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

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(54) **SETTLER PLATE**

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

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(51) **LOC (13) Cl.** **23-01**

(52) **U.S. Cl.**
USPC **D23/207**

(58) **Field of Classification Search**
USPC D23/201, 205, 206, 207, 208, 209, 233, D23/235, 365, 366
CPC B01D 21/0045; B01D 21/0003; B01D 21/0069; B01D 21/0087; B01D 35/30; B01D 2201/29; B01D 2201/30; B01D 2201/301; B01D 2201/302; B01D 2201/306; B01D 2201/309; F16K 31/52475; B01J 49/85; F17C 1/14; F17C 1/16; C02F 1/008

See application file for complete search history.

(56) **References Cited**

U.S. PATENT DOCUMENTS

3,963,624 A 6/1976 Henderson et al.
4,089,782 A 5/1978 Huebner
4,120,796 A 10/1978 Huebner
4,136,012 A 1/1979 Louboutin et al.
4,157,969 A 6/1979 Thies

4,221,671 A 9/1980 Meurer
4,889,624 A 12/1989 Soriente et al.
5,049,278 A 9/1991 Galper
(Continued)

OTHER PUBLICATIONS

Swisher "JMS Plate Settlers Brochure," Jim Myers & Sons, Inc., Oct. 2009, 4 pages.

(Continued)

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(57) **CLAIM**

The ornamental design for a settler plate, as shown and described.

DESCRIPTION

FIG. 1 is a top perspective view of a settler plate according to the claimed design;

FIG. 2 is a bottom perspective view of the settler plate of FIG. 1;

FIG. 3 is a top plan view of the settler plate of FIG. 1;

FIG. 4 is a bottom plan view of the settler plate of FIG. 1;

FIG. 5 is a left elevation view of the settler plate of FIG. 1;

FIG. 6 is a front elevation view of the settler plate of FIG. 1, the rear being identical thereto;

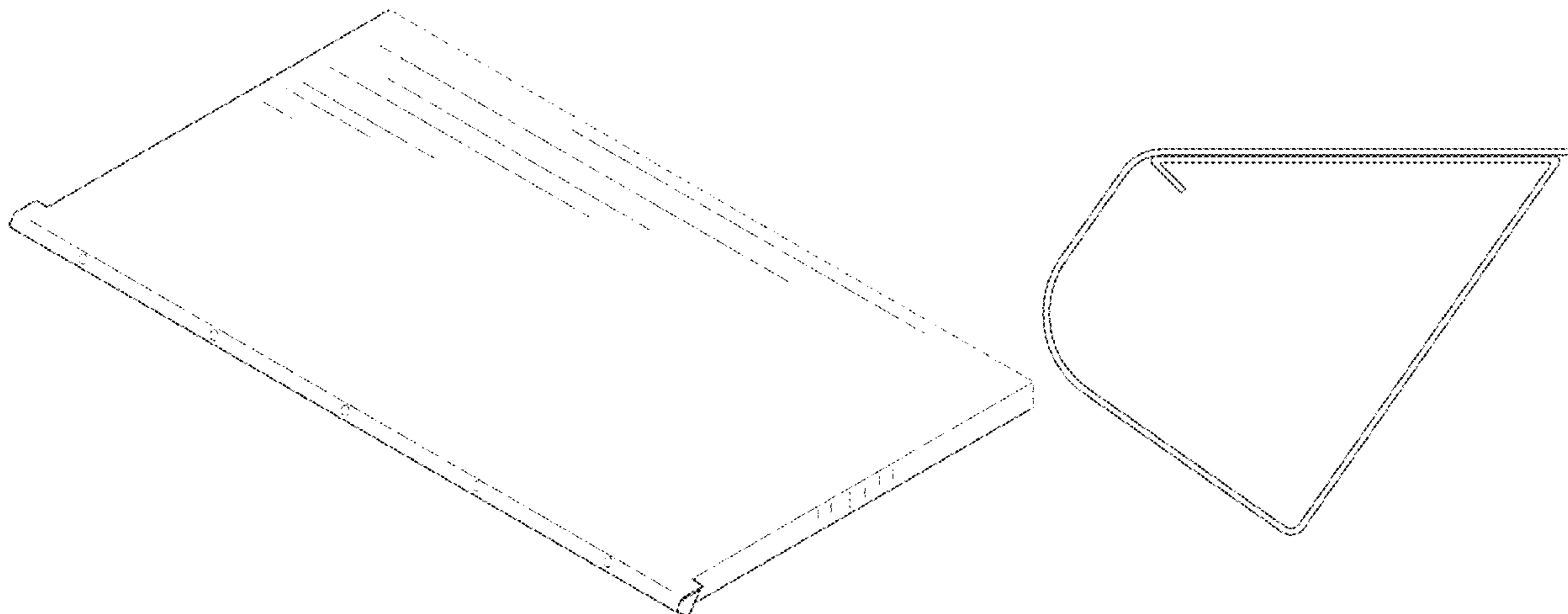
FIG. 7 is a right cross-sectional elevation view of the settler plate taken along line 7-7 of FIG. 3;

