front view thereof;
 FIG. 12 is a rear view thereof;
 FIG. 13 is a right side view thereof;
 FIG. 14 is a left side view thereof;
 FIG. 15 is a top view thereof;
 FIG. 16 is a bottom view thereof;
 FIG. 17 is a top, front, left perspective view of an embodiment of the claimed design;
 FIG. 18 is a bottom, front, right perspective view thereof;
 FIG. 19 is a front view thereof;
 FIG. 20 is a rear view thereof;
 FIG. 21 is a right side view thereof;
 FIG. 22 is a left side view thereof;
 FIG. 23 is a top view thereof; and,
 FIG. 24 is a bottom view thereof.

OTHER PUBLICATIONS

Notice of Allowance for U.S. Appl. No. 29/602,691, dated Apr. 18, 2018, 8 pages.

Extended Search Report for European Application No. 17186332.7, dated Jan. 30, 2018, 8 pages.

* cited by examiner

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(57) **CLAIM**

We claim the ornamental design for a building automation device, as shown and described.

DESCRIPTION

FIG. 1 is a top, front, left perspective view of an embodiment of the claimed design;

In the drawings the broken lines depict portions of building automation device that form no part the claimed design. The broken lines immediately adjacent to shaded surfaces form a boundary of the claim. The building automation device is shown broken away in FIGS. 17-24 of the drawing to indicate indeterminate length, it being understood that it has a uniform shape and appearance through its length.

