

English Catalogue

Made in Japan shimabun.com





株式会社シマブン

Since 1871

Driven By Innovation



Design, Engineering and Manufacture in JAPAN

himabun is one of the leading grating manufacturing company in Japan. Shimabun's gratings are built for strength and designed to perform. Since the beginning, we have focused to research and develop universal design products for residential houses and building materials sector to create comfortable and happiness towards the people of the society. What we mean by universal design products is that it is safe, easy and comfortable to use regardless any ages.

Shimabun mainly manufactures linear water drainage products both for indoor and outdoor use. We are also well known as an OEM company; manufacturing linear water drainage both for TOTO and LIXIL for the Japan market. Other than linear water drainage, we also manufacture stainless steel mirror, porcelain ceramic door handle, wood handrail and wooden rack and other sanitary products.

Over the years, we have accumulated vast experiences and developed a wide range of product line up with different materials. All the factories and manufacturing processes are carefully done in Japan. Our products are manufactured with trust and quality guaranteed. We will continuously bring you the best products that are equipped with the latest technology. Not only do we offer a wide selection of contemporary designs but also the beauty and functionality that will last you for years to come.

Message from the President

Ve started our journey with the aim to research, develop and manufacture universal design products for residential houses and building materials sector to create comfortable and happiness towards the people of the society. Our mission is to improve the lifestyle and culture of the people and to provide a healthy and civilized way of life. Since our establishment, we have valued creativity and challenged the limits of technological innovation with a pioneering spirit. Over the years, Shimabun brand has won customers' trust in locally and internationally as a grating specialist manufacturer with a wealth of experience and a solid track record. Customer satisfaction is our main priority that drives us to develop the latest technologies and manufacturing capabilities and contribute to the society by providing excellent products and services. Our amazing universal design products do not only provide customers safe and secure but also make their usage comfortable. We always listen to our customers very carefully which help us to become stronger in various ways, in areas including quality, productivity and manufacturing technology and become more competent in the market. We believe we can increase the company value much further by enhancing the products and expanding the domestic/overseas sales network. We will continue working together with society toward achieving our goals to enhance our corporate value and helping create an affluent society. Mobulide Shima President and CEO



New face Of JAPAN

RISE ABOVE QUALITY

Quality is the standard, safety is our priority. All of our products are made from the highest grade JIS(Japanese Industrial Standard) and undergoes a meticulous manufacturing process. A very important characteristics of our products is its resilience, no matter the location or design, materials and finish; ease of climate. Our products concept is based on handling and installation are given the universal design for residential houses and same attention to detail. safe, easy and comfortable to use regardless any age and place.

Shimabun's drainage solutions inspire creative planning. They allow to use or elimination of physical barriers within the floor and can be incorporated into wide range of materials and designs. The high quality of components is not limited to the

the building materials sector. What we Products are designed to provide a long mean by universal design is that it will be reliable service life. The smooth surfaces guarantee efficient drainage and hygiene in both indoors and outdoors use.

CONTENIS



All tests performed and maintenance instructions have been followed in accordance with the Japanese Industrial Standard.

Note:

Although Shimabun provides all information, recommendation, and/or advice regarding its products in good faith, the customer is solely responsible for determining the effectiveness, suitability, and safety of any particular use or application of the product. The installation process has been followed in accordance to the Japanese standard. Base on country to country, the process/steps may differ.

Please Login to: www.shimabun.com

PVC Grating	Pg12 - Pg29
Swimming Pool Grating	
Safety Grating	
• Sugra	
• UG	
Stainless Grating	Pg30 - Pg47
• Premium	
Normal Stainless type	
Stainless Raffine	
Wood Raffine	Pg48 - Pg51
Stainless Steel Mirror	Pg52 - Pg55

Pq56 - Pq67

Cerahand

HATTEN EN Swimming Pool Grating

Key Features

Flexible

This resin grating can be fit into curved sections easily as it can bends toward both right and left according to suit the pool design.

Non-slippery

The surface and bottom are made of soft PVC (polyvinyl chlorid) which make it safe for bare feet even at wet places. Beisdes, you will not feel cold stepping on the resin in winter season.

Easy maintenance

Light weight and can be rolled up at the time of cleaning easily which reduce costly recoating exercises. As the surface is inverted-U shaped, it has excellent water drainage property.

Narrow Gaps

It is noted that the gaps between bars are 6 mm or less which prevent children from inserting fingers.

Durability

The whole part is made of resin which is excellent in chemical resistance. Anti-bacterial and antifungal agent is also contained which makes it excellent in durability.

Excellent resistance

It has excellent resistance to hot water and weather resistance.

Color Variation

Resin gratin comes in five different color options which are black, blue, beige, light gray and white.







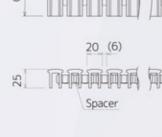


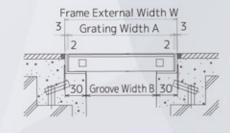




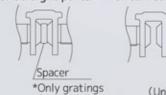








For straight parts For curved parts



(Unit:mm)

For straight, there will be blue spacer at the both end.

Note: Each grating is 1000 millimeter long. Space disconnect the joints according to your require measure.

Main bar

Joint

Material and specifications

Members	Materials	Note
Main bar	Hard/soft vinyl chloride(PVC)	Antibacterial and antifungal
Joint	Soft vinyl chloride(PVC)	Antibacterial and antifungal
Spacer for straight part	Polypropylene(P.P)	/

[Test Results of Resin Grating for Swimming Pool]

Test items	Contents of test	Evaluation		
Load bearing test	Apply a concentrated load on one point whose area is equivalent to the area of a wheel of one wheel chair (ϕ 50) (local load test). The test is implemented based on JIS A 1450.	No significant bend or have residual deformation within the range of withstanding load indicated in the specifications.		
Weather resistance accelerated exposure test	Sunshine weather meter 63 C × 200 hr Rainfall duration 12 min/hr	No significant color deterioration or change of color		
	Apply alkaline, neutral, and acidic chemicals once a day × 14 days	No abnormality in appearance.		
Chemical resistance test	The following chemicals which are used in swimming pools, kitchens, and factories are tested for 4 months. 1. Sodium hypochlorite 2. Hydrogen peroxide 3. Sulfuric acid	No color change or abnormality in appearance. *If the product is adhered with a dark colored chemical and left for a long time, the color does not go off easily.		

For straight parts

Groove width	Part number	Color	Width Amm	Height	Length L mm	Weight (Grating)	Withstanding load	Frame external width Wmm	
100	GRP-25W150	A (Blue)	150			1.9kg	2.0kN(200kgf)	160	
130	GRP-25W180	B (Beige)	180			2.2kg	4 51 11/4 501 61	190	
150	GRP-25W200	G (Light gray)		200	200	25	1000	2.4kg	1.5kN(150kgf)
200	GRP-25W250	S (White)	250			3.0kg	4 01 11/4 001 0	260	
250	GRP-25W300	K (Black)	302.5			3.6kg	1.0kN(100kgf)	310	

For curved parts

Groove width	Part number	Color	Width Amm	Height	Length L mm	Weight (Grating)	Withstanding load	Minimum curve inner R	Frame external width Wmm
100	GRPR-25W150	A (Blue) 150				1.9kg	2.0kN(200kgf)	500	160
130	GRPR-25W180	B (Beige)	180	80	4000	2.2kg	4 51 11/4 501 - 63	650	190
150	GRPR-25W200	G (Light gray)	200	25	1000 (Note 1)	2.4kg	1.5kN(150kgf)	750	210
200	GRPR-25W250	S (White)	250	250	(Note 1)	3.0kg		1000	260
250	GRPR-25W300	K (Black)	302.5			3.6kg	1.0kN(100kgf)	1250	310

Notes for Ordering

- *Please specify the color when you order. Example: If you wish to order a blue grating, please specify GRP-25W150-A.
- *The only color option for a joint is light gray.
- *Depending on request, we can manufacture special order-made products with non-standard dimensions and color.
- *Custom sizes available.
- *Minimum order request 50 meter.
- *In regards of L shape angle please discuss with us











Safety Grating Made of non-slip resin

Narrow Gaps

The gaps between bars are 6 mm or less which prevent children from inserting fingers.

Resistance

Excellent resistance to chemicals, hot water, and weather enables outdoor use such as in swimming pools.

Durability

Steel crossbars are cover inside the resin makes it stronger to bear the passage of a wheel. Wheel chairs and the like can go smoothly across the grating.



Easy Maintenance

Safety Grating is light weight and each resin has a pull ring that makes cleaning easier.