FIG. 8 is an enlarged front elevation view of a portion of the settler plate indicated in FIG. 6; and,

FIG. 9 is an enlarged cross-sectional elevation view of a portion of the settler plate taken along line 9-9 of FIG. 3.

The broken lines in the figures are for the purposes of illustrating portions of the settler plate or environmental structure that form no part of the claimed design. The dash dot broken lines on FIG. 6 are to define the enlargement region shown in FIG. 8 and form no part of the claimed design.

1 Claim, 6 Drawing Sheets



(56)

References Cited

U.S. PATENT DOCUMENTS

5,116,443 A 5/1992 Meurer
 5,378,378 A 1/1995 Meurer
 5,391,306 A 2/1995 Meurer
 6,245,243 B1 6/2001 Meurer
 6,783,009 B1* 8/2004 Meurer G05D 7/0186
 210/521
 6,817,476 B2* 11/2004 Donnick, Jr. B01D 21/0006
 210/522
 6,971,398 B1 12/2005 Brauch et al.
 7,314,572 B1 1/2008 Meurer
 7,850,860 B2* 12/2010 Dissinger B01D 21/0045
 210/802
 7,850,880 B2 12/2010 Dissinger et al.
 7,927,485 B2 4/2011 Roberts et al.
 8,585,896 B2* 11/2013 Roberts B01D 21/003
 210/232
 8,945,401 B2 2/2015 Cook et al.
 9,327,999 B1 5/2016 Philbrook et al.
 9,656,188 B2 5/2017 Cook et al.
 9,993,747 B2 6/2018 Brauch et al.
 2008/0314823 A1 12/2008 Kulick, III et al.
 2010/0243585 A1* 9/2010 Dissinger B01D 21/0045
 210/802
 2012/0312740 A1* 12/2012 Roberts B01D 21/003
 210/521

2012/0312741 A1* 12/2012 Pashaian B01D 21/0087
 210/521
 2017/0050124 A1 2/2017 Feldthusen
 2020/0171411 A1* 6/2020 Hanson B01D 21/2427
 2020/0254364 A1* 8/2020 Hanson B01D 21/307

OTHER PUBLICATIONS

Official Action for U.S. Appl. No. 16/862,352, dated Oct. 2, 2020, 26 pages.
 Notice of Allowance for U.S. Appl. No. 16/208,262, dated Sep. 1, 2020, 10 pages.
 Official Action for U.S. Appl. No. 16/208,262, dated Feb. 27, 2020, 5 pages. Restriction Requirement.
 Office Action for U.S. Appl. No. 16/208,262, dated May 12, 2020, 22 pages.
 Official Action for U.S. Appl. No. 16/862,352, dated Jul. 16, 2020, 5 pages. Restriction Requirement.
 U.S. Appl. No. 16/208,262, filed Dec. 3, 2018, Hanson et al.
 "Plate Settler Technology," Meurer Research Inc., 2018, retrieved from <http://www.meurerresearch.com/literaturemedia/technical-information/plate-settler-technology>, 3 pages.
 "Plate Settlers: The High-Capacity Inclined Plate Settler System," Muerer Research Inc., 2011, retrieved from <http://www.meurerresearch.com/wp-content/uploads/2011/04/platesettler.pdf?x78409>, 6 pages.
 Notice of Allowance for U.S. Appl. No. 16/862,352, dated Feb. 25, 2021 8 pages.

