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

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(54) **SEMICONDUCTOR-BASED START-UP  
ARRANGEMENT FOR ELECTRICAL  
EQUIPMENT**

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

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(51) **LOC (8) Cl.** ..... **13-03**

(52) **U.S. Cl.** ..... **D13/159**

(58) **Field of Classification Search** ..... D13/158,  
D13/159, 160; 200/293; 335/6, 106, 132,  
335/133, 134, 156

See application file for complete search history.

(56) **References Cited**

**U.S. PATENT DOCUMENTS**

4,899,120 A \* 2/1990 Ohtake et al. .... 335/132

5,424,900 A \* 6/1995 Kiiskinen et al. .... 361/116  
D406,105 S \* 2/1999 Gonser ..... D13/159  
6,064,289 A \* 5/2000 Wieloch et al. .... 335/132  
6,377,143 B1 \* 4/2002 Zhou et al. .... 335/132  
6,411,184 B1 \* 6/2002 Comtois et al. .... 335/106  
6,512,433 B1 \* 1/2003 Bouchard et al. .... 335/6  
6,621,393 B2 \* 9/2003 Comtois et al. .... 335/132

\* cited by examiner

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(57) **CLAIM**

The ornamental design for a semiconductor-based start-up arrangement for electrical equipment, as shown.

**DESCRIPTION**

FIGS. 1, 2 and 3 are top, front and side perspective views of a semiconductor-based start-up arrangement for electrical equipment, showing our new design; and,

FIG. 4 is a top and side perspective view thereof.

