

1.0 DESCRIPTION 規範

- With alarm switch type, weather proof IP65
- Without alarm switch type

Service: Liquid & Oil

Flow Range: 1~4LPM, 1~10LPM, 2~20LPM, 3~30LPM, 4~40LPM, 5~50LPM

Material: Body- Polycarbonate (P.C) or Polysulfone (PSU) available;
O-ring- Viton; Float- Magnet cover with PPS plastic, and if the liquid temperature>80°C, the float coating should be PVDF; Connection-SS316, Plastic (PP,PVC,PVDF) available; Spring-SS316

Connection Size: 3/8", 1/2", 3/4"NPT female available

Mounting: Vertical and Horizontal available; various flow directions

Pressure Limit: 300psig (20bar) @100°F (38°C)

Temperature Limit:

- PC body tube with SS316 or PVDF connection: -5°C ~ +80°C
- PC body tube with PP or PVC connection: -5°C ~ +54°C
- PSU body tube with SS316 connection: -5°C ~ +120°C
- PSU body tube with PVDF connection: -5°C ~ +120°C

Accuracy: ±5% full scale

Alarm Switch: One setting point, form A N.O. type bistable switch

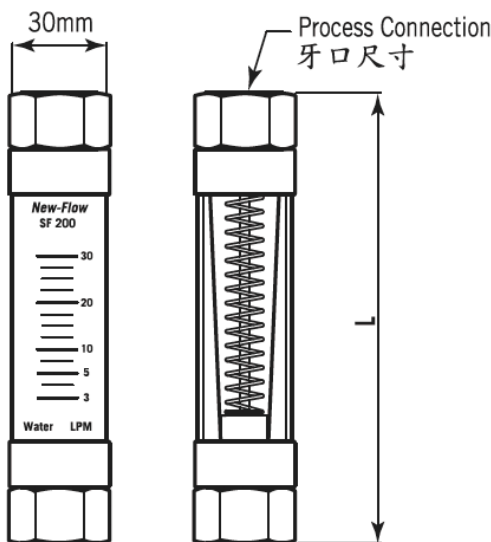
Switch Rating: AC 125V 0.5A/ DC 100V 10W/ Max. DC 250V<1mA

Weight: approach 0.35kg (plastic)

(Contact setting point should be within 10% to 80% of F.S)



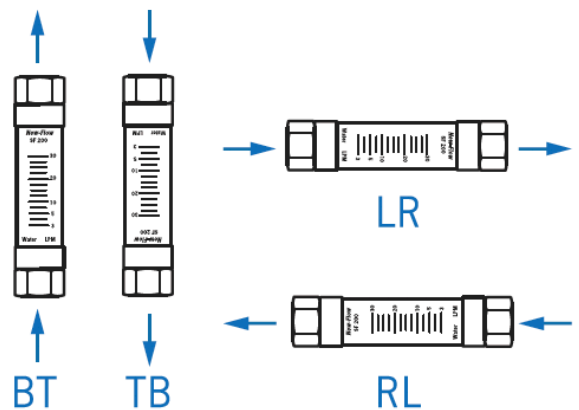
2.0 DIMENSIONS 尺寸



Process Connection / L Length:
牙口尺寸/總長:

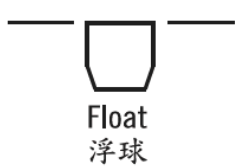
1. 3/8"NPT(F) / L=134mm
2. 1/2"NPT(F) / L=134mm
3. 3/4"NPT(F) / L=162.5mm (Note.1: switch type is unavailable for this size)
(此尺寸不適用於附開關)

3.0 FLOW DIRECTION TYPES 流向



BT: Bottom to Top / 下→上
TB: Top to Bottom / 上→下
LR: Left to Right / 左→右
RL: Right to Left / 右→左

4.0 FLOW READING 流量讀值



Actual Flow Rate

Keep your eyes at the same level of the flowmeter and scales to read the flow rate.

正確流量讀值

水平直視浮球頂端並配合流量計之刻度線，其讀值為目前流量。

5.0 INSTALLATION 配管方式

1. Before installation, make sure your pressure, temperature, fluid and other requirements (flow direction, pipe size and flow rate range) are compatible with the meter.

