



US00D886273S

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

(10) **Patent No.:** **US D886,273 S**
(45) **Date of Patent:** **** Jun. 2, 2020**

(54) **FILTER ELEMENT HAVING A PATTERN**

2,320,770 A 12/1940 Cover
2,227,959 A 1/1941 Cover
2,235,624 A 3/1941 Schwartz

(71) Applicant: **3M INNOVATIVE PROPERTIES COMPANY**, St. Paul, MN (US)

(Continued)

(72) Inventors: **John S. Huberty**, St. Paul, MN (US);
Michael J. Svendsen, Blaine, MN (US);
Michael J. Thuyente, St. Anthony Village, MN (US)

FOREIGN PATENT DOCUMENTS

CA 1069331 1/1980
CA 2209246 7/1996

(Continued)

(73) Assignee: **3M Innovative Properties Company**, St. Paul, MN (US)

OTHER PUBLICATIONS

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

MSA Flexi-Filter® Pads for Advantage® Respirators, obtained from internet on May 18, 2015, <http://us.msasafety.com/Air-Purifying-Respirators-%28APR%29/Filters-%26-Cartridges/Advantage%26reg%3B-Flexi-Filters%26reg%3B/p/000100001000001241>.

(21) Appl. No.: **29/607,684**

(22) Filed: **Jun. 15, 2017**

Primary Examiner — Sandra S Snapp

Related U.S. Application Data

(63) Continuation of application No. 29/518,825, filed on Feb. 27, 2015, now Pat. No. Des. 792,959.

(51) **LOC (12) Cl.** **23-04**

(52) **U.S. Cl.**
USPC **D23/365**

(58) **Field of Classification Search**
USPC D23/355–365, 386–388, 314, 325,
D23/333–336; 55/478, 482, 483, 490,
55/497, 498, 520, 521, 529; D24/110.1
CPC B01D 46/00; B01D 46/0004; B01D 27/04;
B01D 27/06; B01D 39/00
See application file for complete search history.

(57) **CLAIM**

The ornamental design for a filter element having a pattern, as shown and described.

DESCRIPTION

FIG. 1 is a perspective view showing the new design for a filter element having a pattern;
FIG. 2 is an enlarged portion of FIG. 1, which is representative of the remainder of the pattern illustrated in FIG. 1;
FIG. 3 is a front view of FIG. 1;
FIG. 4 is an enlarged portion of FIG. 3, which is representative of the remainder of the pattern illustrated in FIG. 3;
FIG. 5 is a rear view of FIG. 1;
FIG. 6 is a right side view thereof
FIG. 7 is a left side view thereof; and,
FIG. 8 is a top view thereof, the bottom being a mirror image thereof.

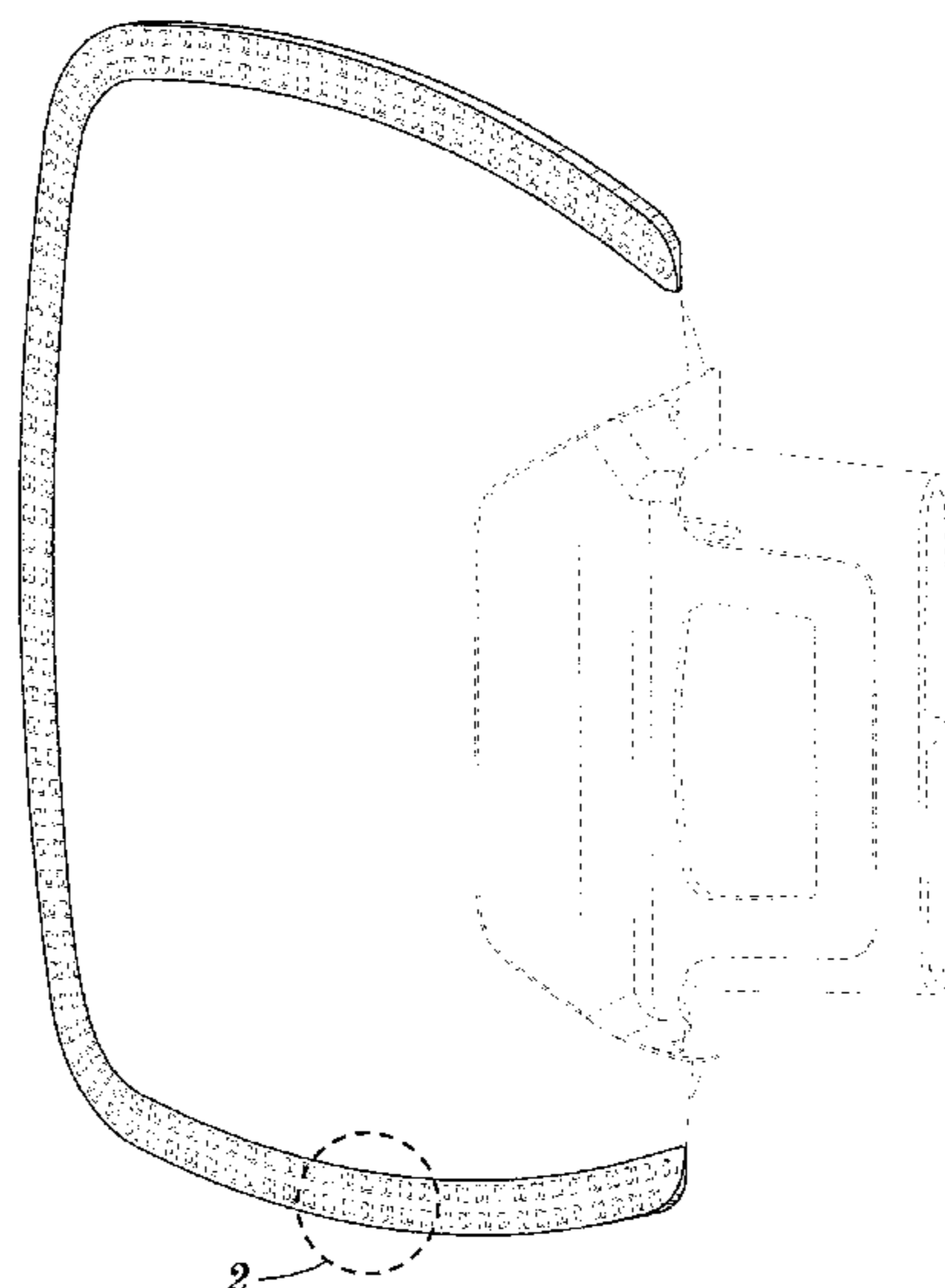
The evenly spaced broken lines shown in the drawings depict portions of the filter element having a pattern and form no part of the claimed design. The dot-dot-dash broken lines represent boundaries of the claimed design.

