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

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(54) **CONTROL UNIT FOR AIR CIRCUIT BREAKER**

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

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

(52) **U.S. Cl.**  
USPC ..... **D13/162**

(58) **Field of Classification Search**  
USPC ..... D13/158, 160, 162, 163, 184  
CPC ..... H05K 5/00; H05K 5/0004; H05K 5/0008;  
H05K 5/0017; H05K 5/03; H05K 5/04;  
H05K 5/06; H02B 1/01; H02B 1/26;  
H02B 1/30; H01H 71/02  
See application file for complete search history.

(56) **References Cited**

**U.S. PATENT DOCUMENTS**

D222,139 S \* 10/1971 Jaeschke ..... D13/184  
D290,960 S \* 7/1987 Brann ..... D14/312  
D325,829 S \* 5/1992 Cury ..... D13/184  
D365,086 S \* 12/1995 Spechts ..... D13/184  
D390,835 S \* 2/1998 Mayfield, III ..... D13/184

5,822,180 A \* 10/1998 Deschamps ..... H02B 1/015  
361/627  
D405,767 S \* 2/1999 Nelson ..... D13/184  
D503,931 S \* 4/2005 Kauranen ..... D13/184  
D543,161 S \* 5/2007 Stepputat ..... D13/184  
D599,302 S \* 9/2009 Magoni ..... D13/160  
7,952,042 B2 \* 5/2011 Coomer ..... F16J 3/041  
200/302.1  
D682,794 S \* 5/2013 Biller ..... D13/162  
D691,557 S \* 10/2013 Helosvuori ..... D13/123  
D706,228 S \* 6/2014 Ishiura ..... D13/162  
D778,243 S \* 2/2017 Knospe ..... D13/160  
D833,986 S \* 11/2018 Vierjarvi ..... D13/163  
D845,909 S \* 4/2019 Shin ..... D13/160  
2009/0015357 A1 \* 1/2009 Ahn ..... H01H 71/04  
335/17  
2019/0148921 A1 \* 5/2019 Bellows ..... H02B 1/565  
361/622

\* cited by examiner

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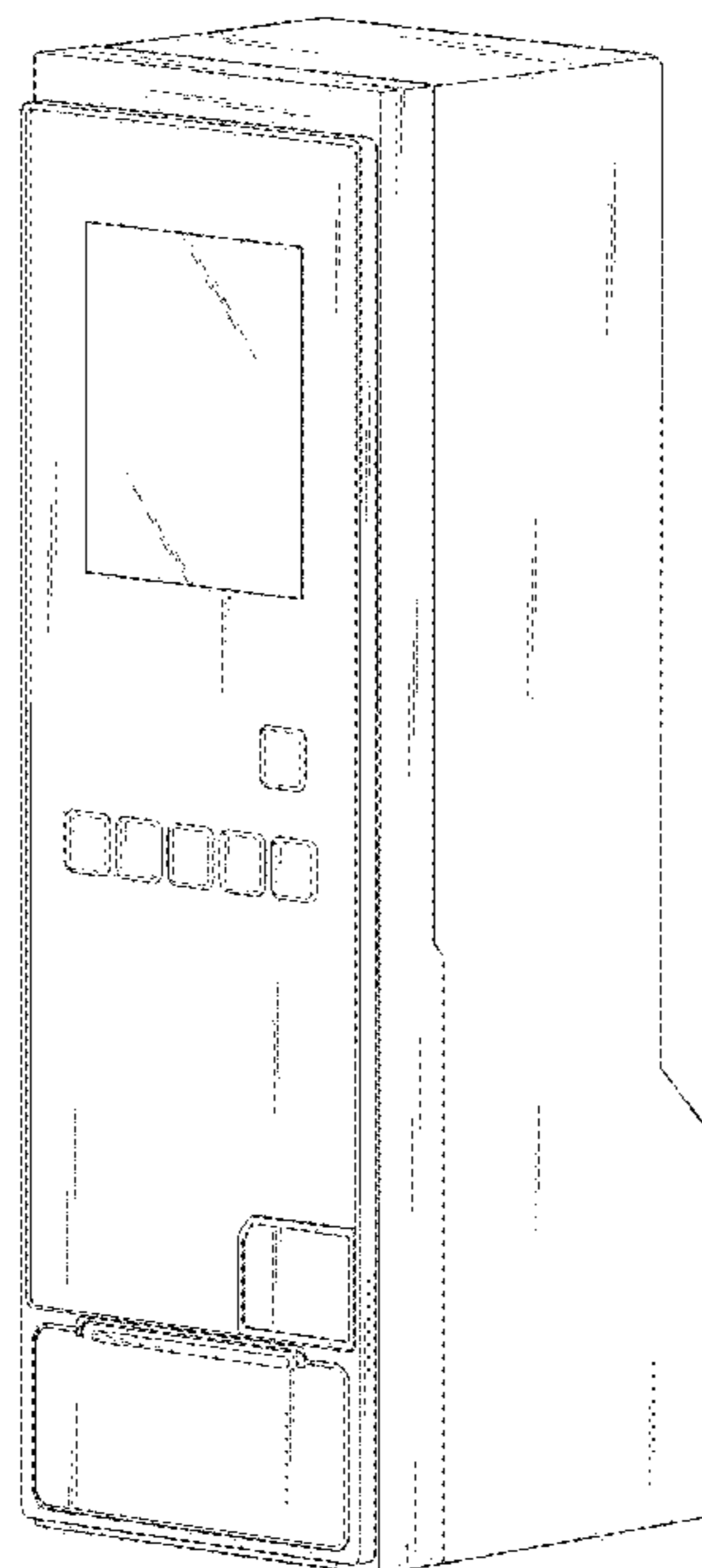
(57) **CLAIM**

