

TEST REPORT

TYPE TEST (TT)

REPORT NO.:
226049



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INSTITUTE**

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Page: 1 of 9
Date: 6 March 2024
Init.: JMOC/ARP/MRI
Appendices: 1

Applicant: Green Drain Europe ApS
Birk Centerpark 40
7400 Herning
Denmark
Contact person: Keld Rindom
Email: kr@greendrains.eu

Product: Odour traps, Green Drain models No. GD 1.25, GD 15, GD 2, GD 4, GD 6

Manufacturing and sampling site: Green Drains Inc.
15275 Collier Blvd., Suite 201-262
Naples, FL 34119
USA

Samples: Information about manufacturing site and sampling site was provided by the applicant. Sampling was carried out by the applicant, and the samples were received by DTI on 19 January 2024.

Test period: 1 February - 4 March 2024

Test site: Danish Technological Institute, VA Testing and Inspection (DTI)
Kongsvang Allé 29
DK-8000 Aarhus C, Denmark

Test method: EAD 180020-00-0704:2018 - Waterless odour trap for floor drains

Result: The requirements of the test methods mentioned above were met.

Remark: Reduced test programme compared to the test method.

Terms: Accredited testing was carried out in compliance with international requirements (EN ISO/IEC 17025:2017) and in compliance with Danish Technological Institute's General Terms and Conditions regarding Commissioned Work Accepted by Danish Technological Institute.
The test results apply to the tested products only. This test report may be reproduced in extract only if the Laboratory has approved the extract in writing.

Signature: *Jesper M. Christensen*
Jesper Mondrup Christensen
Consultant

Allan R. Pedersen
Allan R. Pedersen
Product Manager



 **DANAK**
Test Reg. No. 300

Test methods and requirements in accordance with: EAD 180020-00-0704	Test site	Table No./ Appendix No.	Requirements met		Accredited		Sub- contractor Accredita- tion No.
			Yes	No	Yes	No	
Identification of the tested components and general information	DTI	Table 1					
2.2.2 Air/Odour tightness	DTI	Table 2	X		X		
2.2.3 Self-cleaning ability	-	Table 3	N/A				
2.2.4 Effectiveness	DTI	Tables 4-5	X		X		
2.2.5 Mechanical resistance to air pressure	DTI	Table 6	X		X		
2.2.6 Heat resistance - thermal behaviour	DTI	Table 7	X		X		
2.2.7 Pull-out resistance from floor drain	DTI	Table 8	X		X		
7 Photos and marking	DTI	Tables 9-10					
Installation manual	-	Appendix 1					

Table 1

Identification of the tested components and general information

Item id.	Photo	Model/Article No.	Dimension	Mounting diameter
1		Green Drain GD 1.25	DN40	Ø31-36 mm
2		Green Drain GD 15	DN40	Ø37-45 mm
3		Green Drain GD 2	DN50	Ø46-55 mm
4		Green Drain GD 4	DN100	Ø95-104 mm
5		Green Drain GD 6	DN150	Ø145-155 mm
6		Drain Purus	-	-
7		Drain Blücher	-	-
8		Pipe	DN40 ID Ø35.5 mm	-
9		Pipe	DN40 ID Ø40.5 mm (socket)	-




10		Pipe	DN50 ID Ø50.5 mm (socket)	-
11		Pipe	DN100	-
12		Pipe	DN150	-

Table 2						
2.2.2 – Air/Odour tightness						
Item Id.	Sample No.	Test pressure Pa	Test duration min	Pressure reading after test Pa	Requirements met	
					Yes	No
1	1	200	15	200	X	
2	1	200	15	200	X	
3	1	200	15	200	X	
4	1	200	15	200	X	
5	1	200	15	200	X	
Requirement The pressure shall be at least 180 Pa after the test period.						
Test equipment: 270-A-1783, 270-A-0849						

