## rexroth A Bosch Company

RE 18316-19/03.16

Replaces: 18316-19/10.09

00

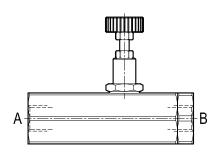
1/2

#### Flow control valves

### Pressure compensated adjustable flow regulator with reverse flow check



#### VCST (G 3/8) Series



# B

#### Description

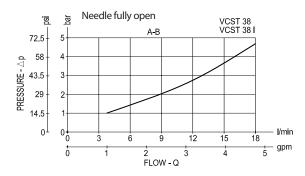
This pressure compensated flow regulator controls the oil flow from B to A, and prevents it from exceeding the adjusted value regardless of working pressure, while establishing a minimum pressure differential of approximately 5 bar (75 psi) between the two ports. The valve is available in different sizes and versions for different flow ranges, as specified by the tables of the Technical data, Dimensions and Performance diagrams. The fine setting of the output flow at A can be achieved by rotating the hand knob which can be locked in position by the locking nut in order to prevent inadvertent changes. Unrestricted reverse flow "A-B" is permitted through a check valve with zero cracking pressure, regardless of valve adjustment.

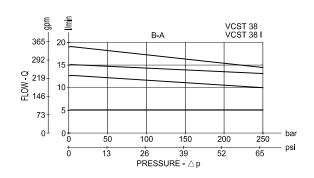
#### Technical data

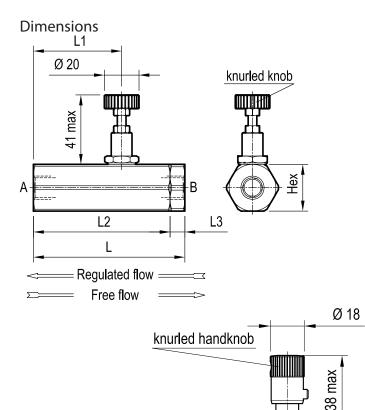
Code	Pressure P max bar (psi)	Flow Q I/min (gpm)	Weight kg (lbs)
VCST 38	250 (3600)	4 - 18	0.34 (0.75)
VCST 381	250 (3600)	(1 - 5)	0.54 (0.75)

Steel body, zinc plated

#### Performance



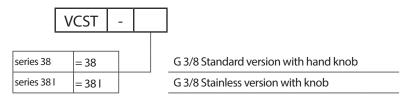




#### **Advantages**

- -Compact design and inline mounting for space saving.
- -Flow setting can be locked by the locking nut.
- -Mounting position is unrestricted.
- -Zero cracking pressure for free reverse flow "A-B".
- -Three sizes, each with hand knob or knurled hand knob, provide great adaptability to the system.

#### Ordering code



#### Ports size / Dimensions

	VCST	VCST	
	38	38 I	
knurled knob		х	
hand knob	х		
Port size A-B	G 3/8		
L mm (inches)	87.5 (3.45)		
L3 mm (inches)	8.5 (0.34)		
L2 mm (inches)	79 (3.11)		
L1 mm (inches)	51 (2.01)		
Hex mm (inches)	27 (1.06)		

The "I" version is stainless steel made.

#### **Application**

The VCST is a normally open, two ports, restrictive type flow regulator, with incorporated check valve for free reverse flow. Typical applications are the control of the maximum speed of an actuator (cylinder or motor), which is achieved by regulating the maximum flow A into or out from the actuator (meter-IN, or meter-OUT). The maximum flow, and consequently the maximum actuator speed, will vary slightly with changes in fluid viscosity, but will be largely independent from the load and from the working pressure. If the valve is used to control the flow from a constant flow line, only the regulated flow will pass through the valve; any excess flow will normally be forced out of the line and delivered to tank through the system relief valve.

Type VCST-38	Material number R932500621	Туре	Material number	Туре	Material number
VCST-38I	R932500622				

Bosch Rexroth Oil Control S.p.A. Fimma Division (Rge 2) Via G. Bovio, 7 Z.l. Mancasale 42124 Reggio Emilia, Italy Tel. +39 0522 517 277 Fax +39 0522 517 125 cartridges@oilcontrol.com

www.boschrexroth.com

forth in it, are the exclusive property of Bosch Rexroth Oil Control S.p.a.. It may not be reproduced or given to third parties without its consent.

The data specified above only serve to describe the product. No statements

© This document, as well as the data, specifications and other information set

concerning a certain condition or suitability for a certain application can be derived from our information. The information given does not release the user from the obligation of own judgment and verification. It must be remembered that our products are subject to a natural process of wear and aging.