2. CORRECT INSTALLATION (as Fig.A):

- Use Two Wrenches

The body process connection must be fixed by one of the wrench at first, and then rotating the other wrench. This is in order to avoid making the plastic body broken-down.

- Center Line

Align the flowmeter to the inlet and outlet pipe to install the flowmeter.

- Use Teflon Tape

Use an appropriate amount of Teflon tape on external pipe thread before making the connection.

3. When doing pipe run, make sure no foreign objects, such as teflon tapes, trapped inside the pipes.

4. Because the flowmeter is made of plastic. Do Not put packing around the body tube.

5. After installation, open the valve slowly. If you open the valve too rapidly, it will casuse the liquid to flow too fast suddenly; it will result in unusual pipe vibration. (as Fig.B)

(1) 安裝流量計之前，必須先確認流量計之操作壓力、溫度、流量及流向、管徑、流量範圍等。

(2) 正確的安裝方式 (請參考圖A):

-必須使用兩個扳手

首先使用其中一個扳手固定流量計本體的六角頭，切勿轉動；另一個固定於pipe上的扳手則可旋轉，用於安裝。此為避免流量計之壓克力本體因不銹鋼管加壓而導致毀損。

-中心線

流量計與上下配管之中心線必須一致方可安裝。

-止洩帶

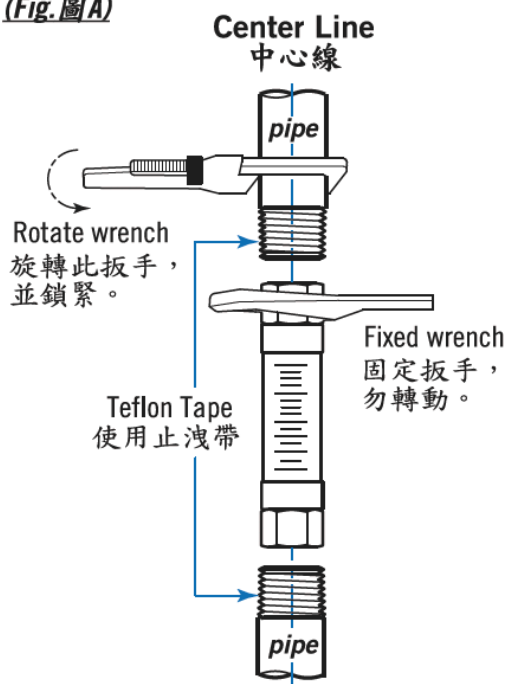
上下配管的螺紋部位請捲上止洩帶。

(3) 配管時，請注意切勿讓止洩帶等異物進入到配管中。

(4) 此流量計為塑膠/壓克力製品，請勿在本體接管部附著墊圈。

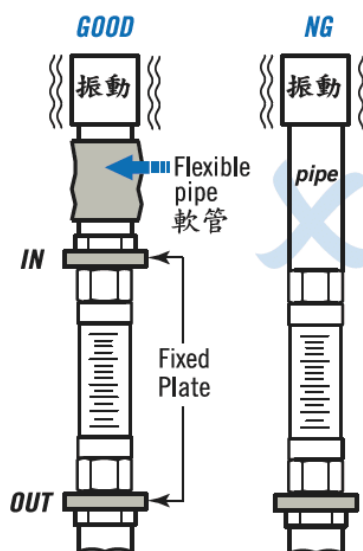
(5) 完成步驟1~4後，請緩緩將球閥打開，慢慢釋放流體。若球閥呈全開狀態，其急速的流體將使配管產生劇烈的振動，且浮球無法正常作動。(請參考圖B)

(Fig.圖A)



(Fig.圖B)

Installation Advice for Against Vibration 振動管線在設置上需注意事項



NOTE.

Stabilize both ends of the flowmeter to prevent vibration and stress; because the tapered tube is made of plastic, too much vibration and excess stress can cause the tapered tube to break.

