



PROJECT		REF		REV	ITEM CODE	
LOCATION		DATE			PAGE	

## SANITARY WARE SPECIFICATION SHEET

Item Descriptions	Stern (Israel) "Smart" Chrome plated deck mounted sensor faucet in 9V DC Supply with <b>IP67 waterproof battery box</b>	<p>Illustration/ Drawing</p>
Dimensions	L60 x W44 x H142 mm	
Model	Smart B	
Code Number	235100	
Finish	Chrome Plated	
Supplier	Acme Sanitary Ware Co. Ltd Mr. Eric Wong/ Mr. Don Yuen	
Contact Tel/Fax	(852) 2388-7171 / (852) 2710-8012	
E-mail	acme@acmesanitary.com.hk	
Website	www.acmesanitary.com.hk	

**SMART B Ref # 235100**  
Touch free electronic faucet for deck mounted installations. Activated by an infrared sensor. For cold or premixed water. Filters included. Chrome plated body, other finishes available. Includes a low battery indicator. Latching solenoid valve is located above deck inside the product for added vandal protection. Regular faucet installation with simple battery connection. Adjustable setting by remote control: sensor range, security time, delay in, delay out, on-off and reset to factory settings. 24 hour mandatory hygiene flush available upon request.

**Application:**

Deck-mounted faucets. Combining an elegant minimalist design with anti-vandal features. Easy installation. Long lasting even in the harshest installation sites. Helps washrooms stay clean and saves water. Prevents cross contamination. Ideal for stadiums, train and bus stations and highway rest stops.

**Use:**

Touch-free electronic faucet. The faucet is automatically activated when the users place their hands in the sensor range and stops when the users remove their hands.

**PRODUCT AT A GLANCE**

Installation	Deck-mounted
Power Supply	• 9V battery • 9V transformer
Operating pressure	0.5-8.0 bAR / 7.0-116.0 PSI
Water supply	Cold or premixed water
Water flow	6 LPM / 1.58 GPM - SSR PCA stream
Water Saving Options	4 LPM / 1 GPM ; 3 LPM / 0.8 GPM 1.89 LPM / 0.5 GPM ; 1.3 LPM 0.35 GPM - PCA spray
Water temperature	70°C Maximum
Security Time	Auto shutoff after 90 seconds. adjustable by remote control

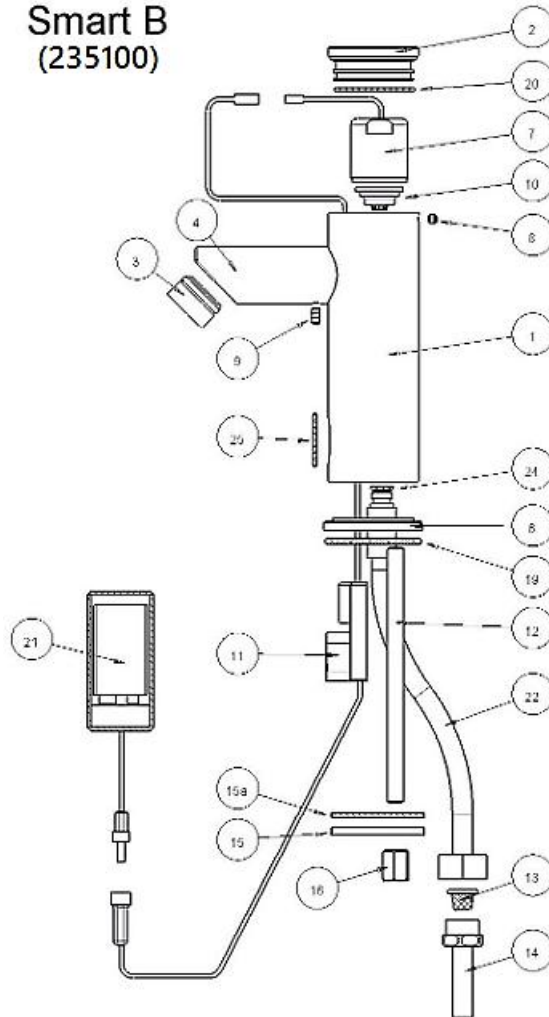
ORDERING INFORMATION			OPTIONS	
MODEL	CODE	POWER	OPTION	CODE
SMART B	235100	9V battery	Remote control	07100005
			Matching battery-powered soap dispenser	235920
			Matching transformer-powered soap dispenser combination	235900
SMART E	235200	9V transformer	Lead free versions	Upon request