**1 Claim, 4 Drawing Sheets**



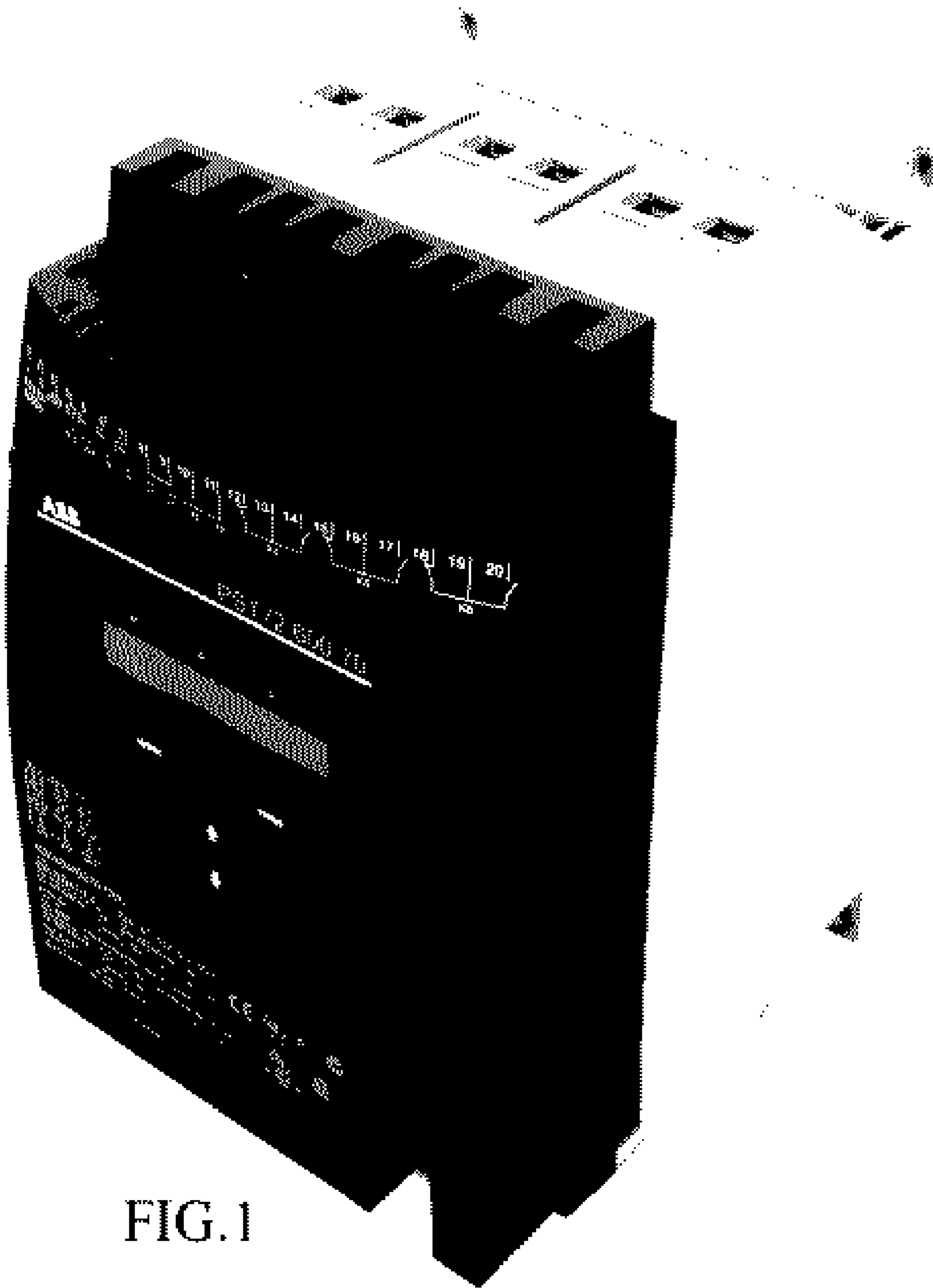


FIG. 1