The ornamental design for a control unit for air circuit breaker, as shown and described herein.

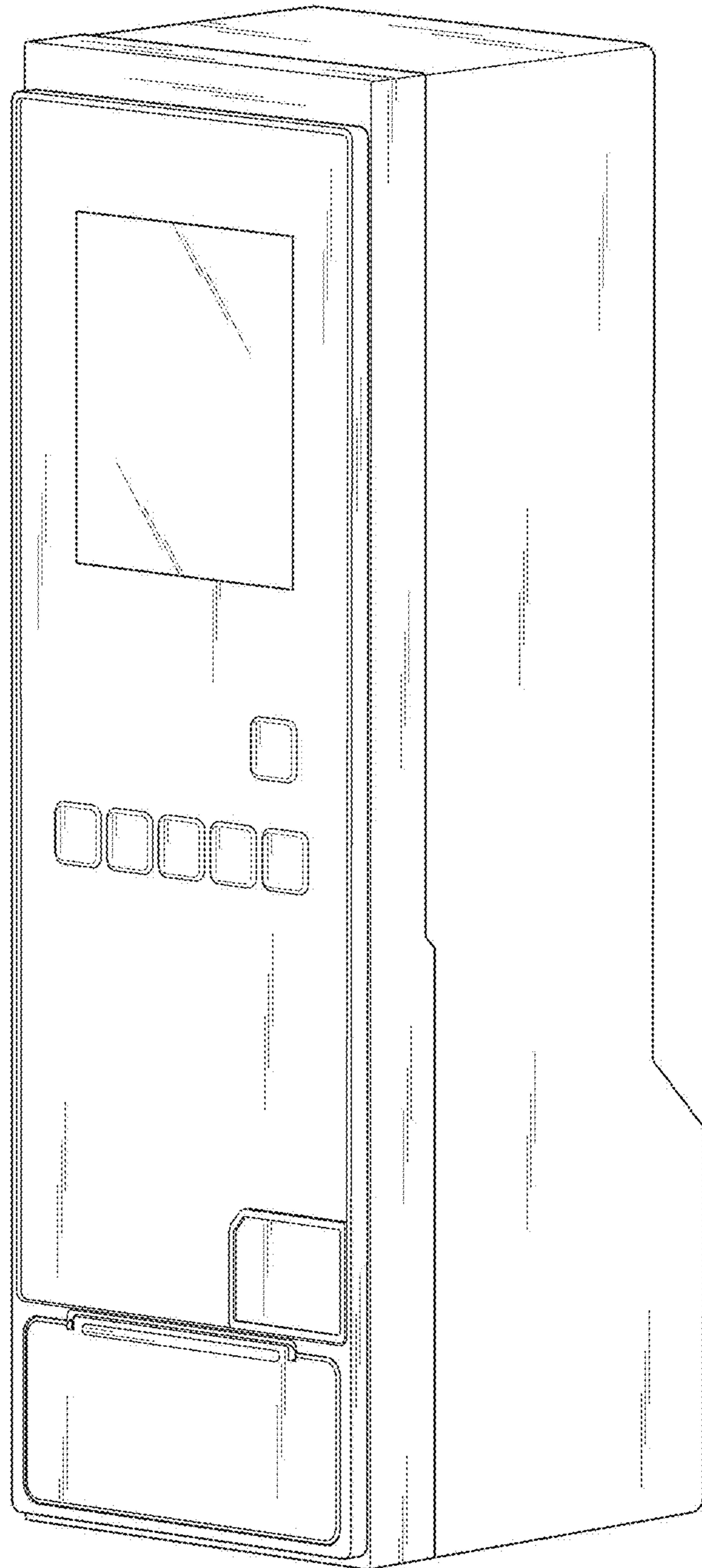
**DESCRIPTION**

FIG. 1 is a perspective view of a control unit for air circuit breaker showing the new design;  
FIG. 2 is a front elevation view thereof;  
FIG. 3 is a rear elevation view thereof based on FIG. 2;  
FIG. 4 is a left-side elevation view thereof based on FIG. 2;  
FIG. 5 is a right-side elevation view thereof based on FIG. 2;  
FIG. 6 is a top plan view thereof based on FIG. 2; and  
FIG. 7 is a bottom plan view thereof based on FIG. 2.