1 Claim, 18 Drawing Sheets

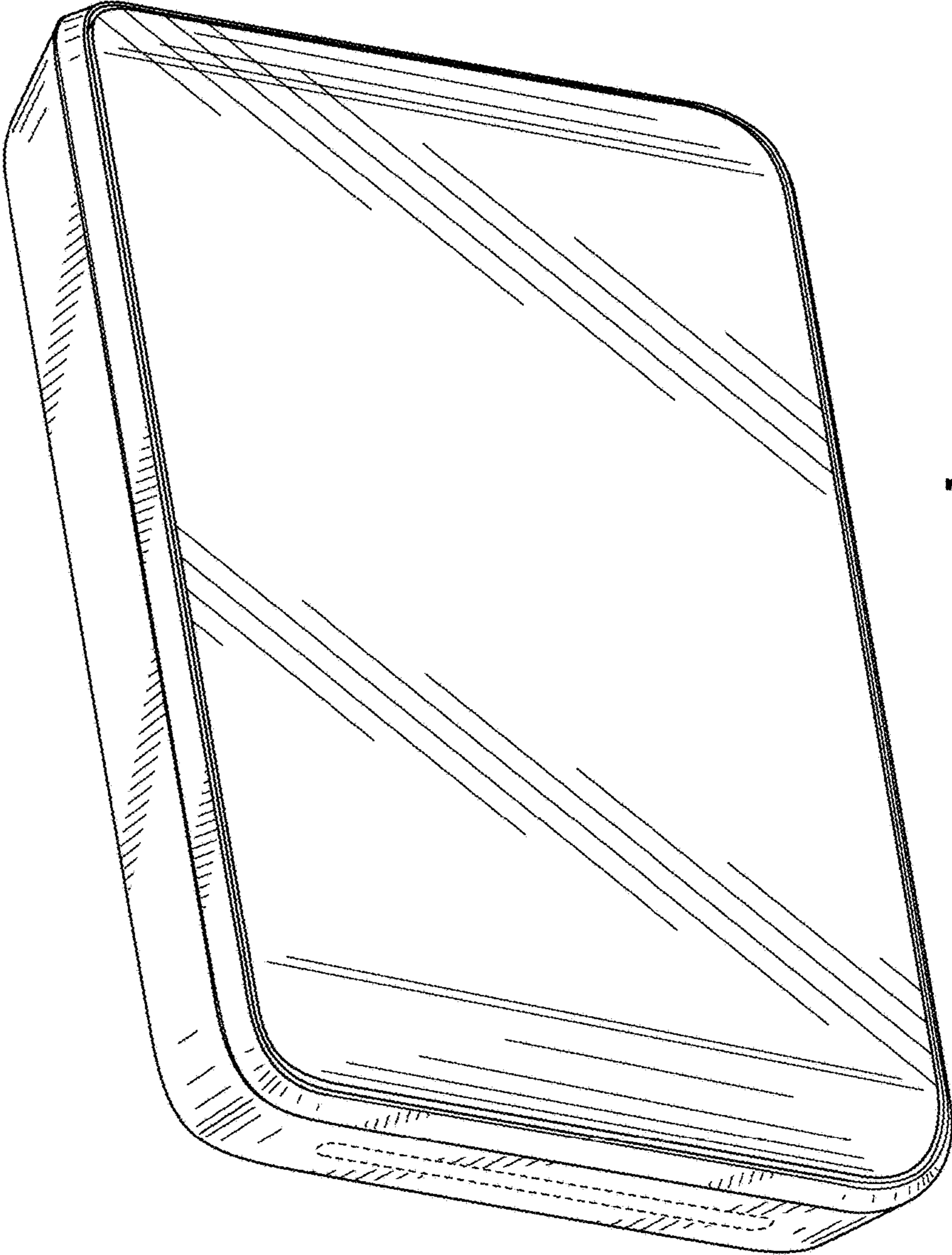


FIG. 1

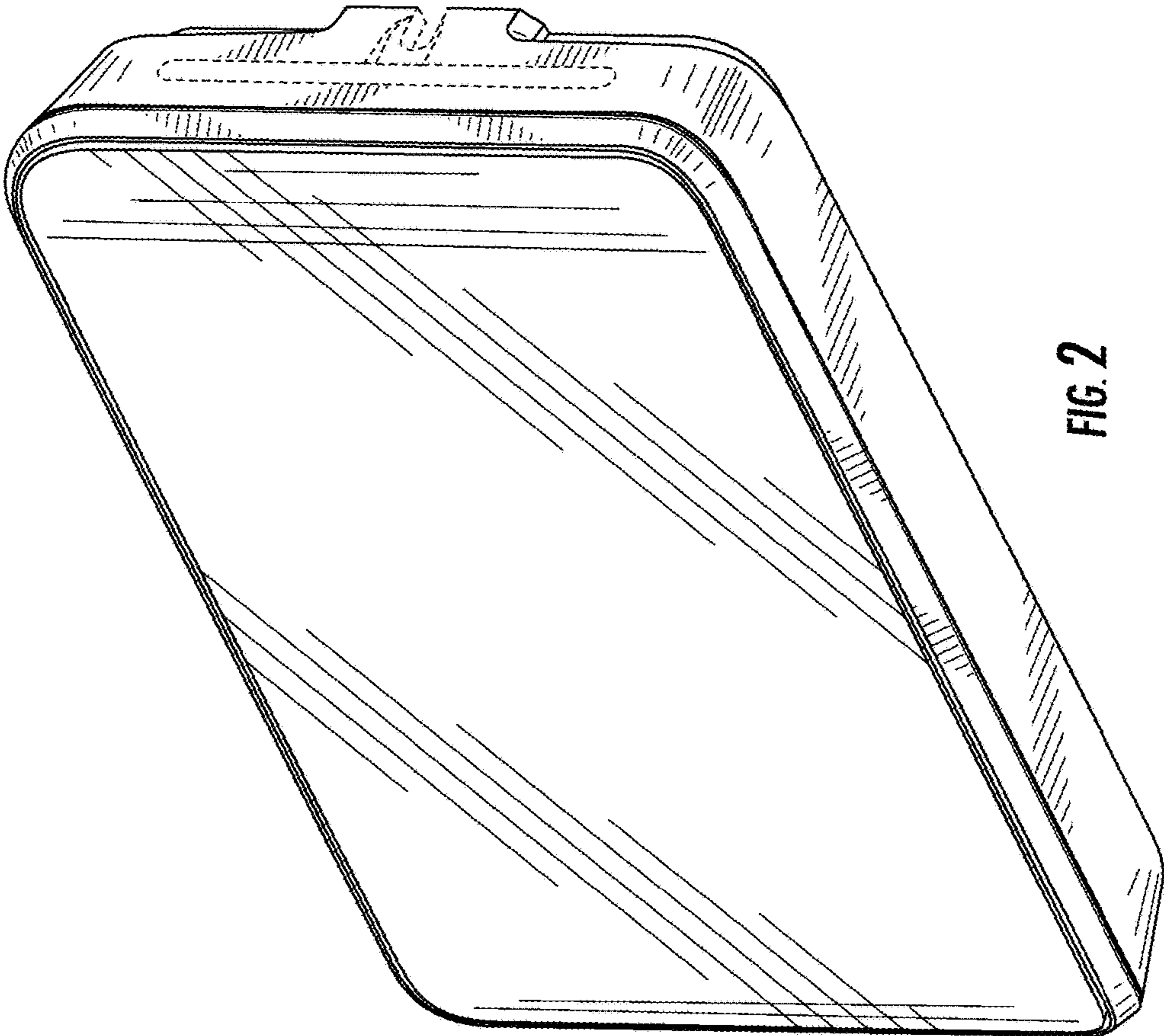


FIG. 2

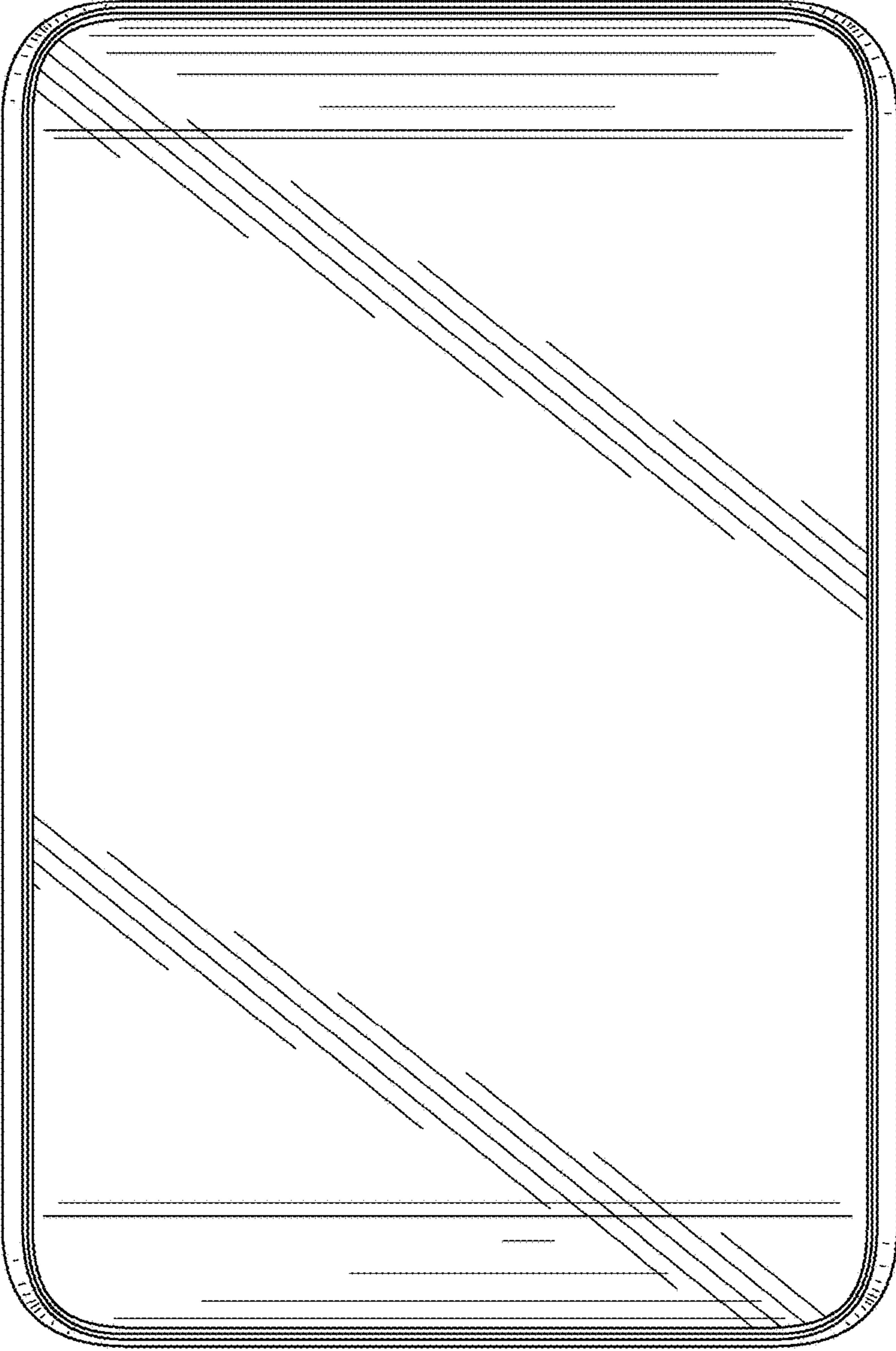


FIG. 3