Non-slippery

The surface and bottom are made of soft PVC (polyvinyl chlorid) which make sure it is safe for bare feet even at wet places. Moreover, the resin surface does not feel cold in winter.



Color Variation

Safety grating comes in nine different color options.

*Please specify a color when you place an order.

Example: If you wish to order a beige grating, please specify GRS-20W150-B.

















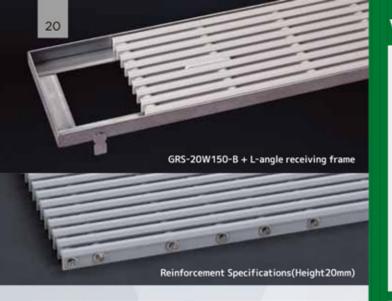


Application

Drainage trench for shower room, toilet, rest room, balcony, kitchen, swimming pool etc.

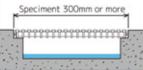
D:Dark gray M:Wood

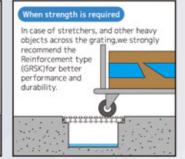




Wide width

In case of width size of 300 or more, we strongly recommend the Reinforcement type(GRSK)for better performance and durability. Please check the withstand load of each specimen given at the catalogue.







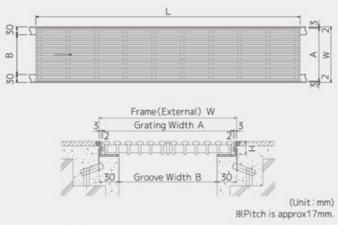
GRSK(Reinforcement Specifications)

ODifferences between GRS and GRSK

GRSK comes in 20 stainless steel crossbar and GRS comes in 10 stainless steel crossbar in 1-meter length.



Vertical type (standard specifications)



	Grating					L-angle receiving frame			
Height Hmm	Bmm	No.	Width Amm	Length L mm	Weight (Grating)	Withstanding load	No.	Wmm	Weight
	100	GRS-20W150	150		1.8kg	1.5kN(150kgf)		160	
20	150	GRS-20W200	200	000	2.4kg		cc: 30	210	1 310
20	200	GRS-20W250	250	250 999		1.0kN(100kgf)	GSL-20	260	1.2kg
	250	GRS-20W300	300		3.6kg			310	
	100	GRS-25W150	150		2.0kg	2.0kN(200kgf)		160	
25	150	GRS-25W200	200	000	2.7kg		GSL-25 21	210	1.3kg
~	200	GRS-25W250	250	999	3.3kg	1.5kN(150kgf)	G3E-25	260	1.5kg
	250	GRS-25W300	300		4.0kg			310	

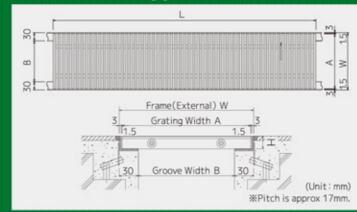
Reinforcement Specifications

Grating							L-angle receiving frame			
Height Hmm	Bmm	No.	Width Amm	Length L mm	Weight (Grating)	Withstanding load	No.	Wmm	Weight	
	100	GRSK-20W150	150	2.3kg				160		
	150	GRSK-20W200	200	50 999	3.1kg	2.0kN(200kgf)		210	1.2kg	
20	200	GRSK-20W250	250		3.9kg		GSL-20	260		
	250	GRSK-20W300	300		4.7kg	1.5kN(150kgf)		310		
	300	GRSK-20W350	350		5.5kg	1.0kN(100kgf)		360		
	100	GRSK-25W150	150		2.5kg	2.0kN(200kgf)		160		
	150	GRSK-25W200	200		3.4kg		GSL-25	210	1.3kg	
25	200	GRSK-25W250	250	999	4.2kg	2.0kiv(200kgr)		260		
25	250	GRSK-25W300	300	999	5.1kg			310		
	300	GRSK-25W350	350		6.0kg	1.5kN(150kgf)		360		
	350	GRSK-25W400	401		6.8kg	1.0kN(100kgf)		410		

Notes for Ordering

- * Please specify a color when you order. Example: If you wish to order a beige grating, please specify GRS-20W150-B.
- * Depending on the request, we can manufacture special order-made products with non-standard dimensions and color.
- <Caution>The product may bend if it is propped against a wall or placed diagonally for a long time. Please make sure to store it on a flat place in stable condition.
- * Custom sizes available.
- * Minimum order request 50 meter.
- * In regards of L shape angle, please discuss with us.

Horizontal type



	Grating						L-angle receiving frame			
Height Hmm	Bmm	No.	Width Amm	Length L mm	Weight (Grating)	Withstanding load	No.	Wmm	Weight	
	100	GRSJ-20W151	151		1.6kg			160		
20	150	GRSJ-20W201	201	999	2.2kg	1.0kN(100kgf)	GSL-20	210	1.2kg	
	200	GRSJ-20W251	251		2.7kg			260		
	100	GRSJ-25W151	151		1.9kg	1.5kN(150kgf)		160		
25	150	GRSJ-25W201	201	— ooo ⊦		2.5kg		GSL-25	210	4.70-
23	200	GRSJ-25W251	251 999		3.1kg	1.0kN(100kgf)	G3L-25	260	1.3kg	
	250	GRSJ-25W301	301		3.7kg			310		

Material and specifications

Members	Materials	Finishing	Note	
Main bar	Hard/soft vinyl chloride (PVC)	-	Antibacterial and antifungal	
Spacer	Hard vinyl chloride (PVC)	-	-	
Pull ring	Hard vinyl chloride (PVC)	-	-	
Crossbar	SUS304	-	_	
Nut	SUS304	-	M4	
Washer	SUS304	-	-	
L-angle receiving frame	SUS304	28	t=3.0	

[Test Results of Safety Grating]

Test items	Contents of test	Evaluation
Load bearing test	Total weight load of a wheel chair has been imposed on one wheel (Ф50). The test was followed based on JIS A 1450.	No significant bend or residual deformation within the range of withstanding load indicated in the specifications.
Weather resistance accelerated	Sunshine weather meter 63 °C × 200 hr Rainfall duration 12 min/hr	No significant color deterioration or change of color.
Chemical resistance test	Apply alkaline, neutral, and acidic chemicals once a day × 14 days	No abnormality in appearance.
Warm water resistance test	Immerse product in 60°C warm water for 7 days.	No change of color or deformation



Jugra grating have stood the test of decades of use in all types of wet are which present a risk of slipping and infection, proving themselves to be an ideal solution where the particular emphasis to be placed on accident prevention. Shimabun's Sugra can easily be incorporated into the design of the facilities question.



Non-slippery

The surface and bottom are made of soft PVC(polyvinyl chlorid) which make sure it is safe for bare feet even at wet places. Moreover, the resin surface does not feel cold in winter.



Narrow Gaps

The gaps between bars are 6 mm or less which prevent children from inserting fingers.

Excellent resistance to chemicals, hot water, and weather enables outdoor use such as in bathroom.



Durability

Steel crossbars are cover inside the resin makes it stronger to bear the passage of a wheel. Wheel chairs and the like can go smoothly across the grating.

Easy Maintenance

The lid is light weight and each resin has a pull ring that makes cleaning easier.

Can be use in

1. Public Facilities











- Indoor and outdoor pools
- ◆ Sports centers
- ♦ Wudu area
- ◆ Adventure pools and thermal baths
- Shower facilities
- Sunas
- Schools
- Rehabilitation clinics and hospitals
- ♦ Hotels

2. Industry and Business









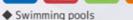
- ◆ Restaurants
- ◆ Fitness Studios
- ◆ Solariums
- ◆ Dental and chemical laboratories
- 3. Households











- Sunas
- ♦ Fitness Studios
- Shower





Color Variation

SUGRA comes in nine different color options.

*Please specify a color when you order. e.g.) If you wish to order a beige grating, please specify GRZ-25W500-B.











