

Code:

9RG NN O CC CC

9RG	Flow Divider Typology
NN	Number of flow divider elements
O	Number of motor elements
CC	Motor Displacement Code
CC	Flow Divider Displacement Code

Example: Flow divider with two elements (same displacement) and Motor
RV-1G / 3,8 x 2 + 1 Motor 7,8

9RG 02 1 34 25

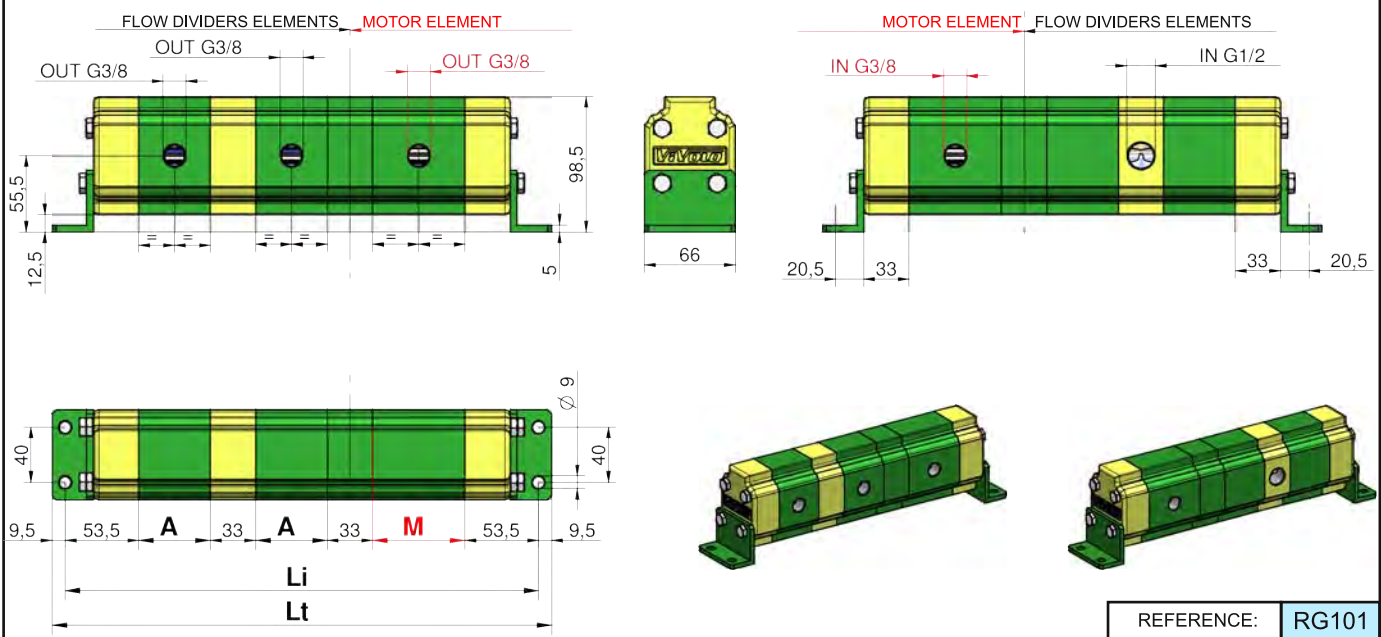
Example: Flow Divider 4 elements (different displacement - max 6) and Motor:
RV-1G / 3,8+4,9+4,9+6,5 + 1 Motor 9,8

9RG 04 1 36 25 29 29 32

NOTE: to define codes for flow dividers with more than 6 different displacement, please contact our sales department.

Table: 1

Displacem. Cm ³ /rev	CC Code	Max Pressure bar	One element flow rate l/min		
			MIN	RECOMMENDED	MAX
0,9	16	220	1	2	6
1,2	17	220	1,5	3	7
1,7	18	220	2	4	9
2,2	20	220	2,5	5	13
2,6	21	220	3	6	15,5
3,2	23	220	3,5	7,5	18
3,8	25	220	4	8,5	21
4,3	27	220	4,5	9,5	23
4,9	29	220	5,5	11	27
5,9	31	220	6,5	13	30
6,5	32	220	7,5	14	32
7,8	34	210	8,5	16	35,5
9,8	36	200	11	20	41

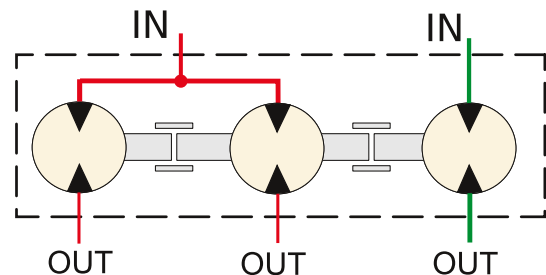
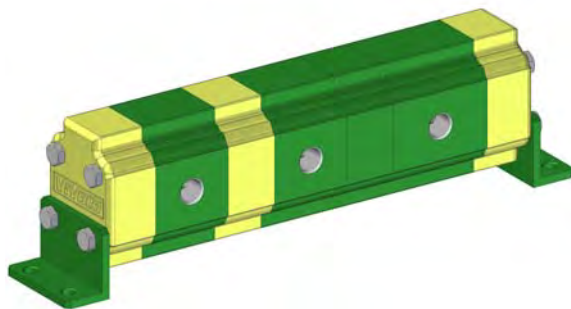


Cm ³ /rev	A-M
0,9	41,5
1,2	42,5
1,7	44
2,2	46
2,6	48
3,2	50
3,8	52
4,3	54
4,9	57
5,9	60,5
6,5	63
7,8	67
9,8	76

Table: 3 in this table the number of inlets in function of the number of elements are indicated.