(56) **References Cited**

U.S. PATENT DOCUMENTS

2,206,061 A 11/1936 Splaine
2,142,064 A 5/1937 Whipple
2,205,368 A * 6/1940 Whipple A62B 23/02
128/206.16
2,220,374 A 11/1940 Lewis

1 Claim, 6 Drawing Sheets



(56)

References Cited

U.S. PATENT DOCUMENTS

2,295,119 A * 9/1942 Malcom A62B 18/00
128/206.17
D172,224 S 5/1954 Daugett
2,840,184 A 12/1954 Stampe
2,845,927 A 8/1958 Hill
3,316,904 A 5/1967 Wall
3,750,665 A * 8/1973 Stranicky A41D 13/11
128/206.12
4,179,274 A * 12/1979 Moon A62B 23/02
128/206.17
4,299,605 A * 11/1981 Aiyama B01D 46/02
383/67
4,382,440 A 5/1983 Kapp
4,714,486 A 12/1987 Silverthorn
4,886,058 A * 12/1989 Brostrom A62B 18/08
128/206.12
4,961,765 A 10/1990 Guhne
4,981,134 A 1/1991 Courtney
5,035,236 A 7/1991 Kanegaonkar
5,074,997 A 12/1991 Riley
5,140,980 A 8/1992 Haughey
5,222,488 A 6/1993 Forsgren
5,240,479 A 8/1993 Bachinski
D339,658 S 9/1993 Lahteenmaki
5,322,061 A 6/1994 Brunson
5,636,627 A 6/1997 Rochester
5,647,356 A * 7/1997 Osendorf A62B 27/00
128/202.27
5,666,949 A 9/1997 Debe
5,720,789 A 2/1998 Pinson
5,732,695 A 3/1998 Metzger
5,992,414 A 11/1999 Tayebi
6,044,842 A 4/2000 Pereira
6,117,515 A 9/2000 Brunson
D437,094 S 1/2001 Ward
6,279,570 B1 8/2001 Mittelstadt
6,298,849 B1 10/2001 Scholey
6,345,620 B2 2/2002 Salapow
6,408,845 B1 6/2002 Pereira
6,467,481 B1 10/2002 Eswarappa
D465,568 S 11/2002 Petherbridge
D484,584 S 12/2003 Anderson
6,761,169 B2 7/2004 Eswarappa
6,783,566 B2 8/2004 Estkowski
6,793,702 B2 9/2004 Eswarappa
D518,571 S 4/2006 Martin
7,334,579 B2 2/2008 Tayebi
8,021,455 B2 9/2011 Adamek
D652,506 S 1/2012 Huberty
D652,910 S 1/2012 Duffy
8,101,003 B2 1/2012 Krisko
8,230,860 B2 7/2012 Dankert
D677,780 S 3/2013 Choi
D677,781 S 3/2013 Choi
D678,508 S 3/2013 Choi
8,388,714 B2 3/2013 Kearsley
8,460,423 B2 6/2013 Legare
8,721,402 B2 5/2014 Woo
8,757,151 B2 6/2014 Johnstone
8,839,788 B2 9/2014 Betz
9,034,181 B1 5/2015 Robinson
D732,670 S 6/2015 Dwyer
D735,962 S 8/2015 Cruz
D745,962 S 12/2015 Dwyer
D746,438 S 12/2015 Dwyer
D757,247 S * 5/2016 Dwyer D24/110.1
D757,928 S * 5/2016 Blomberg D24/110.1
9,510,626 B2 * 12/2016 Blomberg A62B 9/04
9,517,367 B2 * 12/2016 Dwyer A62B 18/10
D778,430 S * 2/2017 Blomberg D24/110.1
D779,674 S * 2/2017 Blomberg D24/162
D786,443 S * 5/2017 Blomberg D24/162
D792,959 S 7/2017 Huberty

