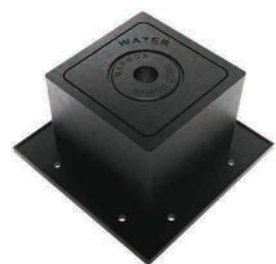




Manhole & Gully Covers



MANHOLE AND GULLY COVERS



HEAVY DUTY MANHOLE COVERS MEETING ALL INTERNATIONAL REGULATIONS

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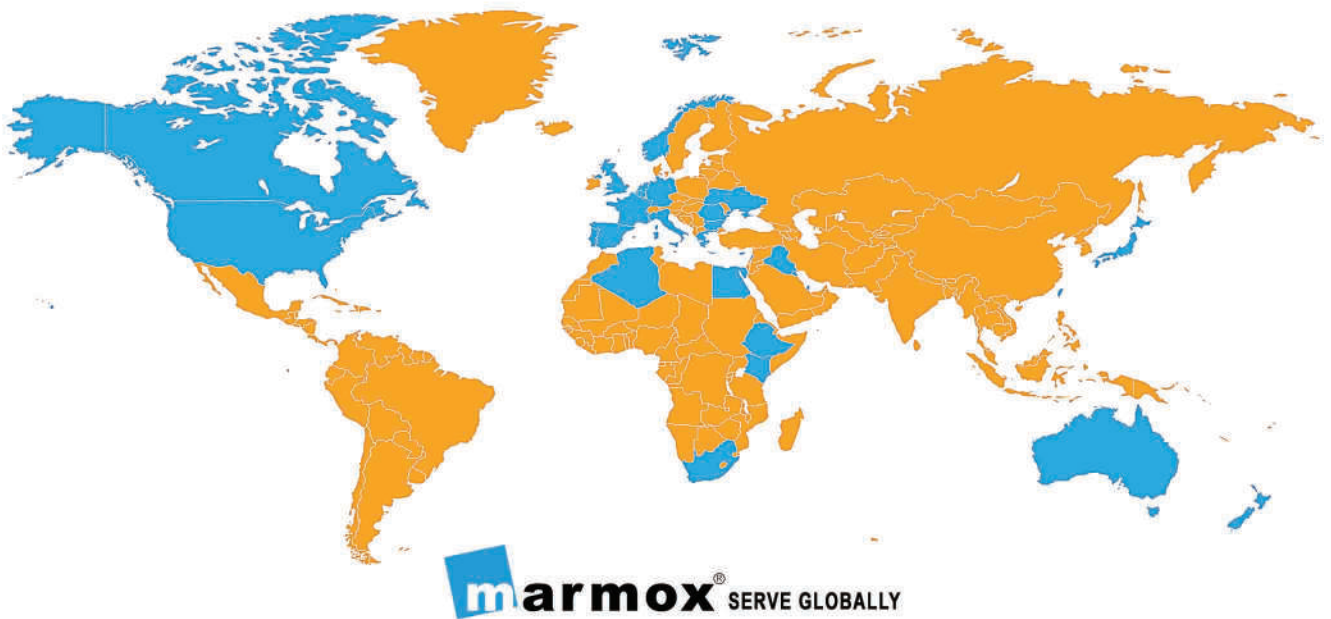
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Company Profile:

marmox, a part of the CMB Group (Chemicals for Modern Building), is an Egypt-based company with a multinational sales network. For over three decades, **marmox** has been serving its valued customers and is proud to rank amongst the leading manufacturers and suppliers of construction materials.

We specialize in the production of innovative, high quality, cost-effective and user-friendly products. Our aim is to provide professional builders, traders and the general public alike with quality products and services, improving the efficiency and the standard of building materials.



Exporting to over 30 countries, we have an established and continuously developing market for our products.

marmox® Manhole and Gully Cover:

The ever-increasing traffic density and the loading requirements of public streets have led to a growing demand for improved quality of manhole covers.

