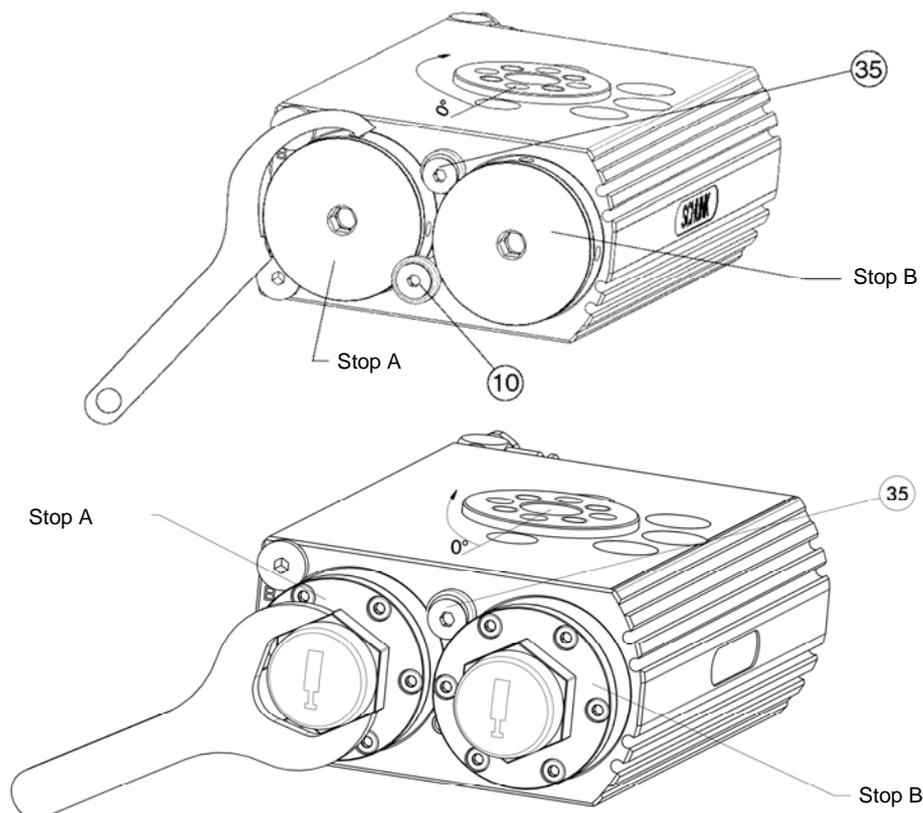


1. Replacing the “old” stops with “new” stops



- (1) Loosen the screw for disassembly of the limiting sleeve (Item 10). (These parts are not needed for the new stops).
- (2) Loosen the clamp for the stops by unscrewing the screw (Item 35).
- (3) Disassembly the stops A and B.
- (4) Disassemble the shock absorbers by removing the safety ring.
- (5) Remove all fitting disks from the hole.
- (6) Mount the new shock absorbers according to the information in the table on page 2. You can mount and adjust the new stops.



Note

On 90° units it is important to note the length of the respective stop.

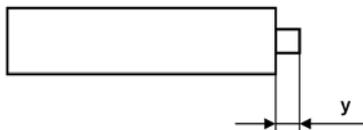
Shock absorber utilization and installation dimensions