D795,415 S * 8/2017 Blomberg D24/110.1
9,950,202 B2 * 4/2018 Mittelstadt A62B 18/10
10,391,338 B2 * 8/2019 Blomberg A62B 23/025
2003/0089089 A1 * 5/2003 Fecteau A62B 23/02
55/497
2004/0031489 A1 2/2004 Tayebi
2004/0055604 A1 3/2004 Viner
2005/0081497 A1 4/2005 Connor
2006/0081249 A1 * 4/2006 Duxbury A62B 23/06
128/205.27
2006/0090754 A1 5/2006 Mittelstadt
2006/0196157 A1 * 9/2006 Greer A62B 23/02
55/500
2007/0144123 A1 6/2007 Angadjivand
2009/0065006 A1 3/2009 Patterson
2009/0263546 A1 10/2009 Rea
2010/0154369 A1 6/2010 Berisha
2011/0283505 A1 11/2011 Billingsley
2011/0284006 A1 11/2011 Legare
2013/0139818 A1 6/2013 Billingsley
2014/0216473 A1 8/2014 Dwyer
2014/0251327 A1 9/2014 Mittelstadt

FOREIGN PATENT DOCUMENTS

CA 2209857 7/1996
CA 2295170 11/1999
CA 2405510 10/2001
CA 2567266 5/2007
CN 201098482 8/2008
CN 201190125 2/2009
CN 101554942 10/2009
CN 201342303 U 11/2009
CN 101628649 1/2010
CN 101703828 5/2010
CN 201603485 U 10/2010
CN 202983422 6/2013
CN 203540246 U 4/2014
DE 2041931 3/1972
DE 3719419 12/1988
DE 10213654 9/2003
DE 10328002 1/2005
DE 202011100327 7/2011
DK 9200731 6/1992
EP 44721 1/1982
EP 0234277 9/1987
EP 0310970 4/1989
EP 1016599 7/2000
EP 1110610 6/2001
EP 1800729 6/2007
FR 814797 6/1937
FR 2511605 2/1983
FR 2544218 10/1984
GB 470850 8/1937
JP 02108844 4/1990
JP 06062349 U 9/1994
JP 09192246 7/1997
JP 2000140587 5/2000
JP 2000288105 10/2000
JP 2002346326 12/2002
KR 20060121699 11/2006
KR 100900755 6/2009
KR 20090010452 U 10/2009
KR 100943196 2/2010
KR 100959146 5/2010
KR 100961411 6/2010
KR 100978602 8/2010
KR 20110000792 U 1/2011
KR 20110037710 4/2011
KR 20110005024 U 5/2011
KR 101051109 7/2011
PL 172113 8/1997
RU 2008126072 1/2010
SE 8403209 6/1984
TW 262201 4/2005