Due to the rise of steel prices over the last years, together with high risk of theft, steel is no longer a viable solution for manhole covers. After a long and intensive research, the **marmox** Co., ISO 9001 certified, has developed an innovative product for manhole covers. This product is based on a newly developed high strength reinforced acrylic concrete.

marmox Manhole Covers exceed conventional solutions in strength, durability, corrosion resistance and accuracy. These covers meet all international specifications (all classes) and are available in standard sizes as well as customized to order.



marmox® Distinctive Advantages:



Cost Effectiveness



Environmentally Friendly



Corrosion Resistance



Impact Resistance



Customization



Permeability of
Electromagnetic Waves



Electric Insulation



Theft Prevention

Technical Specifications of **marmox**® GRP Material:



Bending Strength
DIN 1164
300 (±5%) Kg/cm²



Tensile Strength
DIN 53455
150 (±5%) Kg/cm²



Compressive Strength
DIN 1164
900 (±5%) Kg/cm²



Modulus of Elasticity
DIN 53457
2.5 x 10⁵ Kg/cm²



Surface Hardness
DIN 53505
≥ 35



Density
DIN 53479
2.4 (±5%) g/cm³



Impact Resistance
ISO 3127
No Effect



Water Absorption
DIN 53495
< 0.3 %



Environmental Aspects
-
Environmentally Friendly



Ignition Wt Loss test
ASTM D 2584
≤ 15 %



Fire Resistance
DIN 4102
A2



Linear Thermal Coeff. of Expansion
DIN VDE 0304/1
1.5 x 10⁻⁵ /1° C



Highly Chemical Resistive
Test report for each property
is available upon request.

Certificates:

The image displays three certificates related to Marmox Egypt's products and quality management system.

- Eurocert Certificate:** Certifies the company MARMOX EGYPT, located at the South Village, Industrial Zone, Wadi El Natou, Elshihra, Egypt. It states that the company implements a Quality Management System according to the Standard EN ISO 9001:2015. The certificate is valid for the following scope of certification: Manufacturing of: Marmox (Sinks, Windows Sills, Counter Tops and Polypropylene), Marmox Manhole Covers, Flange Elements, Marmox Shower Trays, Marmox Shower Liners, Under Floor Overlay Boards. (Factory 1); Marmox Basins (Factory 2); Marmox Thermolocks (Factory 3); Marmox Composite Inverters, Marmox Shower Systems. (Factory 4).
- HBRC Verification of Compliance:** Issued to Marmox Egypt, No. 1003. It certifies that the products (Composite Manhole Covers) demonstrated compliance with EN 124:2015-5. The certificate is valid from 18 September 2022 until 18 September 2023, and is subject to satisfactory annual surveillance audits. The certificate is issued on a voluntary basis.
- National Organization for Potable Water & Sanitary Drainage:** A certificate of approval for the use of Marmox products in water supply and sanitary drainage systems, issued by the Egyptian Standards Association (EGS).

In-process Control and Final Inspection:

The tests are a regular internal step in our production process in order to ensure the quality and safety of all our products manufactured in different sizes and types. **marmox** manhole covers comply with European Standard **EN 124:2015-5**.



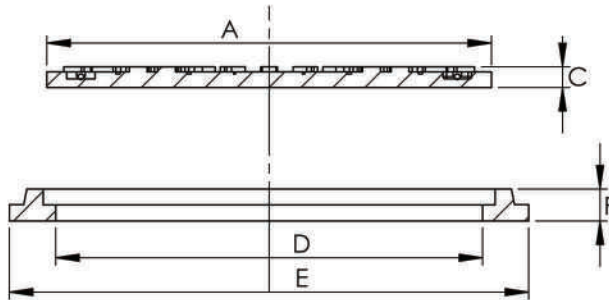
A15

EN124

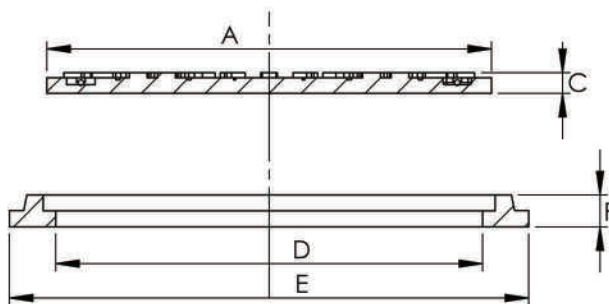
Areas which can only be used by pedestrians and pedal cyclists.



Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
A15 RD 600	Ø 630	22	Ø 600	Ø 735	45



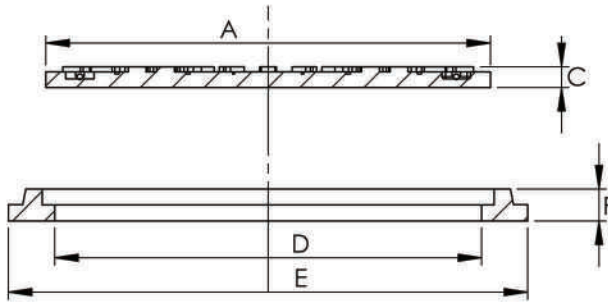
Description	Cover Dimensions (mm)		Frame Dimensions (mm)			
	A	C	D	E	F	
A15 SQ 200 x 200	205	20	170	270	40	
A15 SQ 300 x 300	300	20	275	390	45	
A15 SQ 400 x 400	400	20	375	450	50	
A15 SQ 500 x 500	500	20	475	550	45	
A15 SQ 600 x 600	625	22	600	735	45	
▶ A15 SQ 700 x 700	740	25	700	758	29	
▶ A15 SQ 800 x 800	840	25	800	858	29	
▶ A15 SQ 900 x 900	940	25	900	958	29	
▶ A15 SQ 1000 x 1000	990	25	950	1008	29	
A15 RC 600 x 900	630 x 930	25	600 x 900	720 x 1020	48	



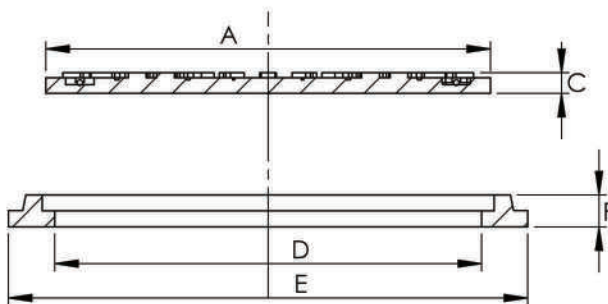
▶ ≡ Surface treated metal frame.



Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
B125 RD 600	Ø 630	45	Ø 600	Ø 735	65
B125 RD 800	Ø 790	50	Ø 760	Ø 880	75



Description	Cover Dimensions (mm)		Frame Dimensions (mm)			
	A	C	D	E	F	
B125 SQ 400 x 400	400	45	375	490	70	
B125 SQ 600 x 600	625	45	600	720	65	
▶ B125 SQ 700 x 700	740	50	700	760	55	
▶ B125 SQ 800 x 800	840	50	800	860	55	
▶ B125 SQ 900 x 900	940	50	900	960	55	
▶ B125 SQ 1000 x 1000	990	50	950	1010	55	
B125 RC 600 x 900	630 x 930	50	600 x 900	720 x 1020	70	



▶ ≡ Surface treated metal frame.

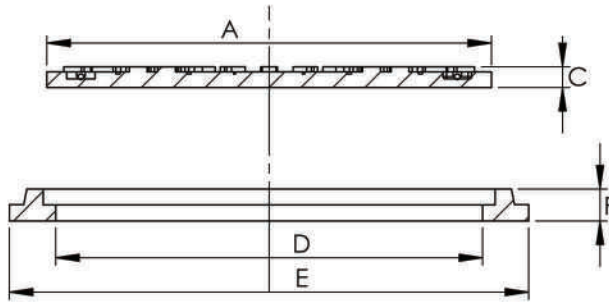
C250

EN124

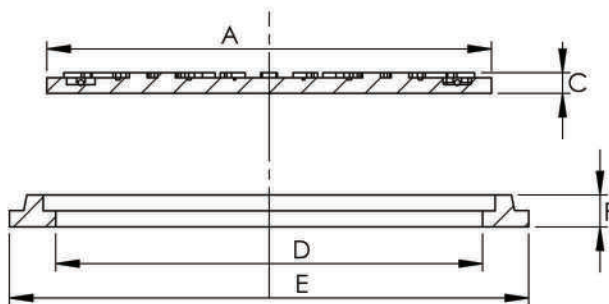
Installed in the area of kerbside channels of roads.



Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
C250 RD 600	Ø 630	60	Ø 600	Ø 740	85
C250 RD 760	Ø 730	60	Ø 700	Ø 830	85
C250 RD 800	Ø 790	60	Ø 760	Ø 880	85



Description	Cover Dimensions (mm)		Frame Dimensions (mm)			
	A	C	D	E	F	
C250 SQ 400 x 400	400	60	365	495	90	
C250 SQ 600 x 600	625	60	600	720	85	
▶ C250 SQ 700 x 700	740	60	700	760	65	
▶ C250 SQ 800 x 800	840	60	800	860	65	
▶ C250 SQ 900 x 900	940	60	900	960	65	
▶ C250 SQ 1000 x 1000	990	60	950	1010	65	
C250 RC 600 x 900	630 x 930	50	600 x 900	720 x 1020	70	



▶ ≡ Surface treated metal frame.

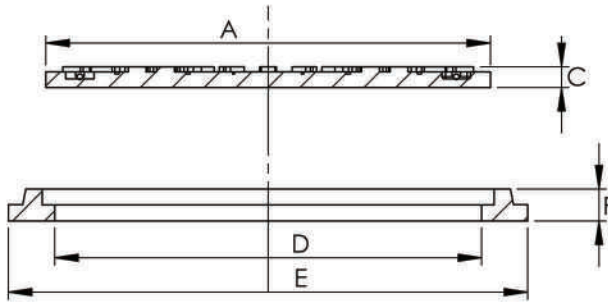
D400

EN124

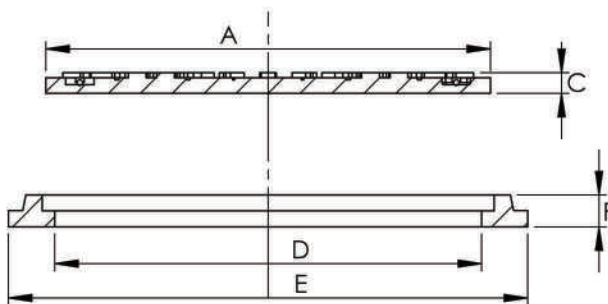
Carriageways of roads (including pedestrian streets), hard shoulders and parking areas, for all types of road vehicles.



Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
D400 RD 600	Ø 630	75	Ø 600	Ø 740	105
D400 RD 760	Ø 730	75	Ø 700	Ø 840	105
D400 RD 800	Ø 790	75	Ø 760	Ø 880	105



Description	Cover Dimensions (mm)		Frame Dimensions (mm)			
	A	C	D	E	F	
D400 SQ 600 x 600	625	75	600	720	100	
▶ D400 SQ 700 x 700	740	80	700	760	85	
▶ D400 SQ 800 x 800	840	80	800	860	85	
▶ D400 SQ 900 x 900	940	80	900	960	85	
▶ D400 SQ 1000 x 1000	990	80	950	1010	85	
▶ D400 RC 600 x 900	630 x 930	80	600 x 900	650 x 950	85	



▶ ≡ Surface treated metal frame.

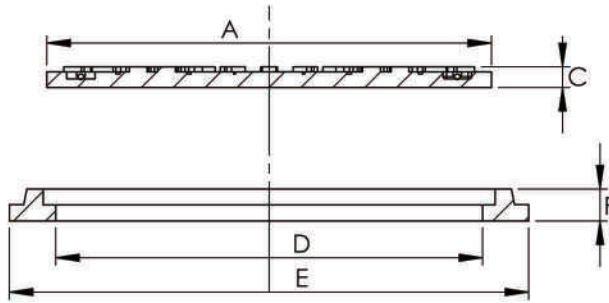
E600

EN124

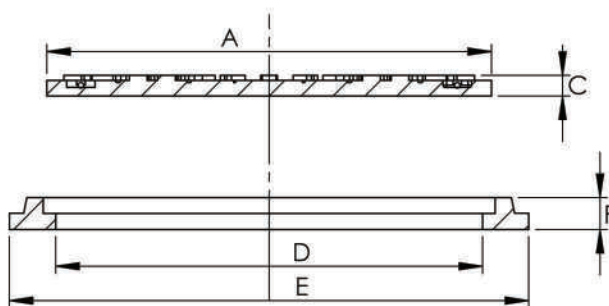
Areas imposing high wheel loads, e.g. docks, aircraft pavements.



Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
▶ E600 RD 600	Ø 650	100	Ø 600	Ø 730	132
▶ E600 RD 760	Ø 810	100	Ø 760	Ø 890	132
▶ E600 RD 800	Ø 850	100	Ø 800	Ø 930	132



Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
▶ E600 SQ 600 x 600	650	100	600	730	132
▶ E600 SQ 800 x 800	850	100	800	930	132
▶ E600 SQ 900 x 900	950	100	900	1030	132



▶ ≡ Surface treated metal frame.

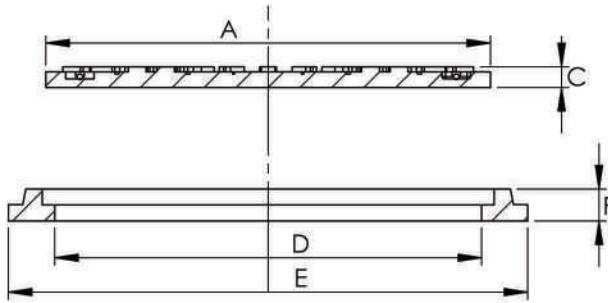
F900

EN124

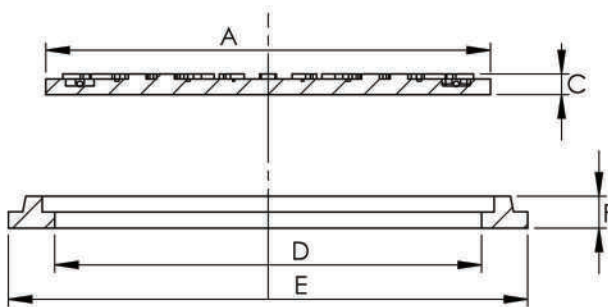
Areas imposing particularly high wheel loads,
e.g. aircraft pavements.



Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
▶ F900 RD 600	Ø 650	120	Ø 600	Ø 730	135
▶ F900 RD 760	Ø 810	120	Ø 760	Ø 890	135
▶ F900 RD 800	Ø 850	120	Ø 800	Ø 930	135

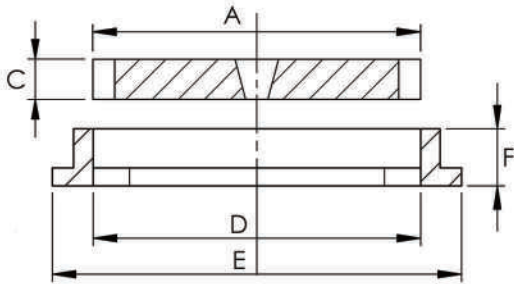


Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
▶ F900 SQ 600 x 600	650	120	600	730	135
▶ F900 SQ 800 x 800	850	120	800	930	135
▶ F900 SQ 900 x 900	950	120	900	1030	135

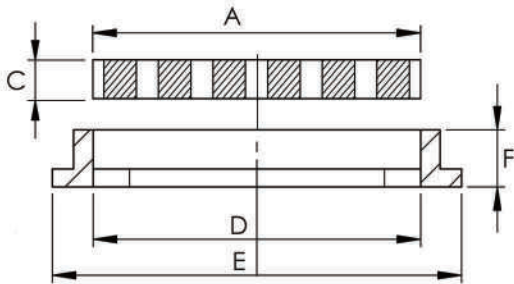


▶ ≡ Surface treated metal frame.

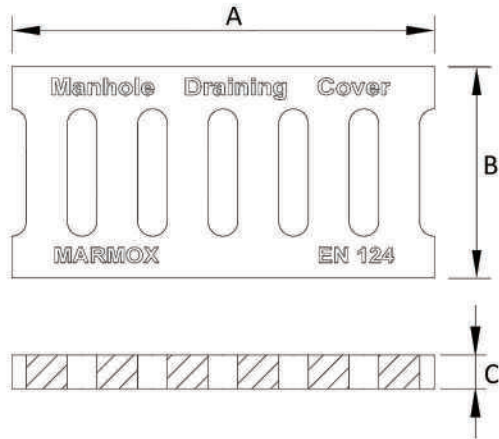
Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
DRG C250 RC 405 x 450	408 x 450	57	370 x 460	530 x 575	80
DRG C250 RC 600 x 600	625 x 625	75	600 x 600	720 x 720	100



Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	D	E	F
DRG C250 RC 400 x 600	430 x 590	60	400 x 600	550 x 715	85
DRG D400 RC 400 x 600	430 x 590	70	400 x 600	550 x 715	95