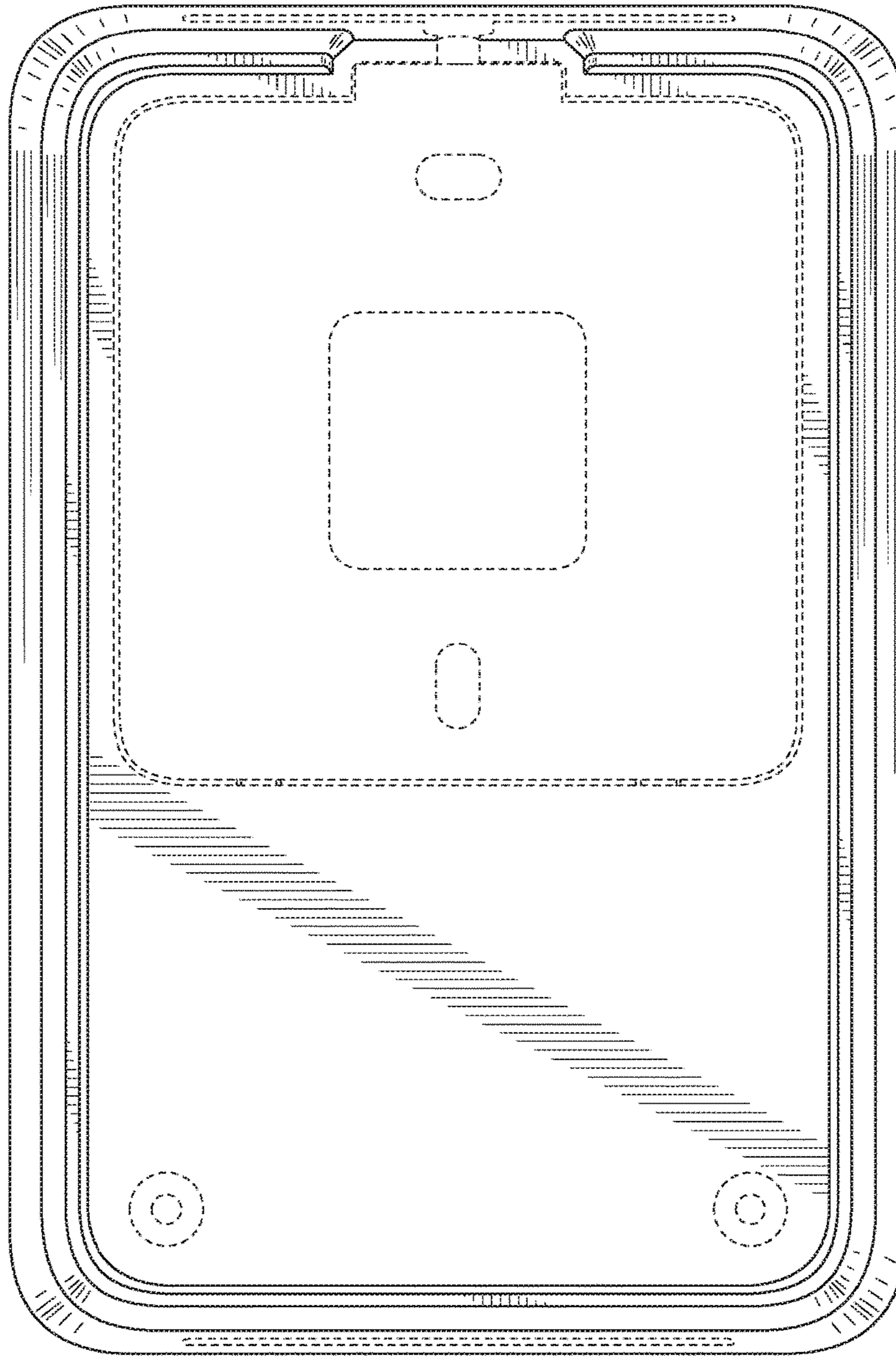


FIG. 4

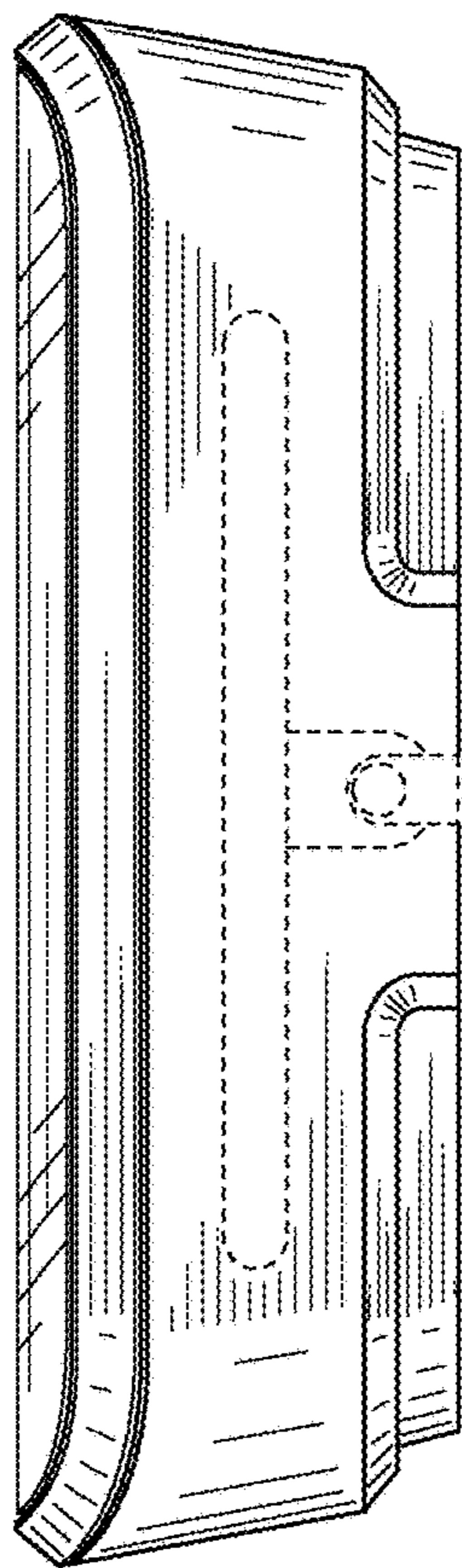


FIG. 5

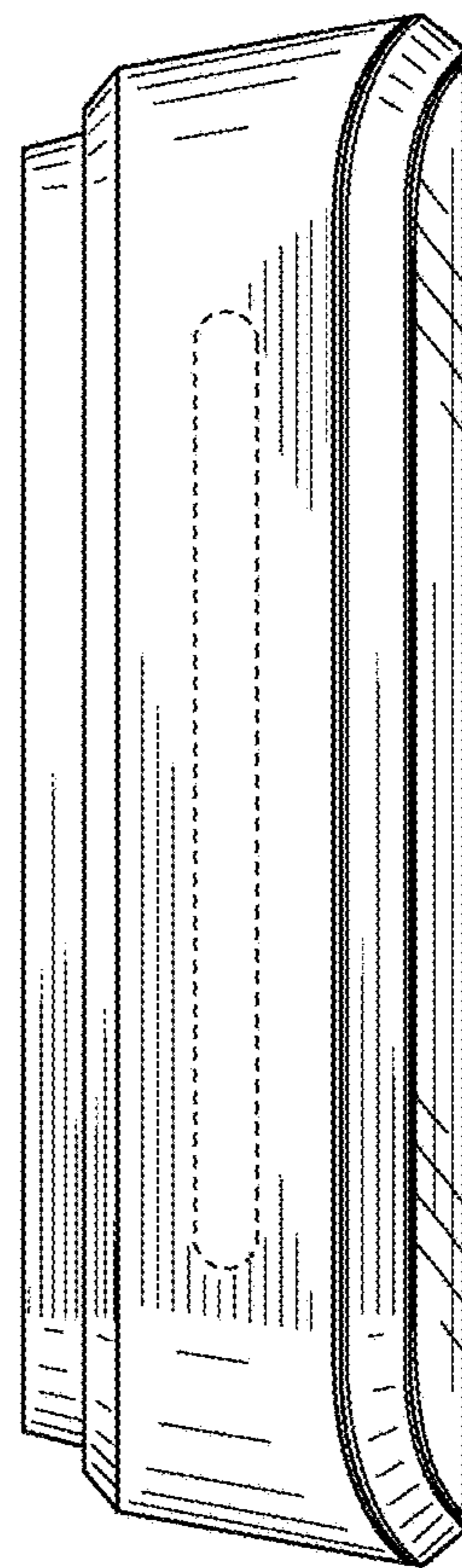


FIG. 6

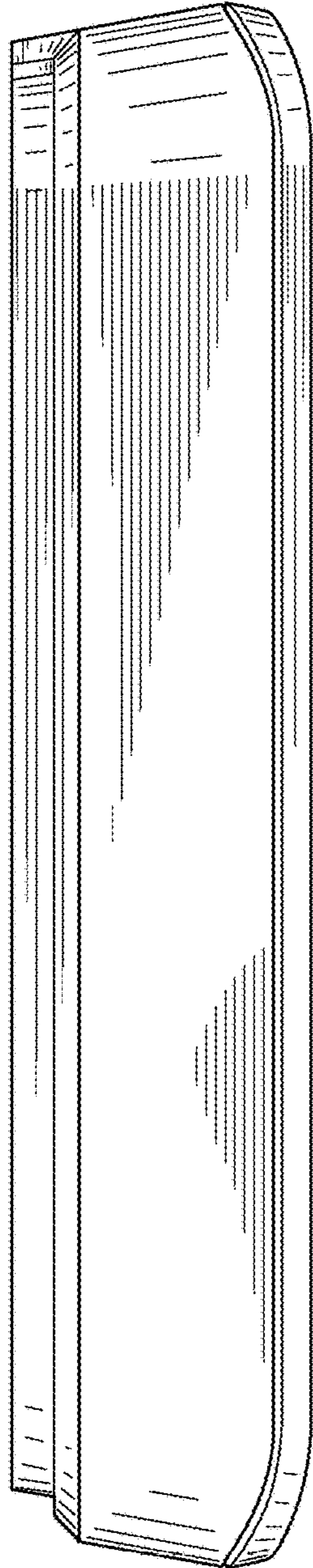