* cited by examiner

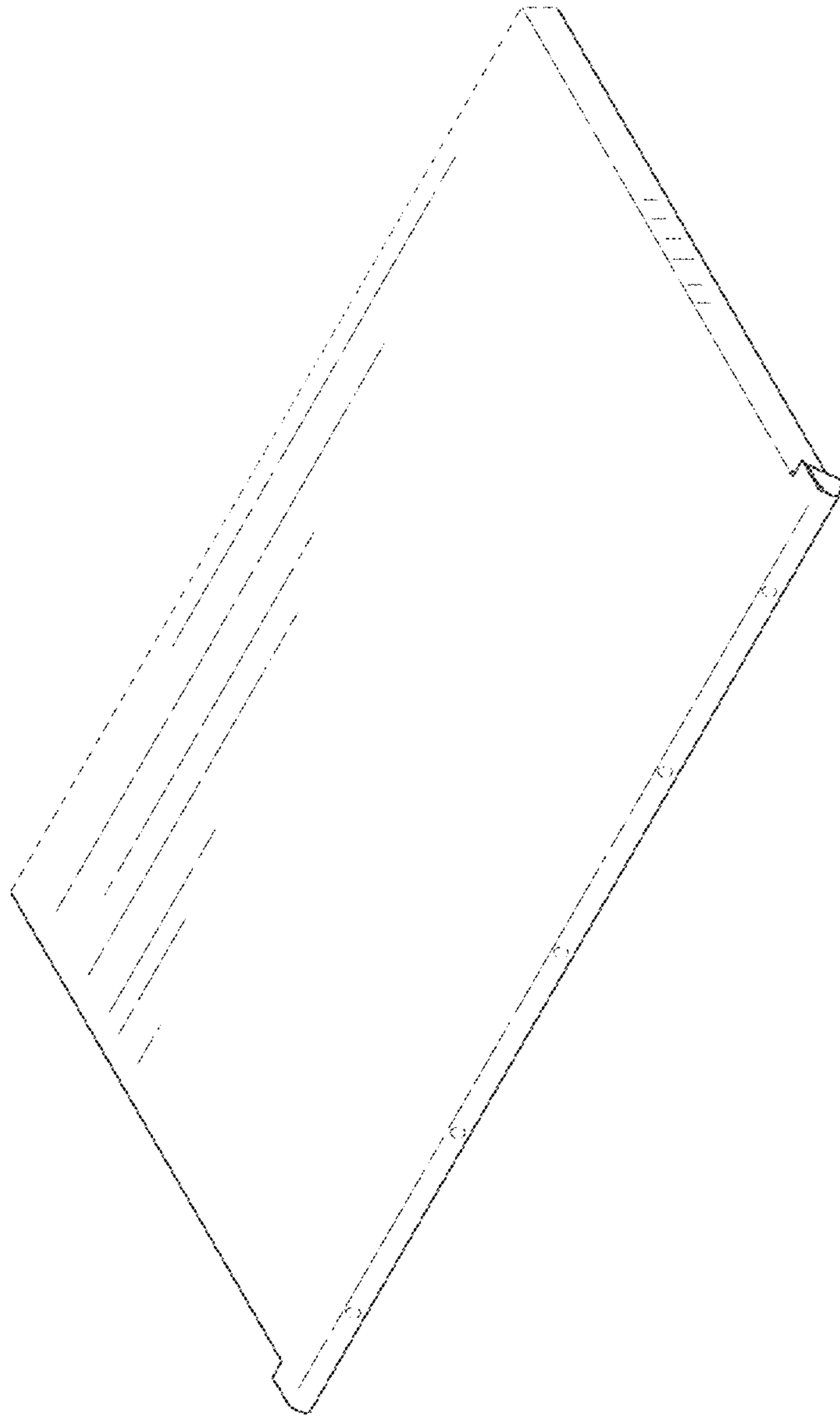


FIG.1