A:Blue









G:Light gray

S:White

D:Dark gray M:Wood

C:Brown

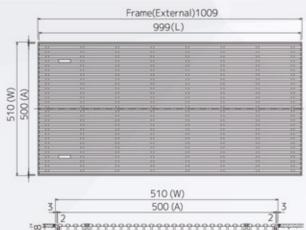
K:Black

Material and specifications

Members	Materials	Finishing	Note
Resin bar	Hard/soft vinyl chloride (PVC)	_	Antibacterial and antifungal
Spacer	Hard vinyl chloride (PVC)	-	Antibacterial and antifungal
Pull ring	Hard vinyl chloride (PVC)	-	Antibacterial and antifungal
Stud bolt	SUSXM7	-	M4
Nut	SUS304	-	M4
Washer	SUS304	-	_
L-angle receiving frame	receiving SUS304 28 t=		t=3.0

[Test Results of SUGRA]

Test items	Contents of test	Evaluation
Load bearing test	Total weight load of a wheel chair has been imposed on one wheel (Ф50). The test was followed based on JIS A 1450.	No significant bend or residual deformation within the range of withstanding load indicated in the specifications.
Weather resistance accelerated	Sunshine weather meter 63 ℃ × 200 hr Rainfall duration 12 min/hr	No significant color deterioration or change of color.
Chemical resistance test	Apply alkaline, neutral, and acidic chemicals once a day × 14 days.	No abnormality in appearance.
Warm water resistance test	Immerse product in 60°C warm water for 7 days.	No change of color or deformation



Grating	Leanalas	(Unit : mm
30	(Separate arrangements)	30

GRZ-25W500 500 25 999 5.2kg GSL-25 510

Notes for Ordering* Custom sizes available.

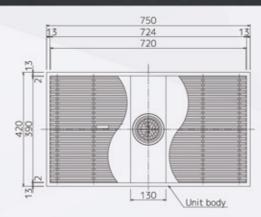


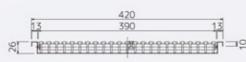








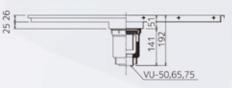




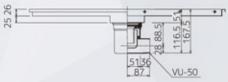
	No.	Weight
Non waterproof vertical drain outlet	HRHT-4275	6.4kg
Non waterproof horizontal drain outlet	HRHY-4275	6.4kg
Waterproof vertical drain outlet	HRHB-4275	10.8kg
Waterproof horizontal drain outlet	HRHZ-4275	10.5kg

Non waterproof

Non waterproof Vertical drain outlet

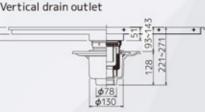


Non waterproof Horizontal drain outlet



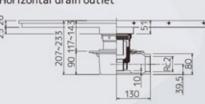
Waterproof

Waterproof Vertical drain outlet



Notes for Ordering
 * Custom sizes available.

Waterproof Horizontal drain outlet



(Unit: mm)

UG **Application**

Sidewalk, promerade, park - amusement park, school, golf field etc.

UG grating is specially designed for outdoor units and suitable for installation in areas exposed to water! UG's wings is made of stainless steel which can take heavier loads than human weights. Only high-quality PVC (soft and hard) and stainless steel (304) are used in the production of these grating. This material guarantees high resistance to wear, a high level of durability and thanks to its non-porous, closed surfaces, outstanding hygiene levels.



Narrow Gaps

The gaps between bars are 6 mm or less which prevent children from inserting fingers.

Resistance

Excellent resistance to chemicals, hot water, and weather enables outdoor use such as in sidewalk.



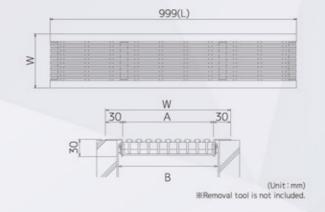
Durability

Steel crossbars are cover inside the resin makes it stronger to bear the passage of a wheel. Stroller and the like can go smoothly across the grating.



Non-slippery

The surface and bottom are made of soft PVC(polyvinyl chlorid) which make sure it is safe for bare feet even at wet places.Moreover, the resin surface does not feel cold in winter.



Connecting metal fitting (Option)



This fitting protects this grating from theft and scattering.

Silencing Rubber (Option)



To prevent any noises while walking on the grating.

Groove width	Part number	Color	W	Α	В	Height	Length L mm	Weight (Grating)	Withstanding load	
100	GRU-100		135	75	90	9		3.3kg		
120	GRU-120		153	93	108			3.6kg		
150	GRU-150		185	125	140			4.1kg		
180	GRU-180	Dark gray	219	159	174	30 999	4.5kg	5.0kN/m		
240	GRU-240		275	215	230			4.9kg	100000000000000000000000000000000000000	
300	GRU-300		338	278	293				6.3kg	
360	GRU-360		395	335	350			7.2kg		

Notes for Ordering

- * Depending on the request, we can manufacture special order-made products with non-standard dimensions and color.
- <Caution>The product may bend if it is propped against a wall or placed diagonally for a long time. Please make sure to store it on a flat place in stable condition.
- * Custom sizes available.

Material and specifications

Members	Materials	Finishing	Note
Main body	Hard/soft vinyl chloride (PVC) +Stainless	-	Antibacterial and antifungal

[Test Results of Groove Grating]

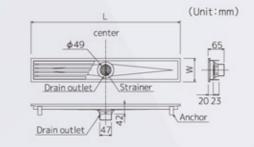
Test items	Contents of test	Evaluation
Load bearing test	Total weight load of a wheel chair has been imposed on one wheel (050). The test was followed based on JIS A 1450.	No significant bend or residual deformation within the range of withstanding load indicated in the specifications.
Weather resistance accelerated	Sunshine weather meter 63 ℃ × 200 hr Rainfall duration 12 min/hr	No significant color deterioration or change of color.
Endurance(Fatigue) test	80kg load 1 million times in servo Pulser tester	No deformation or warping or damage



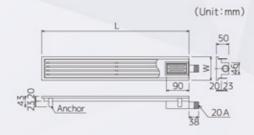
Premium Drain Outlet with Trap

Drain Outlet Unit for Entrance Premium type

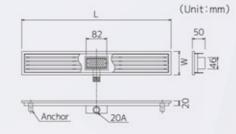
Standard Specifications



Horizontal Specifications



Front Specifications



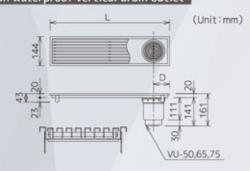
	No.	Lot	Length L mm	Width W mm	Anchor (pair)	Weight	Withstanding load
	GSG-10L600-P		594		2	1.6kg	
	GSG-10L900-P		894		-	2.3kg	
100×100 tiles	GSG-10L1200-P	4	1194	94	3	3.0kg	9.0kN (900kgf)
tiles	GSG-10L1800-P		1794			4.4kg	(900kgr)
	GSG-10L2000-P		1994		5	4.8kg	
	GSG-15L600-P		596		2	2.1kg	
	GSG-15L900-P	1	896	8 -	3	3.3kg	9.0kN (900kgf)
150×150 tiles	GSG-15L1200-P	4	1196	144	3	4.4kg	
G	GSG-15L1800-P		1796		5	6.6kg	
	GSG-15L2000-P		1996			8.0kg	

	No.	Lot	Length L mm	Width W mm	Anchor (pair)	Weight	Withstanding load
	GSGY-10L600-P		585		2	1.7kg	
	GSGY-10L900-P		885		3	2.4kg	
00x100 tiles	GSGY-10L1200-P	4	1185	94		3.1kg	9.0kN (900kgf)
Circs	GSGY-10L1800-P	1785		-	4.5kg	(SOOKGI)	
	GSGY-10L2000-P		1985		5	4.9kg	
	GSGY-15L600-P		586		2	2.4kg	
50.450	GSGY-15L900-P		886		7	3.6kg	0.0141
50×150 tiles	GSGY-15L1200-P	4	1186	144	5	4.7kg	9.0kN (900kgf)
	GSGY-15L1800-P		1786			6.9kg	(Jooky)
	GSGY-15L2000-P		1986			8.3kg	

	No.	Lot	Length L mm		Anchor (pair)	Weight	Withstanding load
	GSGM-10L600-P	1	594	7 1	2	1.7kg	
	GSGM-10L900-P		894		3	2.4kg	22.00
100×100 tiles	GSGM-10L1200-P	4	1194	94		3.1kg	9.0kN (900kgf)
tiles	GSGM-10L1800-P		1794		5	4.5kg	
	GSGM-10L2000-P		1994			4.9kg	
	GSGM-15L600-P		596		2	2.4kg	- //
	GSGM-15L900-P	4	896		3	3.6kg	0.0(-))
150×150 tiles	GSGM-15L1200-P		1196	144	3	4.7kg	9.0kN (900kgf)
	GSGM-15L1800-P		1796		-	6.9kg	
	GSGM-15L2000-P		1996	4	5	8.3kg	

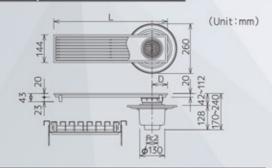
Drain Outlet Unit for SUS Grating Premium type