FIG. 7

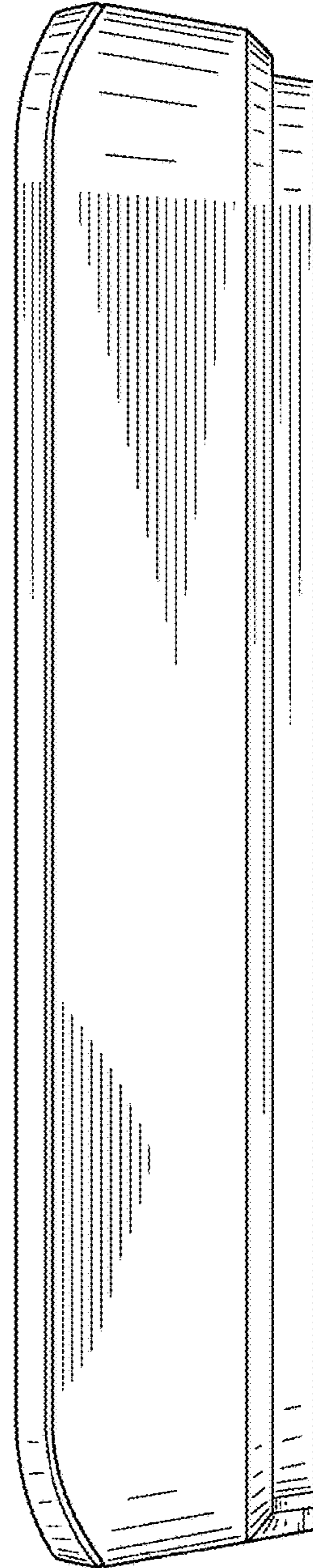


FIG. 8

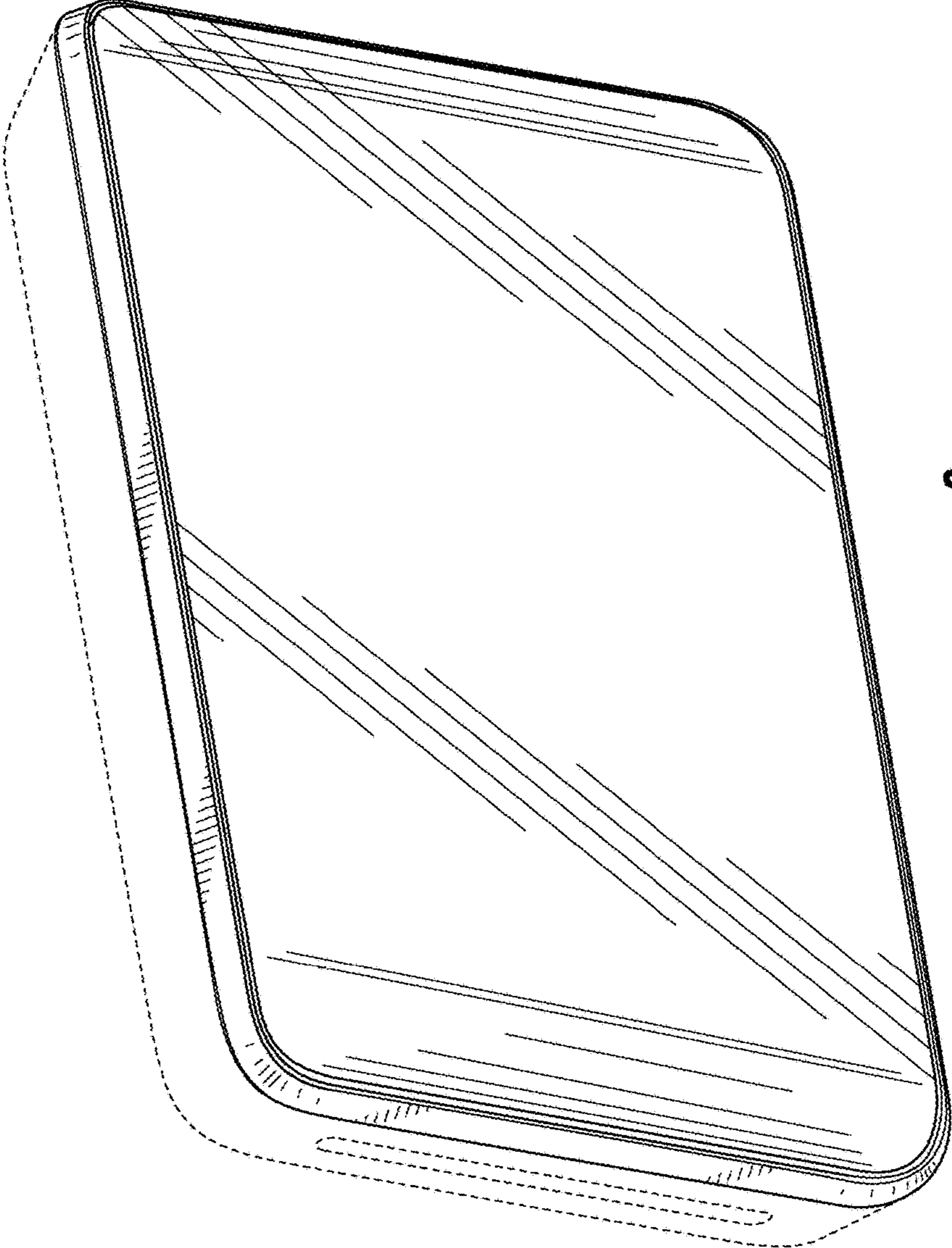


FIG. 9

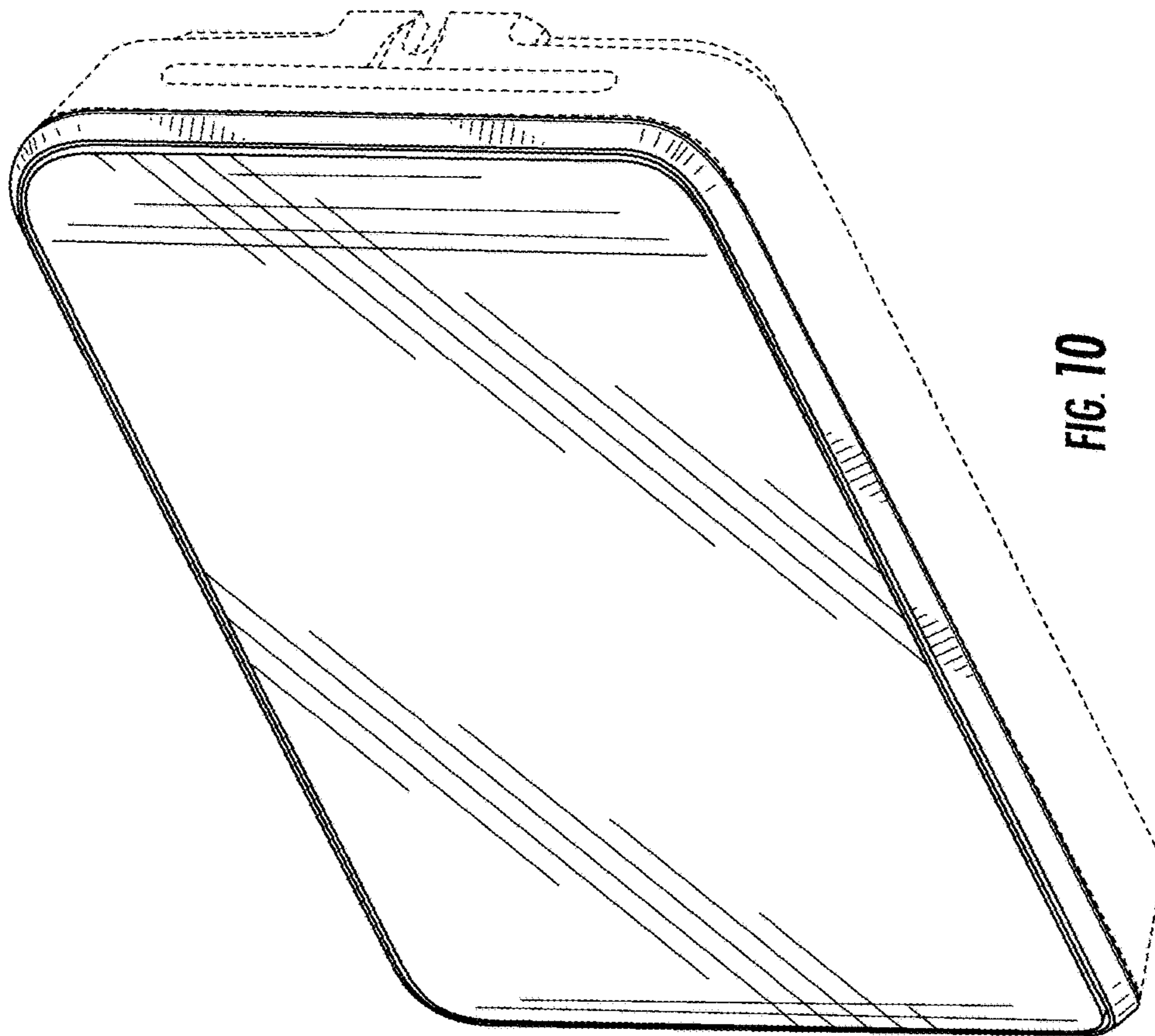


FIG. 10

