

Prefabricated Concrete Compact Substations



SMK & SPK Type

SMK Series

Transformer and Distribution Kiosks

SMK series monoblock concrete transformer and distribution kiosks are manufactured up to 40.5 kV voltage level and 1600 kVA transformer power.

SMK series monoblock concrete kiosks are manufactured in accordance with type tests from internationally accredited laboratories, IEC 62271-202 standard and TEDAŞ-MLZ-2020-069 regulation.

SMK Series Monoblock Concrete Kiosks come in 2 different types.

- SMK-D Monoblock Concrete Distribution Kiosks (MV)
- SMK-T Monoblock Concrete Transformer Kiosks (MV-TR-LV)

Advantages

- Conformable design for every types of medium voltage switchgear
- Conformable design for every types of low voltage panel
- Special design suitable according to needs for doors and ventilation systems.
- Special applications for special projects
- Long operating life and high strength with C35 concrete
- Easy and reliable transport and commissioning
- IP23D protection class
- Compact design
- Easy and safe operation
- Long working life

Application Areas

- Power Distribution and Transmission
- Compensation Facilities
- Renewable Power
- Cement Plants
- Automotive Industry
- Iron and Steel Industry
- Rolling Mills
- Mining Plants

Service Conditions

- Altitude : 1000 m
- Ambient Temperature : -5...+50°C
- Ambient Pollution : High
- Max. Sun Radiation : 1000 W/m²
- Endurance for Earthquake : 0,5 g
(horizontal and vertical)



Rated Values

- Ur : up to 40,5 kV
- Ir : up to 1250 A
- Ik : up to 25 kA
- Fr : 50/60 Hz
- IAC : AB
- IP class : IP23D
- Compressive Strength Class : C35

Standards

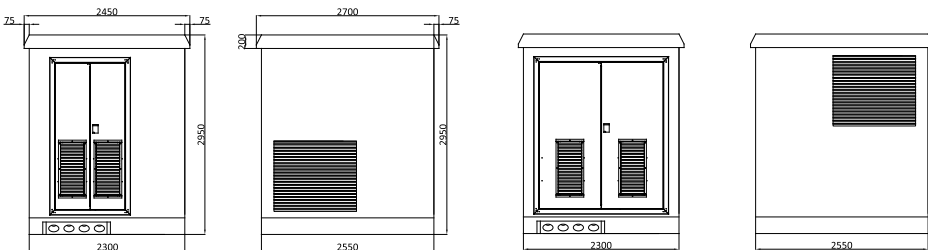
- IEC 62271-202
- IEC 62271-200
- IEC 60529
- IEC 60068-2-11
- IEC 60076-1
- IEC 61442
- IEC 61439-1

Dimensions

SMK 2,55

Outside Dimensions (WxDxH) : 2550 x 2300 x 2950 mm

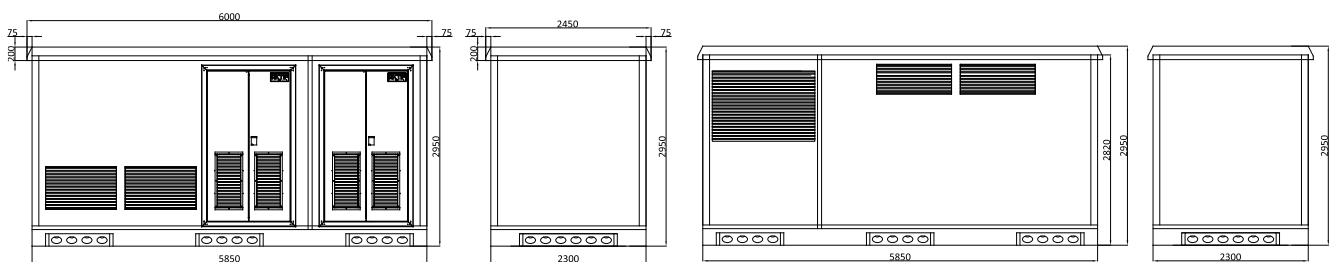
Inside Dimensions (WxDxH) : 2350 x 2100 x 2720 mm