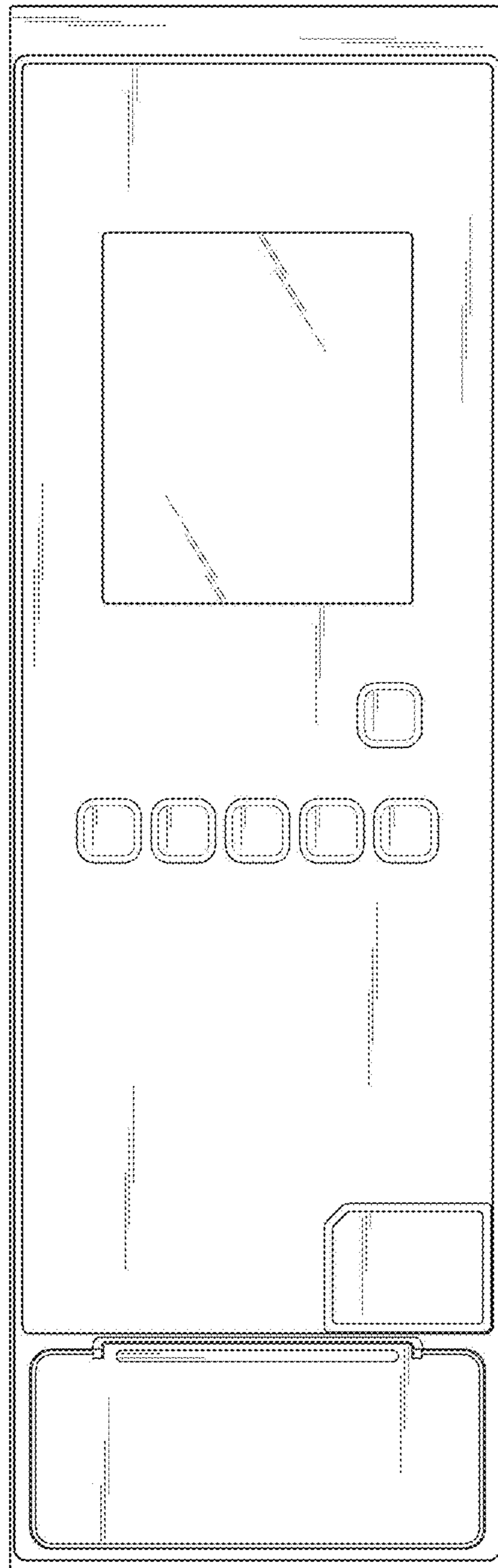
**1 Claim, 7 Drawing Sheets**