Table 3
2.2.3 – Self-cleaning ability
Measured expelled glass beads, gram per l/s
Item id.: - Sample No.: -
Requirements met: -
Test equipment: -

Table 4
2.2.4 – Effectiveness 2.2.4.1 – Access for cleaning
Item id. 1, sample No. 1
<p>Requirements</p> <p>Trapped gullies should have provision for mechanical cleaning of the outlet pipe system leading to and from the gully. The size of the opening shall be at least 32 mm for DN ≤110 and at least 50 mm for DN>110.</p> <p>Assessment</p> <p>The odour trap can be removed in order to clean the outlet/pipe.</p>
Requirements met: Yes
Test equipment: -

Table 5								
2.2.4 – Effectiveness 2.2.4.2 – Water through the grating								
Item Id.	Sample No.	Mounting position, depth from end mm	Head of water mm	Test duration min.	Measured flow l/s	Required flow l/s	Requirement met	
							Yes	No
1 8	1 -	100	20	10	0.17	-	-	-
2 10	1 -	100	20	10	0.41	-	-	-
3 10	1 -	100	20	10	0.88	0.85	X	-
4 11	1 -	100	20	10	2.91	2.60	X	-
5 12	1 -	100	20	10	3.42	-	-	-
Test equipment: 84315, 270-A-2298								

Table 6

2.2.5 – Mechanical resistance to air pressure

Item Id.	Sample No.	Pressure needed for air flow Pa	Requirement, pressure for air flow Pa	Requirement met	
				Yes	No
1 8	1 -	>700	Min. 400	X	
2 9	1 -	>700	Min. 400	X	
3 10	1 -	>700	Min. 400	X	
4 6	1 1	>700	Min. 400	X	
5 12	1 -	460	Min. 400	X	

Test equipment: 270-A-1783, 270-A-2228

Table 7

2.2.6 – Heat resistance – thermal behavior

Item Id.	Sample No.	Number of cycles	Temperature hot water °C	Temperature cold water °C	Water added through	Requirements met	
						Yes	No
4 6	2 1	1500	93	15	Grating	X	
4 7	3 1	1500	93	15	Grating	X	

Requirement

There shall be no deformation or change in surface texture that may impair the fitness for use of the gully.

Test equipment: 270-A-2500, 270-A-2265

Table 8

2.2.7 – Pull-out resistance from floor drain

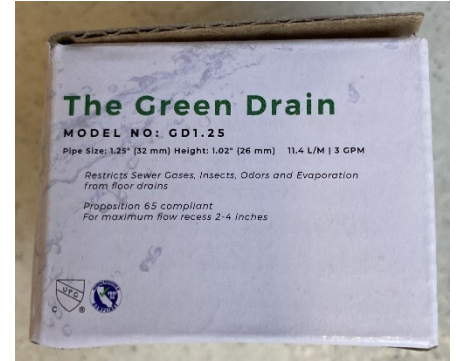
Item Id.	Sample No.	Min. load kg	Test speed mm/min.	Measured load for movement kg	Requirement met	
					Yes	No
4 6	2 1	-	5	4.2	-	-
4 7	3 1	-	5	3.2	-	-

Test equipment: 84315, 270-A-2298

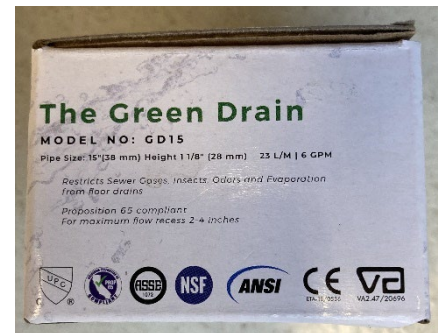
Table 9

Photos

Id. 1



Id. 2



Id. 3



Photos

Id. 4



Id. 5



Table 10

7 - Marking

Marking of item id. 1:

GREEN DRAIN™ GD-1.25 ASSE 1072 AF-GW USA & FOREIGN PATENT 7900288, 9027172 UPC (logo)