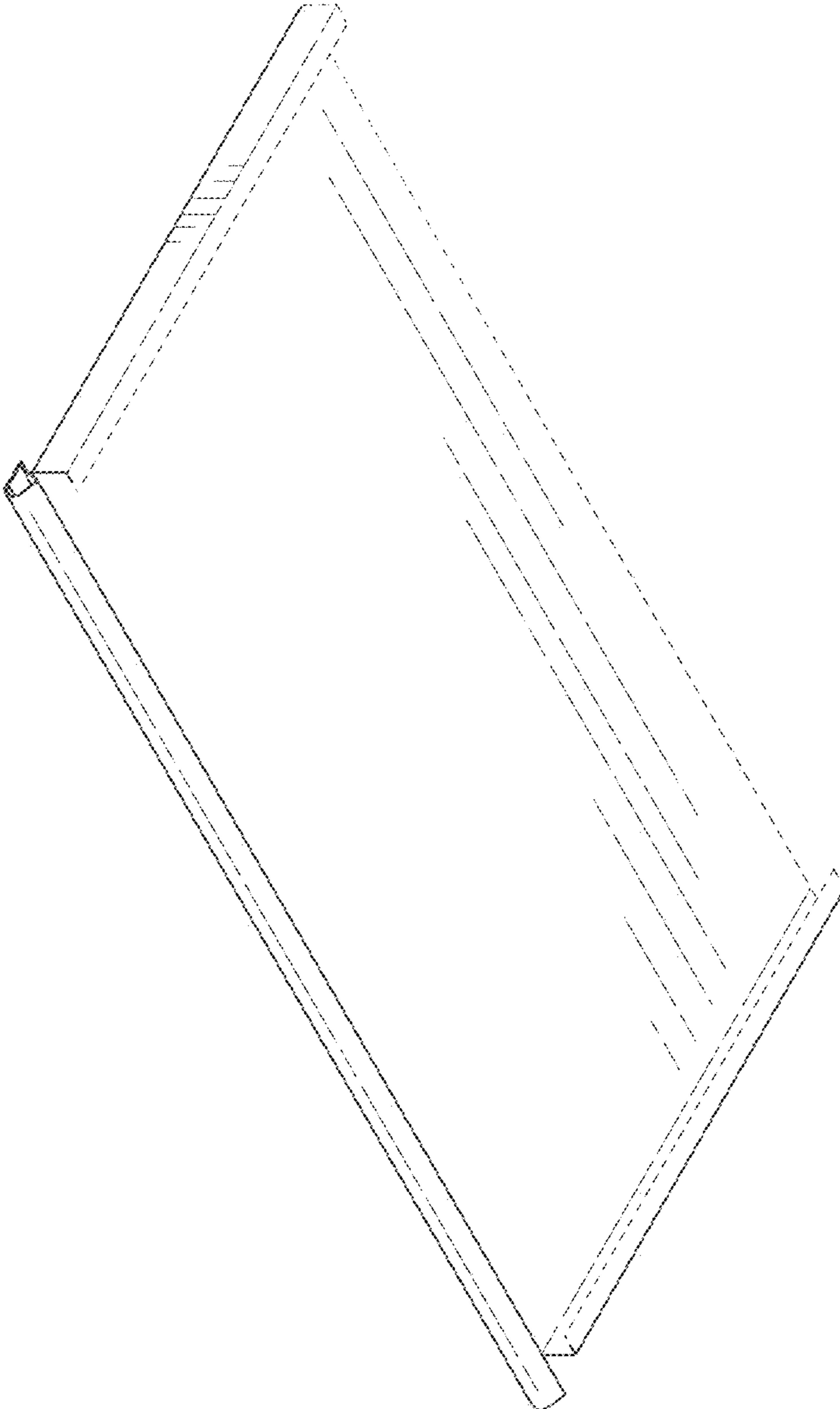


FIG. 2

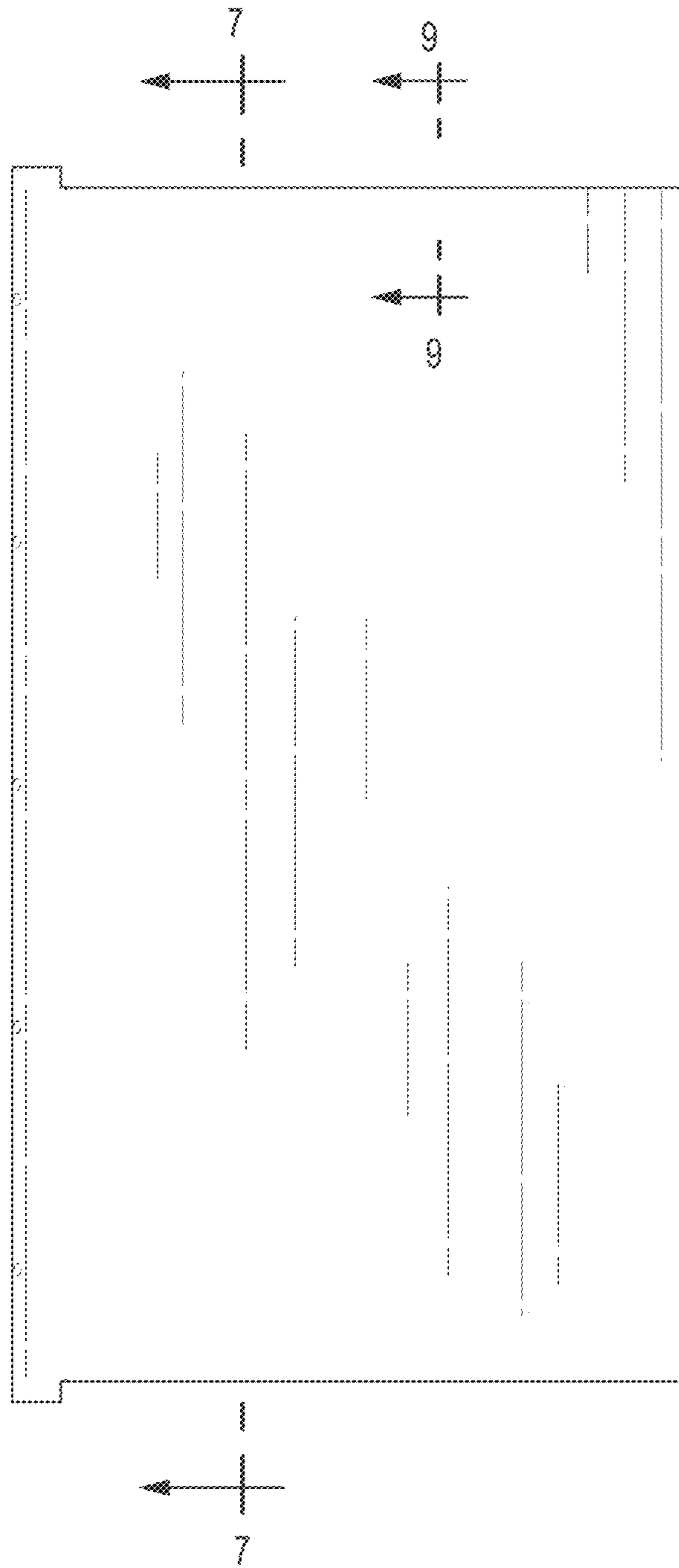