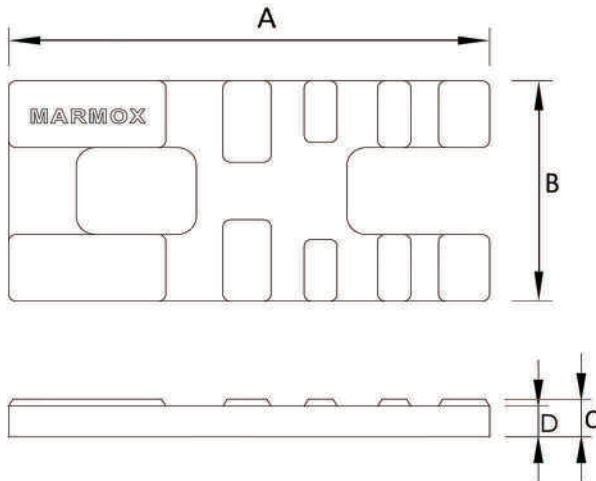
Description			Cover Dimensions (mm)		
			A	B	C
DRG COVER	A15 RC	105 x 490	490	105	20
DRG COVER	A15 RC	200 x 400	400	200	26
DRG COVER	A15 RC	200 x 490	490	200	20
DRG COVER	A30 RC	204 x 404	404	204	20
DRG COVER	B125 RC	150 x 590	590	150	35
DRG COVER	B125 RC	200 x 590	590	200	40
DRG COVER	B125 RC	226 x 590	590	226	35
DRG COVER	B125 RC	230 x 590	590	230	35
DRG COVER	B125 RC	300 x 590	590	300	35
DRG COVER	C250 RC	200 x 590	590	200	50
DRG COVER	C250 RC	230 x 590	590	230	50
DRG COVER	C250 RC	300 x 590	590	300	40
DRG COVER	C250 RC	388 x 588	588	388	60
DRG COVER	C250 RC	405 x 450	450	405	60
DRG COVER	C250 RC	600 x 600	600	600	75
DRG COVER	D400 RC	160 x 590	590	160	60
DRG COVER	D400 RC	200 x 590	590	200	60
DRG COVER	D400 RC	250 x 590	590	250	60
DRG COVER	D400 RC	388 x 588	588	388	70



STEP | Manhole steps to safely climb down manhole.

EN124

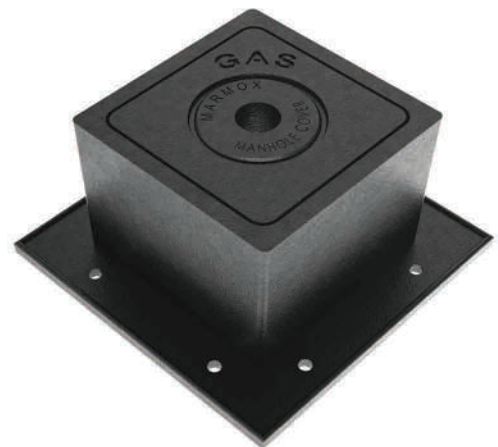
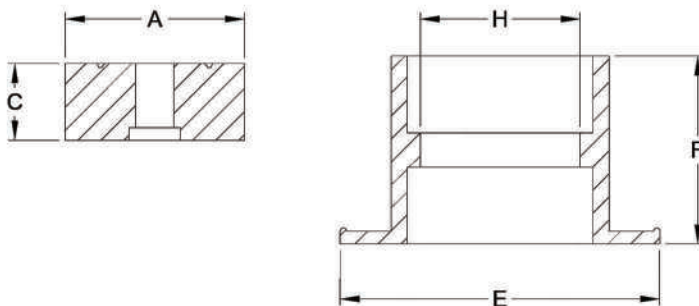
Description	Step Dimensions (mm)			
	A	B	C	D
A10 STEP 310 x 150	310	158	27	22
A30 STEP 310 x 150	315	158	47	40



GAS | For gas / water / irrigation valves on top of pedestrian streets, pedal cyclists and car parks.

