CPC

COOPERATIVE PATENT CLASSIFICATION

H ELECTRICITY

H02 GENERATION; CONVERSION OR DISTRIBUTION OF ELECTRIC POWER

H02B BOARDS, SUBSTATIONS, OR SWITCHING ARRANGEMENTS FOR THE SUPPLY OR DISTRIBUTION OF ELECTRIC POWER

(basic electric elements, their assembly, including the mounting in enclosures or on bases, or the mounting of covers thereon, see the subclasses for such elements, e.g. transformers H01F, switches, fuses H01H, line connectors H01R; installation of lines, cables, or other conductors for supply or distribution H02G)

NOTE

This subclass covers boards, switchyards, switchgear or their installation, or the association of switching devices with each other or with other devices, e.g. transformers, fuses, meters or distribution boards; such associations constitute substations or distribution points.

WARNING

In this subclass non-limiting references (in the sense of paragraph 39 of the Guide to the IPC) may still be displayed in the scheme.

1/00 Frameworks, boards, panels, desks, casings; Details of substations or switching arrangements

NOTE

In groups H02B 1/01 to H02B 1/56, the last place priority rule is applied, i.e. at each hierarchical level, in the absence of an indication to the contrary, classification is made in the last appropriate place.

1/01 . Frameworks
1/011 . {Open support bases}
1/012 . {Details of mechanical connections}
1/013 . {Profiles for cabinet frames}
1/014 . {Corner connections for frameworks}
1/015 . Boards, panels, desks; Parts thereof or accessories therefor

2001/0155 . . {Removable shutters for non-used openings}
1/03 . . for energy meters
1/04 . . Mounting thereon of switches or of other devices in general, the switch or device having, or being without, casing
1/041 . . . {Mechanical coupling for side-by-side mounted apparatus}
1/042 . . . {Mounting on perforated supports by means of screws or locking members}
1/043 . . . . . {the perforated support having openings distributed according to a pattern}
1/044 . . . Mounting through openings
1/048 . . . . Snap mounting
1/052 . . . . Mounting on rails
1/0523 . . . . . {locked into position by a sliding member}
1/0526 . . . . . {locking or releasing devices actuated from the front face of the apparatus}
1/056 . . . . Mounting on plugboards
1/0565 . . . . . {by means of an adapter carrying one or more apparatuses (holders with sockets H01R 33/00)}
1/06 . . having associated enclosures, e.g. for preventing access to live parts (shutters or guards for contacts H02B 1/14)
1/063 . . . . {with tamper resistant sealing device}
1/066 . . . . {with hinged covers (covers for distribution boxes H02G 3/14)}
1/14 . Shutters or guards for preventing access to contacts (shielding of isolating-contacts in withdrawable switchgear H02B 11/24)
1/16 . Earthing arrangements (earthing arrangements for substations H02B 5/01, for switchgear H02B 11/28, H02B 13/075; earth plates, pins, or other contacts H01R 4/66)
1/18 . Disposition or arrangement of fuses (for switchgear having a withdrawable carriage H02B 11/26)
1/20 . Bus-bar or other wiring layouts, e.g. in cubicles, in switchyards (installations of bus-bars H02G 5/00)
1/202 . . . {Cable lay-outs}
1/205 . . . {for connecting electrical apparatus mounted side by side on a rail}
1/207 . . . . {Cross-bar layouts}
1/21 . Bus-bar arrangements for rack-mounted devices with withdrawable units
1/22 . . Layouts for duplicate bus-bar selection
1/24 . Circuit arrangements for boards or switchyards (devices for displaying diagrams H02B 15/00; service supply H02J 11/00)
1/26 . Casings; Parts thereof or accessories thereof (adapted for a single switch H01H; enclosures for cables, lines or bus-bars H02G; distribution, connection or junction boxes H02G 3/08; casings in general H05K)
1/28 . . dustproof, splashproof, drip-proof, waterproof or flameproof
1/30 . . Cabinet-type casings; Parts thereof or accessories thereof
1/301 . . . {mainly consisting of a frame onto which plates are mounted}
Switchgear having carriage withdrawable for isolation

- Details
- Isolating-contacts, e.g. mountings, shieldings (shutters or guards for isolating contacts H02B 1/14, H02B 11/24; switch contacts H01H; line connectors in general H01R)
- Means for duplicate bus-bar selection (layouts for duplicate bus-bar selection H02B 1/22)
- Oil-tank lowering means associated with withdrawal mechanism
- Indicating electrical condition of gear; Arrangement of test sockets
- with isolation by horizontal withdrawal
- Withdrawal mechanism
- with interlock (interlock for switches in general H01H)
- truck type (H02B 11/127 takes precedence)
- drawer type (H02B 11/127 takes precedence)
- with isolation by vertical withdrawal
- having an enclosure
- wherein front of enclosure moves with carriage upon horizontal withdrawal subsequent to isolation
- Shutters or guards
- Arrangements of fuses, resistors, voltage arresters or the like

Earthing arrangements

Arrangements of switchgear in which switches are enclosed in, or structurally associated with, a casing, e.g. cubicle (in association with main transformer H02B 5/00, H02B 7/00; switchgear having carriage withdrawable for isolation H02B 11/00)

- [Electrical connection between switchgear cells]
- with resin casing
- with metal casing
- Safety arrangements, e.g. in case of excessive pressure or fire due to electrical defect (for buildings in general E04B 1/94; devices for opening or closing safety wings E05F 1/00; emergency protective circuit arrangements for distribution gear, e.g. bus-bar systems, or for switching devices H02H 7/22)
- Gas-insulated switchgear
- (for three phase switchgear)
- [comprising a vacuum switch (H02B 13/0352 takes precedence)]
- [Mounting of monitoring devices, e.g. current transformers]
- [Connections to in or out conductors (connectors in general H01R)]
- Details of casing, e.g. gas tightness (gas reservoirs for switches H01H 33/56)
- Features relating to the gas (selection of fluids for switches H01H 33/22)
- Means for detecting or reacting to mechanical or electrical defects (for switches H01H 9/50, H01H 33/26, H01H 33/53)
- (through monitoring changes of gas properties)
- Earthing arrangements
- with stone, brick or concrete casing

Supervisory desks or panels for centralised control or display (desks in general A47B)

- with mimic diagrams
- consisting of building blocks