FIG.3

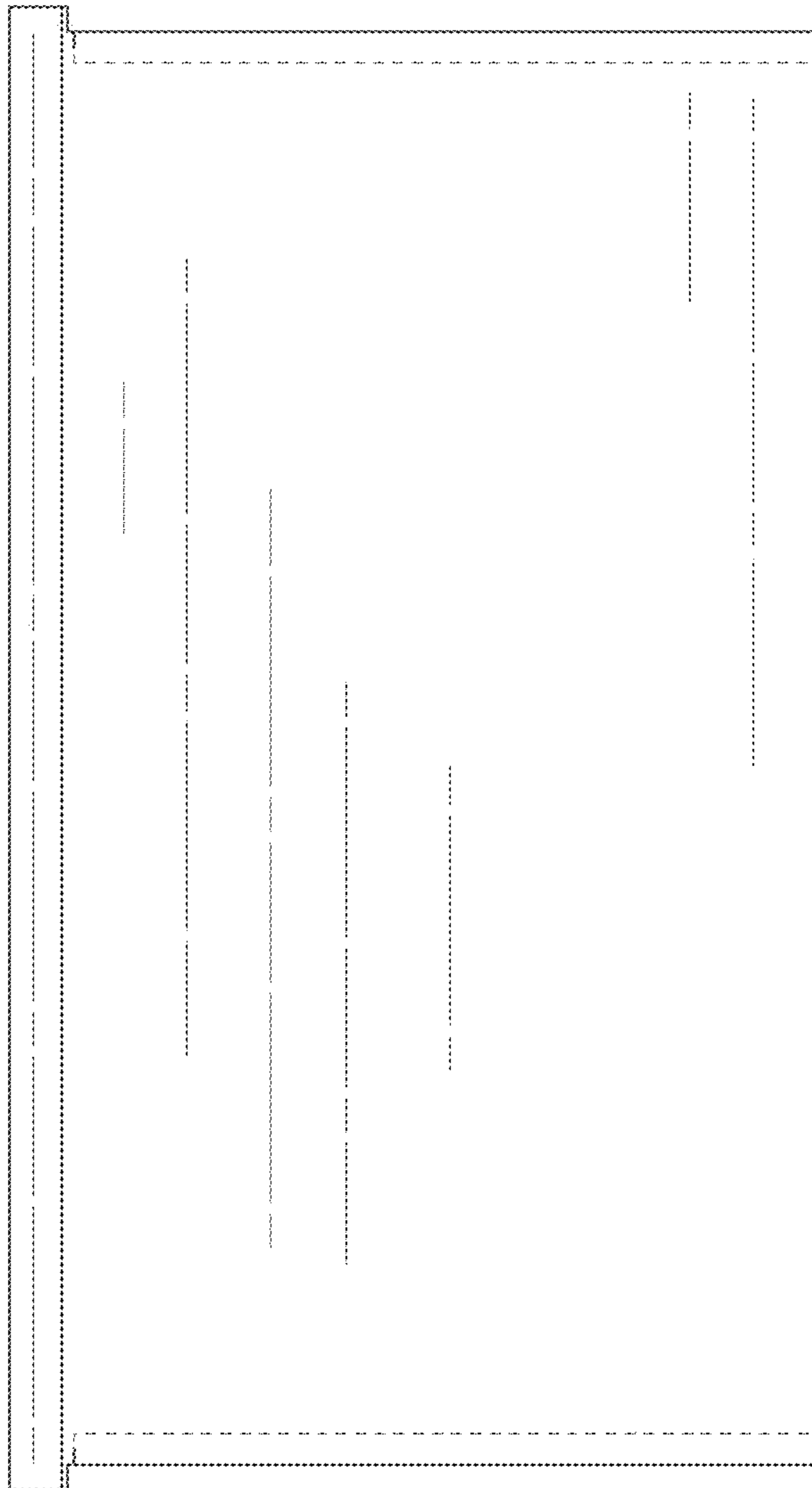


FIG.4