Non waterproof vertical drain outlet



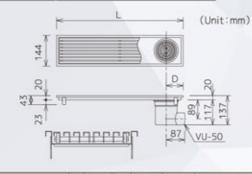
No.	Lot	L	D	Anchor (pair)	Weight	Withstanding load
HSAT-15L600-P	7.	596	2	2.6kg		
HSAT-15L900-P	١.	896	80		3.8kg	9.0kN
HSAT-15L1200-P	4	1196		3	4.9kg	(900kgf)
HSAT-15L1800-P		1796	898	5	7.1kg	

Waterproof vertical drain outlet



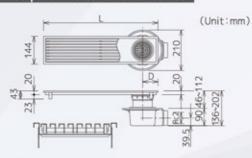
No.	Lot	L	D	Anchor (pair)	Weight	Withstanding load
HSAB-15L600-P		596	596	2	6.8kg	
HSAB-15L900-P	4	896	80	3	8.0kg	9.0kN
HSAB-15L1200-P		1196		3	9.1kg	(900kgf)
HSAB-15L1800-P		1796	898	5	11.3kg	

Non waterproof horizontal drain outlet



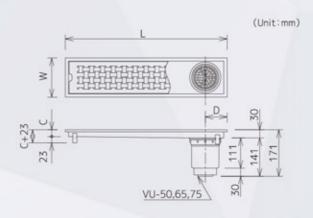
No.	Lot	L	D	Anchor (pair)	Weight	Withstanding load
HSAY-15L600-P		596	596 896 80	2	2.6kg	
HSAY-15L900-P		896			3.8kg	9.0kN
HSAY-15L1200-P	4	1196		3	4.9kg	(900kgf)
HSAY-15L1800-P		1796	898	5	7.1kg	

Waterproof horizontal drain outlet

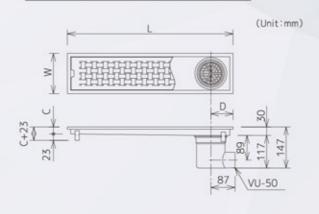


No.	Lot	L	D	Anchor (pair)	Weight	Withstanding load				
HSAZ-15L600-P		596		2	6.8kg					
HSAZ-15L900-P		896	80	80	80	80	80	7	8.0kg	9.0kN
HSAZ-15L1200-P	1	1196		3	9.1kg	(900kgf)				
HSAZ-15L1800-P		1796	898	5	11.3kg					

Non waterproof vertical drain outlet



Non waterproof horizontal drain outlet



150×150 tiles

No.	Lot	L	W	c	D	Anchor (pair)	Weight	Withstanding load	
HSUT-15L150-SP	6	144		30	72	-	0.9kg		
HSUT-15L450-SP		444 26 2.0	2.0kg						
HSUT-15L600-SP		594		25		2	2.5kg	1.5kN (150kgf)	
HSUT-15L750-SP	4	744	144	24	80		3.0kg		
HSUT-15L900-SP		894		23			3.5kg		
HSUT-15L1200-SP		1194		20		3	4.5kg		

Drain Outlet Unit for SUS Punching Checkweave · Premium type

200×200 tiles

No.	Lot	L	W	c	D	Anchor (pair)	Weight	Withstanding load
HSUT-20L200-SP	6	196		30	98	-	1.5kg	
HSUT-20L600-SP		596		25		2	3.4kg	4.5(4)
HSUT-20L800-SP		796	196	25		- 3	4.4kg	1.5kN (150kgf)
HSUT-20L1000-SP	4	996		22		0 3	5.5kg	
HSUT-20L1200-SP		1196		20			6.3kg	

150×150 tiles

No.	Lot	L	w	С	D	Anchor (pair)	Weight	Withstanding load	
HSUY-15L150-SP	6	144		30	72	-	0.9kg		
HSUY-15L450-SP		444		26			2.0kg	1.5kN (150kgf)	
HSUY-15L600-SP		594		25		2	2.5kg		
HSUY-15L750-SP	4	744	144	24	80		3.0kg		
HSUY-15L900-SP		894		23		-	3.5kg		
HSUY-15L1200-SP		1194		20		3	4.5kg		

200×200 tiles

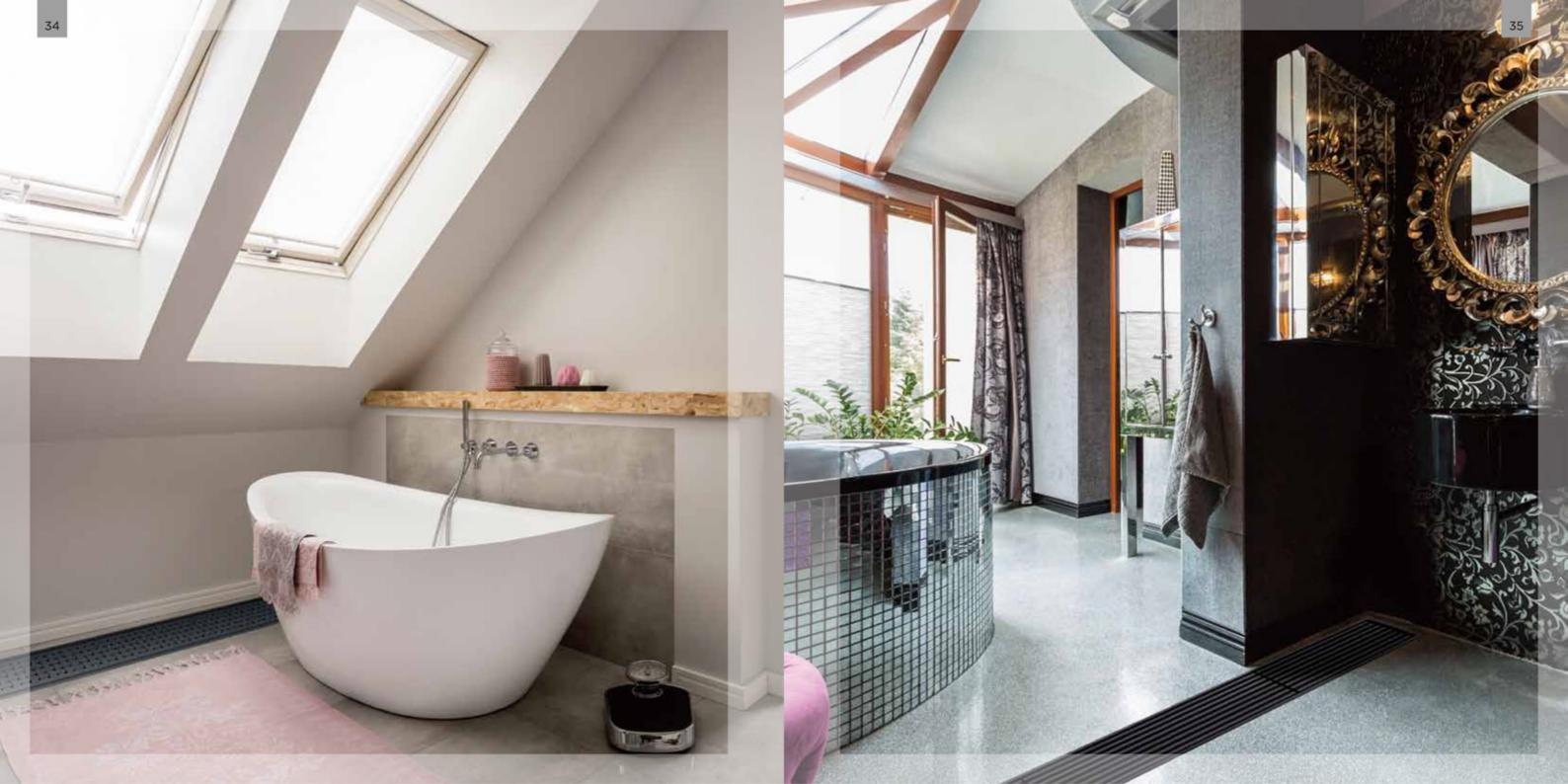
No.	Lot	L	w	С	D	Anchor (pair)	Weight	Withstanding load
HSUY-20L200-SP	6	196		30	98	-	1.5kg	
HSUY-20L600-SP		596		25		2	3.4kg	4 FLN
HSUY-20L800-SP		796	196	25			4.4kg	1.5kN (150kgf)
HSUY-20L1000-SP	4	996		22	80	3	5.5kg	
HSUY-20L1200-SP		1196		20			6.3kg	

Notes for Ordering

- * Depending on request, we can manufacture special order-made products with non-standard dimensions. The length can be customize up to 4000 mm.

 * Custom sizes available.