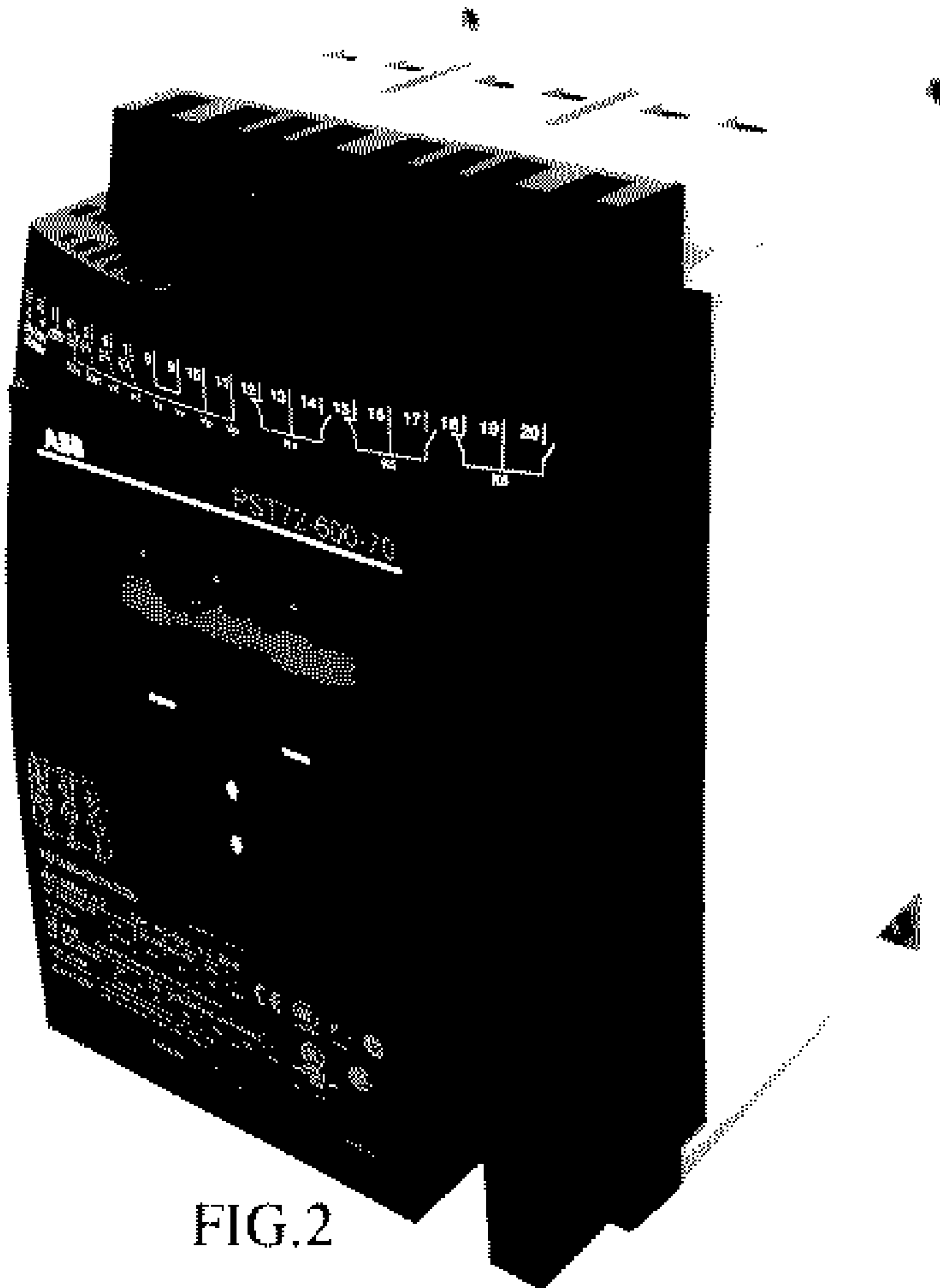


FIG. 2



FIG.3

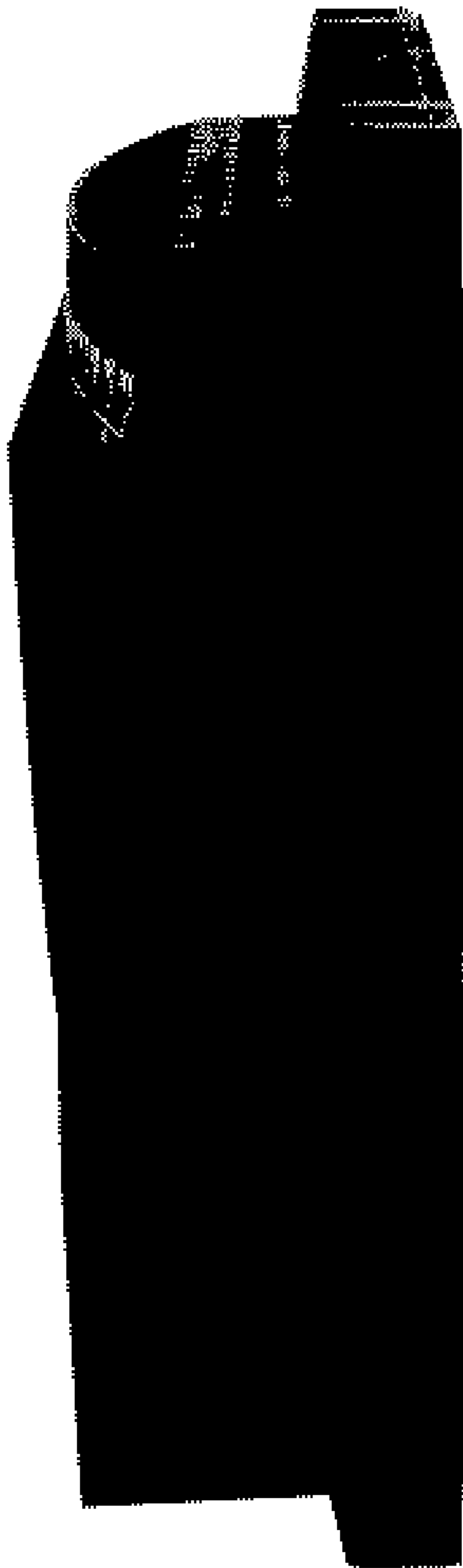


FIG.4