請在流量計的兩端進行固定，以防止振動中的配管所產生的壓力造成塑膠本體破裂。

6.0 NOTICE OF INSTALLATION 安裝注意事項

1. Do Not place the flowmeter at unsafe area. It will damage body tube if flowmeter falls.
 2. When doing pipe run, make sure to use two wrenches. Please refer to the Fig.A on page 2.
 3. Securely and carefully uninstall the flowmeter. Pay attention if any liquid from the detected medium remains in the flowmeter.
- (1) 勿將流量計安裝於不穩定的位置。一旦掉落將會造成流量計塑膠管本體破裂。
 (2) 配管時，務必使用兩個扳手，請參考上頁圖A。
 (3) 欲卸除流量計時，請注意是否有任何流體介質殘留於流量計本體中。

7.0 WIRING STEPS FOR ONE ALARM SWITCH TYPE 安裝開關步驟



Fig.1: The finished product of SF200 configures with alarm switch.
SF200加上開關之成品圖。

Fig.2: Use a cross-head screwdriver to loosen a screw and separate a part of alarm switch from the flowmeter body.(as Fig.3)
使用十字螺絲起子將開關和流量計本體拆開，如圖3。

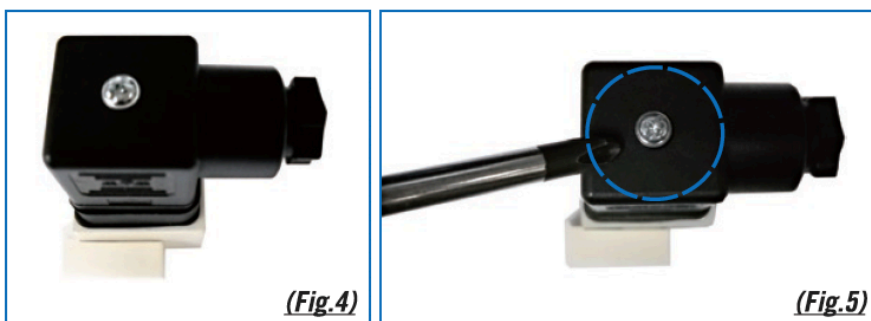


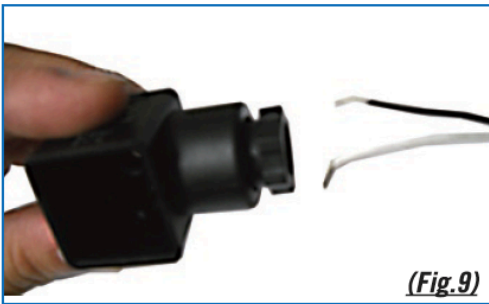
Fig.4/5: Use a cross-head screwdriver to loosen the screw on the top of switch housing.
使用十字螺絲起子將接線盒上方螺絲拆開。



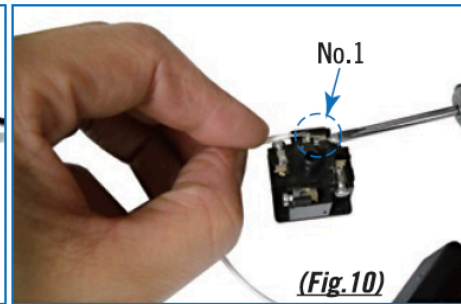
Fig.6: There is an indication number marked under the male connector.
接線盒下方有數字標示。

Fig.7: Use a mini size of flat-head screwdriver to take apart the top cover of female connector.
使用小尺寸的一字型螺絲起子將接線盒上半部輕輕拆開。

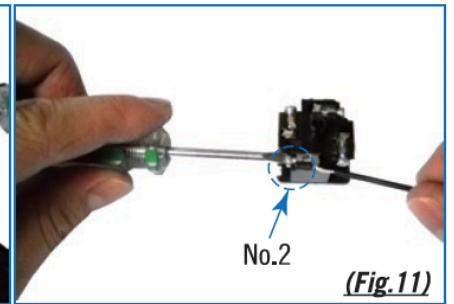
Fig.8: Please find out the position of No.1 and No.2 which are by the side of wiring holes.
拆開後會發現接線孔旁標示1及2的位置。



(Fig.9)



(Fig.10)



(Fig.11)

Fig.9: Put the electric wires into the conduit.

