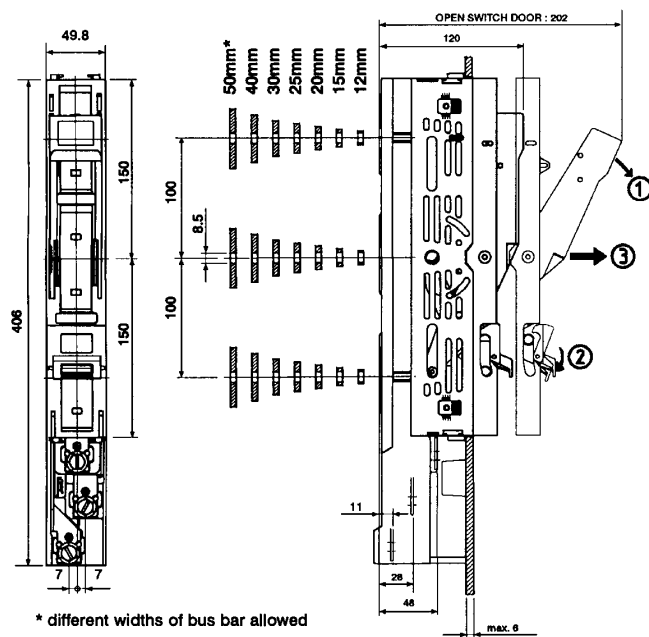


NH Vertical Fuse Switch Disconnecter

VLB

Size 00; 160A, 660V AC



Dimensional Drawing (mm):
direct mounting with screws.

CATALOG SYMBOL: VLB
NH VERTICAL FUSE SWITCH DISCONNECTOR
SIZE 00; 160A, 660V AC

Standards/

Approvals: IEC 947 and DIN43 620/1
Description: A Low Voltage Vertical Load Break Fuse Switch Disconnecter to take NH style Fuse Links in size '00'

Packaging: The items are individually packed.

Complies With: EN60 947-3

ASSEMBLY:

Switch Base

The switch base is isolated and touch protected (degree of protection IP2).

Base Body

The base body consists of glass fibre strengthened, thermically high stable and self extinguishing thermosetting plastics free from halogen. There are no metal parts except the current carrying contact system.

Contact System

The one-piece contact system with stainless steel springs, is corrosion resistant as well as torsion resistant. The copper contacts are nickel galvanized or on special order silver coated.

Protection Cover

The cover consists of glass fibre strengthened, thermically high stable and self extinguishing thermoplastics free of halogen. It is snapped into the base body and does not have to be removed for mounting.

Switch Door

In ON position a flexible lock arrests the attachable door of the vertical fuse switch.

In OFF position the door can be removed to change the fuse links.

Label and indicator of the fuse links can be seen through large windows placed in the switch door.

These shiftable windows are equipped with testing holes to check switching condition of the fuse links or voltage. After withdrawing the test leads the front degree of protection IP3 is again re-established.

The switch door can be sealed in closed position.

The switch door can be parked (parking position).

SWITCHING:

- Short circuit making (with NH fuse links)
- Load isolating capacity (AC 23)
- Touch protection

Part No.	Terminal Set	Switching Options
VLB00	3 Terminal screws M8	Triple pole parallel

NH Vertical Fuse Switch Disconnecter

VLB

Size 00; 160A, 660V AC

TECHNICAL DETAILS:

Weight:	1.6 kg
Size:	00
Number of poles/phases:	3
Conventional free air thermal current I_{th}:	160A
Conventional free air thermal current I_{th} with connecting knives:	250A
Rated operational voltage U_e:	400V AC; 500V AC; 660V (690)V AC; 440V DC
Rated operational current I_e:	160A 160A 100A 160A
Utilization category:	AC23B AC22B AC21B DC2B
Rated insulation voltage U_i:	1000V
Rated frequency:	42-65Hz
Degree of protection:	IP 2
Rated duty:	Uninterrupted duty
Rated impulse withstand voltage U_{imp}:	8kV
Rated short circuit making capacity I_{cm} with connecting knives:	17kA
Rated conditional short circuit current with fuse links:	50kA (400V AC) AC23B; 50kA (500V AC) AC22B; 35kA (660/690V AC) AC21B; 10kA (440V DC) DC22B
Rated short-time withstand current I_{cw} with connecting knives:	≥ 4.0 kA/1
Maximum power loss of fuse link:	12 W
Standard terminal: diameter of thread:	Metric 8
For bus bar with maximum width:	20mm
For cable lugs:	Maximum 1 x 70 ²
Ambient air temperature:	-25°C to +55°C

