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# (12) United States Design Patent

Hindle et al.

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(54) **SAFETY ENCLOSURE**

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

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(51) **LOC (7) Cl.** ..... **13-03**
(52) **U.S. Cl.** ..... **D13/184**
(58) **Field of Search** ..... D13/133, 152, D13/158, 160, 162, 163, 164, 184; 174/50, 50.52, 52.1; 220/3.8; 312/291; 361/679, 686, 687, 724, 733, 752

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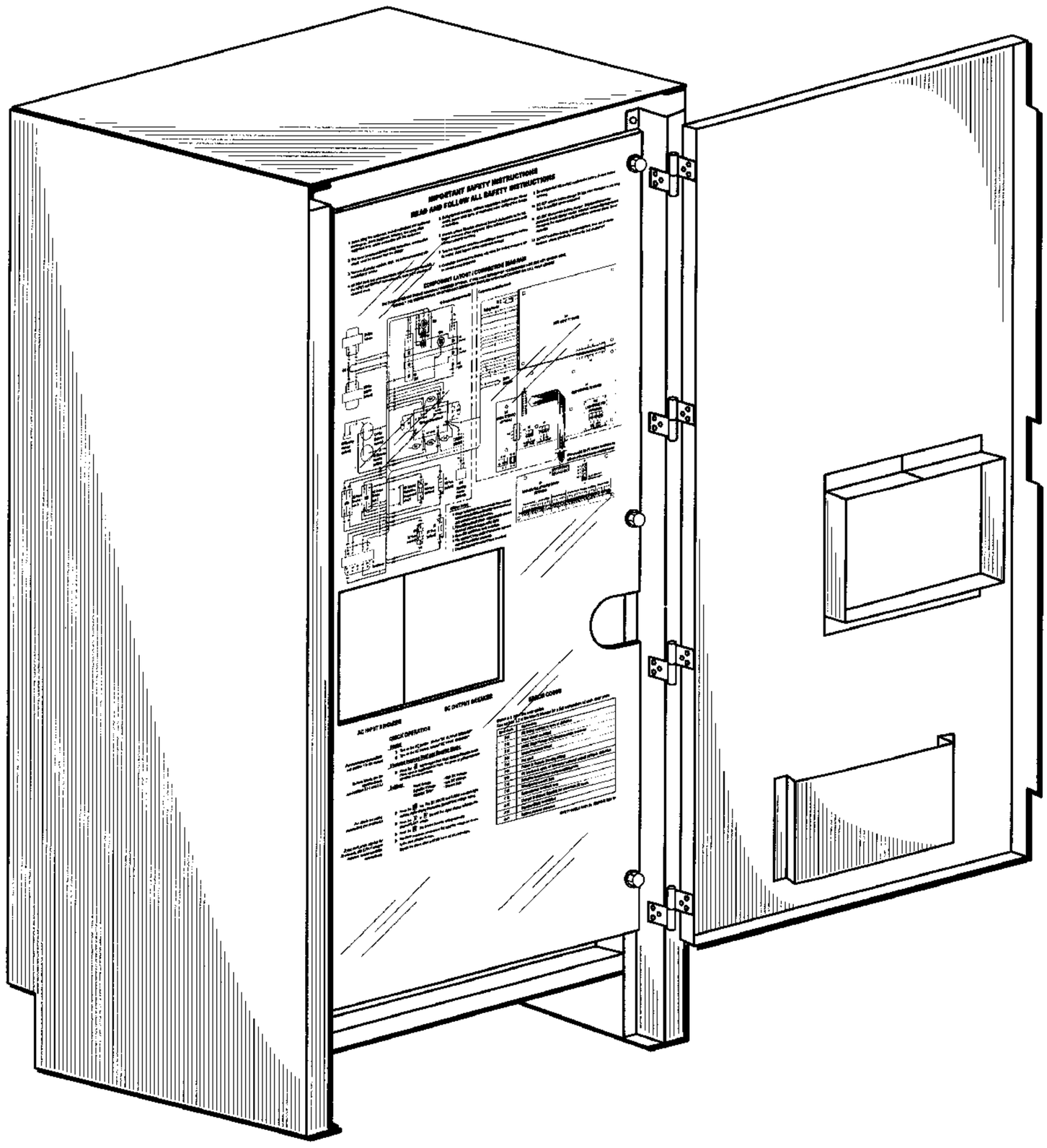
(57) **CLAIM**

The ornamental design for a safety enclosure, as shown and described.