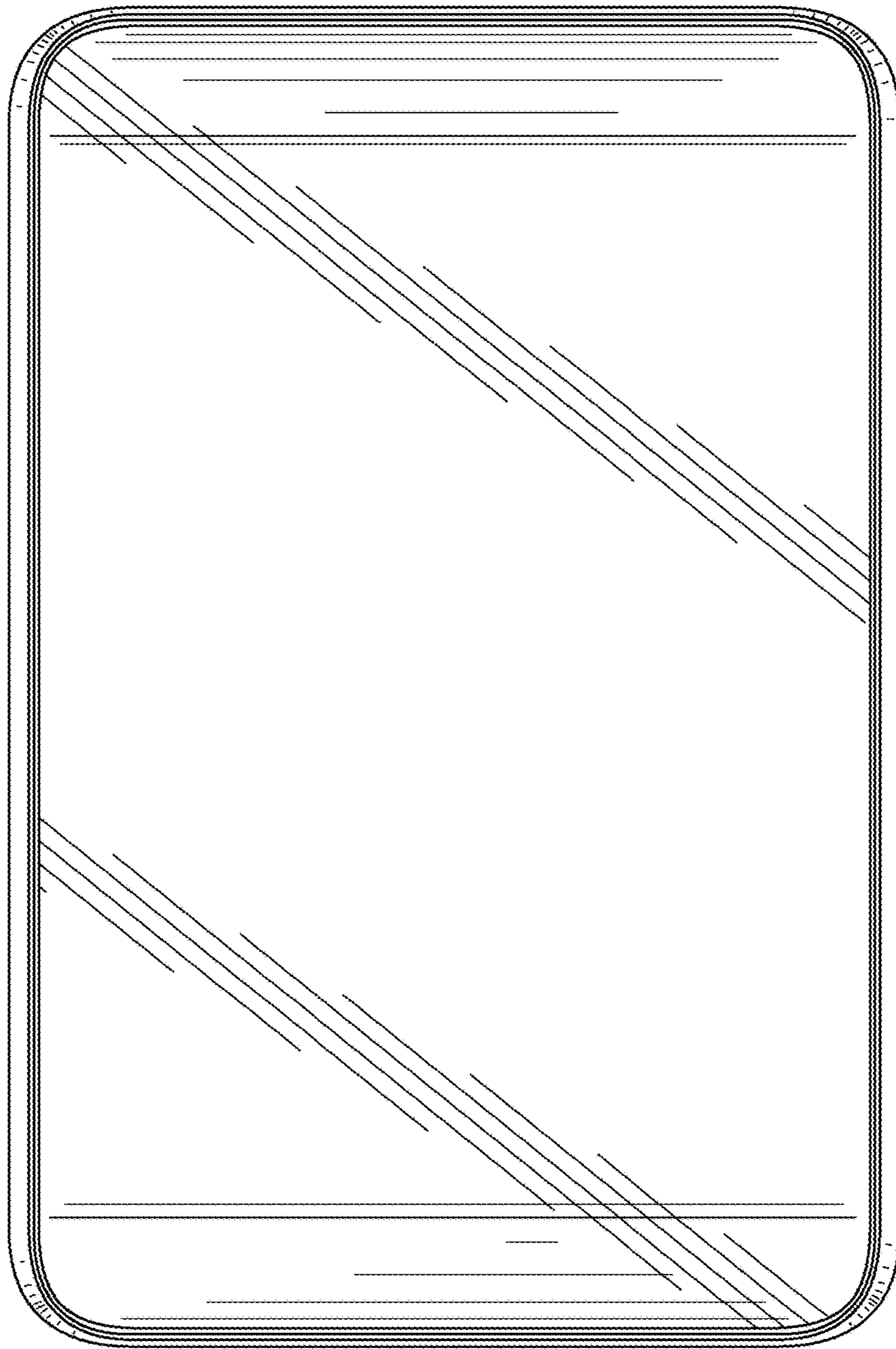


FIG. 11

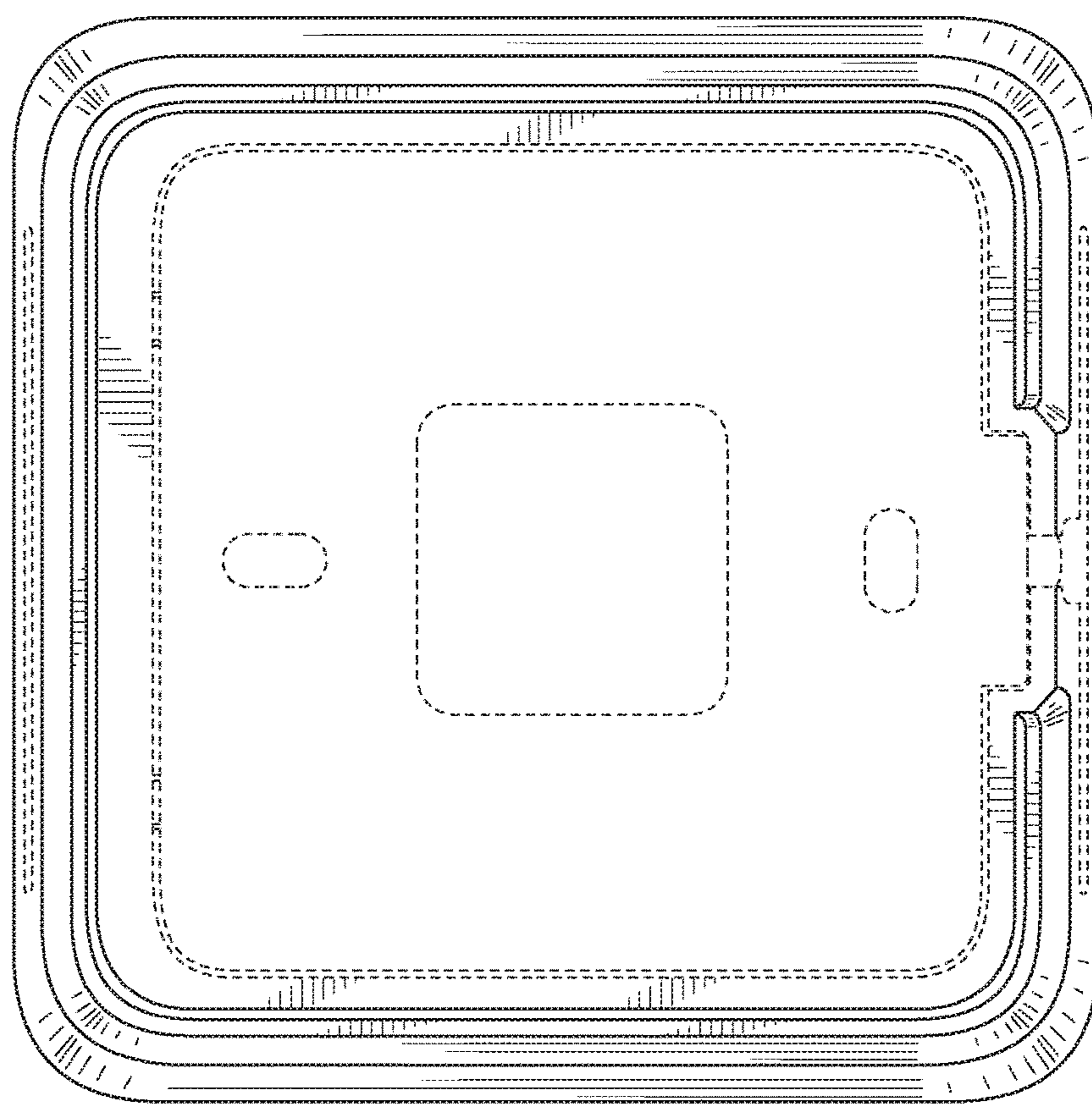


FIG. 12

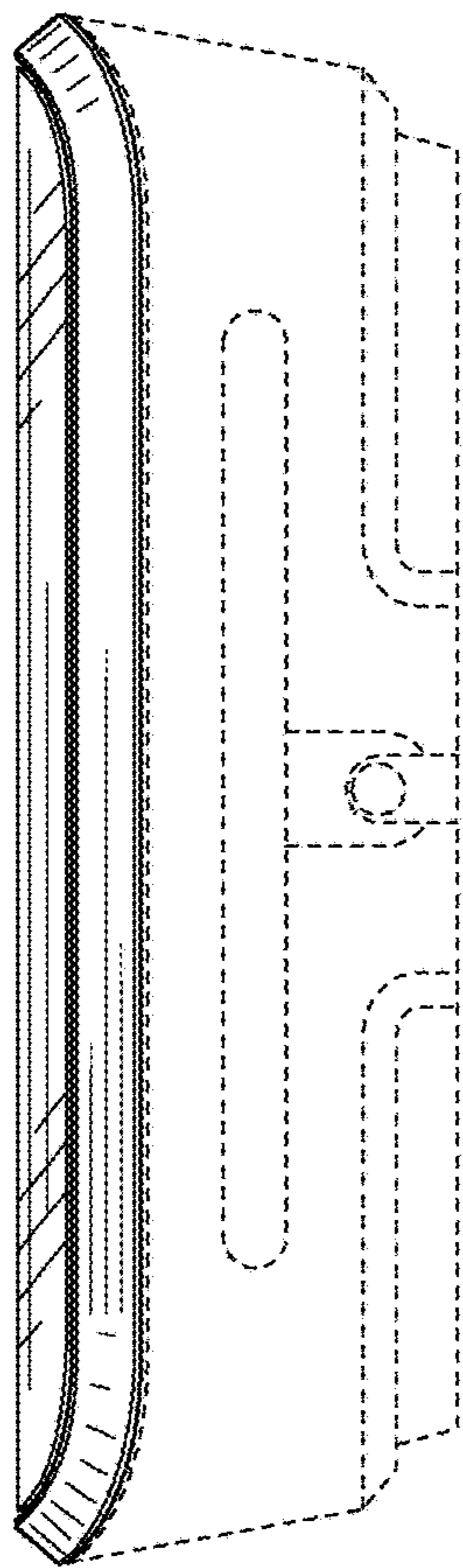


FIG. 13

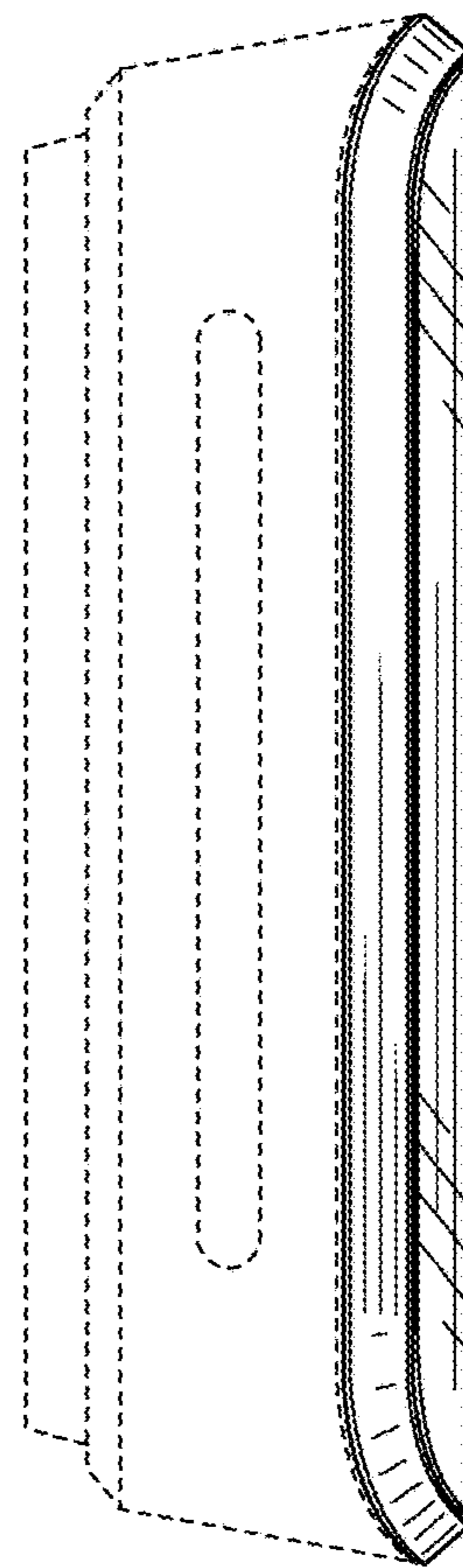