Number of elements	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
"IN" Number of inlets	1	1	2	2	3	3	4	4	5	5	6	6	7	7	8

INTERNAL DRAIN



In **table 1** the functioning range of single flow divider elements is indicated.

The higher is the feeding capacity (q), the higher is the precision of the flow division, but in opposition there are losses of loading and higher noise. Therefore we suggest to feed the elements with capacities equal or a few superior to the ones indicated in the column "**RECOMMENDED**".

Remember to verify the capacities even in phase of flow reunion.

The pressure indicated are to be considered as maximum of functioning, the flow divider is able to bear peaks of pressure 20 % superior.

How to calculate the "Li" and "Lt" measures of flow dividers:

From **table 2** it is possible to obtain the "Li" measure for flow dividers up to 16 elements with equal displacements; for flow dividers with different elements or with more than 16 elements the "Li" and "Lt" measure have to be calculated by the following formula:

$$Li = [(n-1) \times 33] + 107 + (A1 + A2 + A3 + \dots)$$

$$107 = 53,5 + 53,5$$

n = Number of elements of flow divider

A1... An = heights of elements of flow divider

$$Lt = Li + 19$$

$$19 = 9,5 + 9,5$$

EXAMPLE: To obtain the measures Li and Lt of a flow divider with three elements (n=3), **RV-1G / 3,8 x 2+ 1 MOTOR 7,8**

Distance between fixing hole centres

$$Li = [(3-1) \times 33] + 107 + 52 + 52 + 67 = 344 \text{ mm}$$

Total Length

$$Lt = 344 + 19 = 363$$

In **table 3** the number of inlets in function of the number of elements are indicated.

For flow dividers with many inlets, as they are all communicating it is even possible to use only one of them, by plugging the other ones. We suggest to make full use at least of 1 inlet every 40 l/min capacity.

To obtain errors of division **inferior to 3%** there must be no difference of pressure between the elements superior to **30 bar**. To obtain high precisions the respect of the following parametres is also important:

- Environment temperature: -10°C ÷ +60°C Oil temperature: +30°C ÷ +60°C
- Hydraulic oil based on hlp, hv (din 51524) minerals Oil Viscosity 20 ÷ 40 cSt
- Oil filtering 10 ÷ 25 µ

Code:

9RG NN O CC CC

9RG	Flow Divider Typology
NN	Number of flow divider elements
O	Number of motor elements
CM	Motor Displacement Code
CC	Flow Divider Displacement Code

Example: Flow divider with two elements (same displacement) and Motor RV-1G / 7,8 x 2 + 1 Motor 17 cc

9RG 02 1 51 34

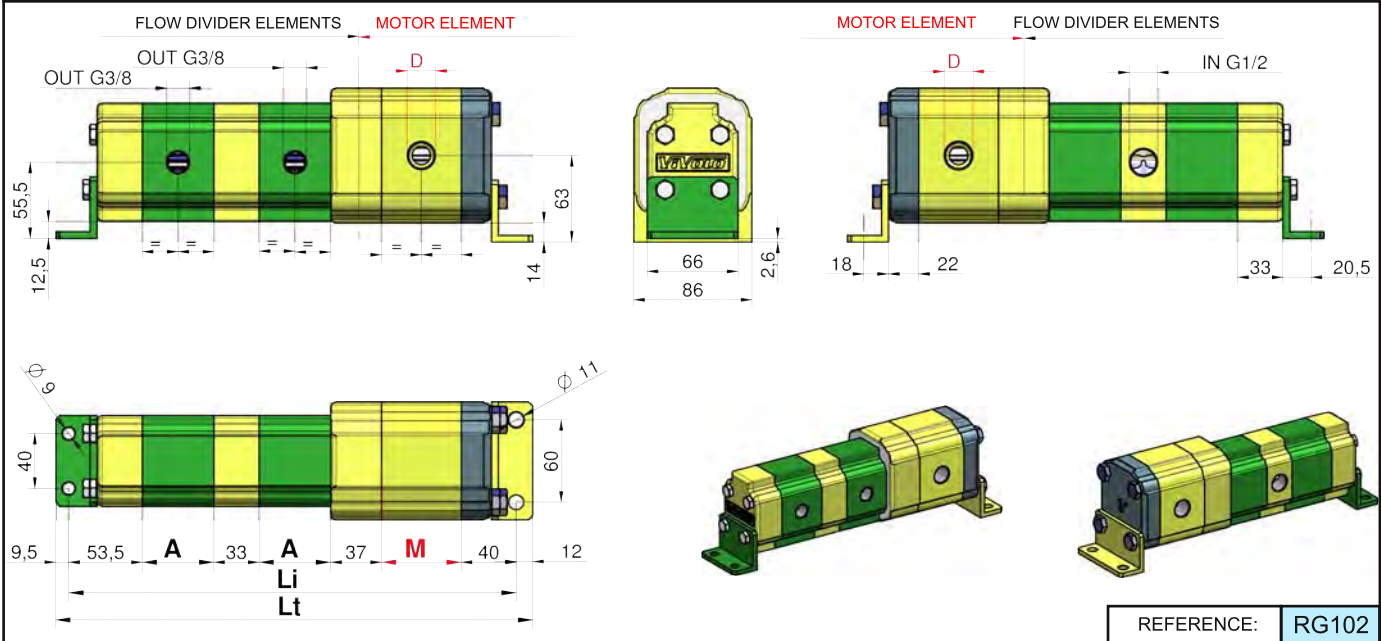
Example: Flow Divider 4 elements (different displacement max 6) and Motor RV-1G / 3,8+4,9+4,9+6,5+1 Motor 22 cc