**DESCRIPTION**

FIG. **1** is a front three-quarter perspective view embodying our new design;
FIG. **2** is a front elevation view;
FIG. **3** is a an enlarged front elevation view of the top portion of the inside panel shown for ease of illustration;
FIG. **4** is a an enlarged front elevation view of the bottom portion of the inside panel shown for ease of illustration; and,
FIG. **5** is a front elevation view as shown in FIG. **2** with the door shown in closed position.

**1 Claim, 5 Drawing Sheets**



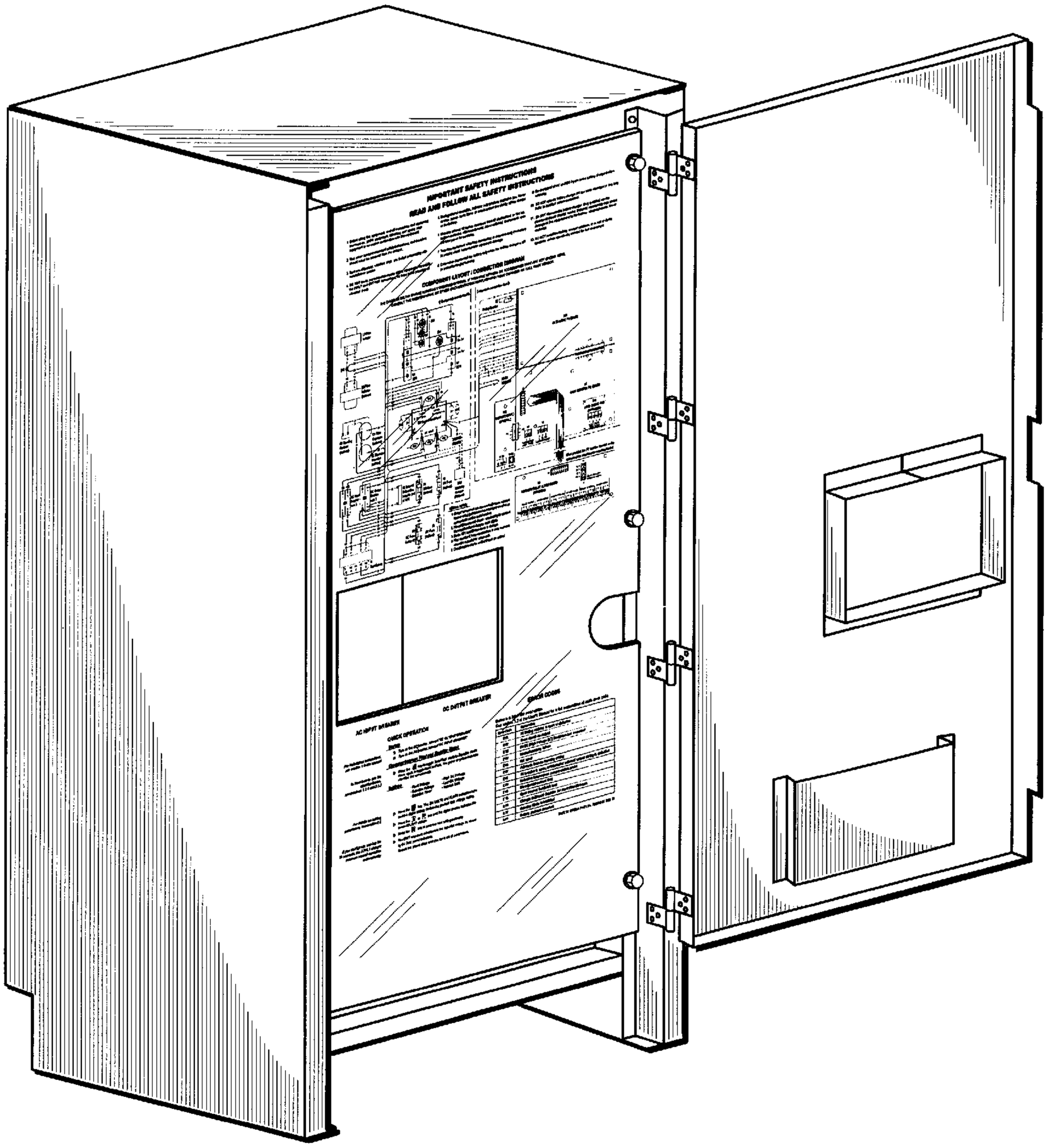

IMPORTANT SAFETY INSTRUCTIONS
READ AND FOLLOW ALL SAFETY INSTRUCTIONS
COMPONENT LAYOUT / CONNECTION DIAGRAM
AC INPUT BREAKER
DC OUTPUT BREAKER
QUICK OPERATION
ERROR CODES