Packing:

Green Drain™ Waterless Trap Seal for Floor Drains GD1.25

The Green Drain MODEL NO: GD1.25

Pipe size: 1.25" (32 mm) Height: 1.02" (26 mm) 11.4 L/M I 3 GPM

Restricts Sewer Gases, Insects, Odors and Evaporation from floor drains

Proposition 65 compliant

For maximum flow recess 2-4 inches

Marking of item id. 2:

GREEN DRAIN™ GD15 ASSE 1072 AF-GW USA & FOREIGN PATENT 7900288, 9027172 NSF (logo), UPC (logo)

Packing:

Green Drain™ Waterless Trap Seal for Floor Drains GD15

The Green Drain MODEL NO: GD15

Pipe Size: 1.5" (38 mm) Height: 1 1/8" (28 mm) 23 L/M I 6 GPM

Restricts Sewer Gases, Insects, Odors and Evaporation from floor drains

Proposition 65 compliant

For maximum flow recess 2-4 inches

Marking of item id. 3:

GREEN DRAIN™ GD2 ASSE 1072 AF-GW USA & FOREIGN PATENT 7900288, 9027172 NSF (logo), W Water Mark (logo), UPC (logo)

Packing:

Green Drain™ Waterless Trap Seal for Floor Drains GD2

The Green Drain MODEL NO: GD2

Pipe Size: 2" (50-58 mm) Height: 1.3" (33 mm) 45 L/M I 12 GPM

Restricts Sewer Gases, Insects, Odors and Evaporation from floor drains

Proposition 65 compliant

For maximum flow recess 2-4 inches

Marking of item id. 4:

GREEN DRAIN™ GD4 ASSE 1072 AF-GW USA & FOREIGN PATENT 7900288, 9027172 NSF (logo), W Water Mark (logo), UPC (logo), CE (logo)

Packing:

Green Drain™ Waterless Trap Seal for Floor Drains GD4

The Green Drain MODEL NO: GD4

Pipe Size: 4" (102-110 mm) Height: 2" (51 mm) 276.3 L/M I 73 GPM

Restricts Sewer Gases, Insects, Odors and Evaporation from floor drains

Proposition 65 compliant

For maximum flow recess 2-4 inches

Marking of item id. 5:

GREEN DRAIN™ GD6 ASSE 1072 AF-GW USA & FOREIGN PATENT 7900288, 9027172 UPC (logo)

Packing:

Green Drain™ Waterless Trap Seal for Floor Drains GD6

The Green Drain MODEL NO: GD6

Pipe Size: 6" (150-156 mm) Height: 2" (51 mm)

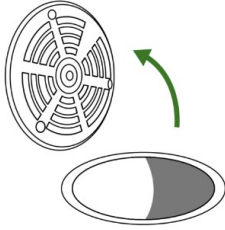
Restricts Sewer Gases, Insects, Odors and Evaporation from floor drains

Proposition 65 compliant

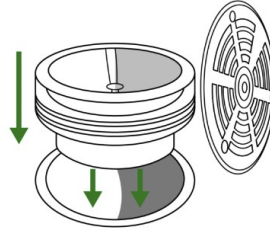
For maximum flow recess 2-4 inches

How to Install a Green Drain

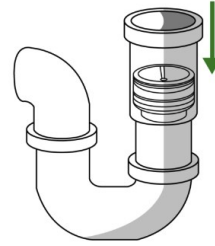
1 Remove Grate



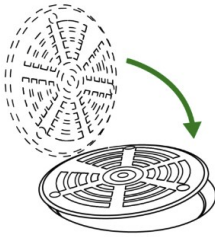
2 Insert Green Drain™



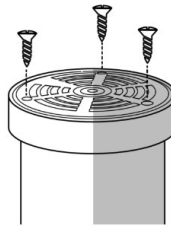
3 Recess 2" to 4" Into The Physical Pipe



4 Close Grate



5 Fasten Screws



Green Drain™