* cited by examiner

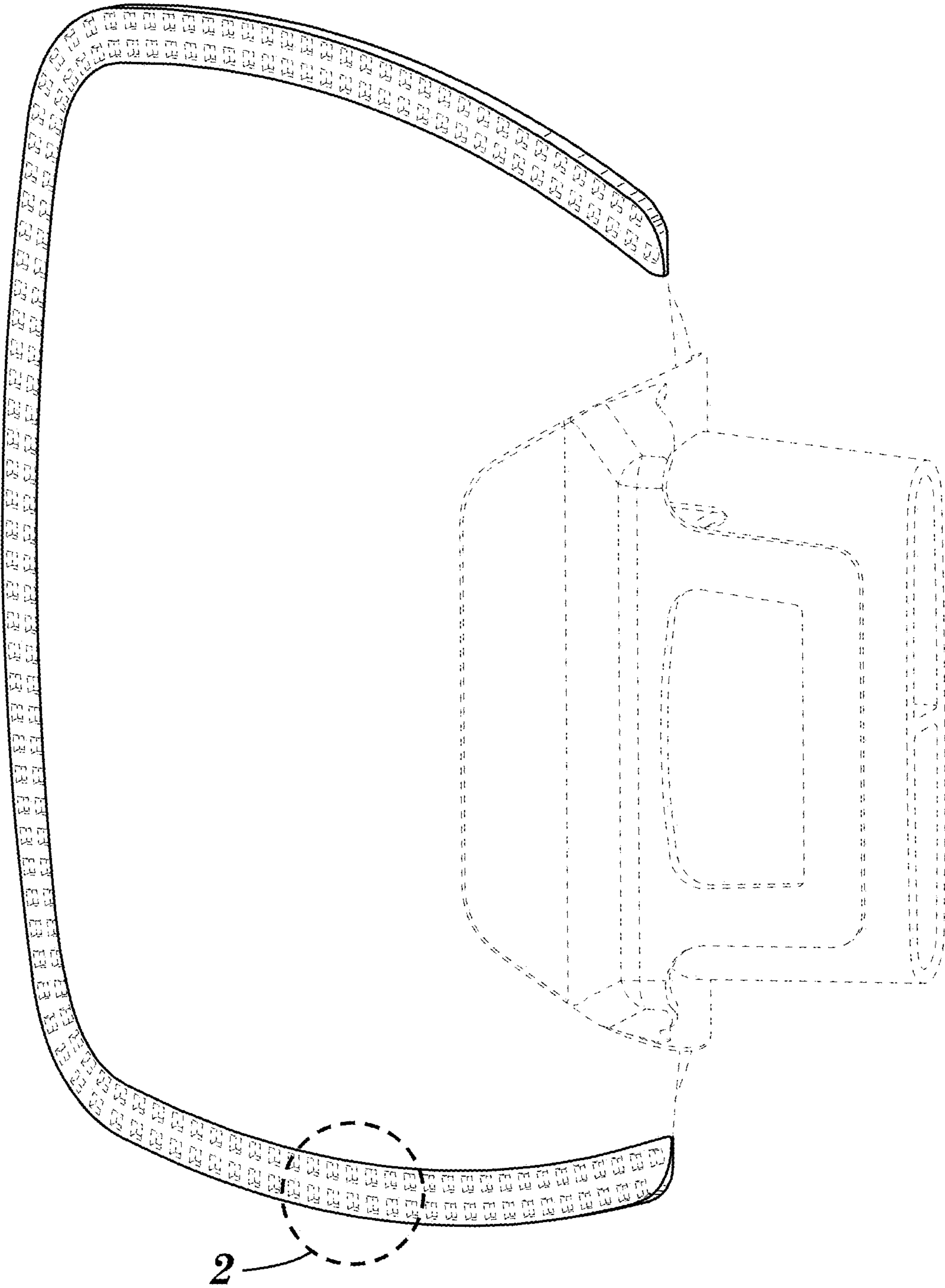


Fig. 1