SMK 5,85

Outside Dimensions (WxDxH) : 5850 x 2300 x 2950 mm

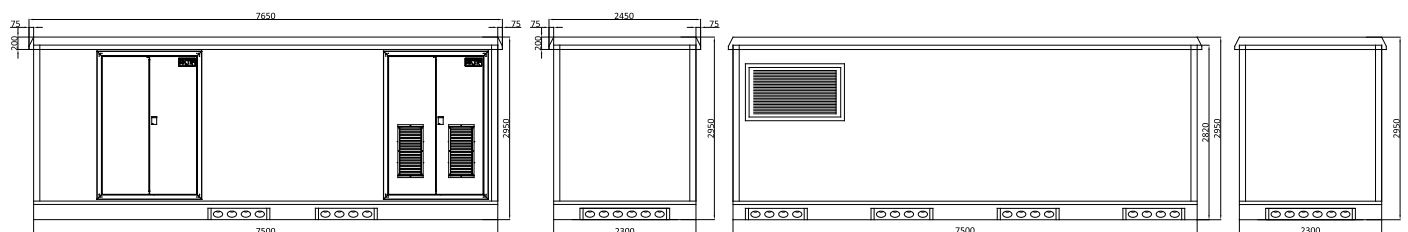
Inside Dimensions (WxDxH) : 5650 x 2100 x 2720 mm



SMK 7,5

Outside Dimensions (WxDxH) : 7500 x 2300 x 2950 mm

Inside Dimensions (WxDxH) : 7300 x 2100 x 2720 mm



SPK Series

Transformer and Distribution Kiosks

Prefabricated concrete transformer and distribution substations are manufactured up to 2500 kVA transformer power.

SPK series prefabricated concrete kiosks are manufactured in accordance with type tests from internationally accredited laboratories, IEC 62271-202 standard and TEDAŞ-MLZ/2000-052.A regulation.

SPK Series prefabricated concrete compact substations are 2 types;

- SPK-D Prefabricated Concrete Distribution Kiosks (MV)
- SPK-T Prefabricated Concrete Transformer Kiosk (MV-TR-LV)



Advantages

- Conformable design for every types of medium voltage switchgear
- Conformable design for every types of low voltage panels
- Special design suitable according to needs for doors and ventilation systems.
- Special solutions applications for special projects
- Long operating life and high strength with C35 concrete
- Easy transport and commissioning
- IP23D protection class
- Compact design
- Easy and safe operation

Application Areas

- Power Distribution and Transmission
- Power Generation
- Renewable Power
- Cement Plants
- Automotive Industry
- Iron and Steel Industry
- Rolling Mills
- Mining Plants

Service Conditions

- Altitude : 1000 m
- Ambient Temperature : -5 ... +50°C
- Ambient Pollution : High
- Max. Solar Radiation : 1000 W/m²
- Earthquake strength : 0,5 g
(horizontal and vertical)

Rated Values

- Ur : up to 40,5 kV
- Ir : up to 3150 A
- Ik : up to 40 kA
- Fr : 50/60 Hz
- IAC : AB
- IP class : IP23D
- CL : 10
- Compressive Strength Class : C35

Standards

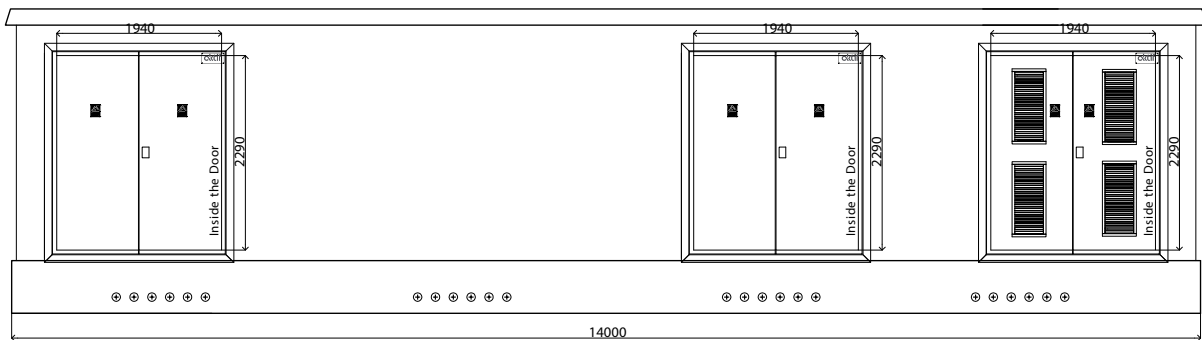
- IEC 62271-202
- IEC 62271-200
- IEC 60529
- IEC 60068-2-11
- IEC 60076-1
- IEC 61442
- IEC 61439-1