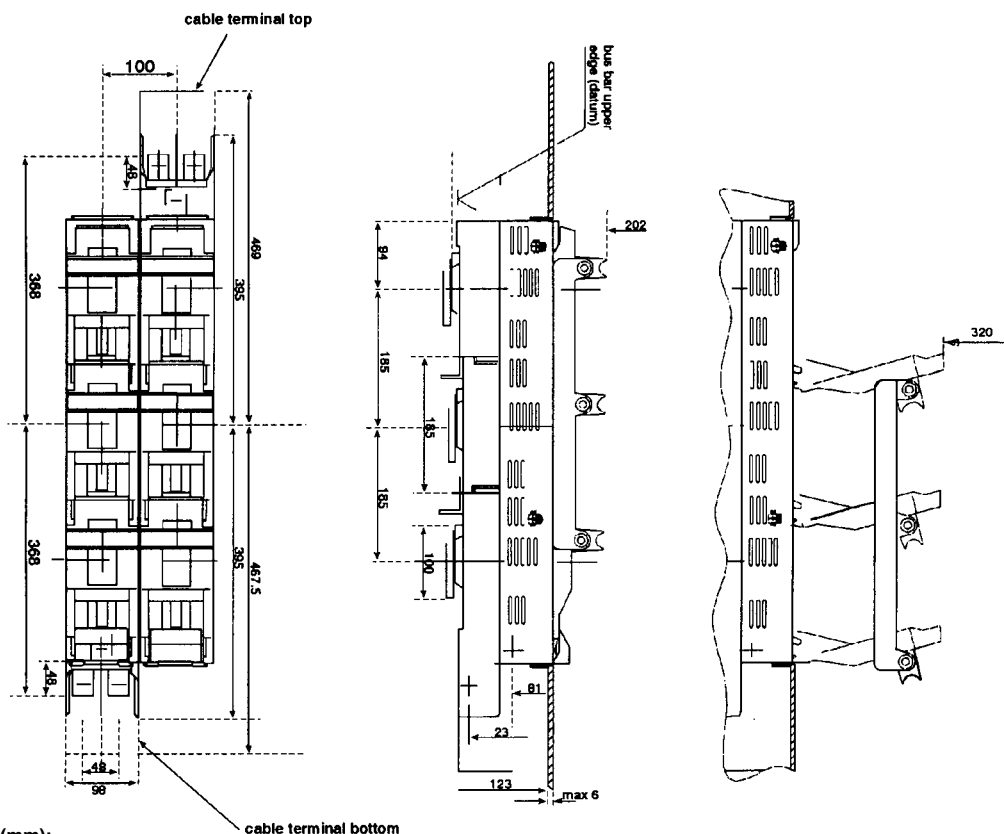
Advantages of Product:

- Symmetrical Switch (top/bottom terminals alternative on one switch).
- Insulated completely and touch protected according to EN 60947.
- Synthetics used are free of halogen and self extinguishing (VO according to UL94).
- Easy sealing of switch door without accessories.
- Park position of switch door.
- Indicating switch for door position.
- Direct mounting on bus bar system 100mm without drilling by usage of a forked clamp.
- Adaptable on bus bar system 60mm by using an adapter.
- Lateral shifted ventilation slots to avoid arc-overs to neighboring vertical switches.
- Minimized mounting time - for mounting only the door has to be removed.
- Life mounting possible.

NH Vertical Fuse Switch Disconnecter

VLB

Sizes 1, 2, & 3; 250A, 400A, & 630A, 660V AC



Dimensional Drawing (mm):