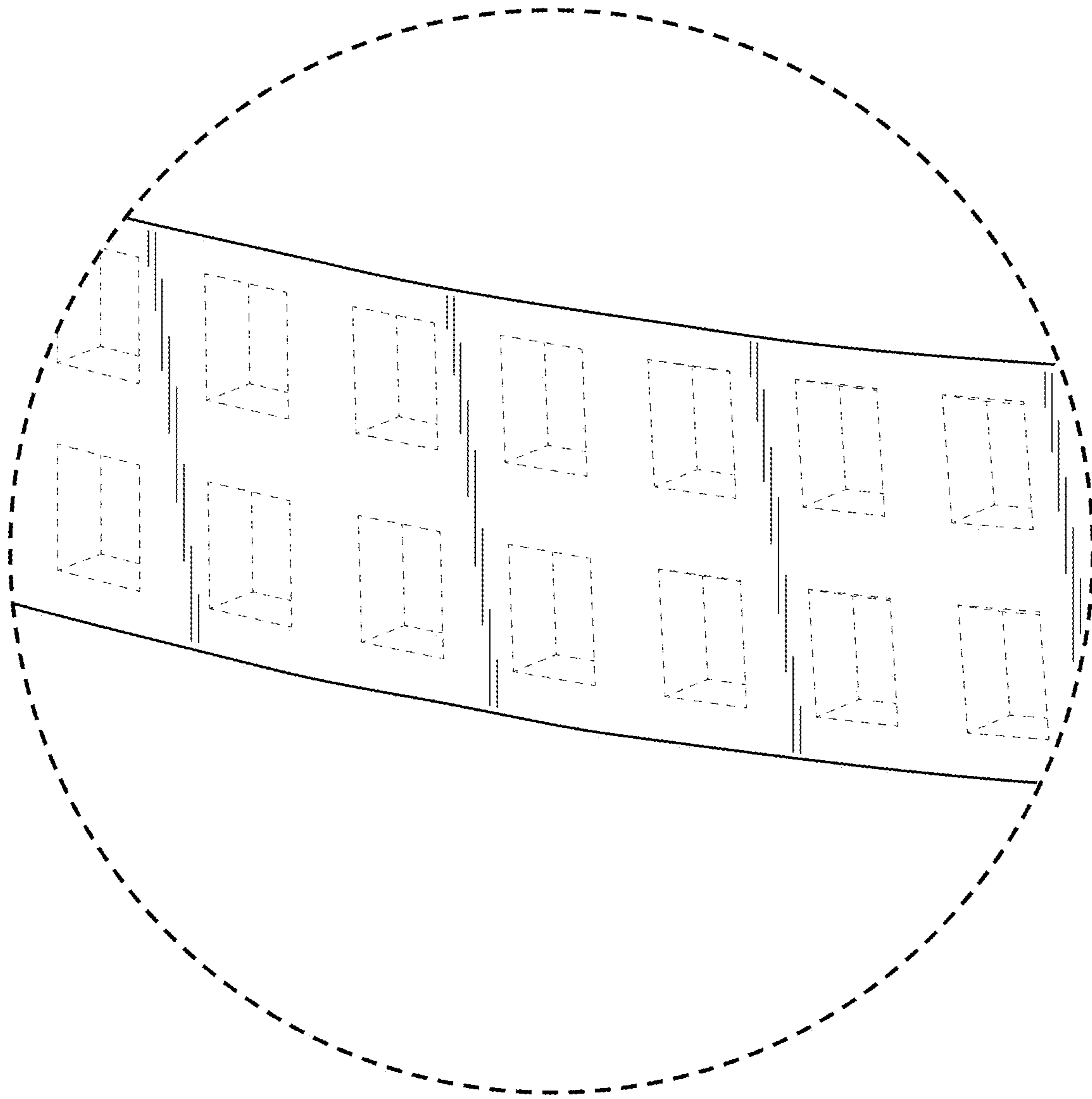


Fig. 2

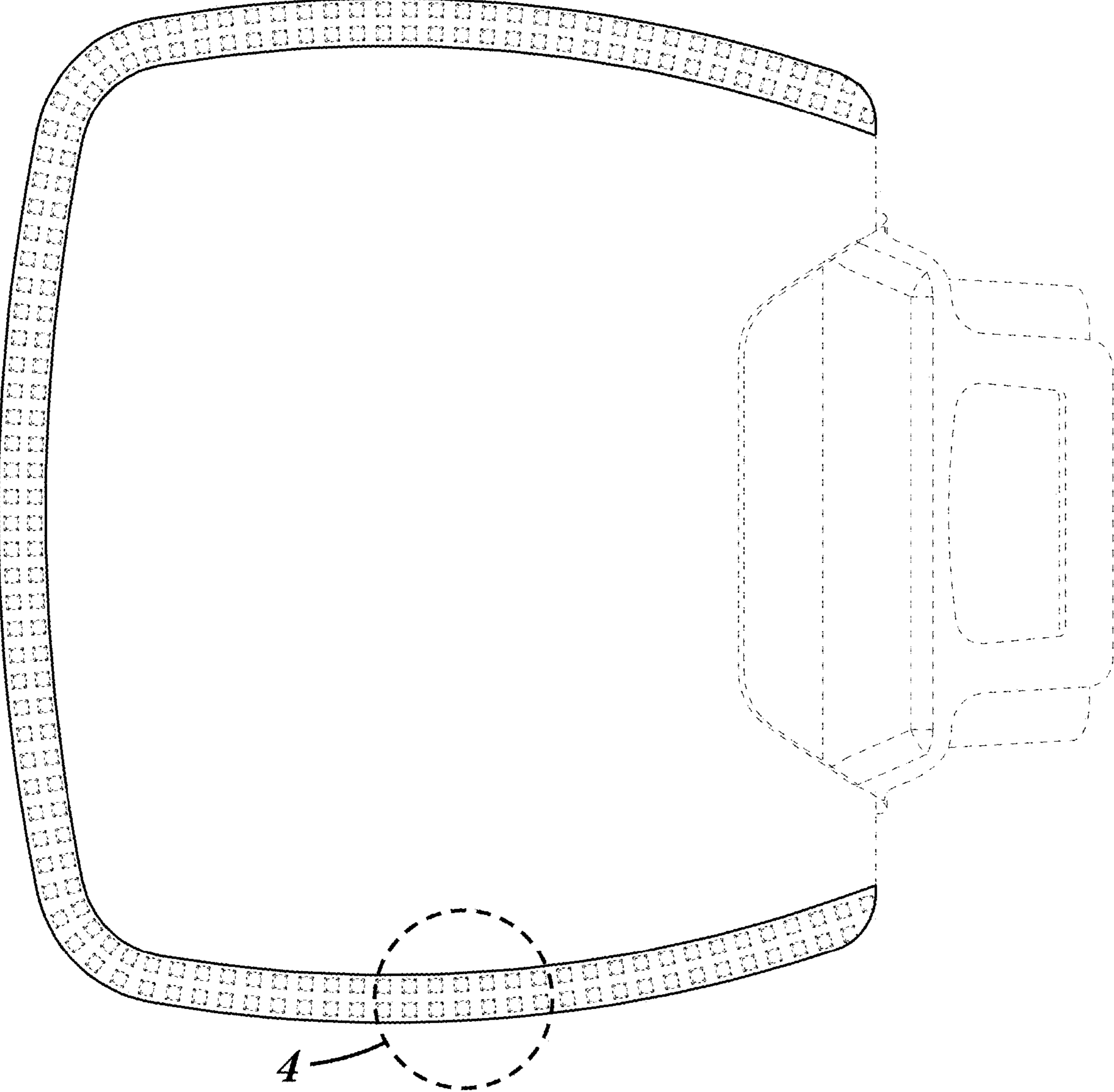


Fig. 3