EN124

Description	Cover Dimensions (mm)		Frame Dimensions (mm)		
	A	C	H	E	F
GAS B125 180 x 180	140	60	125	270	147
GAS B125 240 x 240	205	60	185	320	150



Optional Attachments:

Water Tight and Locking system











Lifting Tool



Opening Tool



Color Range of **marmox** Covers:

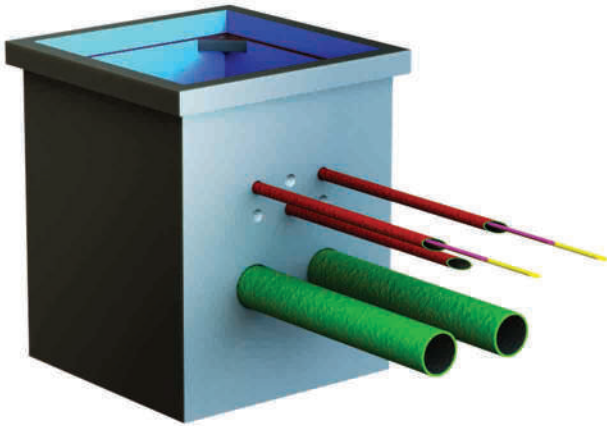
								
CODE:	100	101	102	103	104	105	106	111
COLOR:	BLACK	DARK GREY	LIGHT GREY	RED	GREEN	YELLOW	BEIGE	BLUE

Installation Guidance:

Follow the Correct instructions to ensure the efficiency of the product:

- The concrete around the frame is C20 or over, recommended C25.
- The size of the access hole is not more than the frame clear opening.
- The thickness of bedding mortar is over 20mm.
- Vehicles are not allowed to move on the cover before completing the installation stages.

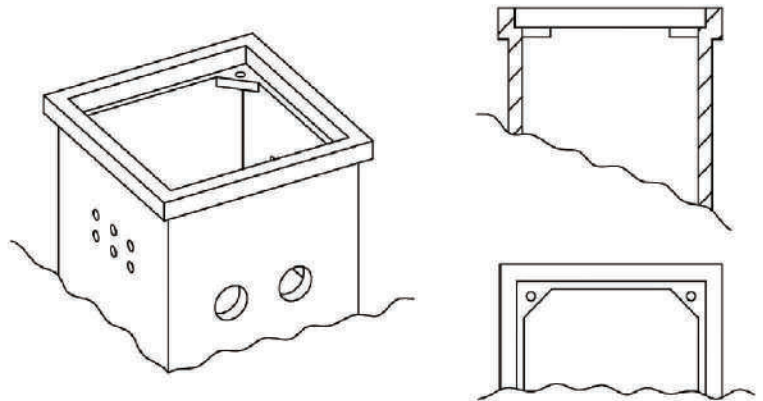
Marmox Handhole:



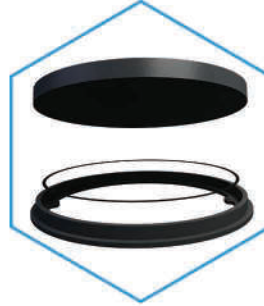
marmox – Handhole is a new product which launched to fulfil the requirements of the electrical utility, telecommunications, construction, transportation, and water utility industries.

These Handholes are produced as a single unit equipped with rubber sealant joint.

marmox – Handhole is made from GRP that meets the requirements of EN124:2015 & EOS 4207:2020 characterized by excellent mechanical & chemical properties as well as ease of installation; furthermore; it is much better in operation in comparison to other traditional concrete products.



	40 X 40 X 40	40 X 40 X 60	50 X 50 X 50	60 X 60 X 80	70 X 70 X 80
Description	Length x Width x Height (mm)				
Outer Dimensions	450 X 450 X 430	450 X 450 X 630	580 X 580 X 540	650 X 650 X 830	780 X 780 X 840
Inner Dimensions	400 X 400 X 400	400 X 400 X 600	500 X 500 X 500	600 X 600 X 800	700 X 700 X 800
Cover Dimensions	440 X 440 X 30	440 X 440 X 30	540 X 540 X 50	640 X 640 X 30	740 X 740 X 50
Load Class	A 15	A 15	B125	A 30	B125



marmox® Quality Policy

marmox® is committed to providing products and related services with a quality that meets the applicable requirements, customer satisfaction and complies with technical specifications at a competitive value.




For information and advice on our products and services:

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2022 – 2023