Dimensions

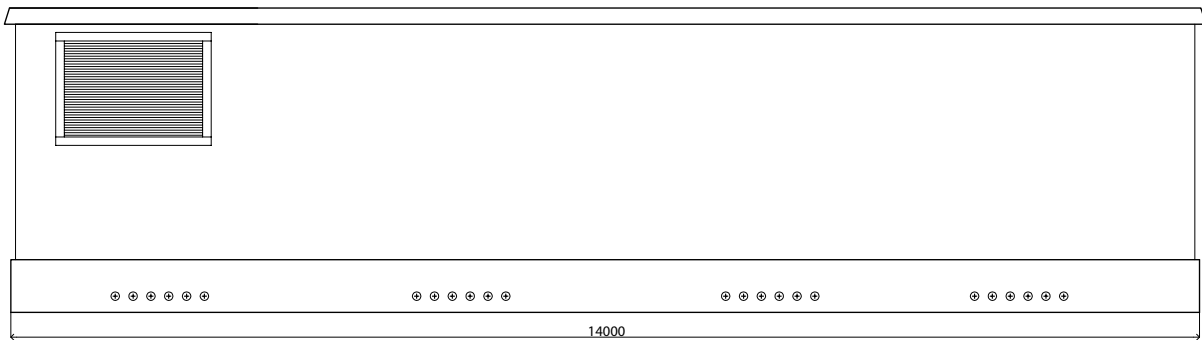
SPK Kiosks are statically calculated up to 30.000 mm. (Minimum length of a medium voltage switchgear room is 4000 mm and grows with 2000 mm intervals according to TEDAS- MLZ/2006-052.A)

SPK Series Model	Outside Dimensions (mm)		Inside Dimensions (mm)		
	Length	Depth	Length	Depth	Height
PB5	Requested from customer	4090	Requested from customer	3800	3655
PB6	Requested from customer	< 5290	Requested from customer	< 5000	3655

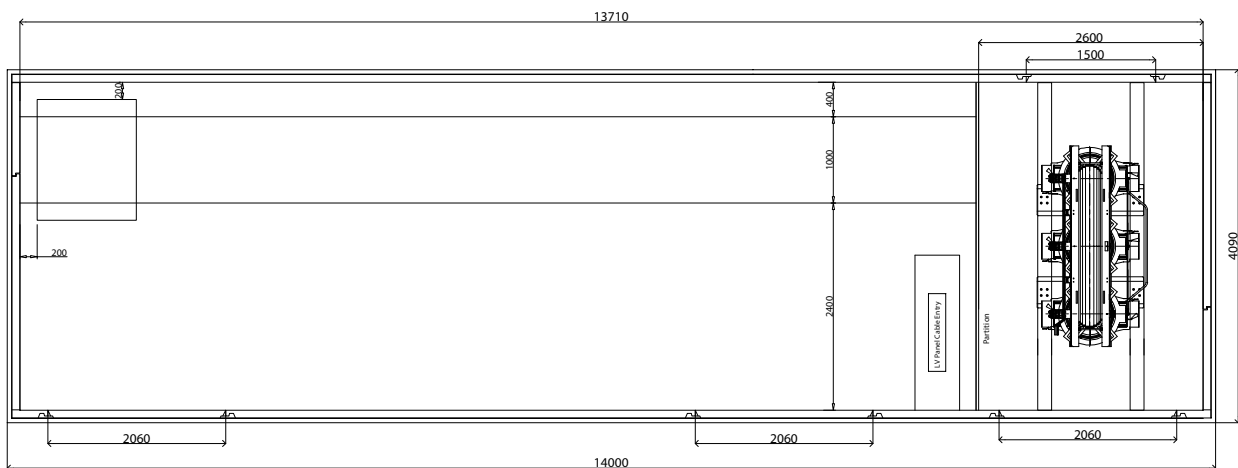
Example for PB5 Design



Front view



Rear view





Headquarters

Bayraktar Bul. Şehit Sk. No: 5
34775 Ümraniye, İstanbul, TR
Phone : +90 (216) 314 93 20
Fax : +90 (216) 314 93 60
www.aktif.net - info@aktif.net



Germany Office

Bahnhofstrasse 82-86
35390 Giessen, Germany
Phone : +49 176 60940534
www.aktif.net
info.de@aktif.net



HV Factory

Akşemsettin Mah. Çatalca Sk. No: 11,
06930 Sincan, Ankara, TR
Phone : +90 (312) 269 46 02
Fax : +90 (312) 269 45 01
www.aktif.net - info@aktif.net



LV Factory

Kargalı Hanbaba Organize Sanayi, 2. Sk.,
No: 5, Hendek, Sakarya, TR
Phone : +90 (264) 276 64 50
Fax : +90 (264) 276 64 52
www.aktif.net - info@aktif.net