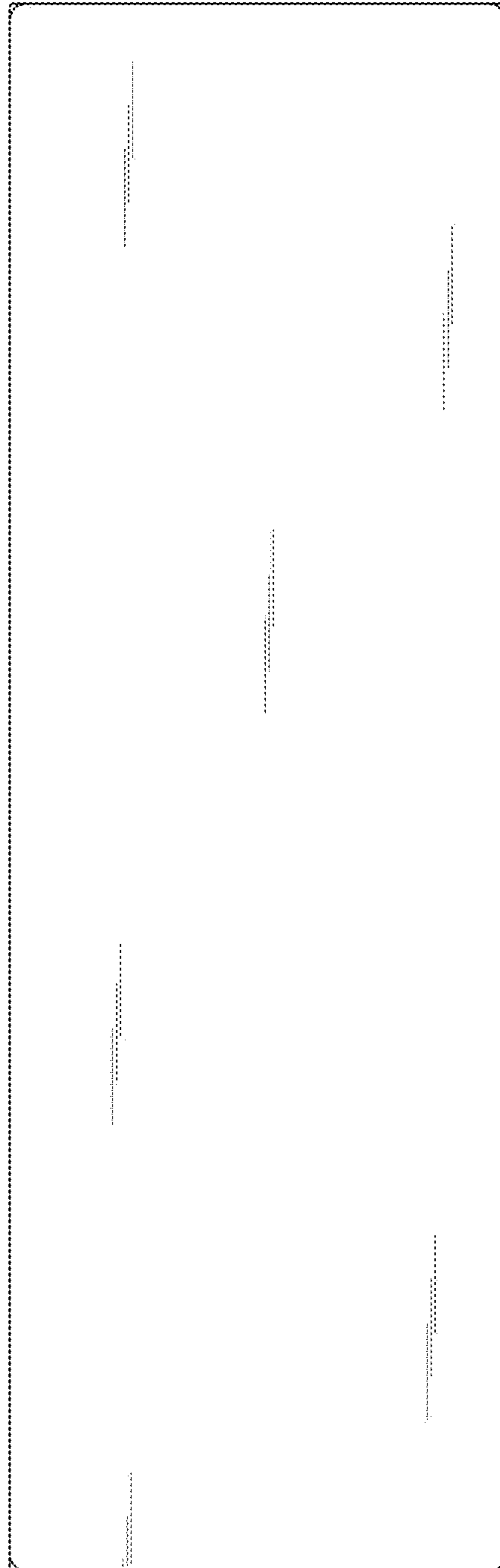
*FIG. 1*



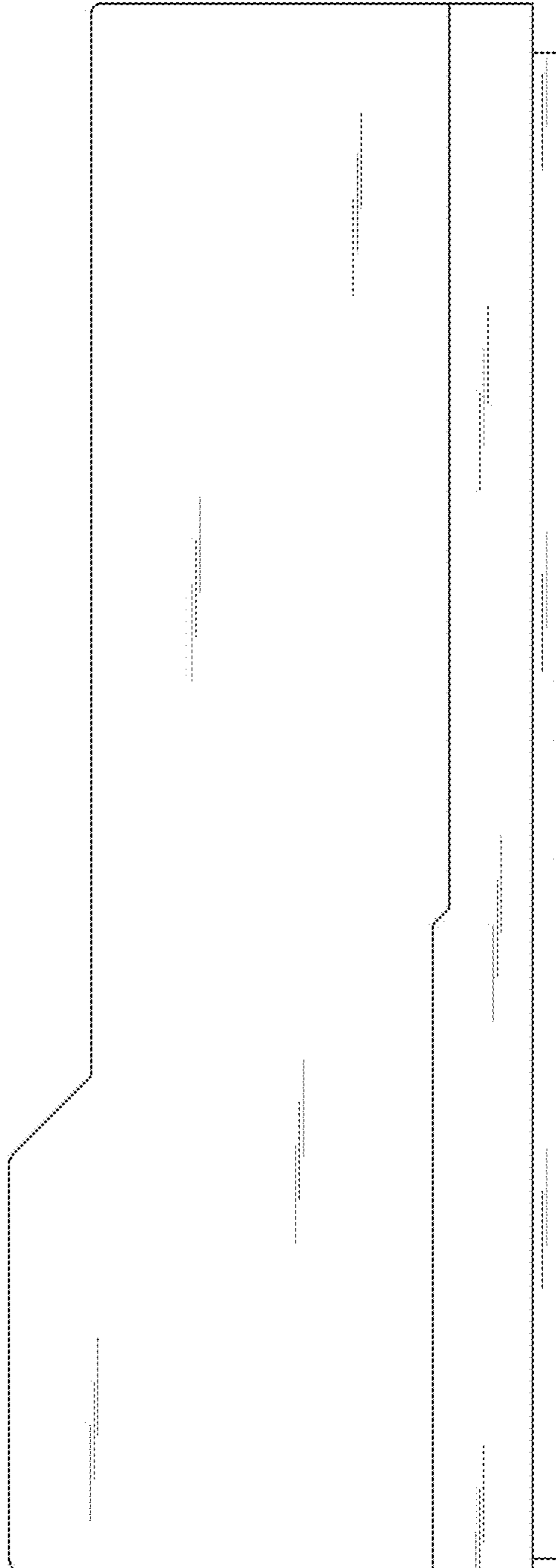