FIG. 14

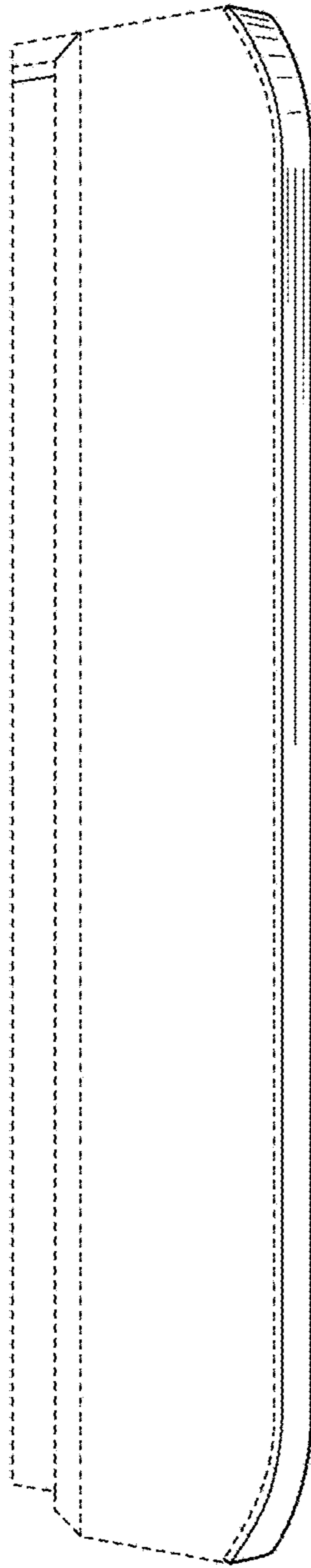


FIG. 15

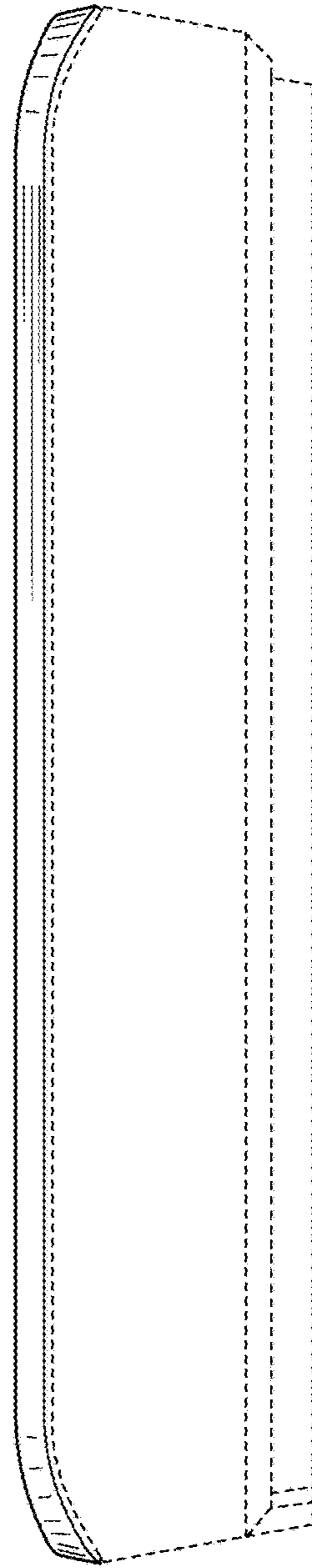


FIG. 16

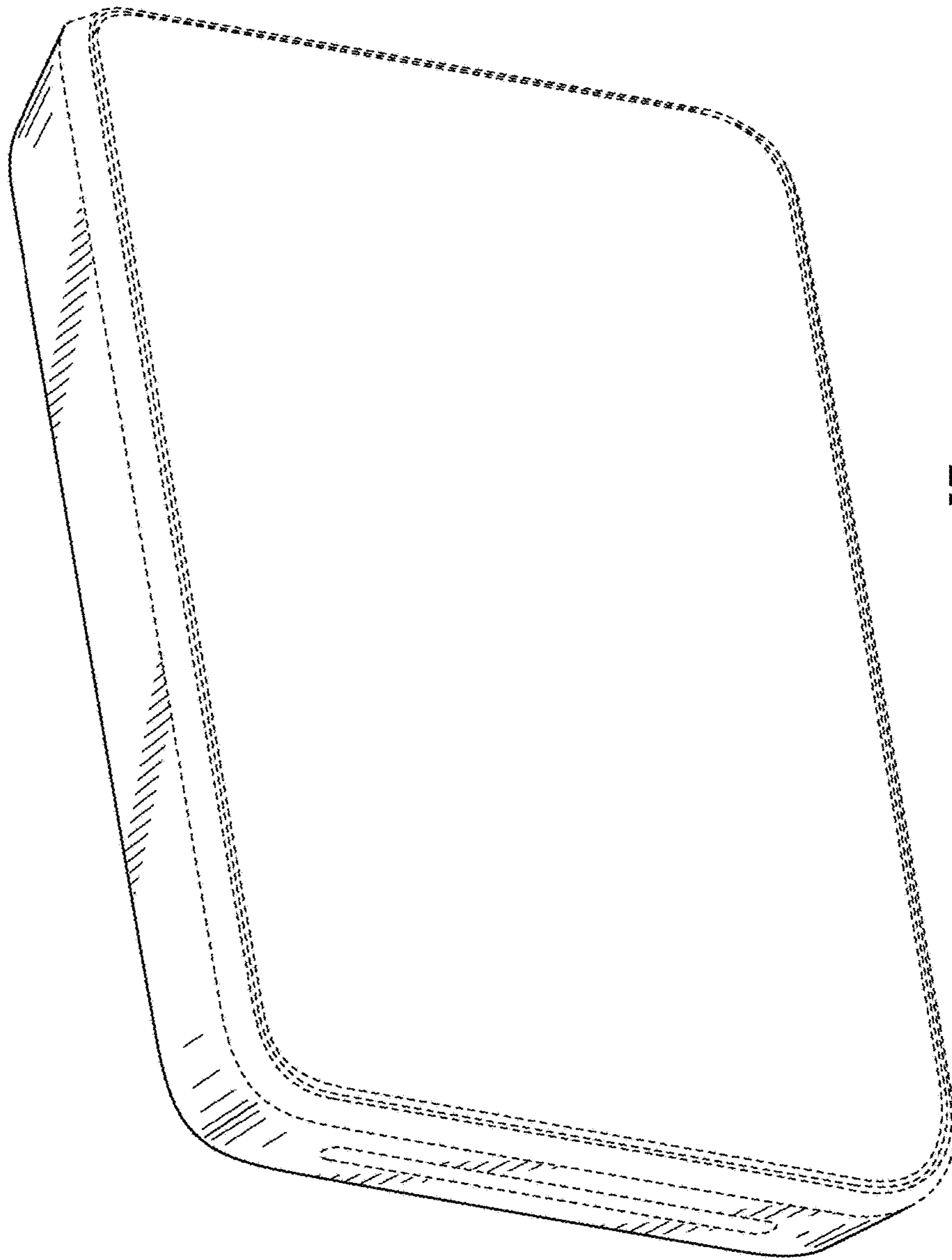


FIG. 17

