VALVE

Radiator valves

Quick facts

- Brass valve housing, matt, nickel plated
- Available with DN10, DN15 and DN20 threads.
- Integrated setting of the k_v-value.
- Designed for thermal actuators ACTUATOR
- NC/NO-function possible together with ACTUATOR

Quick selection table

Size	Thread		k_v-value (m^3/h)	
	Inches	DN	adjustable	at P-band 2K
110	3/8"	10	0.09...0.63	0.43
115	1/2"	15	0.10...0.89	0.52
120	3/4"	20	0.31...1.41	0.71

Technical description

Design

- The flow rate can be preset through a valve cone, where the full lift height is guaranteed for each setting. Presetting is done by means of the protective cover.
- The valves are designed according to EN215.
- The packing box can be replaced even while the heating system is under pressure. An assembly device is needed to do this.

Material and surface treatment

- The VALVE is made completely of matt nickel-plated brass.
- EPDM rubber sealing ring.

Planning

- Setting modes are indicated by the reference marks on the valve's protective cover, see figure 1.
- The k_v-value presets for each product size can be read from the table, Setting modes - k_v-values.
- k_v-values can also be read in the sizing charts.

Maintenance

- The VALVE is completely maintenance free.

Declaration

- Declaration of Construction Materials is available for download from www.swegon.com.

Installation

- Separate detailed installation instructions are included with each delivery.
- The valve can be installed in any position, but is also dependent on the actuator requirements, see details for the actuator in question.

Commissioning

- The flow rate is set by adjusting the valve cone.
- Commissioning is easily done by simply fitting the supplied reversible protective cover over the valve (S1).
- Each k_v-value is marked with lines in different lengths on the protective cover (A), see figure 1 and the table setting modes – k_v-values.
- Turn the protective cover (S2) until the required reference mark (A) aligns with the mark (B) on the valve's outlet side.
- On delivery the valves are set fully open (position N), see figure 1.

Table – Setting modes – k_v-values

Size	k_v-values for each setting mode (m^3/h)				
	1	2	3	4	5
110	0.09	0.18	0.26	0.33	0.48
115	0.10	0.20	0.31	0.45	0.69
120	0.31	0.41	0.54	0.83	0.91

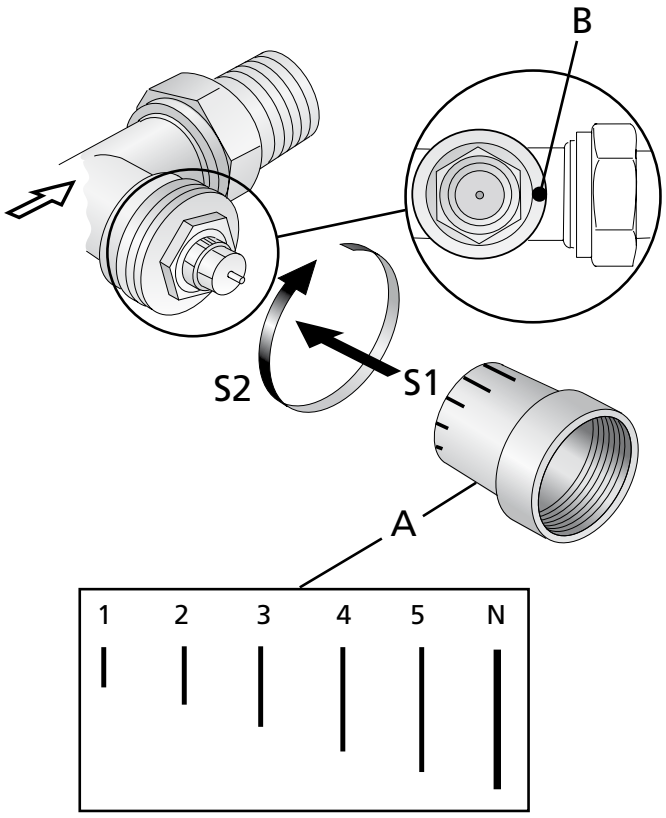


Figure 1. Adjustment of the k_v-value.