 * The pipe hole can be customize according to the request.
- * Minimum order request 10 set.





Stainless Grating — Drain Outlet Unit with Trap —

———— Drainage trench for bathroom, shower room, rest room, balcony, kitchen etc.

Features

- Narrow Gaps: The gaps between bars are 6 mm or less which prevent children from inserting fingers.
- Easy Maintenance: Upper lid is light weight and each resin has a pull ring that makes cleaning easier.
- Durability: As upper surface is flat, wheel chairs and the like can go smoothly across the grating.
- Type: Two type of lids are available: Plain type and Non-slip type.

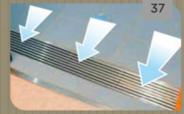


Material and specifications

	Members	Materials	Finishing	Note
	Plain type	SUS304+AES	Hair-line	t=1.2
Lid	Nonslippery type	SUS304+AES	Hair-line, nonslippery processing	t=1.2
	Resin material	Hard vinyl chloride (PVC)	-	-
Mair	n body	SUS304	Groove: 28, Frange: HL	t=1.0
Anc	hor	Stainless	-	accessory
Trap	portion	Stainless+Resin	-	_
Wat	erproof inlet	Cast iron +Chloroprene rubber	Cationic electrodeposition	Only for Waterproof type

It drains smoothly.

Because it is perpendicular to the flow of water.



The resin material on the back side suppresses slip and stepping sound.



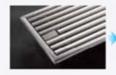
Left:Plain type Right:Nonslippery type



Note

* Depending on request, we can manufacture special order-made products with non-standard dimensions. For W144 and W196 the length can be customize up to 4000 mm.

With the removal tool







An attached fitting is useful for maintenance. It allows easy removal of the top cover before cleaning.

Plain type	Nonslippery type
No.	No.
HSAT-15L●●T-F	HSAT-15L●●T-D

With the burglar proof metal fitting



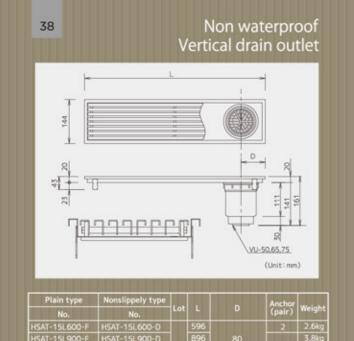




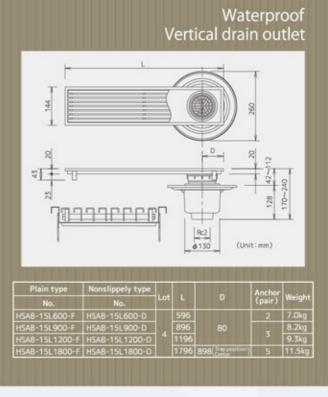
This fitting protects this unit from theft to ensure safe outdoor use. Since it prevents the top cover from being raised easily, it also provides a childproof feature.

*This metal fitting does not provide perfect antitheft measures, because it is fastened by a nut.

Plain type	Nonslippery type
No.	No.
HSAT-15L●●N-F	HSAT-15L●●N-D

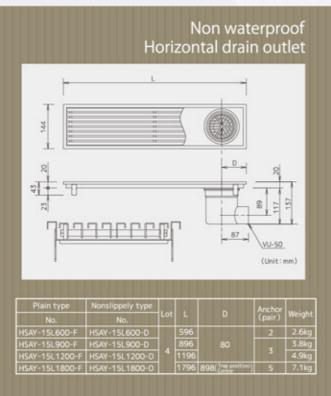




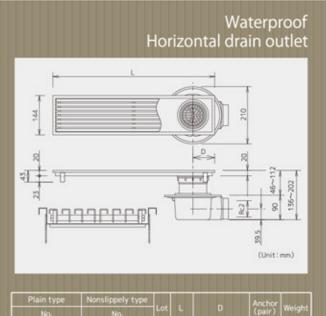












Entrance Drainage GS

Narrow Gaps

The gaps between bars are 6 mm or less which prevent children from inserting fingers.

Durability

As upper surface is flat, wheel chairs and the like can go smoothly across the grating.

Water Draining

Made for draining water especially on the rainy season.

Easy Maintenance

The lid is light weight which makes cleaning easier.



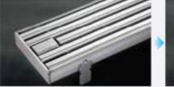
Type

Two type of lids are available: Plain type and Non-slip type.

The resin material attached to the back side restrains displacement and muffles the sound of this unit under your shoes.



With the removal tool

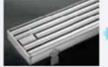




An attached fitting is useful for maintenance. It allows easy removal of the top cover before cleaning.

	Plain type	Nonslippery type
	No.	No.
100×100tiles	GSG-10L●●T-F	GSG-10L●●T-D
150×150tiles	GSG-15L●●T-F	GSG-15L●●T-D

With the burglar proof metal fitting







Tighten with a nut

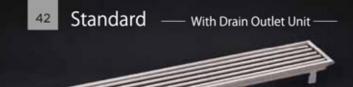
This fitting protects this unit from theft to ensure safe outdoor use. Since it prevents the top cover from being raised easily, it also provides a childproof feature.

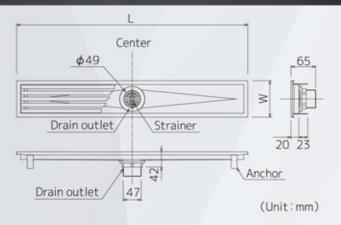
*This metal fitting does not provide perfect antitheft measures, because it is fastened by a nut.

	Plain type	Nonslippery type
	No.	No.
100×100tiles	GSG-10L●●N-F	GSG-10L●●N-D
150×150tiles	GSG-15L●●N-F	GSG-15L●●N-D

Application

Drainage trench for entrance door, elevator, balcony, kitchen at hospital, store, office, residence area etc.





100×100 tiles

Plain type	Nonslippery type				Anchor	and the last
No.	No.	Lot		W	(pair)	Weight
GSGY-10L600-F	GSGY-10L600-D		585		2	1.7kg
GSGY-10L900-F	GSGY-10L900-D		885			2.4kg
GSGY-10L1200-F	GSGY-10L1200-D	4	1185	94	3	3.1kg
GSGY-10L1800-F	GSGY-10L1800-D		1785		5	4.5kg
GSGY-10L2000-F	GSGY-10L2000-D		1985			4.9kg

150x150 tiles

Plain type	Nonslippery type				Anchor	Secretary of
No.	No.	Lot	١.	W	(pair)	Weight
GSGY-15L600-F	GSGY-15L600-D		586		2	2.4kg
GSGY-15L900-F	GSGY-15L900-D		886			3.6kg
GSGY-15L1200-F	GSGY-15L1200-D	4	1186	144	3	4.7kg
GSGY-15L1800-F	GSGY-15L1800-D		1786		1 2	6.9kg
GSGY-15L2000-F	GSGY-15L2000-D		1986		5	8.3kg

- Note
- Depending on request, we can manufacture special order-made products with non-standard dimensions. For W94 and W144 the length can be customize up to 4000 mm.
- * Minimum order request 10 set.

100x100 tiles

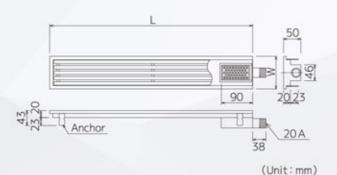
Plain type	Nonslippery type	594 894 0 4 1194 9	1. 1		Anchor	
No.	No.		W	(pair)	Weight	
GSG-10L600-F	GSG-10L600-D	1	594		2	1.6kg
GSG-10L900-F	GSG-10L900-D		894		3	2.3kg
GSG-10L1200-F	GSG-10L1200-D	4	1194	94	,	3.0kg
GSG-10L1800-F	GSG-10L1800-D		1794		(4)	4.4kg
GSG-10L2000-F	GSG-10L2000-D		1994		5	4.8kg

150x150 tiles

Plain type	Nonslippery type				Anchor	
No.	No.	Lot	L	w	(pair)	Weight
GSG-15L600-F	GSG-15L600-D		596		2	2.1kg
GSG-15L900-F	GSG-15L900-D		896		3	3.3kg
GSG-15L1200-F	GSG-15L1200-D	4	1196	144	1	4.4kg
GSG-15L1800-F	GSG-15L1800-D		1796		5	6.6kg
GSG-15L2000-F	GSG-15L2000-D		1996]		8.0kg

- Note
- Depending on request, we can manufacture special order-made products with non-standard dimensions. For W94 and W144 the length can be customize up to 4000 mm.
- * Minimum order request 10 set.