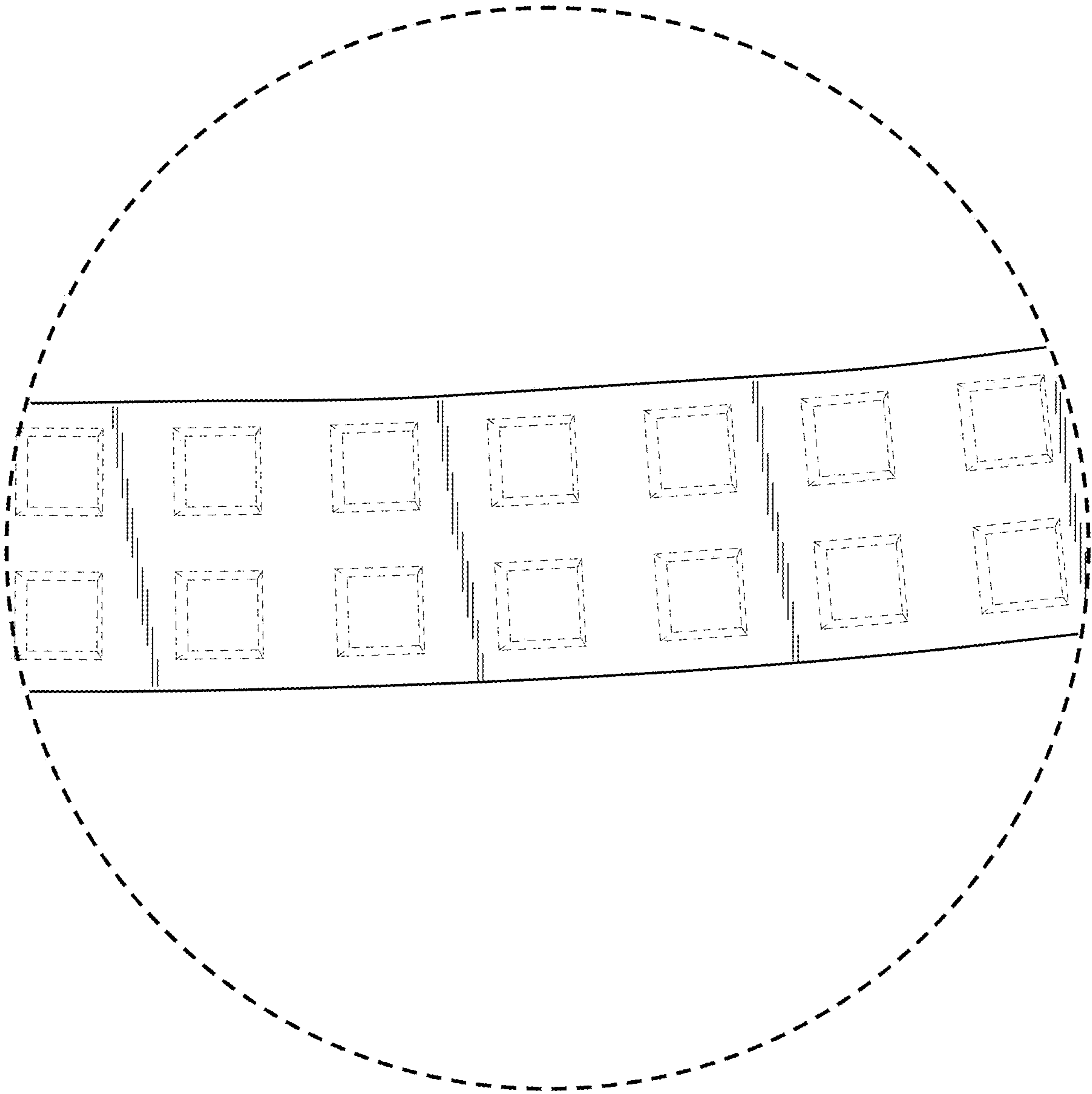


Fig. 4

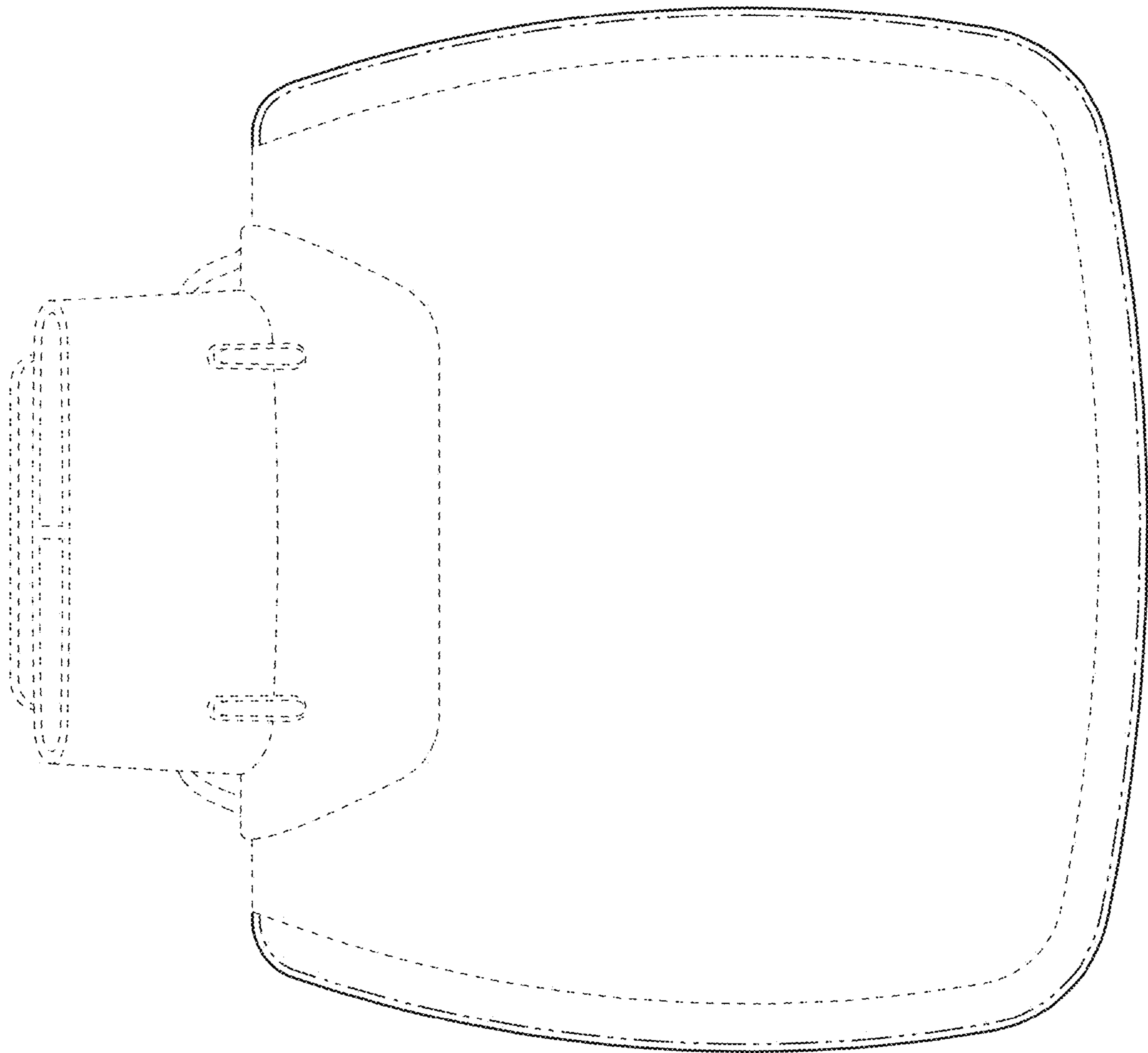