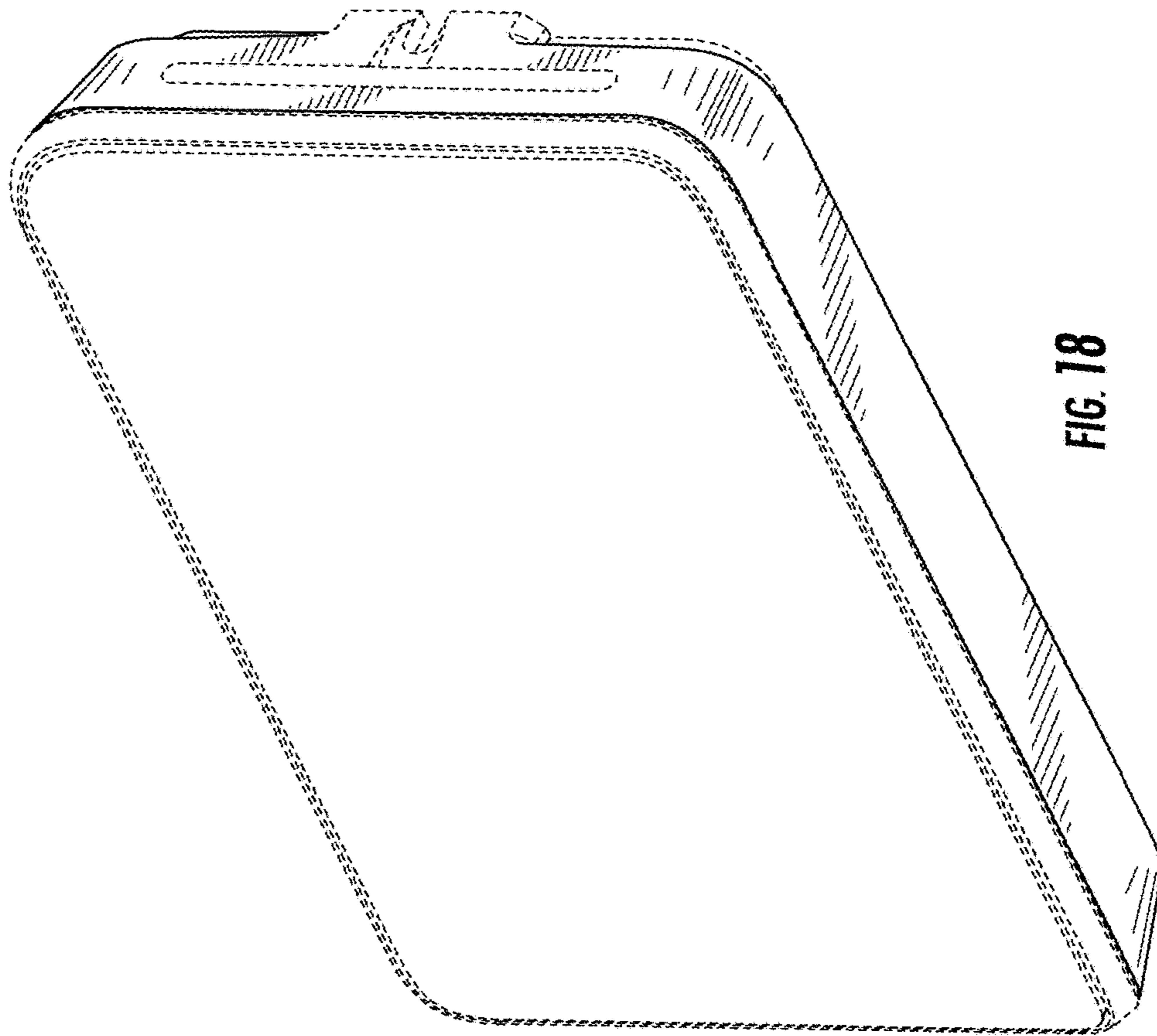


FIG. 18

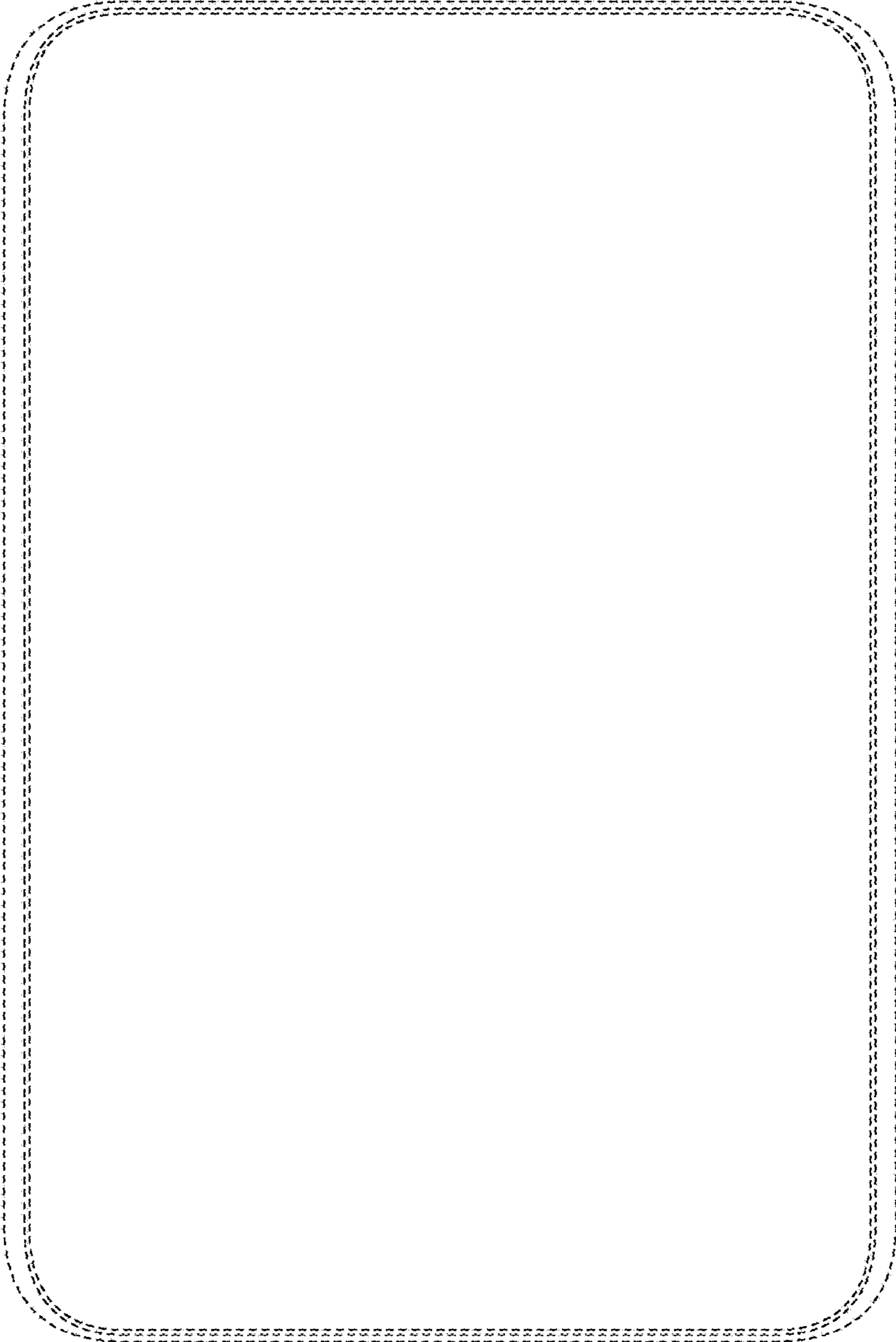


FIG. 19

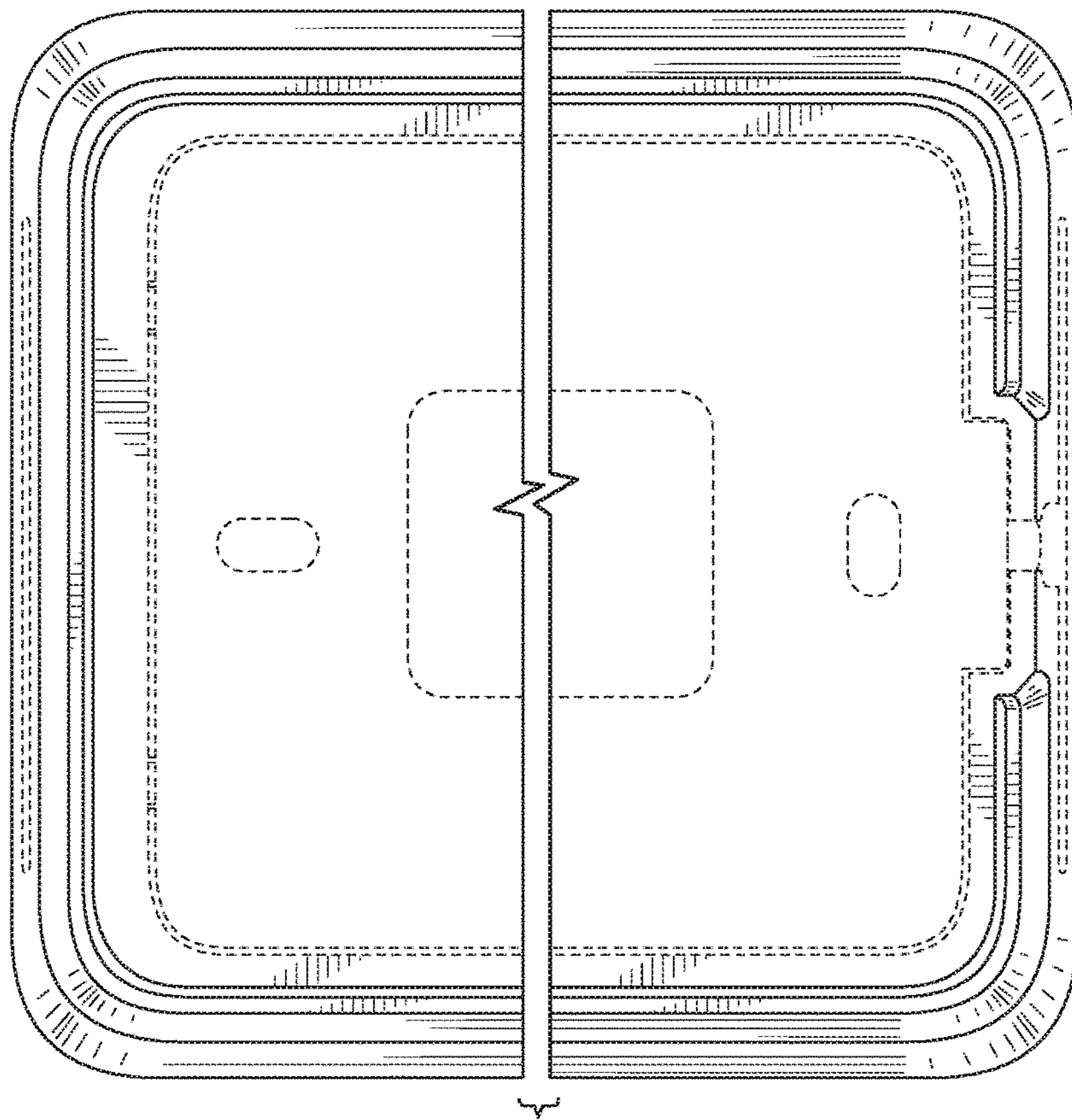


FIG. 20

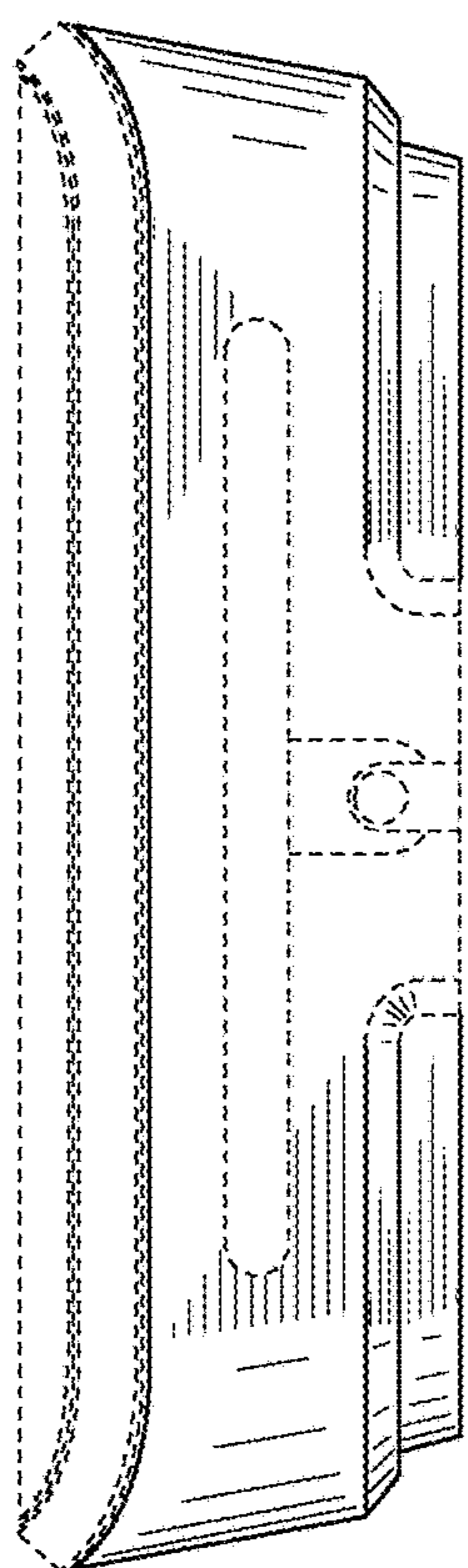


