



A monolithic drainage system designed to accept large volumes of rainwater to load class D400kN

# Contents

Product range		Loading category	Page
RECYFIX MONOTEC	Overview		3-5
	Features & Benefits		6-7
	Hydraulic capacity		8-9
	Exploded Drawing		10-11
	Step Fall		12-13
	-		
RECYFIX MONOTEC 100	Types 230, 280 & 380 channels	Class D400	14
	Accessories - Trash box Connection plates - Types 230, 280 & 380	Class D400 N/A	15
	Accessories - Inspection box Connection plates - Types 230, 280 & 380	Class D400 N/A	16
	End caps Further accessories – step fall adapters	N/A N/A	17
		·	
RECYFIX MONOTEC 200	Type 450 channel	Class D400	18
	Accessories - Trash box Connection plates - Type 450	Class D400 N/A	19
	Accessories - Inspection box Connection plates - Type 450 End caps	Class D400 N/A N/A	20-21
RECYFIX MONOTEC	Installation examples	N/A	24-25





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# **RECYFIX®**MONOTEC

Monolithic drainage system - lightweight and robust

### Lightweight for simple, fast and low-cost installation

- maximum stability with minimum weight
- significantly lighter than channels made of mineral material
- simple to transport, handle and install

1m 100mm channel = **7,8kg** 1m 200mm channel =**16,2kg** 



Simple processing

### **RECYFIX**<sup>®</sup> - corrosion free and extremely strong

- High-Tech-Material from renowned Plastic Research Institute
- permanently resistant to frost, de-icing salt and UV light
- extremely durable even with frequent traffic





Fast installation



Easy transport



100% corrosion free, especially in cases of frost and de-icing salt



Asphalt installation





Block paved installation



Concrete installation



Frequently trafficked area



Monolithic drainage system for heavily frequented traffic areas.

#### **1** Requirements

Monolithic drainage channels in traffic areas must:

- be permanently corrosion-resistant
- be secure against vandalism
- be maintenance-free and drain reliably
- satisfy aesthetic demands

#### 2

#### Application areas

- Parking areas
- Market places, public spaces
- School playgrounds
- Residential areas
- Gas stations
- Trafficked areas in trade and industrial sites

#### 3 Solutions

Therefore, RECYFIX MONOTEC channels are especially suitable for draining such surfaces:

- Lightweight ensuring simple processing for cost-effective installation
- Channel made of specially resistant recycled modified polypropylene
- Leak-proof and chemical-resistant
- Extremly robust
- Very quick to install

A selection of Hydraulic Performance tables for the most popular sizes of FASERFIX® and RECYFIX® channels including the RECYFIX® MONOTEC and RECYFIX® HICAP® ranges are available on request in an 8 page hard copy or PDF publication.

Hauraton channel drainage configurations are designed and sized using in-house **Hydraulic design software**. The accuracy of the software has been verified by physical testing of Hauraton systems within a hydraulic discharge test flume, replicating and evaluating hundreds of flow scenarios.

Hydraulic design software is also available free of charge to industry professionals. Intuitive and user friendly, **Hauraton Design Software** allows engineers to create drainage schemes for the company's range of civil engineering systems on tablets, desktop computers or through the internet (web-based application).

For smaller projects where a quick indication of the appropriate channel size and system is required for a given catchment area, Hauraton can provide their **Hydraulic Design App**.

For further details contact the Hauraton Technical Support Team





# **RECYFIX®**MONOTEC - Class D400kN

Features & Benefits

# 100% corrosion free

#### high hydraulic capacity

SPORT

- optimised inlet surface with composite corrosion free grating design
- high capacity with slim channel construction
- = Safety



#### low weight ensures easy handling on site

- significantly lighter than channels made of mineral material
- simple to transport and install one man lift
- = Time and cost savings







Fast installation

Easy transport

Simple processing

### 📕 hauraton

#### strong and durable

impact resistant to D400kN loadingsstrong elastic material











- high resistance to frost, de-icing salt and UV light
- withstands high temperature differences
- chemical-resistant

= Durability



#### low maintenance

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- cleaning the system is simplified via inspection box units
- durable high-quality appearance
- = Time and cost savings

# **RECYFIX** MONOTEC

Optimal hydraulic capacity through slim design.