- Installation:**  
Lavatory mounted
- Water supply:**  
Cold or premixed water (1 inlet)
- Water temperature:**  
Max 70 °C
- Operating pressure:**  
0.5 - 8.0 bar
- Power source:**  
9V Alkaline battery
- Stern Soap & Water:**  
Smart matching soap dispenser



## SPARE PARTS LIST

**Smart B  
(235100)**



Quantity	Part Number	Description	Cat. No.
	-	<b>Seals and Screws Kit</b>	<b>07210007</b>
1	20	O-ring	
1	19	O-ring	
1	15a	Gasket	
1	8	Screw	
1	9	Screw	
1	25	O-ring	
	-	<b>Sensor Kit</b>	<b>07220184</b>
1	11	Infra Red Sensor	
1	25	O-ring	
	-	<b>Filter Adapter Kit</b>	<b>07212001</b>
1	13	Filter	
1	14	Nipple	
	-	<b>Cover Kit</b>	<b>07270003</b>
1	2	Cover	
1	20	O-ring	
	-	<b>Solenoid Valve Kit</b>	<b>07230003</b>
1	7	Solenoid valve	
1	10	Diaphragm	
	10	<b>Diaphragm</b>	<b>04500001</b>
	21	<b>Battery box</b>	<b>06530018</b>
	21	<b>IP 67 Battery box</b>	<b>06530019</b>

**Note:** In order to locate the relevant spare part, please check the corresponding parts and part number in the drawing. Minimum order quantity will be required.

*\* All information of the above is for the reference only. No prior notice is made if any changes.*



Water Services Department

二打道七號入境事務大樓 48 樓

48/L, Immigration Tower, 7 Gloucester Road, Wan Chai, Hong Kong

本署檔號 : ( 12 ) in WSD 3321/19 T/J(603/2019)  
Our ref.  
來函檔號 :  
Your ref.

電話 :  
Tel.  
傳真 : 2824 0578  
Fax.

29 April 2020

### Approval of "STERN" Sensor Tap (General Acceptance No. B20200029)

Your letter ref. HX/W/1589/19 dated 18 June 2019 and subsequent submissions received by this department up to 20 April 2020 refer.

It is noted that the fitting described below has been accepted by the United Kingdom Water Regulations Advisory Scheme (WRAS) to have complied with the requirements of the United Kingdom Water Supply (Water Fitting) Regulations / Scottish Water Byelaws when correctly installed. This Authority accepts that the fitting described below based on the WRAS certificate and test report ref. 190492PC190015C issued on 9 April 2020 by Fugro Technical Services Limited complies with, and its use when correctly installed does not contravene, the Waterworks Ordinance and Regulations.

**Name of Manufacturer:** Y Stern Engineering (1989) Ltd

**Country of Origin:** Israel

**Brand:** Stern

**Details of Fitting:** 'Smart' range of basin mounted sensor tap (chromium plated brass). The flow is controlled via a solenoid valve and activated by an infra-red sensor on the front of the



spout. Maximum working pressure 8.0 bar. Maximum operating temperature 70°C.

**Model:** Smart B

**Size:** Stainless steel braided PEX lined hose assembly incorporating 3/8" BSP captive nut end connection

**Body Markings:** *Smart* on tap body

**WRAS Approval Number:** 1610700

**Installation Requirements:** R001, R006, R009

**Expiry Date:** 31 October 2021

In view of the acceptance by WRAS, this Authority has no objection to the use of the said fitting in fresh water plumbing systems subject to full adherence to Waterworks installation requirements. In particular, you are required to draw your customers' attention to the following installation requirements –

“Installation shall comply with the ‘Installation Requirements & Notes’ of the WRAS’s approval letter concerned.”