FIG. 1

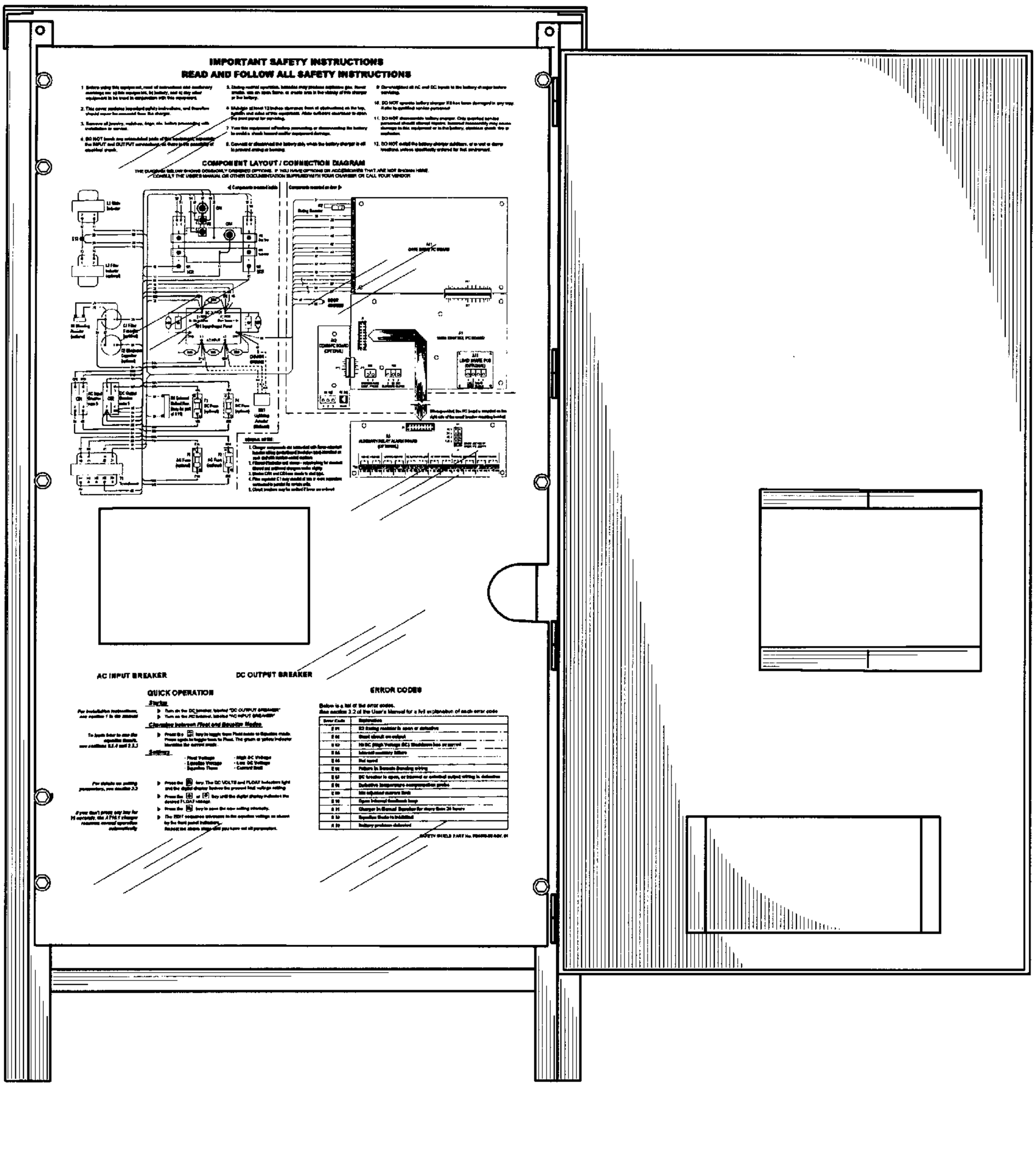

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FIG. 2

FIG. 3

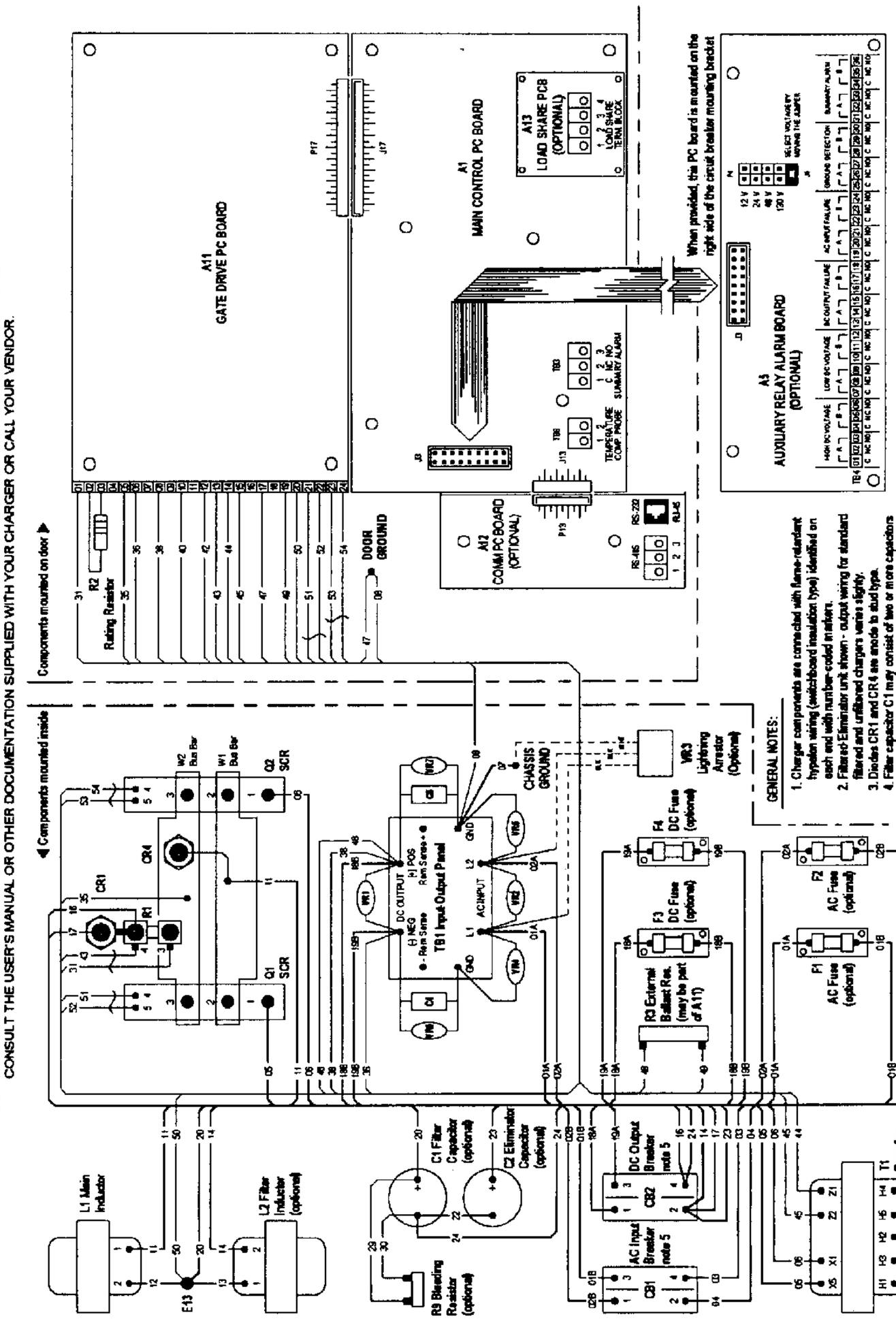
# IMPORTANT SAFETY INSTRUCTIONS

## READ AND FOLLOW ALL SAFETY INSTRUCTIONS

1. Before using this equipment, read all instructions and cautionary markings on: a) this equipment, b) battery, and c) any other equipment to be used in conjunction with this equipment.
2. This cover contains important safety instructions, and therefore should never be removed from the charger.
3. Remove all jewelry, watches, rings, etc. before proceeding with installation or service.
4. DO NOT touch any uninsulated parts of this equipment, especially the INPUT and OUTPUT connections, as there is the possibly of electrical shock.
5. During normal operation, batteries may produce explosive gas. Never smoke, use an open flame, or create arcs in the vicinity of this charger or the battery.
6. Maintain at least 12 inches clearance from all obstructions on the top, bottom and sides of this equipment. Allow sufficient clearance to open the front panel for servicing.
7. Turn this equipment off before connecting or disconnecting the battery to avoid a shock hazard and/or equipment damage.
8. Connect or disconnect the battery only when the battery charger is off to prevent arcing or burning.