Fig. 5

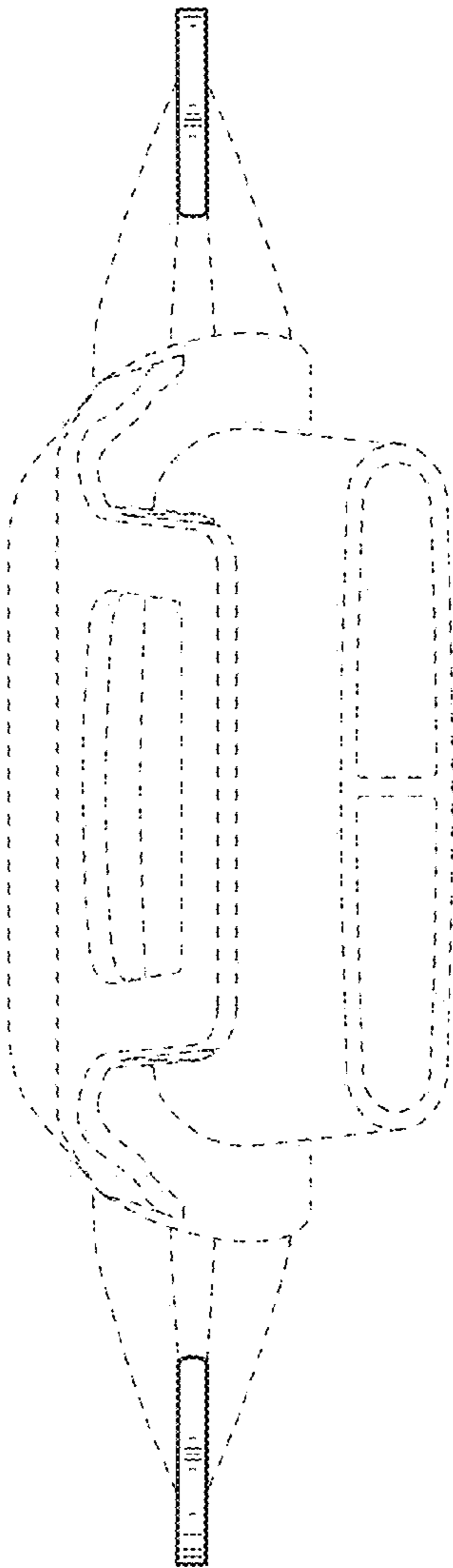


Fig. 6