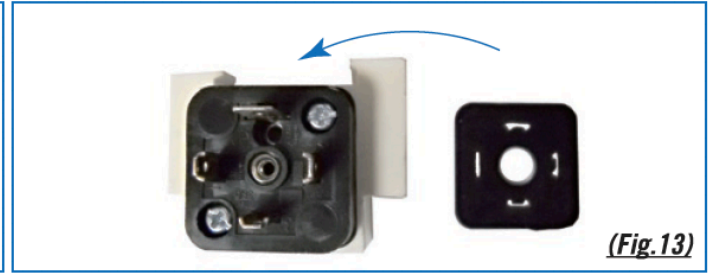
將電線由出線孔穿入。

Fig.10/11: Connect the electric wires with the wiring holes of No.1 and No.2 separately by a mini size of flat-head screwdriver.

用小尺寸的一字螺絲起子將兩條線分別鎖入標示1及2的接線孔上。



(Fig.12)



(Fig.13)

Fig.12: Finished the connected.

接線完成品。

Fig.13: Put and fix the insulated rubber on the male connector.

將黑色墊圈置入公接線端子。



(Fig.14)



(Fig.15)

Fig.14: Put the female connector back on the male connector.

再將母線端子和公線端子蓋起來。

Fig.15: Decide the suitable position of alarm switch by yourself, and use a cross-head screwdriver to fix the screw tightly.

And also, it can readjust the position by releasing the screw again.

成品如圖。如需要調整開關位置，可用十字螺絲起子調整螺絲鬆緊，即可調整位置，隨後再將螺絲鎖緊即可。

8.0 MAINTENANCE 維修

1. Clean the tapered tube when dirty.
2. The flowmeter body and other parts can be washed in a mild soap and water solution. Avoid solvents, alcohol and liquid soaps and avoid prolonged immersion; it will cause the flow body to crack and damage the body tube.
3. Use two wrenches to uninstall the flowmeter. The body process connection must be fixed by one of the wrench; and then rotating the other one wrench to uninstall the flowmeter.
4. The space between the float and the body tube is very narrow. Pay attention if dirt appears in this area.
5. When not in use during wintertime, release water in the flowmeter.

****CAUTION:** If flowmeter is disassembled by the customer, the product warranty is waived.

(1) 流量計本體中的錐形管變髒時，請清理。

(2) 清理時，請以紗布等柔軟的棉布沾水使用中性的清潔劑輕輕擦拭數次。切勿使用酒精等溶劑，否則將造成裂痕導致錐形管破裂。

(3) 欲將流量計由機台裝置上拆卸時，也必須使用兩個扳手。其中一個扳手固定流量計本體上的六角頭，切勿轉動；另一個於pipe上的扳手則可旋轉，用於拆卸。

(4) 流量計本體中的錐形管和浮球間間隙非常狹窄，請特別注意若有任何異物沉積於此處。

(5) 冬季不使用流量計時，請將流體排出。

****注意:** 若貴司自行拆解流量計之本體及配件，則不在保固範圍內。

9.0 LIMITED WARRANTY 保固期限及範圍

New-Flow (Golden Mountain Enterprise Co., Ltd.) warrants the components of their products, against any defect in materials and/or workmanship for a period of 12 months from the shipping date.

New-Flow's product warranty will be waived if:

1. Product has been modified or altered in a manner inconsistent with standard usage.
2. Product has been damaged due to abuse, misuse, or negligence, accident, fire, flood, wind, earthquake or other acts of God.
3. New-Flow reserves the right to issue and cease this warranty based on review of uncertain or doubtful product defect causes.

商品的保固期限為交貨至客戶指定地點後一年。在此保固期限內，若商品發生故障，則無償修理或以代替品交換。

下列情形不在保固範圍內：

- (1) 使用者之不當裝置，拆卸或錯誤使用。
- (2) 商品故障原因為人為疏失之不當使用，或是天災等意外。
- (3) 基於不可預知的狀況，敝司保留發行/終止保固期的權限。

10.0 NOTES 注意

1. Product price doesn't include outside technician service.
 2. Additional charges apply for the following service request:
 - a. Installation instruction and testing
 - b. Adjustment and repairs
 - c. Technical instruction and education
 3. New-Flow reserves the right improve/modify our products and conditions without prior notice.
- (1) 商品的價格不包含派遣技術專員等的服務費用。
 - (2) 以下項目將個別申請費用：
 - a. 安裝指導及試俾
 - b. 校正及維修
 - c. 技術指導及訓練
 - (3) 敝司為增進產品設計而做改良，不做先行通知。