“A stop cock or gate valve must be installed at the upstream of the fitting for manual isolation of water supply.” AND

“The main voltage operated sensor valve should comply with the electricity safety regulation for applications in bathroom, toilet etc.”

A condition of this acceptance is that the fitting to be installed should be replicas of the sample certified by WRAS and no modification should be made to the fitting. This acceptance may be withdrawn at any time if the standard of the fitting installed fails to meet that of the approved sample or if the fitting is found to be unsuitable for use in fresh water plumbing systems.

This acceptance is only applicable to the main body of the fitting, unless otherwise specified.

For the use of the fitting in any project, the General Acceptance Number of this letter must be quoted as a means of identification of acceptance of the fitting by this Authority.



Should you have any enquiries, please contact our Engineer Mr. Terry KUNG at tel. no. 3583 4086.

Yours faithfully,



(CHAN Chung-kun)

for Director of Water Supplies

Encl.

c.c.      WSD 3321/1/82 ] - without catalogue  
            ME/MC        ] - with soft copy only



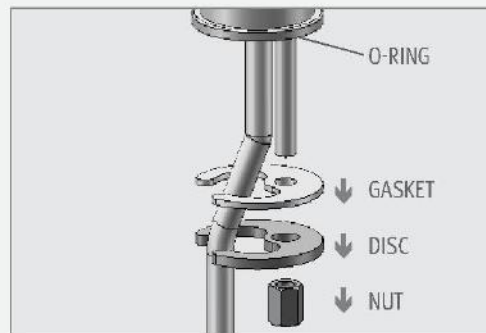
## INSTALLATION

### STEP 1 – PREPARATION FOR MOUNTING THE FAUCET

1 Shut off the water supply.

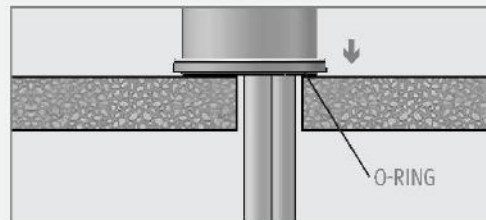


2 Remove the hexagonal nut, the disk and the gasket. Do not remove the O-ring from the base of the faucet.

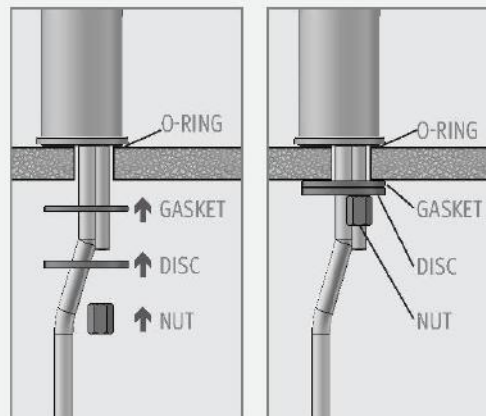


### STEP 2 – INSTALLING THE FAUCET

1 Place the faucet with O-ring into the hole in deck or lavatory. Make sure the O-ring is located between the deck or lavatory and the bottom of the faucet.



2 Slide the gasket, disk and hexagonal nut over the flexible hose and secure the faucet into place.





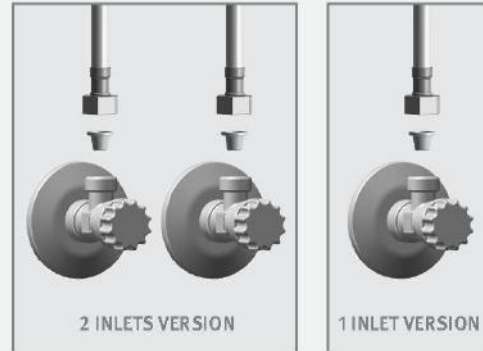
## INSTALLATION

### STEP 3 – CONNECTING THE WATER SUPPLY

1

Connect the flexible pipe to the water supply.