9. De-energized all AC and DC inputs to the battery charger before servicing.
10. DO NOT operate battery charger if it has been damaged in any way. Refer to qualified service personnel.
11. DO NOT disassemble battery charger. Only qualified service personnel should attempt repairs. Incorrect reassembly may cause damage to this equipment or to the battery, electrical shock, fire or explosion.
12. DO NOT install the battery charger outdoors, or in wet or damp locations, unless specifically ordered for that environment.

## COMPONENT LAYOUT / CONNECTION DIAGRAM

THE DIAGRAM BELOW SHOWS COMMONLY ORDERED OPTIONS. IF YOU HAVE OPTIONS OR ACCESSORIES THAT ARE NOT SHOWN HERE, CONSULT THE USER'S MANUAL OR OTHER DOCUMENTATION SUPPLIED WITH YOUR CHARGER OR CALL YOUR VENDOR.



**AC INPUT BREAKER** **DC OUTPUT BREAKER**

## QUICK OPERATION

### *Startup*

*For installation instructions, see section 1 in the manual*

- Turn on the DC breaker, labeled "DC OUTPUT BREAKER"
- Turn on the AC breaker, labeled "AC INPUT BREAKER"

### *Changing between Float and Equalize Modes*

*To learn how to use the equalize timers, see sections 2.2.4 and 2.3.3*

- Press the [MODE] key to toggle from Float mode to Equalize mode. Press again to toggle back to Float. The green or yellow indicator identifies the current mode.

### *Settings*

- Float Voltage
- Equalize Voltage
- Equalize Timer
- High DC Voltage
- Low DC Voltage