The RECYFIX MONOTEC channel is made of highly resistant and unbreakable polypropylene. Therefore, a particularly slender design is possible which has a positive effect with regard to drainage capacity. The smallest model, with a nominal width of 100 mm and a height of 230 mm, already achieves a drainage cross-section of 190.5 cm<sup>2</sup>. Comparable channels, made from other materials, must have much thicker sidewalls which significantly reduces the drainage cross-section.

The RECYFIX MONOTEC Channel range consists of 3 heights with a nominal width of 100 mm and one model with a nominal width of 200 mm. Long-term practical tests and computer-aided simulations lead to the same result: The RECYFIX MONOTEC accumulates heavy rainfall, provides a sufficient backwater reserve and drains large surfaces safely and reliably.



#### **RECYFIX MONOTEC**

Nominal size	Height	Drainage cross-section	Volume/ Channel
100 mm	230 mm	190.5 cm <del>∲</del>	19.1 (
100 mm	280 mm	245.5 cm <del>∲</del>	24.6
100 mm	380 mm	355.5 cm <del>∲</del>	35.6
200 mm	450 mm	746.1 cm <del>∲</del>	74.6 1

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#### Maximum hydraulic capacity

The fiber-reinforced polypropylene material enables a slim channel design. As a result, a maximum hydraulic capacity is achieved.



245.5 cm<sup>2</sup>

NW 100, Type 230

NW 100, Type 280



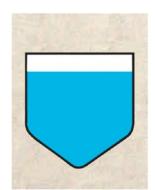
NW 100, Type 380



NW 200, Type 450



NW 200, Type 450



Lower drainage capacity, up to 45%, with monolithic channels made from other materials

#### **FIBRETEC** slotted grating: Proven to make progress

In 2010, HAURATON invented the FIBRETEC slotted grating. This grating is specially designed for maximum hydraulic performance. Optimized inlet radii ensure that the largest amount of water is led into the channel within the shortest time. More than one million channels sold expresses its great popularity. Deliberately, the design has now been transferred to the RECYFIX MONOTEC. Along with the enormous volume of the channel, a product with the highest hydraulic demands has emerged - the perfect combination of water intake, retention and drainage.



Testing at HAURATON Hydraulic Center in Budapest

FASERFIX® SUPER

FASERFIX® KS

FASERFIX® BIG SLG

FASERFIX® BIG BLS

SERVICE

# **RECYFIX** MONOTEC

Drainage system for traffic, parking and commercial areas.

RECYFIX MONOTEC channels meet the requirements of DIN EN 1433 and are suitable for the following load classes:

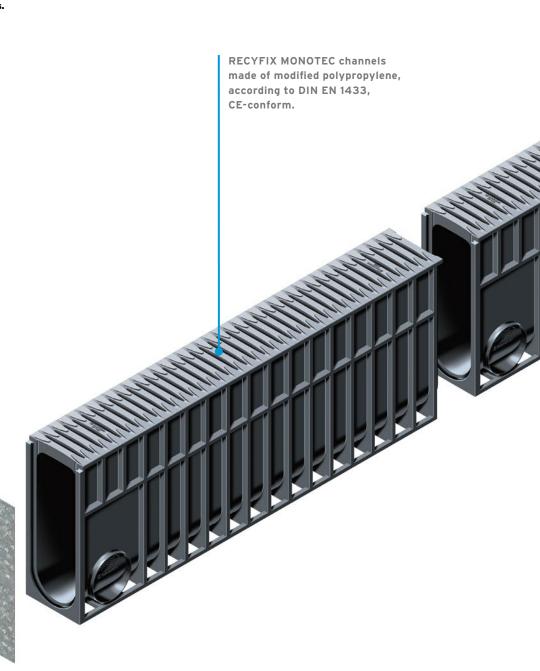


Category C 250, Load Class 250 kN



Category D 400, Load Class 400 kN

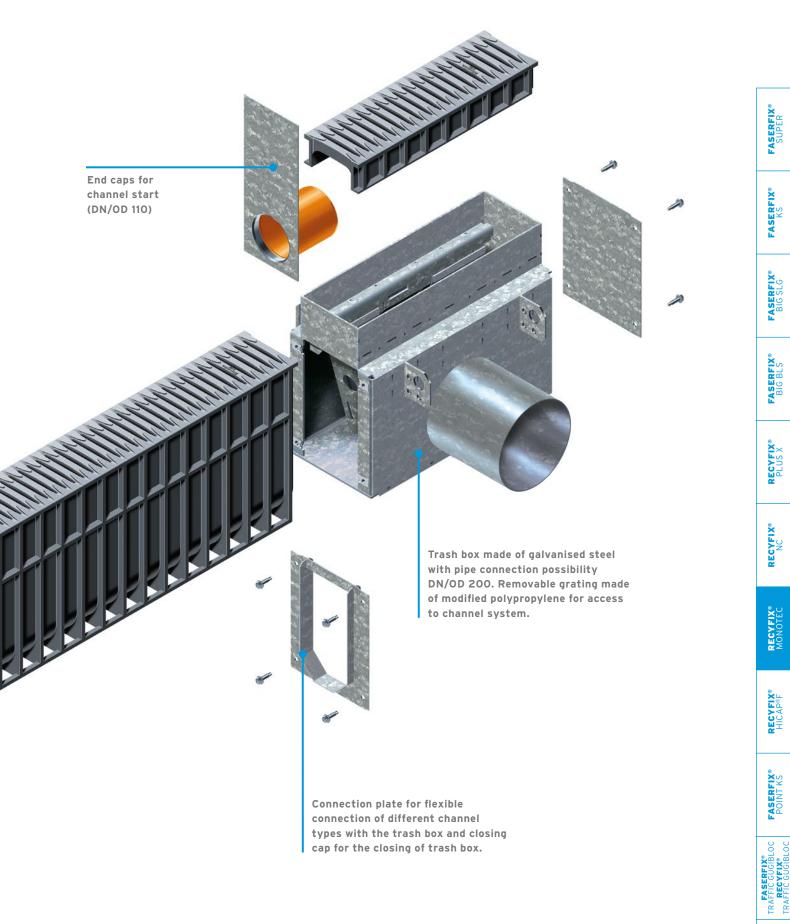
If in doubt, always select the higher class.



End caps for channel start (DN/OD 110)

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SERVICE



# **RECYFIX** MONOTEC Step Fall

Reliable hydraulic performance for channel runs with a stepped slope.

#### Installation with a stepped slope.

When **RECYFIX** MONOTEC channels are laid to a stepped construction, an artificial slope is created using channels of different heights. **RECYFIX** MONOTEC step fall adapters are used at the transition from one level to the next. They bridge the difference in height, ensuring that the water drains away smoothly.



FASERFIX<sup>®</sup> SUPER

FASERFIX® KS

FASERFIX® BIG SLG

FASERFIX® BIG BLS

RECYFIX® PLUS X

RECYFIX® NC

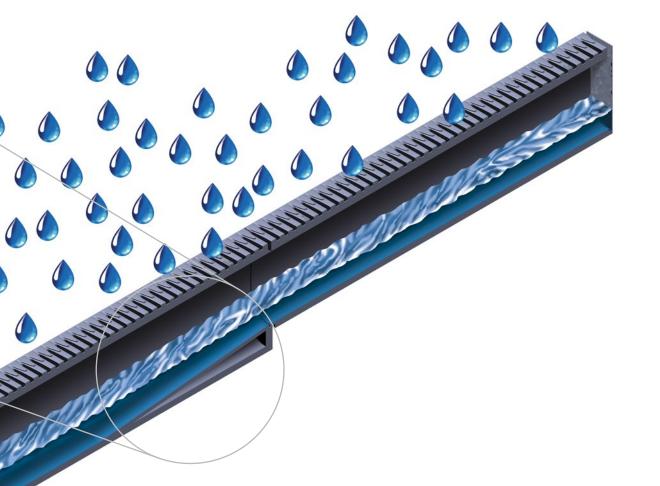
RECVFIX® MONOTEC

RECYFIX® HICAP®F

FASERFIX® POINT KS

FASERFIX® TRAFFIC GUGIBLOC RECYFIX® TRAFFIC GUGIBLOC

SERVICE



#### **RECYFIX** MONOTEC Step Fall Adapter, black, for channel runs with step fall



Step Fall Adapter for transition from type 230 to 280

Step Fall Adapter for transition from type 280 to 380

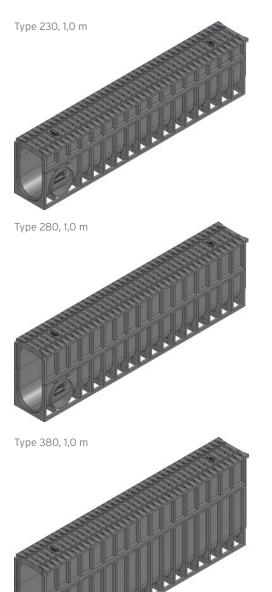
#### **RECYFIX** MONOTEC Channel 100:

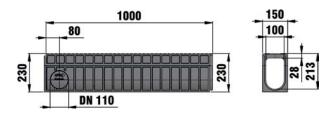


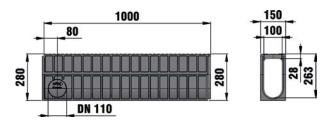
**RECYFIX** MONOTEC 100 Trash box

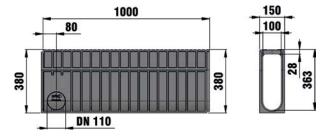
#### Monolithic channel

#### RECYFIX®MONOTEC 100, up to class D 400









	Length mm	Width mm	Height mm	Internal channel cross-sect. cm²	Intake cross-sect. cm²/m	Weight kg	ltem No.
Type 230, 1,0 m	1000	150	230	190	372	8,21	36000
Type 280, 1,0 m	1000	150	280	245	372	9,20	36005
Type 380, 1,0 m	1000	150	380	355	372	11,19	36015

#### Accessories

#### Trash boxes



Trash box with galvanised bucket



•

Connection plate with screw set, galvanised, channel type 230

Closing cap with screw set, galvanised, for trash box/inspection box

510

ł

392

588

**DN 200** 

	Length mm	Width mm	Height mm	Weight kg	ltem No.
Trash box with galvanised bucket	510	160	392	29,50	36045
Looking handle with screw for protection against vandalism	28	117	14	0,07	36098
Connection plate with screw set, galvanised, channel type 230	-	216	283	1,06	36032
Connection plate with screw set, galvanised, channel type 280	-	216	283	1,02	36037
Connection plate with screw set, galvanised, channel type 380	-	216	283	0,92	36047
Closing cap with screw set, galvanised, for trash box/inspection box	-	216	283	0,95	36023

160

C

228

8

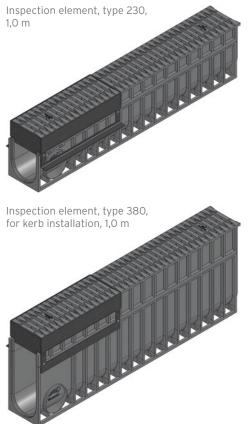
All trash and inspection boxes are factory-made with the end face open to enable a modular use for all application situations:
Option 1: one-sided channel connection: You will need 1 connection plate with the same channel height (= same type) and an closing cap.

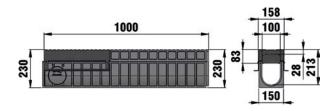
- Option 2: two-sided channel connection: You will need 2 connection plates with the same channel height (= same type).

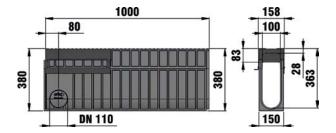
### **RECYFIX®**MONOTEC 100

#### Accessories

#### **NEW** Inspection elements







	Length mm	Width mm	Height mm	Internal channel cross-sect. cm²	Intake cross-sect. cm²/m	Weight kg	ltem No.
Inspection element, type 230, 1,0 m	1000	158	230	130	351	10,89	36062
Inspection element, type 280, 1,0 m	1000	158	280	185	351	11,79	36063
Inspection element, type 380, 1,0 m	1000	158	380	295	351	13,72	36065
Inspection element, type 230, for kerb installation, 1,0 m	1000	158	230	130	351	11,12	36066
Inspection element, type 280, for kerb installation, 1,0 m	1000	158	280	185	351	12,11	36067
Inspection element, type 380, for kerb installation, 1,0 m	1000	158	380	295	351	14,10	36069

End cap closed,

galvanised, type 280

#### End caps



galvanised, type 230



End cap with horizontal PVC-U pipe outlet DN/OD 110, galvanised, type 280

End cap with horizontal PVC-U pipe outlet DN/OD 110, galvanised, type 380

Width Height Length Weight ltem mm mm mm kg No. End cap closed, galvanised, type 230 150 224 0,53 36080 \_ 150 274 0,65 36082 End cap closed, galvanised, type 280 \_ End cap closed, galvanised, type 380 150 374 0,88 36086 -End cap with horizontal PVC-U pipe outlet DN/OD 110, galvanised, type 230 150 224 0,66 36090 \_ 36092 End cap with horizontal PVC-U pipe outlet DN/OD 110, galvanised, type 280 274 0,78 -150 End cap with horizontal PVC-U pipe outlet DN/OD 110, galvanised, type 380 150 374 1,01 36096