*FIG. 2*



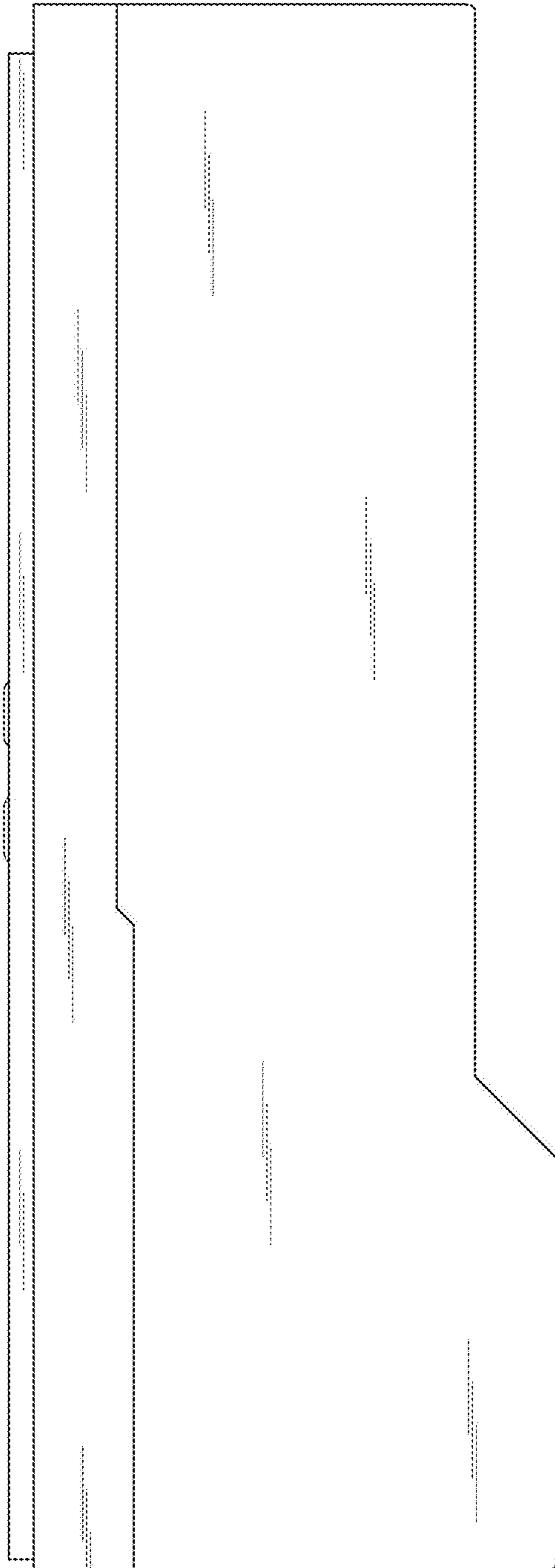
*FIG. 3*