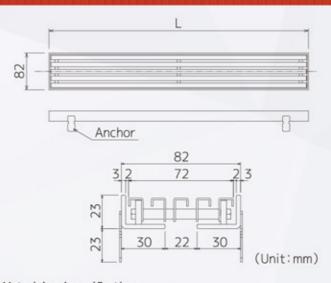


Without Outlet Drain Outlet Unit

43



- Note
- Depending on request, we can manufacture special order-made products with non-standard dimensions. For W94 and W144 the length can be customize up to 4000 mm.
- * Minimum order request 10 set.



Material and specifications

Members		Materials	Finishing	Note	
	Plain type	SUS304+AES	Hair-line	t=1.2	
Lid	Nonslippery type	SUS304+AES	Hair-line, nonslippery processing	t=1.2	
	in material	Hard vinyl chloride(P.V.C)	-	-	
L-ar	ngle receiving frame	SUS304	28	t=3.0	
Rem	oval tool	Stainless	_	accessory	

RAFFINE

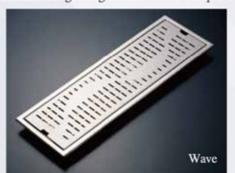
Drain Outlet with Trap

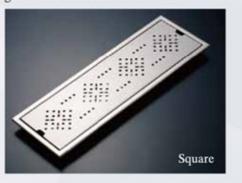
STAINLESS

tainless Gratings are made from the finest raw materials and assembled with scrupulous attention to detail. Every component is designed, developed and produced in-house to the most exacting standard. Stainless Grtaing does not only enhance your interior design and environment but also greater structural strength, more impact resistance and contraction properties. Stainless Gratings are for Prestige, the taste of paradise. A Luxury grating specially made to upgrade your shower room.

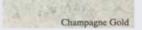
Designs and Colors

Stainless grating comes with 3 unique designs with 5 different colors.





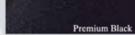






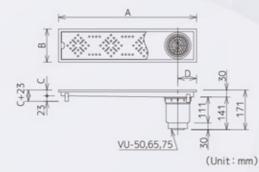






Material and specifications

Members	Materials	Finishing	Note
Top cover	SUS304	BA	t=1.2~2.0
Main body	SUS304	BA	t=0.7
Trap portion	SUS304+resin	-	-
Waterproof	Cast iron + chloroprene	Cationic electrodeposition	Only for waterproof type



Test	Test Content	Result		
Hot water resistance test	One week in hot water at 60℃, 87℃×48H	Clear		
Weather resistance promotion exposure test	Sunshine Weather Meter 4000 hr	Clear		
Chemical resistance test	Alkaline, neutral, acidic coating x 14 days	Clear		
Impact resistance test	A steel ball of 1.2kg is dropped from a height of 1m at Φ40	Some indentation No paint peeling		
Moisture resistance test	40℃ Humidity 95% x 24hr	Clear		
Abrasion resistance test	37,000 round trips with nylon scourer	No scratches		
Slip test	Friction coefficient(dry/wet): 0.37/0.36 Stainless steel surface friction coefficient at wet:0.17	Non slippery		

	No.	Lot	Α	В	С	D	Anchor (pair)	Weight	Withstanding load	
	HS ♦ T-15L450		444		26			1.6kg		
150x150 tiles HS♦T-15L750 4 744 144 24 80 HS♦T-15L900 894 23	2	2.3kg								
	80		3.0kg	1.5kN (150kgf)						
	HS ♦ T-15L900		894		23		3	4.4kg	(150kg1)	
	HS ♦ T-15L1200		1194		20			4.8kg		
	HS ♦ T-20L600		596		25	6	2	3.4kg		
200×200	HS ♦ T-20L800		796	100	25	00		4.4kg	1.5kN	
tiles	4 700 801	3	5.5kg	(150kgf)						
	HS ♦ T-20L1200		1196		20			6.3kg		

Notes for Ordering

*Please specify a drain hole design code at \Rightarrow :Wave (W),square (S),or circle (C).
Please specify a color code at the end of the part number: Champagne gold (C), Yellow gold (Y), Champagne gold gradation(CG), Yellow gold gradation(YG), premium black (P). Example: When you specify the wave design and champagne gold color: HSWB-15L450-C

*Depending on request, we can manufacture special order-made products with non-standard dimensions. For W82 the length can be customize up to 4000 mm.

*Custom sizes available. *The pipe hole can be customize according to the request. *Minimum order request 5 set.



RAFFINE GRATING

Durable and Prestige

NEW PRODUCT AWARD ARCHIDEX D ARCHIDEX D ARCHIDEX D

Wood Raffine was chosen as the 'New Product Award' category at Archidex 17 for its unique and luxury features.

A Premium grade Grating made of Walnut Wood especially for indoor use.



Round upper surface makes you feel comfortable and prevent slippage.

The gaps between bars are 6 mm or less which prevent the risk of getting children's foot finger caught.

Thin layer coating has been applied in order to keep the wooden feeling.

You won't feel cold stepping on Wood Raffine in winter season.



Antifungal has been processed to avoid growth of fungus.



appearance.

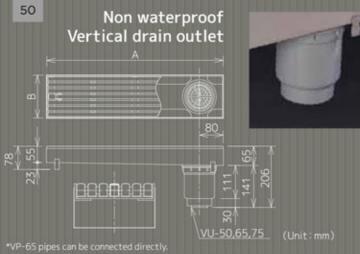
A Premium grade Grating made of Walnut Wood which is exceptionally durable and beautiful. Walnut wood; A very strong and stable wood with rich color and the nice touch of contrast. Every component is designed, developed and produced in-house to the highest international standard. It has been developed not only to upgrade your shower room, lifestyle but also considering its lifelong durability. Wood Raffine is the beauty of a shower room, transforms a normal shower space into an amazing space.

Material and specifications

Members	Materials	Finishing	Note
Top cover	Walnut (natural wood) +SUS304	Coating with a wooden surface feeling	Antibacterial and antifungal
Main body	SUS304	-	-
Trap portion	SUS304 +Resin	-	
Waterproof inlet	Cast iron +chloroprene	Cationic electrodeposition	Only for waterproof type

For 150 x 150 tiles:Top cover has 7 bars For 200 x 200 tiles:Top cover has 10 bars

Test items	Contents of test	Evaluation
Load bearing test	The total weight load of a wheel chair has been imposed on one wheed(Ф50). The test was followed based on JIS A 1450.	No significant bend or residual deformation within the range of withstanding load indicated in the pecifications.
Chemical resistance test	Apply alkaline, neutral, and acidic chemicals once a day × 14 days	No abnormality in appearance.
Warm water resistance test	Immerse product in 60°C warm water for 7 days.	No change of color or deformation
Impact resistance test	Drop a 20 mm radius ball of 1.2 kg from the height of 1 m.	No crack or breakage
Heat resistance test	70°C × 72 hr, exposure duration:2 hr	No abnormality in appearance.
Moisture resistance test	40°C and humidity of 95% × 24 hr	No abnormality in appearance.
Hot water resistance test	87*C×48hr	No change in weight or change of color or in appearance to the exte that may disrupt use.
Heating/ cooling cycle test	Minus15°C (30 min) ++ room temperature (20°C×3 min) ++ 70°C (30 min) =1 cycle, number of cycles:25, exposure duration at room temperature:2 hr	No abnormality in appearance.
Antibacterial test	JIS Z 2801	Antibacterial activity value of 2.0 or higher
Antifungal test	The test is implemented in accordance with JIS Z 2911(Methods of test for fungus resistance).	No growth of myceliu was observed.
Abrasion test	Move a nylon scrub brush back and forth 10 thousand times with a pressing force of 20 Nf.	No abnormality in appearance.
Immercion test	Room temperature(20°C)×8 hr.↔Dry(60°C)×16hr.,	No abnormality in



*VP-65 pipes can be connected directly.
VP-50 and -75 pipes can be connected through sockets.