#### Further accessories



Step Fall Adapter for step slope, from type 230 to 280



Step Fall Adapter for step slope, from type 280 to 380

	Length mm	Width mm	Height mm	Weight kg	ltem No.
Step Fall Adapter for step slope, from type 230 to 280	510	125	113	0,48	36070
Step Fall Adapter for step slope, from type 280 to 380	510	125	163	0,59	36071
Universal sealant/adhesive Siga-Meltell® 320 black**	-	-	-	0,97	19051
Tubular pistol for universal sealant/adhesive Siga-Meltell® 320 black**	-	-	-	1,30	6891

\*\*Amount needed for Type 380: approx. 32 ml per joint



End cap closed, galvanised, type 380



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FASERFIX® SUPER

SERVICE CHANNEL

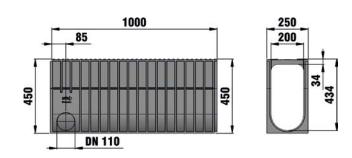
### **RECYFIX®**MONOTEC 200

#### Monolithic channel

Туре

#### **RECYFIX**<sup>®</sup>MONOTEC 200, up to class D 400





	Length mm	Width mm	Height mm		Intake cross-sect. cm²/m	Weight kg	ltem No.	
e 450, 1,0 m	1000	250	450	746	656	16,31	36215	

#### Accessories

#### Trash boxes

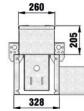


Trash box with galvanised bucket



Looking handle with screw for protection against vandalism







Connection plate with screw set, galvanised, channel type 450



Closing cap with screw set, galvanised, for trash box/inspection box

	Length mm	Width mm	Height mm	Weight kg	ltem No.
Trash box with galvanised bucket	510	260	497	42,70	36245
Looking handle with screw for protection against vandalism	-	206	120	0,24	36298
Connection plate with screw set, galvanised, channel type 450	-	316	283	1,18	36247
Connection plate with screw set, galvanised, for RECYFIX MONOTEC 100 type 380	-	316	283	1,55	36147
Closing cap with screw set, galvanised, for trash box/inspection box	-	316	283	1,50	36223

All trash and inspection boxes are factory-made with the end face open to enable a modular use for all application situations: - Option 1: one-sided channel connection: You will need 1 connection plate with the same channel height (= same type)

and an closing cap.

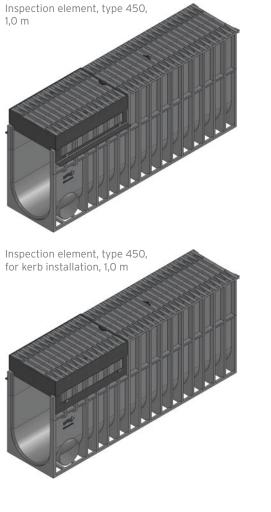
- Option 2: two-sided channel connection: You will need 2 connection plates with the same channel height (= same type).

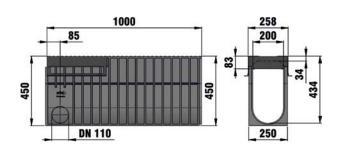


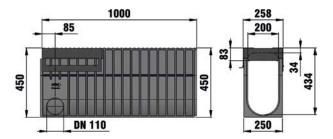
### **RECYFIX®**MONOTEC 200

#### Accessories

#### **NEW** Inspection elements







	Length mm	Width mm	Height mm	Internal channel cross-sect. cm²	Intake cross-sect. cm²/m	Weight kg	ltem No.
Inspection element, type 450, 1,0 m	1000	258	450	648	307	19,69	36262
Inspection element, type 450, for kerb installation, 1,0 m	1000	258	450	648	307	19,22	36266



#### End caps





End cap closed, galvanised, type 450 End cap with horizontal PVC-U pipe outlet DN/OD 110, galvanised, type 450

	Length mm	Width mm	Height mm	Weight kg	ltem No.
End cap closed, galvanised, type 450	-	250	441	1,75	36286
End cap with horizontal PVC-U pipe outlet DN/OD 110, galvanised, type 450	-	250	441	1,87	36296