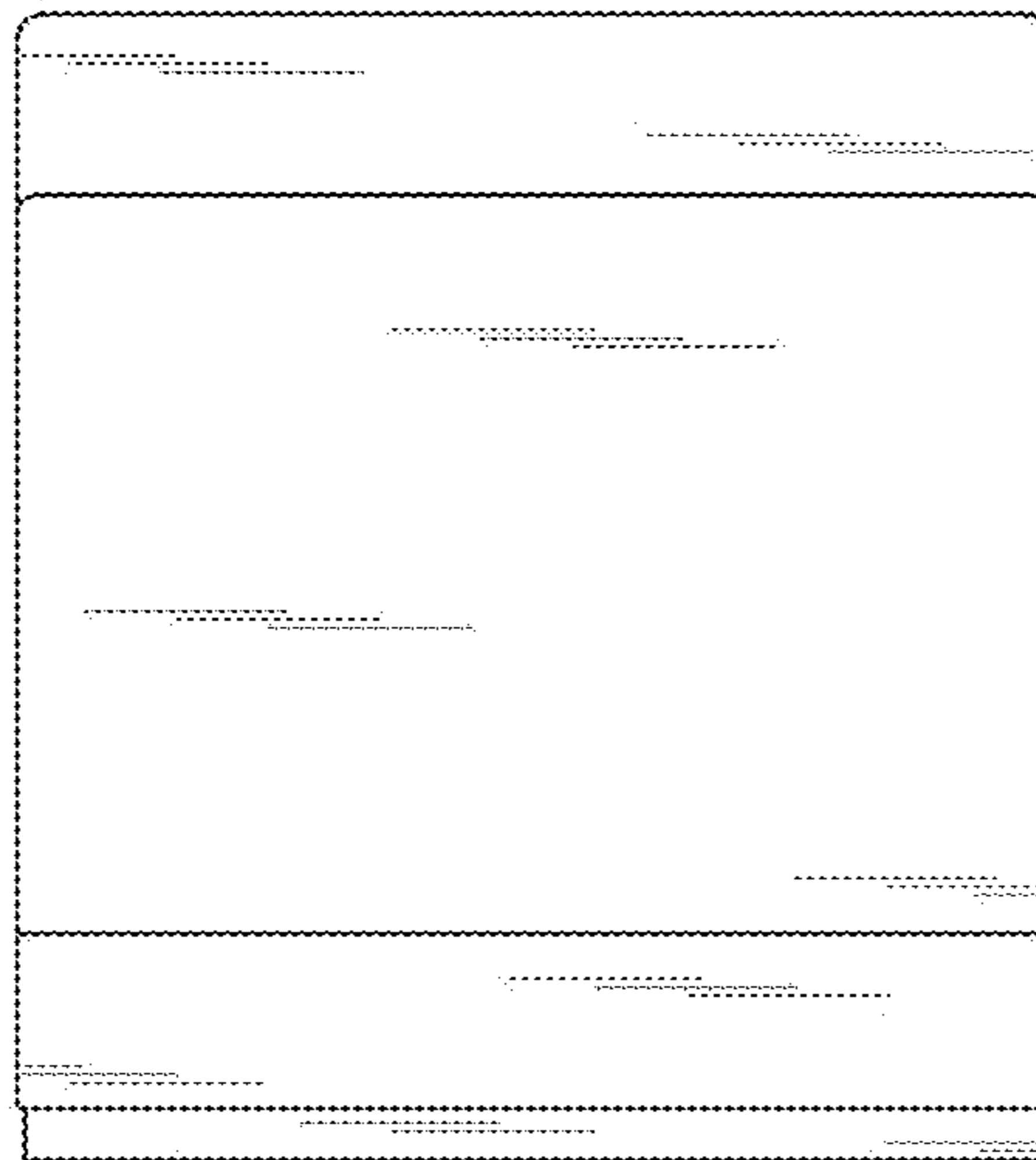
*FIG. 4*



*FIG. 5*



*FIG. 6*





*FIG. 7*