A = Protective cover (reversible) with reference markings.
B = Marking on the outlet side of the valve.

Technical data

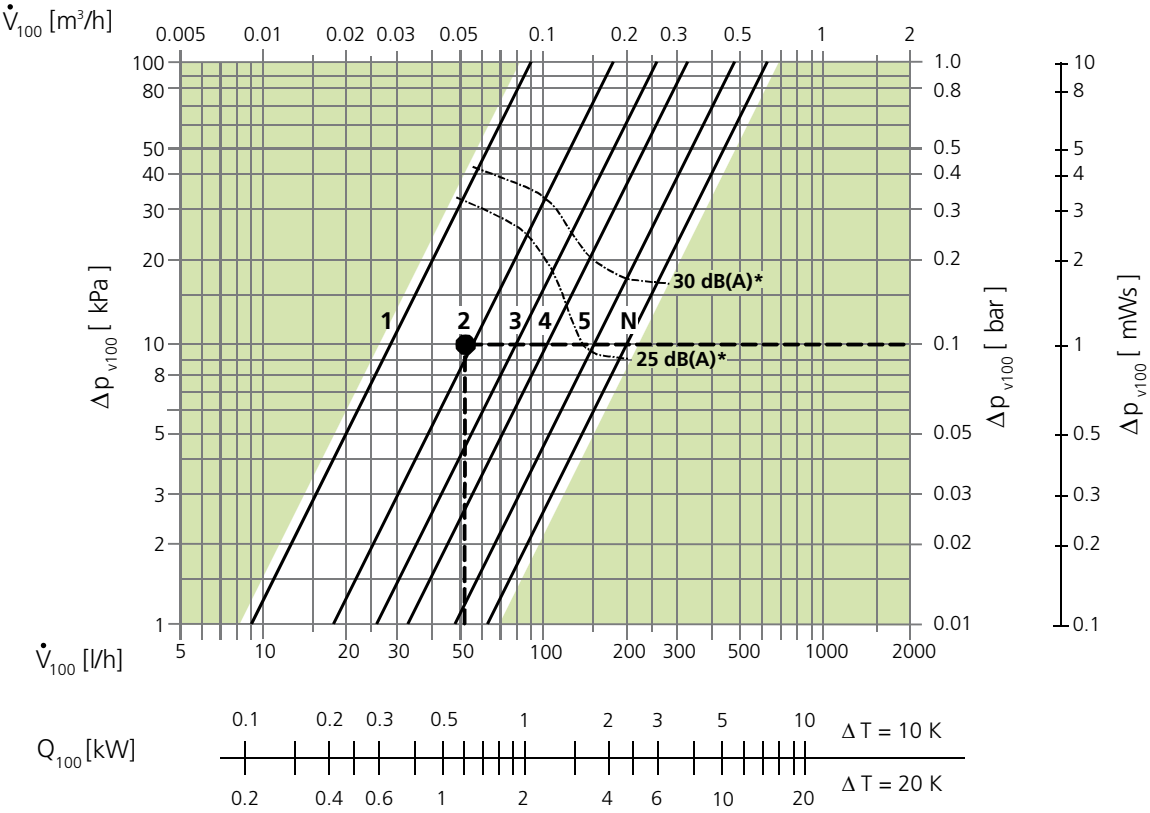
- The performance of the valve is evident from the sizing charts.
- The valve is manufactured by Siemens.
- See the table below for technical data.