#### Further accessories

	Length mm	Width mm	Height mm	Weight kg	ltem No.
Universal sealant/adhesive Siga-Meltell® 320 black**	-	-	-	0,97	19051
Tubular pistol for universal sealant/adhesive Siga-Meltell® 320 black**	-	-	-	1,30	6891

\*\*Amount needed for Type 450: approx. 42 ml per joint

RECYFIX® HICAP®F

FASERFIX® SUPER

FASERFIX<sup>®</sup> KS

FASERFIX® BIG SLG

FASERFIX® BIG BLS

RECYFIX® PLUS X

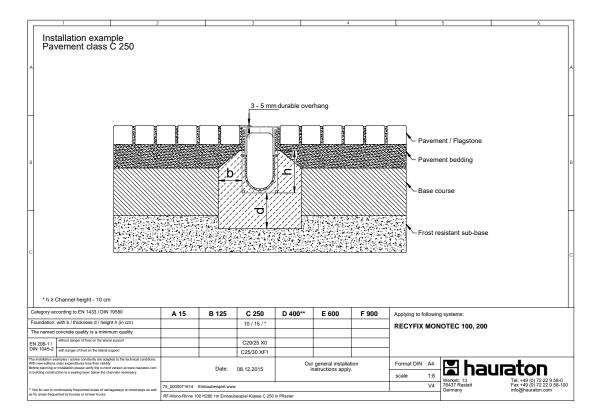
RECYFIX® NC

RECYFIX® MONOTEC

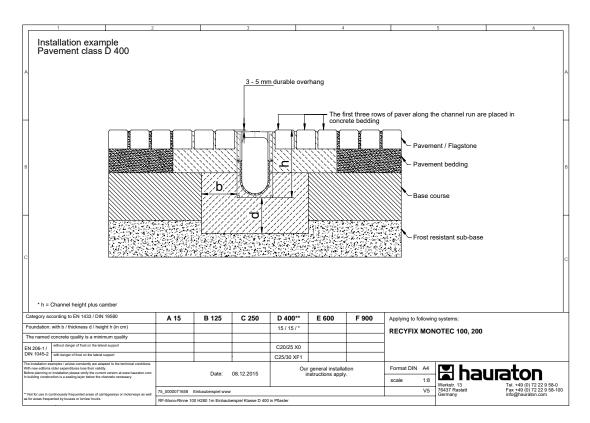


### Installation examples **RECYFIX**<sup>®</sup>MONOTEC

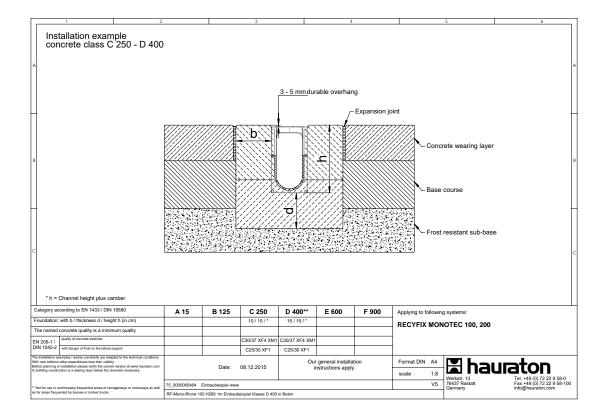
#### Installation example pavement, class C 250



#### Installation example pavement, class D 400

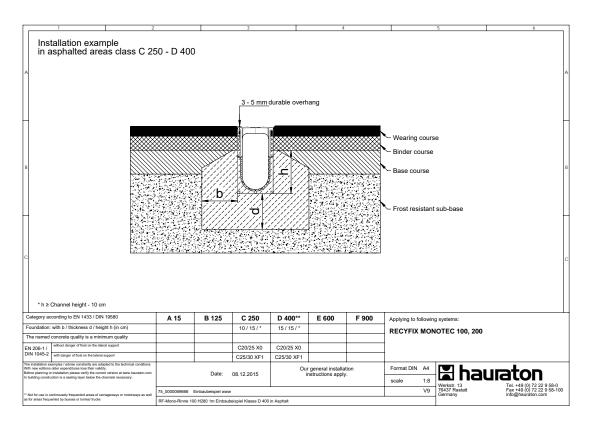






### Installation example concrete, class C 250 - D 400

#### Installation example asphalt, class C 250 - D 400





05/2021| All drawings, measurements and weights are non-committal! We reserve the right do technical changes for improvement

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