FIG. 21

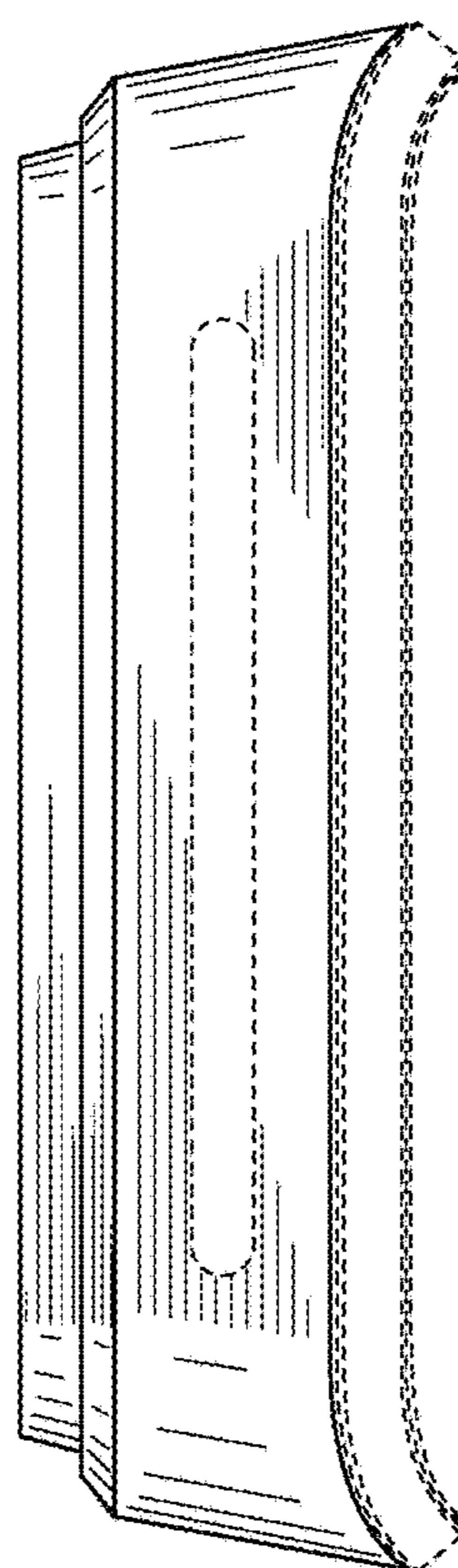


FIG. 22

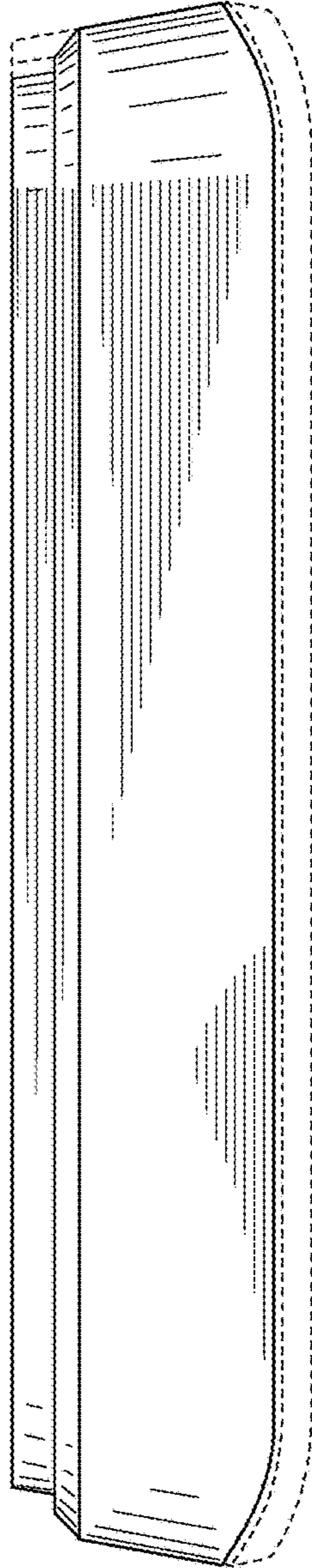


FIG. 23

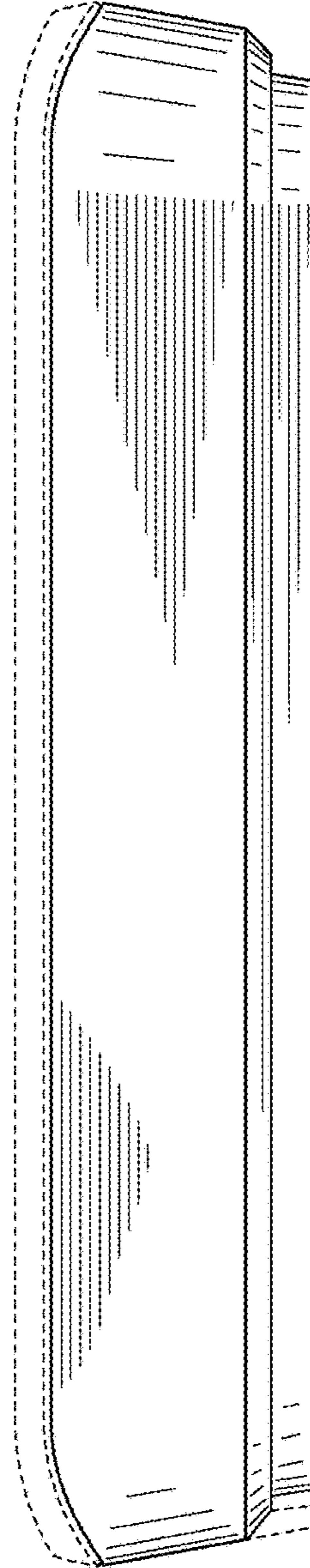


FIG. 24