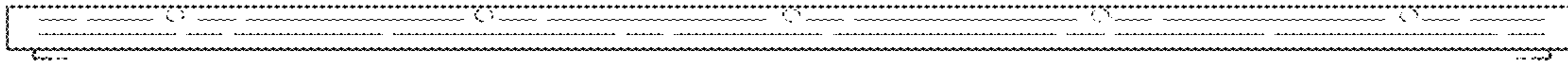


FIG.5

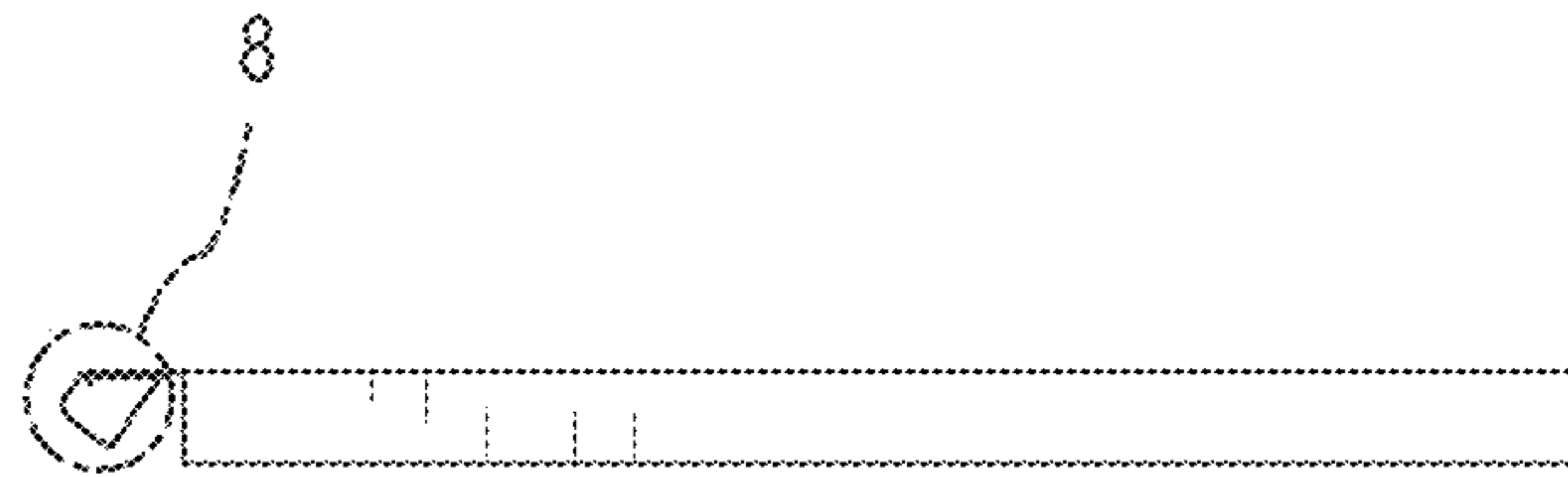