- Current limit

*For details on setting parameters, see section 2.3*

- Press the [SET] key. The DC VOLTS and FLOAT indicators light. and the digital display flashes the present float voltage setting.
- Press the [▲] or [▼] key until the digital display indicates the desired FLOAT voltage.
- Press the [SET] key to save the new setting internally.
- The EDIT sequence advances to the equalize voltage as shown by the front panel indicators.

Repeat the above steps until you have set all parameters.

*If you don't press any key for 25 seconds, the AT10.1 charger resumes normal operation automatically*

## ERROR CODES

Below is a list of the error codes.
See section 3.2 of the User's Manual for a full explanation of each error code.

| Error Code | Explanation |
|---|---|
| E 01 | R2 Rating resistor is open or defective |
| E 02 | Short circuit on output |
| E 03 | HVDC (High Voltage DC) Shutdown has occurred |
| E 04 | Internal memory failure |
| E 05 | Not used |
| E 06 | Failure in Remote Sensing wiring |
| E 07 | DC breaker is open, or internal or external output wiring is defective |
| E 08 | Defective temperature compensation probe |
| E 09 | Misadjusted current limit |
| E 10 | Open internal feedback loop |
| A 01 | Charger in Manual Equalize for more than 24 hours |
| A 02 | Equalize Mode is inhibited |
| A 03 | Battery problem detected |