9RG 04 1 55 25 29 29 32

NOTE: to define codes for flow dividers with more than 6 different displacement, please contact our sales department.

Table: 1

Displacem. Cm ³ /rev	CC Code	Max Pressure bar	One element flow rate l/min		
			MIN	RECOMMENDED	MAX
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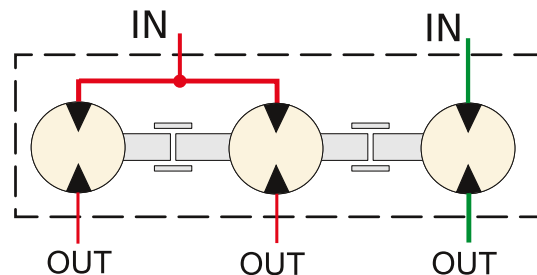
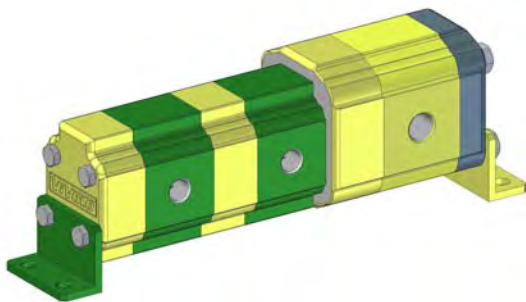
Cm ³ /giro	A
0,9	41,5
1,2	42,5
1,7	44
2,2	46
2,6	48
3,2	50
3,8	52
4,3	54
4,9	57
5,9	60,5
6,5	63
7,8	67
9,8	76

Cm ³ /giro	CM	M	D
4	41	47	1/2" BSP
6	43	50	1/2" BSP
9	45	54	1/2" BSP
11	47	58	1/2" BSP
14	49	64	3/4" BSP
17	51	68	3/4" BSP
19	53	72	3/4" BSP
22	55	78	3/4" BSP
26	57	82	1" BSP
30	59	90	1" BSP
34	61	97	1" BSP
40	63	106	1" BSP

Table: 3 in this table the number of inlets in function of the number of elements are indicated.

Number of elements	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
"IN" Number of inlets	1	1	2	2	3	3	4	4	5	5	6	6	7	7	8

INTERNAL DRAIN



In **table 1** the functioning range of single flow divider elements is indicated.

The higher is the feeding capacity (q), the higher is the precision of the flow division, but in opposition there are losses of loading and higher noise. Therefore we suggest to feed the elements with capacities equal or a few superior to the ones indicated in the column **"RECOMMENDED"**.

Remember to verify the capacities even in phase of flow reunion.

The pressure indicated are to be considered as maximum of functioning, the flow divider is able to bear peaks of pressure 20 % superior.

How to calculate the "Li" and "Lt" measures of flow dividers:

$$Li = [(n-1) \times 33] + 130,5 + (M1 + M2 + M3 + \dots) + (A1 + A2 + A3 + \dots)$$

$$130,5 = 53,5 + 37 + 40$$

n = Numero di elementi del divisore

A1... An = altezze elementi divisore

M1...Mn= altezze elementi motore

$$Lt = Li + 21,5$$

$$21,5 = 9,5 + 12$$

EXAMPLE: To obtain the measures **Li** and **Lt** of a flow divider with three elements (n=3), **RV-1G / 3,8 x 2+ 1 MOTOR 11**

Distance between fixing hole centres $Li = [(2-1) \times 33] + 130,5 + 47 + 52 + 52 = 314,5 \text{ mm}$

Total Length $Lt = 314,5 + 21,5 = 336$

In **table 3** the number of inlets in fuction of the number of elements are indicated.

For flow dividers with many inlets, as they are all communicating it is even possible to use only one of them, by plugging the other ones. We suggest to make full us at least of **1** inlet every **40** l/min capacity.

To obtain errors of division **inferior to 3%** there must be no difference of pressure between the elements superior to **30 bar**. To obtain high precisions the respect of the following parametres is also important:

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