Drawings

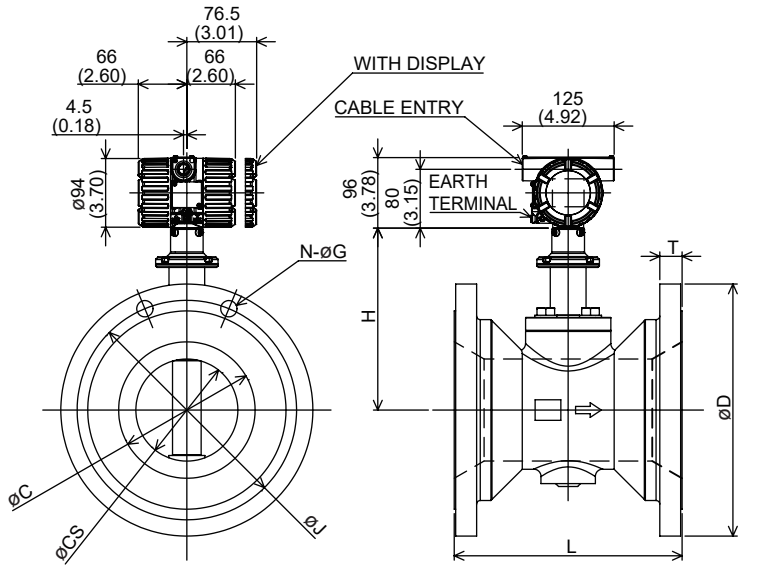
Vortex Flowmeter VY Series
VY200
Reduced Bore Type (1 Size Reduction)
Process Connection: EN Flange

SD 01F07E02-03EN

• Reduced Bore Type (1 Size Reduction): EN Flange (Size 200 mm(8 inch))

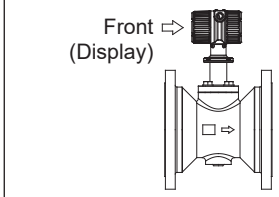
☐ Standard View (Without (8) option code: /RH)

Unit: mm (approx. inch)

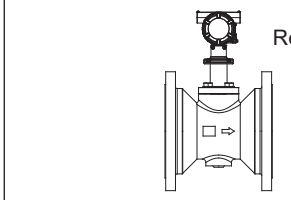


☐ With (8) option code: /RH

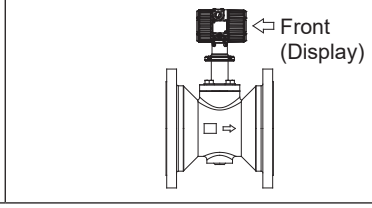
☐ +90 degrees selected



☐ +180 degrees selected



☐ –90 degrees selected



Flow Direction➡

VY□□□ -□□□ -1 □ □□ □□□□ -□ □ □□ □ 0 0 /□
(1) (2) (3) (4) (5) (6) (7) (8)

• Code details for SD

(1) Model	VY200: Size 200 mm(8 inch)
(2) Type of Body	-1: Reduced Bore Type (1 Size Reduction)
(3) Type of Shedder Bar	A: General type, B: General Type with Temperature Sensor, C: High Temperature Type, D: High Temperature Type with Temperature Sensor, G: Long Neck Type, H: Long Neck Type with Temperature Sensor
(4) Body&Shedder Bar Material	[Body Material & Shedder Bar Material] BL: CF8M&1.4517, BB: CF8M&CF8M, BH: CF8M&CW-12MW
(5) Process Connection EN Flange	[Body Material, Face, Pressure Rating] BBE☐: CF8M, Type B1, PN10 to 40 ☐: Pressure Rating, 1= PN10, 2= PN16, 3= PN25, 4= PN40
(6) Cable Entry : One : Two	0: JIS G1/2 Female, 2: ASME 1/2 NPT Female, 4: ISO M20x1.5 Female A: JIS G1/2 Female, C: ASME 1/2 NPT Female, E: ISO M20x1.5 Female, J and K: [Only for Japan Flameproof] ISO M20x1.5 Female
(7) Communication and Input/Output	JA: HART 7 communication, 4 to 20 mA DC, Pulse/Status output JB: HART 7 communication, 4 to 20 mA DC, Pulse/Status output, Analog input F0: FOUNDATION Fieldbus Communication M0: Modbus Communication, Pulse/Status output NN: None (Remote Sensor)
(8) Options	/RH: Cable Entry Direction Change /☐: Other Options (No effect for structual demension)

● Dimensions (Lay Length, Outer Diameter etc) and Weight for each Model

☐VY200		External Dimensions mm (approx. inch)						Weight kg(lb)*2
	(5) Process Connection Code: Body Material, Face, Pressure Rating	Lay Length L*1	Outer Diameter øD	Flange Thickness T	Bolt Circle Diameter øJ	No. of Bolt Holes N	Hole Diameter øG	
☐	BBE1: CF8M, Type B1, PN10	310 (12.2)	340 (13.39)	24 (0.94)	295 (11.61)	8	22 (0.87)	68.5 (151) [68.5 (151)]
☐	BBE2: CF8M, Type B1, PN16	310 (12.2)	340 (13.39)	24 (0.94)	295 (11.61)	12	22 (0.87)	68.5 (151) [68.5 (151)]
☐	BBE3: CF8M, Type B1, PN25	310 (12.2)	360 (14.17)	30 (1.18)	310 (12.2)	12	26 (1.02)	76.6 (168.9) [76.6 (168.9)]
☐	BBE4: CF8M, Type B1, PN40	310 (12.2)	375 (14.76)	34 (1.34)	320 (12.6)	12	30 (1.18)	78.9 (173.9) [78.9 (173.9)]