Table – technical data

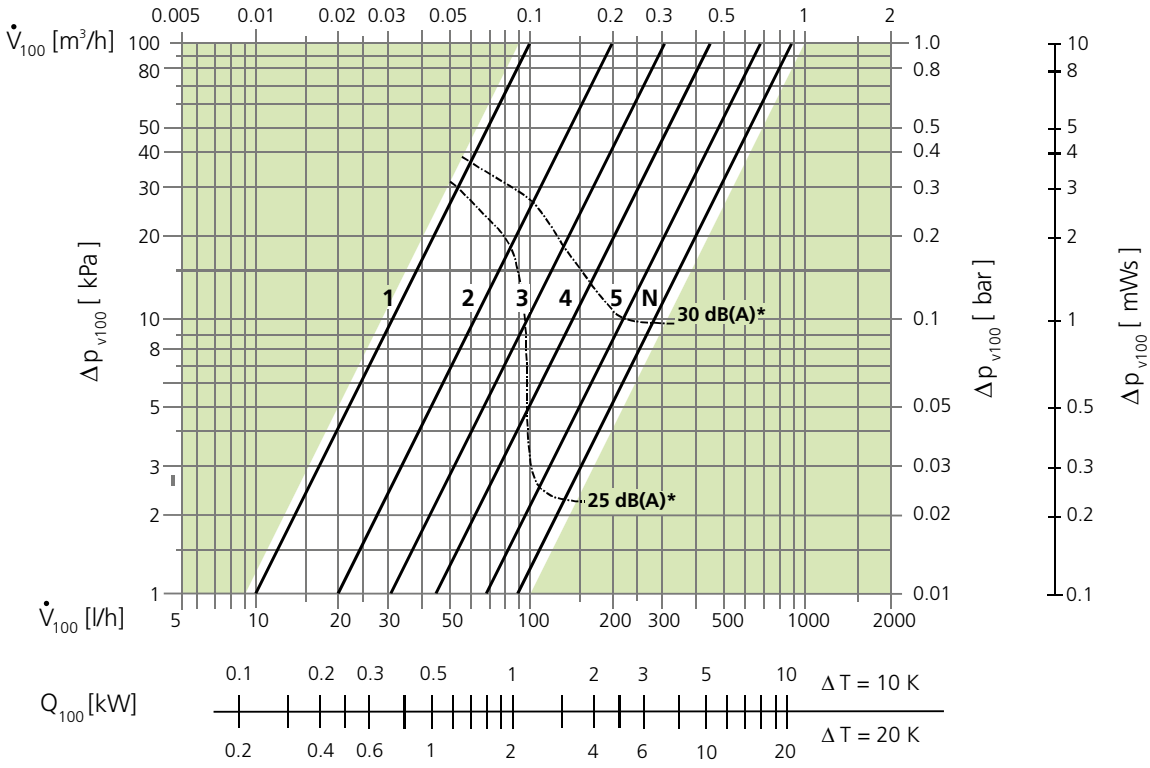
Function	Characteristics
Enclosure class	PN 10
Permissible media:	Cold and hot water Water with propylene glycol Water with ethylene glycol < 30% Recommendation: Water treatment according to VDI 2035
Media temperature	1 - 120 °C
Max. working pressure	1000 kPa (0.6 bar)
Differential pressure ΔP_{max}	max 60 kPa (0.6 bar)
Differential pressure ΔP_{v100}	5 - 20 kPa (0.05 - 0.2 bar) recommended range
Lift height	1.2 mm