For 150 x 150 tiles

П	non waterproof	Part number of non waterproof horizontal drain outlet	A	В	Anchor (pair)	Weight
Set	HWFT-15L600	HWFY-15L600	594	144	2	4.2kg
Cover	HWF-15L600-11	HWF-15L600-11	583	134	-	2.7kg

Non waterproof Horizontal drain outlet



For 200 x 200 tiles

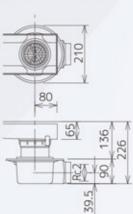
	Part number of non waterproof vertical drain outlet	Part number of non waterproof horizontal drain outlet	A	В	Anchor (pair)	Weight
Set	HWFT-20L600	HWFY-20L600	596	196	2	5.0kg
Cover	HWF-20L600-11	HWF-20L600-11	585	186		3.1kg

Waterproof Vertical drain outlet (Unit: mm)

For 150 x 150 tiles

	Part number of waterproof vertical drain outlet	Part number of waterproof horizontal drain outlet	А	В	Anchor (pair)	Weight
Set	HWFB-15L600	HWFZ-15L600	594	144	2	4.2kg
Cover	HWF-15L600-11	HWF-15L600-11	583	134		2.7kg

Waterproof Horizontal drain outlet



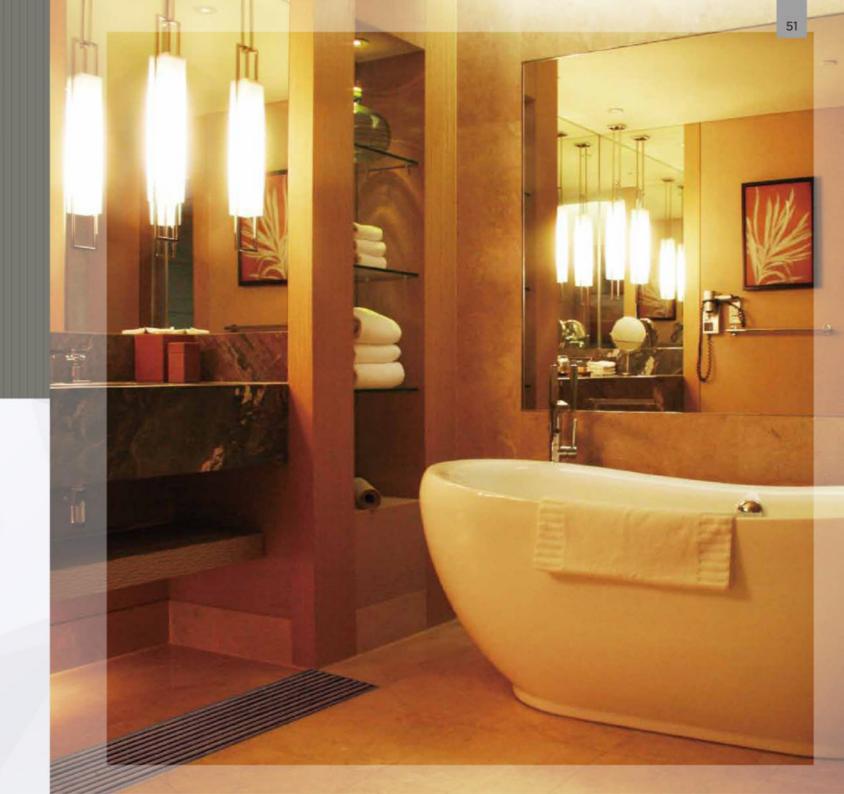
(Unit: mm)

For 200 x 200 tiles

	Part number of waterproof vertical drain outlet	Part number of waterproof horizontal drain outlet	A	В	Anchor (pair)	Weight
Set	HWFB-20L600	HWFZ-20L600	596	196	2	5.0kg
Cover	HWF-20L600-11	HWF-20L600-11	585	186	_	3.1kg

Notes for Ordering

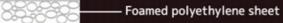
- * Depending on your requests, we can manufacture special order products with other than standard dimensions. * The maximum length of the wooden grating is 600 mm. * Custom sizes available. * The pipe hole can be customize a according to the request. * Minimum order request 5 set.





[Back side specification]

Three-layer structure



Synthetic resin (Polypropylene, polyethylene)Mirror main body (SUS304)

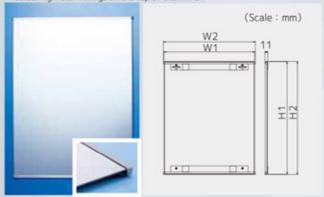






Burglar-proof metal fitting type (KSN)

**When constructing, please secure a clearance of 30 mm which is necessary for attaching metal fittings on the top of the mirror.

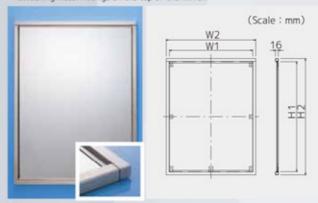


KSN

No.	Dimensions of the mirror		Dimensio	ons when bracket	Lat	W-:
	W1	H1	W2	H2	Lot	Weight
KSN-3545	357	455	361	457	-	2.4kg
KSN-4560	460	608	464	610	5	3.9kg
KSN-4590	460	910	464	912	3	5.6kg

Four-side frame metal fitting type(KSS)

**When constructing, please secure a clearance of 30 mm which is necessary for attaching metal fittings on the top of the mirror.



KSS

Ma	Dimer of the	nsions		ons when	1.4	Wataba		
No.	W1	H1	W2	H2	Lot	Weight 3.3kg		
KSS-3545	357	455	391	491	-	3.3kg		
KSS-4560	460	608	494	644	5	5.1kg		
KSS-4590	460	910	494	946	3	7.2kg		

<Caution>

- * If you wish to use it at a wet location such as a bathroom, please be sure to caulk the gap between the mirror and wall in order to prevent water from entering the gap.

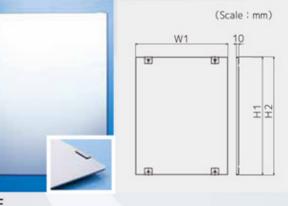
 * Depending on request, we can manufacture special order-made products with non-standard dimensions and color.

- * Depending on request, we can manufacture special order-made products with non-standard dimensions. The highest dimension can be 1200*2400.

 * Custom sizes available * Minimum order request 20 pcs.

Four-points securing metal fitting type(KSF)

**When constructing, please secure a clearance of 30 mm which is necessary for attaching metal fittings on the top of the mirror.



No.	Dimer of the	nsions mirror	Dimensio		Lat	Wainht		
NO.	W1 H1		W2	H2	Lot	Weight		
SF-3545	357	455	357	457	-	2.1kg		
SF-4560	460	608	460	610	5	3.6kg		
SF-4590	460	910	460	912	3	5.4kg		

Wood frame type (KSW)

*When constructing, please secure a clearance of 30 mm which is necessary for attaching metal fittings on the top of the mirror.



KSW

No	Dimer of the	nsions mirror	Dimensio	ons when bracket	Lak	Mainh		
No.	W1 H1		W2	H2	Lot	Weight		
SW-3545	357	455	379	479	-	2.5kg		
SW-4560	460	608	482	632	5	4.1kg		
SW-4590	460	910	482	934	3	5.9kg		



Arita Ware Cerahand

Luxury Is In Each Details

Traditional Cerahand of Japan 日本を代表する伝統工芸

Arita ware is one of the world's famous porcelain fired in the vicinity of Arita-cho in Saga Prefecture. It has over 400 years of long history and Japan's first porcelain. In 1653, Arita ceramics were exported to European countries by Dutch East Indian Company (Vereenigde Oostindische Compagnie). They were especially popular with European nobles who used the somenishiki's dishes, the large jars, and the bowls. Arita ceramics started to undergo some changes to adjust to the European lifestyle.

Designs accorded with the seasons enriched the arts and way of life in the traditional Japanese society. Printed figures represent the beauty of Japan's tradition which is why these figures are done very carefully by the specially trained craftsman. This luxury porcelain ceramic grab bar is contained with anti-bacterial agent does not only looks vibrant, vivid and colorful but also feels astonishing.