*1: Lay Length (L) tolerances are as follows:
• VY015 to VY200: ± 3.0 mm

*2: In case of Type of Shedder Bar: C, D, G or H, refer to the value in square brackets

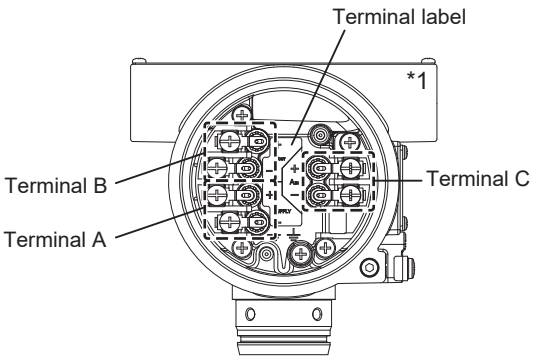
● Dimensions (height and diameters) for each Model

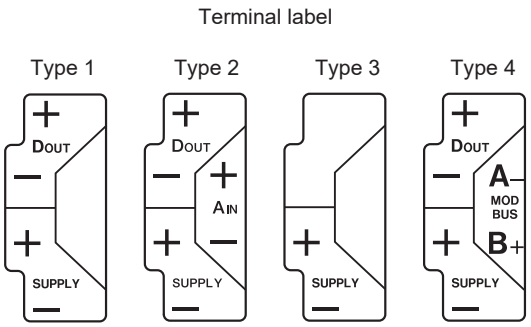
	(1) Model	(3) Type of Shedder Bar	(4) Body & Shedder Bar Material	Height H mm (inch)	Inner Diameter øC mm (inch)	Sensor Diameter øCS mm(inch)
☐	VY200	A, B: General type	BL, BH	244.5 (9.63)	185.6 (7.31)	138.8 (5.46)
☐			BB	251.5 (9.9)	185.6 (7.31)	138.8 (5.46)
☐		C, D: High Temperature type, G, H: Long Neck type	BL, BH	344.5 (13.56)	185.6 (7.31)	138.8 (5.46)
☐			BB	351.5 (13.84)	185.6 (7.31)	138.8 (5.46)

● Terminal Layout Diagram

☐ Integral Transmitter Case

Terminal screw size: M4



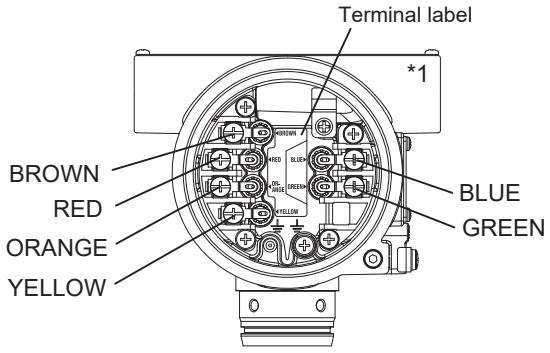


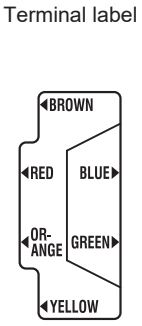
Terminal label	Communication and input/ output	Terminal A	Terminal B	Terminal C
Type 1	JA	SUPPLY +, SUPPLY – Power supply, HART communication and analog output	D_{OUT} +, D_{OUT} – Pulse/status output	–
Type 2	JB	SUPPLY +, SUPPLY – Power supply, HART communication and analog output	D_{OUT} +, D_{OUT} – Pulse/status output	A_{IN} +, A_{IN} – Analog input
Type 3	F0	SUPPLY +, SUPPLY – Power supply and FOUNDATION Fieldbus communication	– (*2)	–
Type 4	M0	SUPPLY +, SUPPLY – Power supply	D_{OUT} +, D_{OUT} – Pulse/status output	MODBUS A –, MODBUS B + Modbus communication

*1: When -0 (JIS G1/2 female, one electrical connection), -2 (ASME 1/2 NPT female, one electrical connection), or -4 (ISO M20x1.5 female, one electrical connection) is selected for the cable entry, it is only located on the right side in this view.
*2: Terminal B is a terminal block only and no screws are attached.

☐ Remote Sensor Terminal Box

Terminal screw size: M4





Terminal	Application
BROWN, RED, ORANGE, YELLOW, GREEN, BLUE (*2)	Connect the vortex fowmeter signal cable (VY1C)

*1: The cable entry is only located on the right side when viewed from the front.
*2: Match the colors of the vortex fowmeter signal cable (VY1C) with the corresponding terminals.