Sizing diagram

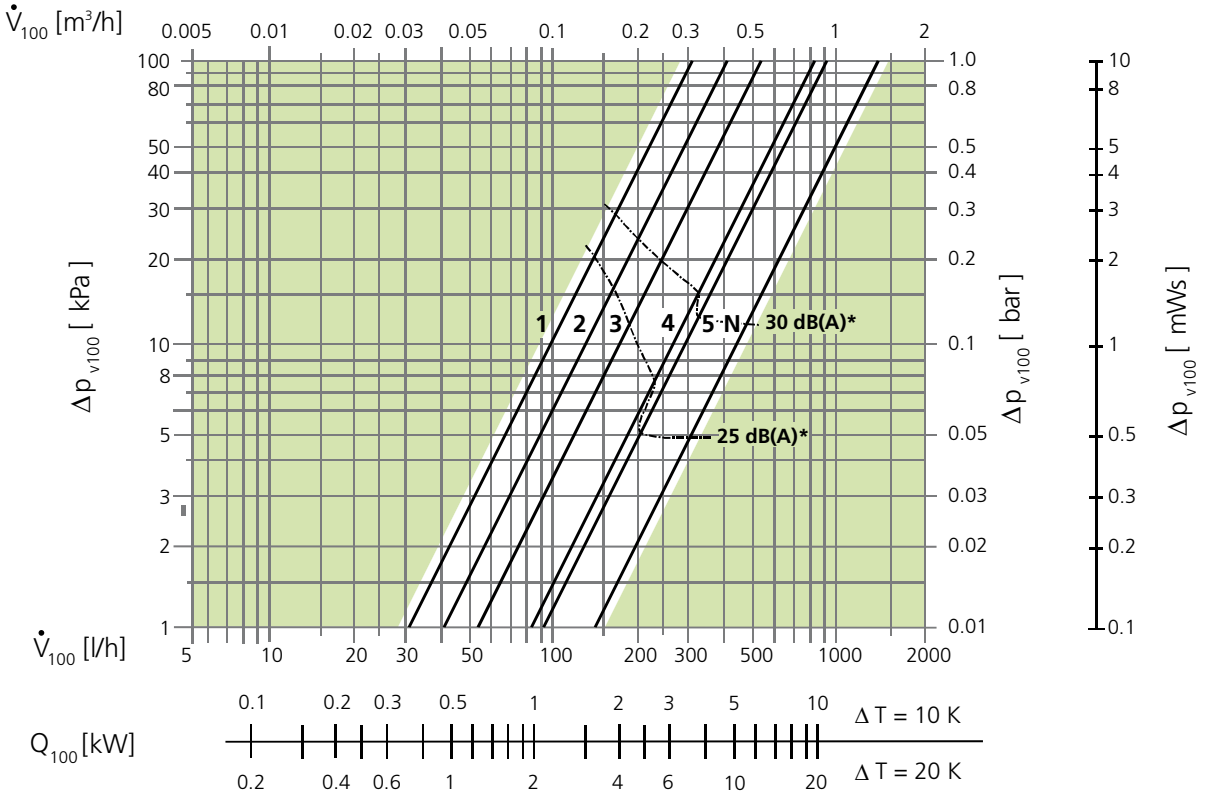
Valve 110



Valve 115



Valve 120



Dimensions and weights

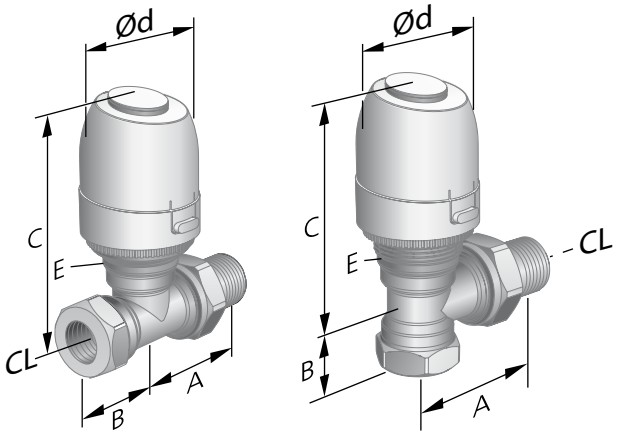


Figure 3. VALVE-S (straight model) and VALVE-A (angled model) illustrated together with ACTUATOR.

Dimensions, thread and k_v-value

Size	Thread		Dimensions (mm)				k_v-value (m^3/h)
	Inches	DN	A	B	C	Ød	
S 110	3/8"	10	59	26	81	44	0,09-0,63
S 115	1/2"	15	61	33	81	44	0,10-0,89
S 120	3/4"	20	63	35	81	44	0,31-1,41
A 110	3/8"	10	49	20	81	44	0,09-0,63
A 115	1/2"	15	53	23	81	44	0,10-0,89
A 120	3/4"	20	63	26	81	44	0,31-1,14

E = threaded socket M30 x 1.5 mm.
CL = Center line.

Specification

Radiator valve	VALVE	a	-a	-bbb
Version				
Design: Straight model = S (straight) Angled model = A (angle)				
Size: 110 115 120				