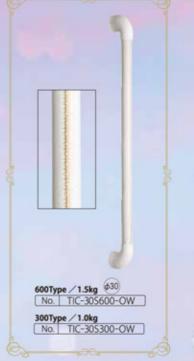












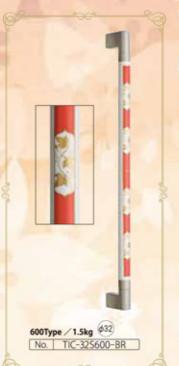




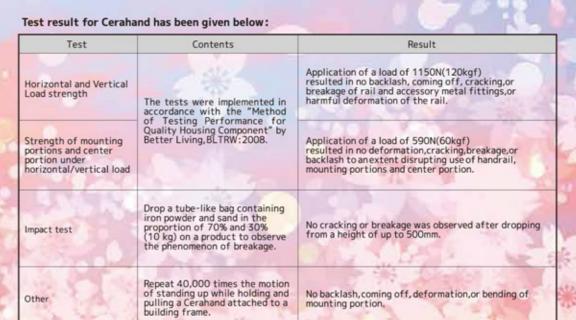


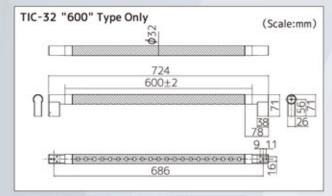












Please make sure the following type number:

600Type

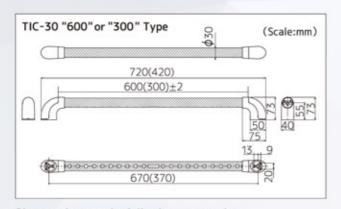
- ●TIC-32S600-CW ●TIC-32S600-KIK ●TIC-32S600-KIH
- ●TIC-32S600-KIC ●TIC-32S600-IE ●TIC-32S600-SBS
- ●TIC-32S600-SWS ●TIC-32S600-SSS ●TIC-32S600-BR
- ●TIC-32S600-BB ●TIC-32S600-IW

Body: Ceramic, Mortart, Stainless Bolt, Resin cap, Attached bis Metal Fittings: Aluminum, Cation, Painting clothing, Acrylic baking finish









Please make sure the following type number:

600Type

- ●TIC-30S600-TSG ●TIC-30S600-OW ●TIC-30S600-KKB
- ●TIC-30S600-SKR ●TIC-30S600-YP

300Type

- ●TIC-30S300-TSG ●TIC-30S300-OW ●TIC-30S300-KKB
- ●TIC-30S300-SKR ●TIC-30S300-YP

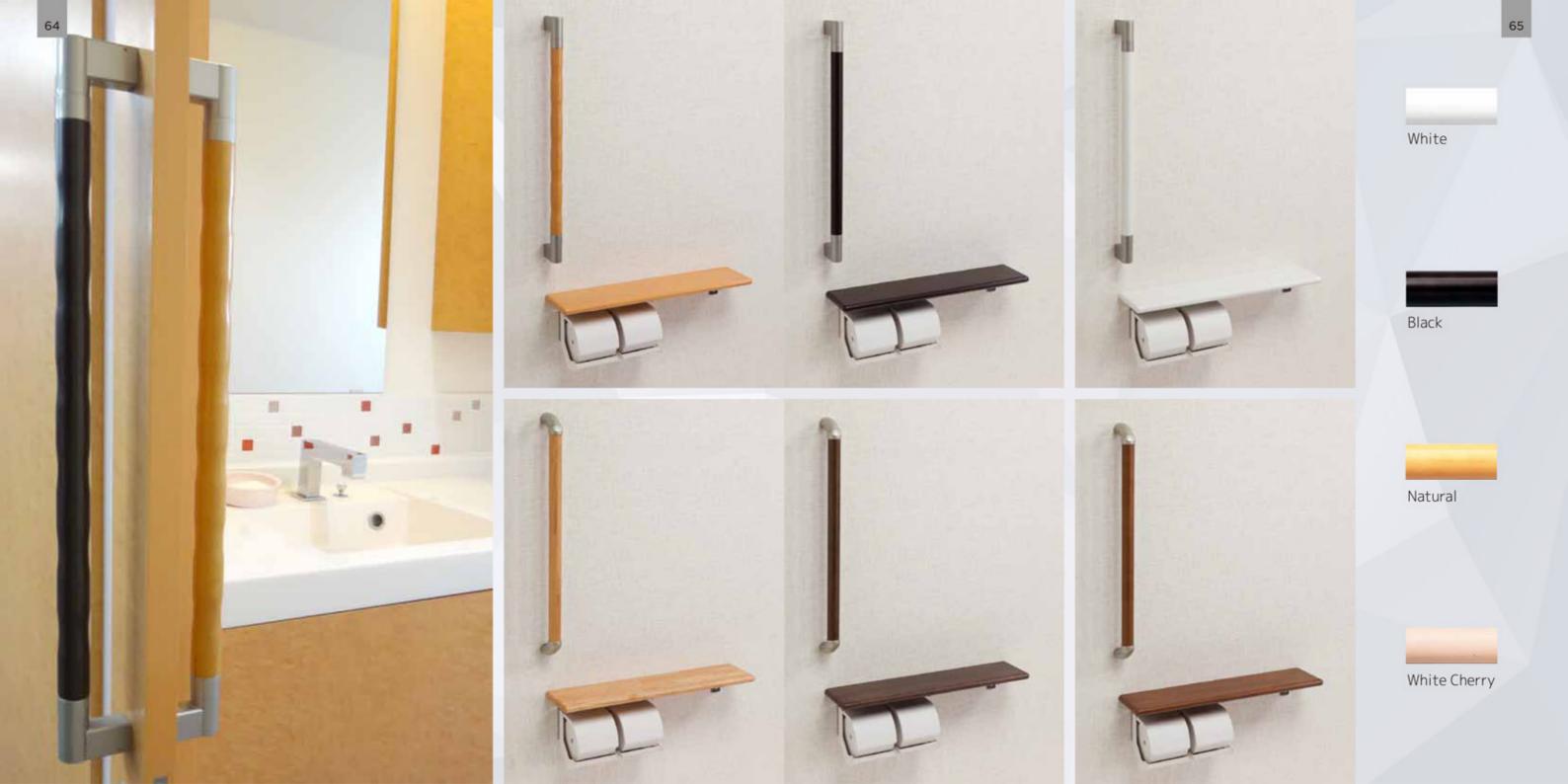
Body: Ceramic, Mortart, Stainless Bolt, Resin cap, Attached bis Metal Fittings: Zinc Alloy, Acrylic Baking Finish

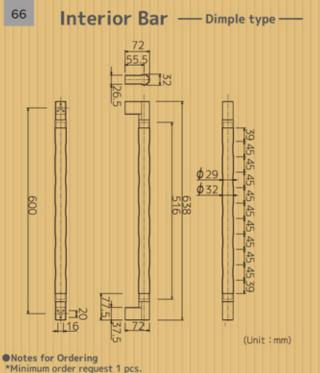






SIMPLE DESIGN
MAPLE WOOD
SOLID GRIP
LIGHT WEIGHT





TIWS-32S600-N

TIWS-32S600-S

TIWS-32S600-N Natural TIWS-32S600-D Dark

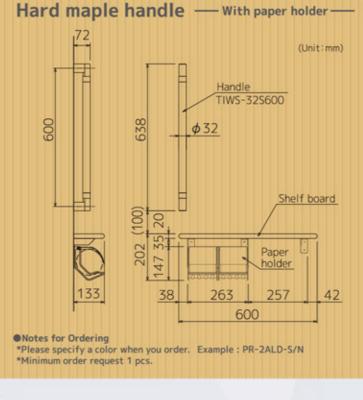
TIWS-32S600-S Snow White

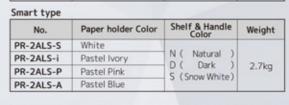
TIWS-32S600-C White Cherry

(Snow White)

(Natural)







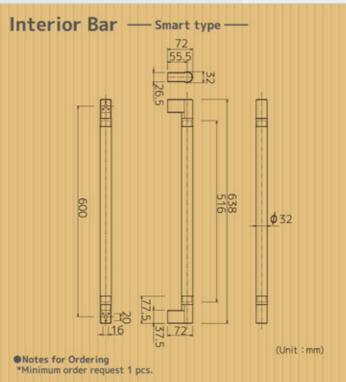


TIWS-32S600-D

TIWS-32S600-C (White Cherry)

Color

(Dark)

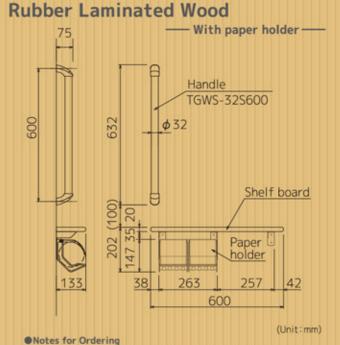




No.	Body Color	Shelf · Handle Color	Weight		
PR-2BLS-S	White				
PR-2BLS-i	Pastel Ivory	N (Natural)	2.51		
PR-2BLS-P	Pastel Pink	B (Brown)	2.5kg		
PR-2BLS-A	Pastel Blue	7			



No.	Paper holder Color	Shelf & Handle Color	Weight
PR-2ALD-S White			
PR-2ALD-i	Pastel Ivory	N (Natural)	
PR-2ALD-P	Pastel Pink	D (Dark) S (Snow White)	2.7kg
PR-2ALD-A	Pastel Blue	3 (Snow White)	



*Please specify a color when you order. Example : PR-2BLS-S/N *Minimum order request 1 pcs.

М	IEMO	 							