CATALOG SYMBOL: VLB
NH VERTICAL FUSE SWITCH DISCONNECTOR
SIZES 1, 2, & 3,
250A, 400A, & 630A
660V AC

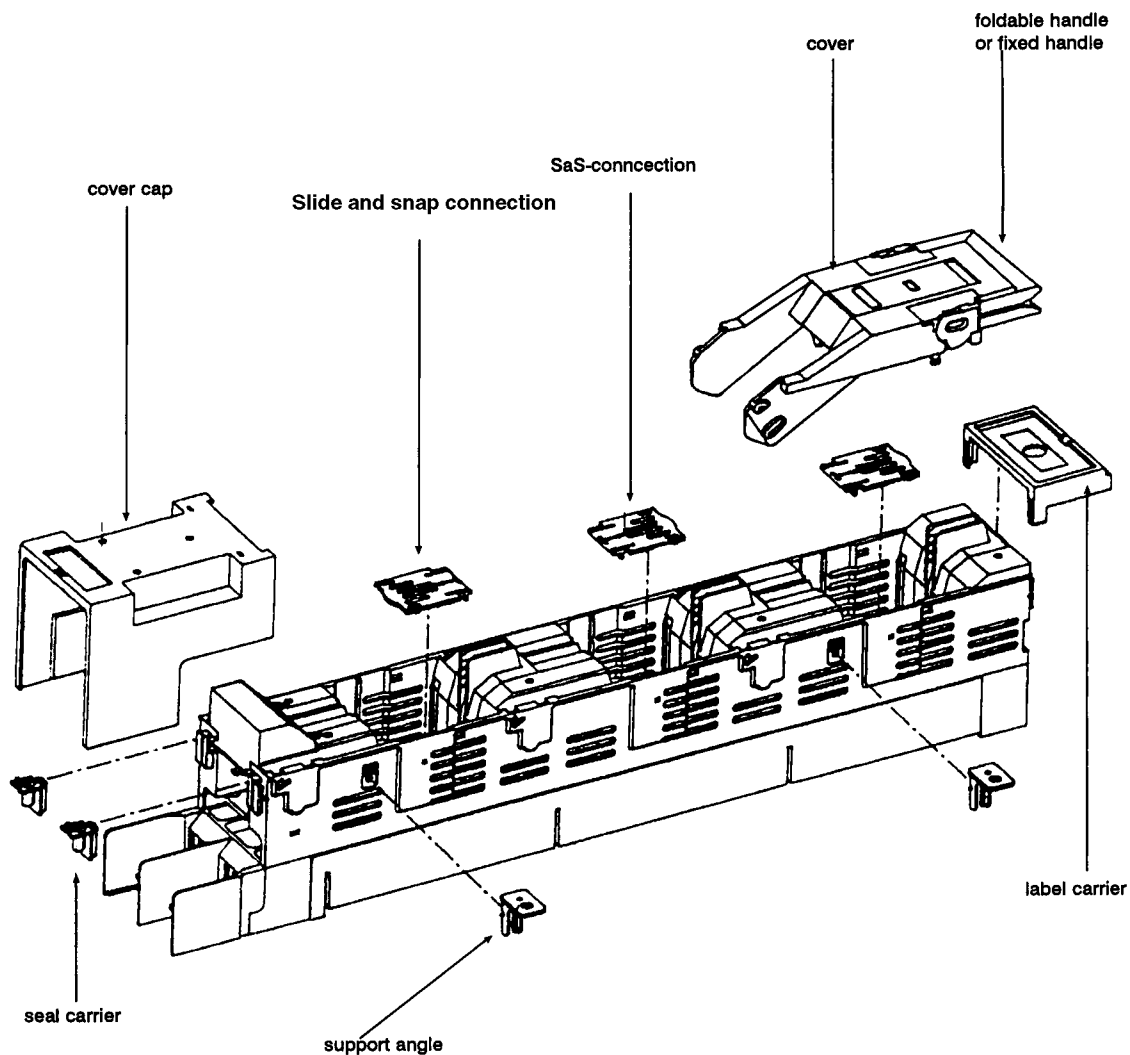
Standards/ Approvals: IEC 947-3 and DIN43 620/1
Description: A Low Voltage Vertical Load Break Fuse Switch Disconnecter to take NH style Fuse Links in sizes 1, 2, & 3
Packaging: The items are individually packed.
Complies With: EN60 947-3

Size	1	2	3
Nominal current thermal squared	250A	400A	630A
Permanent current with connecting knives	400A	630A	1000A
Nominal rating voltage AC	660 (690) V	660 (690) V	660 (690) V
Nominal insulating voltage	1000V	1000V	1000V
Insulating class	C	C	C
Rated frequency	45-62 Hz	45-62 Hz	45-62 Hz
Protection category	IP20	IP20	IP20
Rated impulse withstand voltage	12kV	12kV	12kV
Utilization category:			
AC 23B/ 400V, cos φ = 0.35	1250/2000A	2000/3200A	3150/5040A
AC 22B/500V, cos φ = 0.65	750A	1200A	1890A
AC 21B/660V (690V), cos φ = 0.95	375A	600A	745A
Dynamic short-circuit strength with fuse links	120kA	120kA	120kA
Fuse short circuit current	50kA	50kA	50kA
Nominal intermitted current (1s)	5000A	8000A	12600A

NH Vertical Fuse Switch Disconnecter

VLB

Sizes 1, 2, & 3; 250A, 400A, & 630A, 660V AC



Part Number	Terminal	Handle	Switching Possibility	Weight/kg
VLB1	Insert Nut M10	Fixed Handle	Triple-pole Switching (Parallel)	5
VLB2	Insert Nut M12	Fixed Handle	Triple-pole Switching (Parallel)	5
VLB3	Insert Nut M12	Fixed Handle	Triple-pole Switching (Parallel)	5.5

See BIF Document number 4173 for details of NH Fuse Links to fit this Fuse Switch.

The only controlled copy of this BIF document is the electronic read-only version located on the Bussmann Network Drive. All other copies of this BIF document are by definition uncontrolled. This bulletin is intended to clearly present comprehensive product data and provide technical information that will help the end user with design applications. Bussmann reserves the right, without notice, to change design or construction of any products and to discontinue or limit distribution of any products. Bussmann also reserves the right to change or update, without notice, any technical information contained in this bulletin. Once a product has been selected, it should be tested by the user in all possible applications.