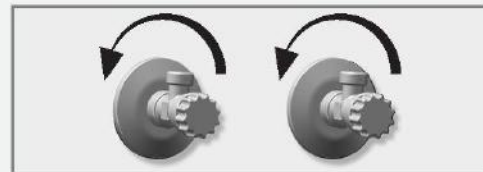
*For models with temperature control connect the red flexible pipe to the hot water supply and the blue flexible pipe to the cold water supply.*



**MAKE SURE THAT THE FILTER(S) IS/ARE INSTALLED BETWEEN THE FLEXIBLE PIPE AND THE SHUT OFF VALVE (ANGLE VALVE) (NOT SUPPLIED).**

2

Turn on the central water supply and the shut-off valves (angle valves) and check for leaks.



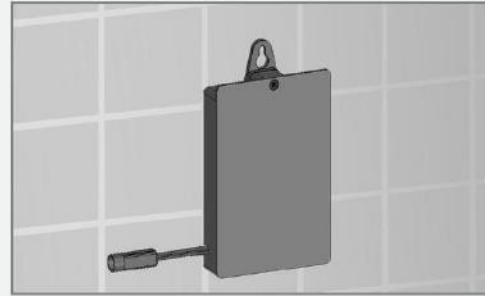


## INSTALLATION

### STEP 4 – CONNECTING THE POWER SOURCE

#### BATTERY VERSION

Install the battery box at the wall underneath the sink using the two sided adhesive foam tape. The cable connection must point down. (You can use an optional extension cable in order to assemble the battery box up to 10ft. away from the sink.)



1

#### TRANSFORMER VERSION

Plug the transformer into the electricity socket and connect the connectors.



2

In order to avoid entering into the adjusting mode, wait 10 seconds before operating the faucet. If the range is unsatisfactory, refer to the section titled “settings adjustment.



ABOUT  
**10**  
SECONDS

NOTE: This model includes a special aerator that allows you to adjust the water stream direction on site in order to prevent water splashing if needed. To change the angle of the water stream, simply move the adjustable tilting plate by pressing it smoothly.

**ATTENTION!** the aerator is tightened to prevent removal by hand.







## TROUBLESHOOTING

PROBLEM	INDICATOR	CAUSE	SOLUTION
No water coming out of the faucet:	1. Sensor flashes continuously when user's hands are within the sensor's range.	Low battery.	Replace battery
	2. LED in the sensor does not flash once when user's hands are within the sensor's range.	1. Range is too short.	Increase the range
		2. Range is too long.	Decrease the range
		3. Battery is completely used up	The battery must be replaced.
	3. LED in the sensor flashes once when user's hands are within the sensor's range.	4. Unit is in "Security Mode"	
		5. Sensor is picking up reflections from the washbasin or another object.	Eliminate cause of reflection.
1. Connectors between the electronic unit and solenoid are disconnected.		Connect the electronic unit connectors to the solenoid.	
2. Debris or scale in solenoid.		Unscrew solenoid, pull out the plunger and the spring from the solenoid and clean them. Use scale remover material if needed. When replacing the plunger, please make sure that the spring is in vertical position.	
3. The central orifice in the diaphragm is plugged or the diaphragm is torn		Clean the orifice or replace diaphragm.	
4. The water supply pressure is higher than 8 bar.	Reduce the supply water pressure.		
	5. The water supply pressure is under 8 bars and yet the pressure in the faucet's body is higher. This situation could be caused by a sudden increase in the water supply pressure that the back check prevents from dropping, even after water supply pressure drops under 8 bars.	Shut off water supply and unscrew one of the flexible pipes in order to reduce the pressure that blocks the product.	
Water flow from spout does not stop:	1. Sensor flashes once when user's hands are within the sensor's range.	Debris or scale in diaphragm	Clean the orifice or replace diaphragm.
	2. LED in the sensor does not flash once when user's hands are within the sensor's range.	1. Sensor is dirty or covered.**	Clean or eliminate cause of interference.
		2. Sensor is picking up reflections from the washbasin or another object.	Decrease the range or eliminate cause of reflection.
Water flow diminished		Filter or aerator is clogged	Remove, clean, re-install

\* "Security Mode": If the sensor is covered for more than 90 sec. the faucet will automatically shut off water flow. To return to normal operation remove any blockage.

\*\* In this case, the water flow will stop anyway after 90 seconds because of the security time.