FIG.6



FIG.7

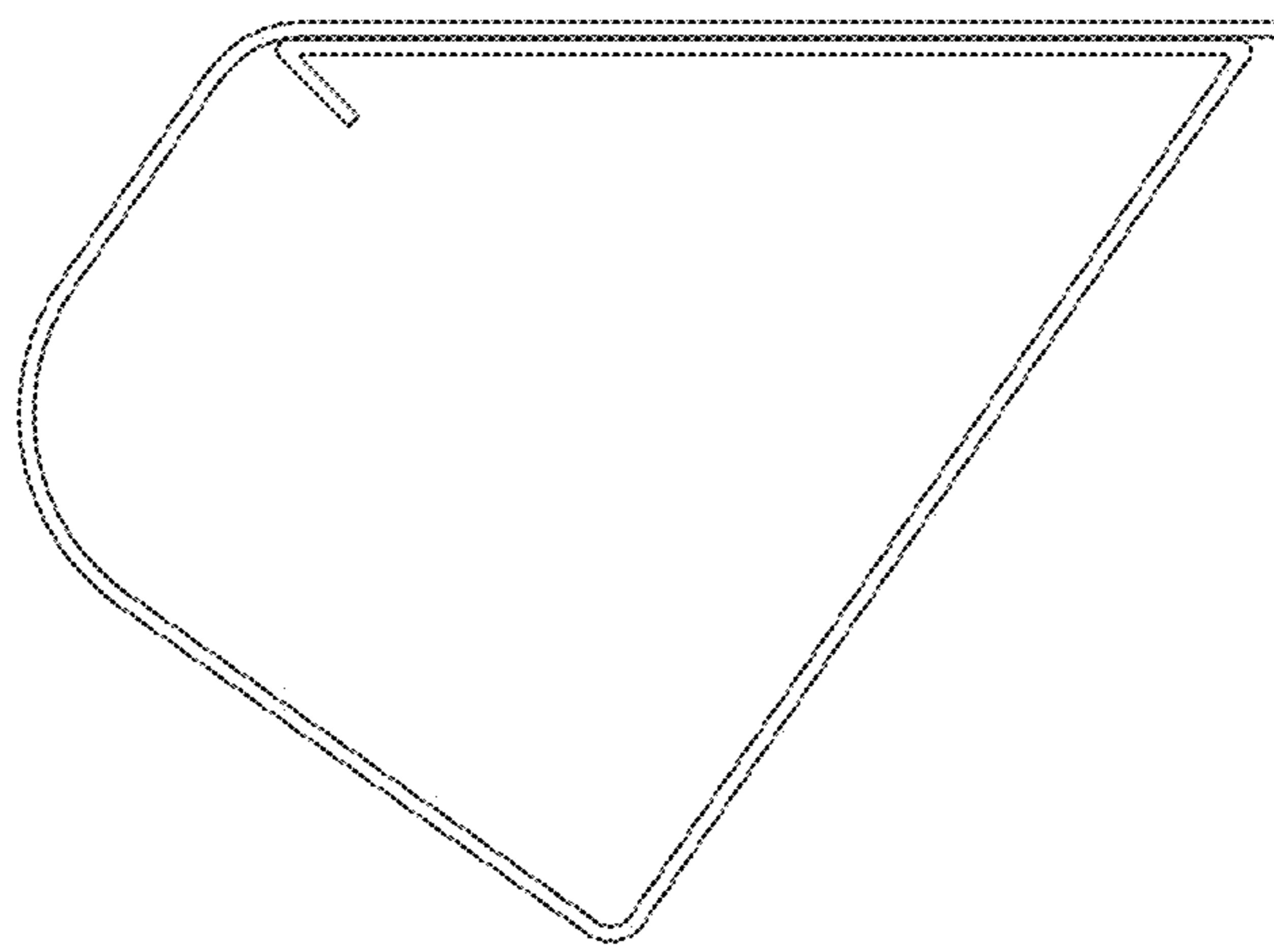


FIG. 8



FIG. 9