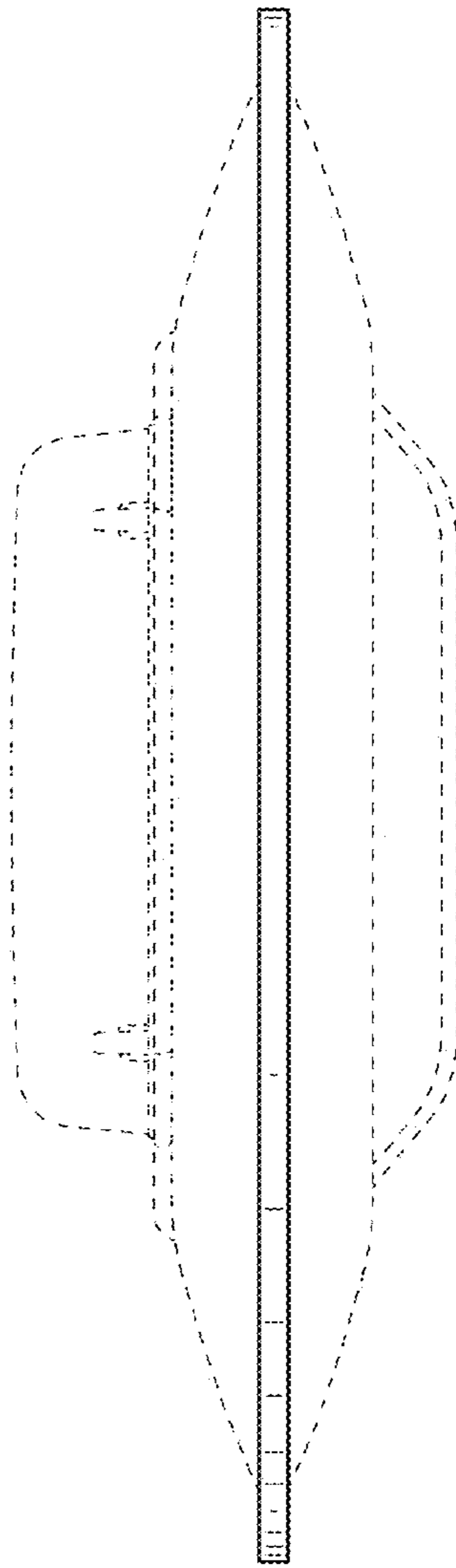


Fig. 7

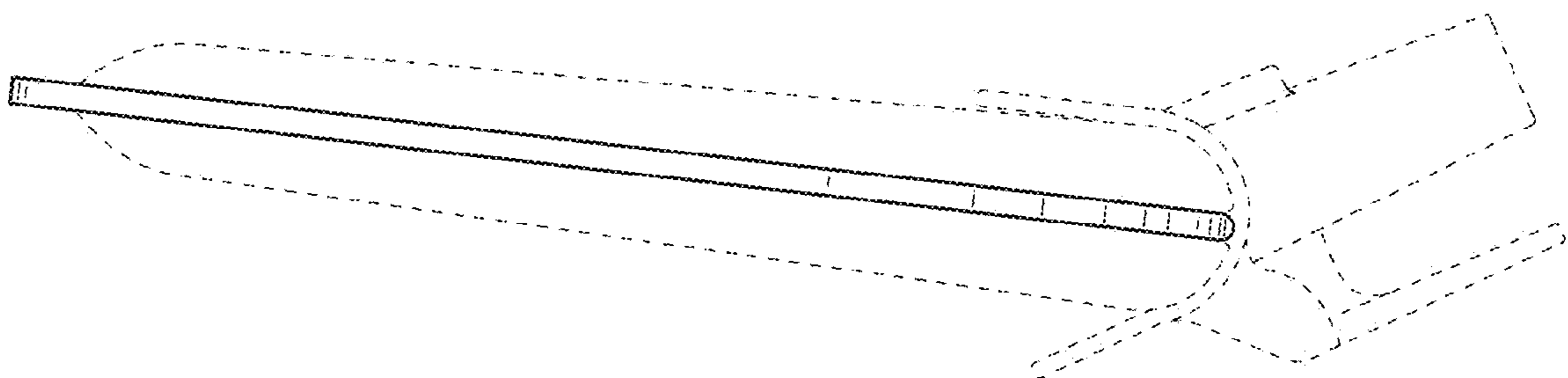


Fig. 8