SAFETY SHIELD PART No. FB5003-00 REV. 01

FIG. 4

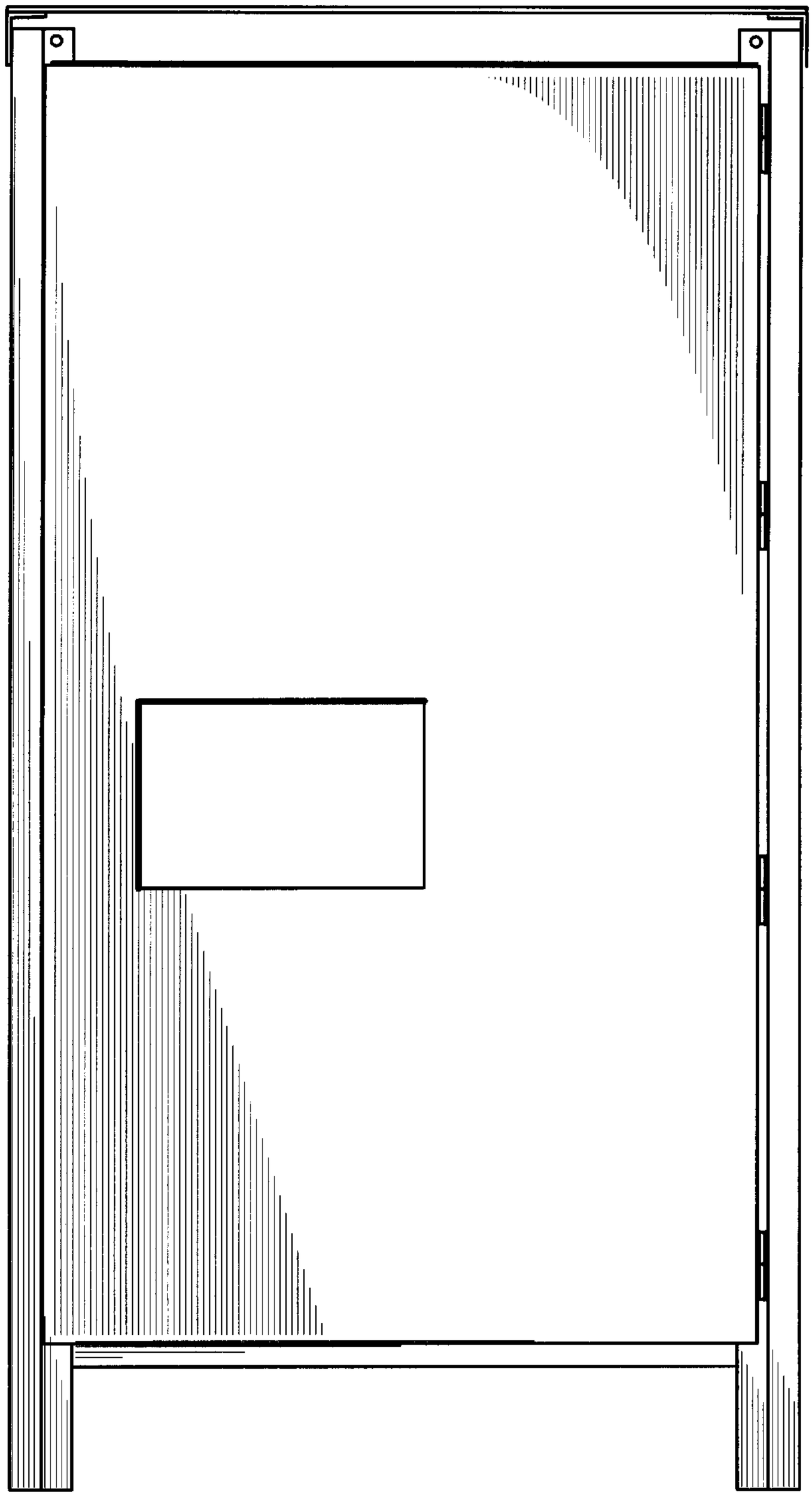


FIG. 5