Unit	Basic			VM		
	Shock absorber	Shock abs. projection (h)		Shock absorber	Shock abs. projection (h)	
20.1	WP-M 0,25-356 (ID No.: 9941662)	17. Jan	±0,05	-		
20.2	WP-M 0,25-356 (ID No.: 9941662)		±0,05	MC 150 MH2 (ID-Nr.: 9701000)	see measuring instructions	±0,1
25.1	WP-M 0,25-356 (ID No.: 9941662)		±0,05	-		
25.2	WP-M 0,25-456 (ID No.: 9941661)	17,5	±0,05	MC 150 MH2 (ID-Nr.: 9701000)	see measuring instructions	±0,1
35.1	MC 225 MH2 (ID No.: 9701013)	see measuring instructions	±0,1	-		
35.2	MC 225 MH2 (ID No.: 9701013)		±0,1	MC 225 MH2 (ID-Nr.: 9701013)	see measuring instructions	±0,1
40.1	WP-M 1,0-166 (ID No.: 9941268)	17,5	±0,05	-		
40.2	WP-M 1,0-166 (ID No.: 9941268)	17,5	±0,05	MC 600 MH2 (ID-Nr.: 9701005)	see measuring instructions	±0,1
50.1	WP-M 1,0-166 (ID No.: 9941268)	17,5	±0,05	-		
50.2	WP-M 1,0-166 (ID No.: 9941268)	17,5	±0,05	MC 600 MH2 (ID-Nr.: 9701005)	see measuring instructions	±0,1
60.1	WP-M 1,0-166 (ID No.: 9941268)	17,5	±0,05	-		
60.2	WP-M 1,0-456 (ID No.: 9941634)	17,5	±0,05	MC 600 MH2 (ID-Nr.: 9701005)	see measuring instructions	±0,1

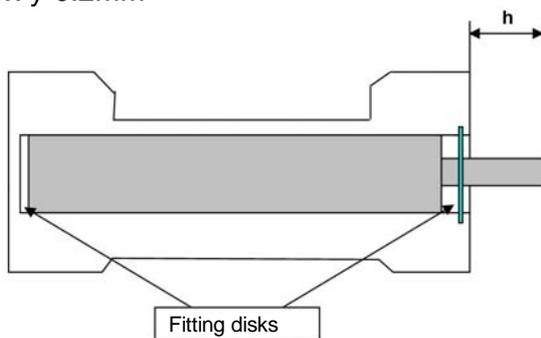
Measuring instructions



1. Measure the projection (x) of the shock absorber.

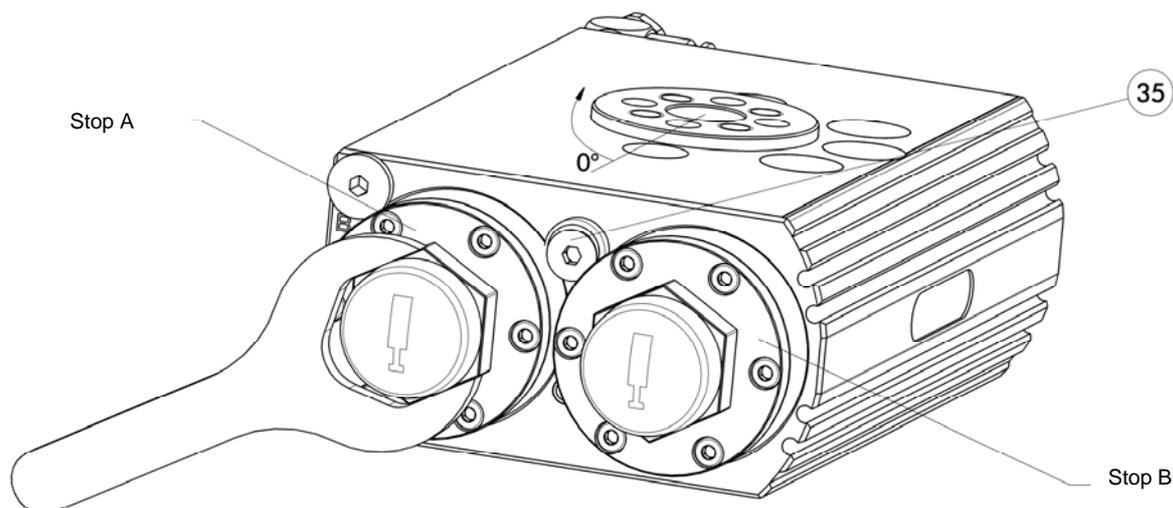


2. Measure the projection (y) of the compressed shock absorber plunger.
3. Calculate shock absorber stroke (h) .
 $h=x-y-0.2\text{mm}$



4. Adjust shock absorber projection (h).

2. Adjusting the stops



- (1) Use an Allen wrench to loosen the screw (item 55) about one revolution.
- (2) Apply air pressure to air connection B. Unit rotates to stop A (base setting 0°).
- (3) Set the desired end position by turning the stop A.

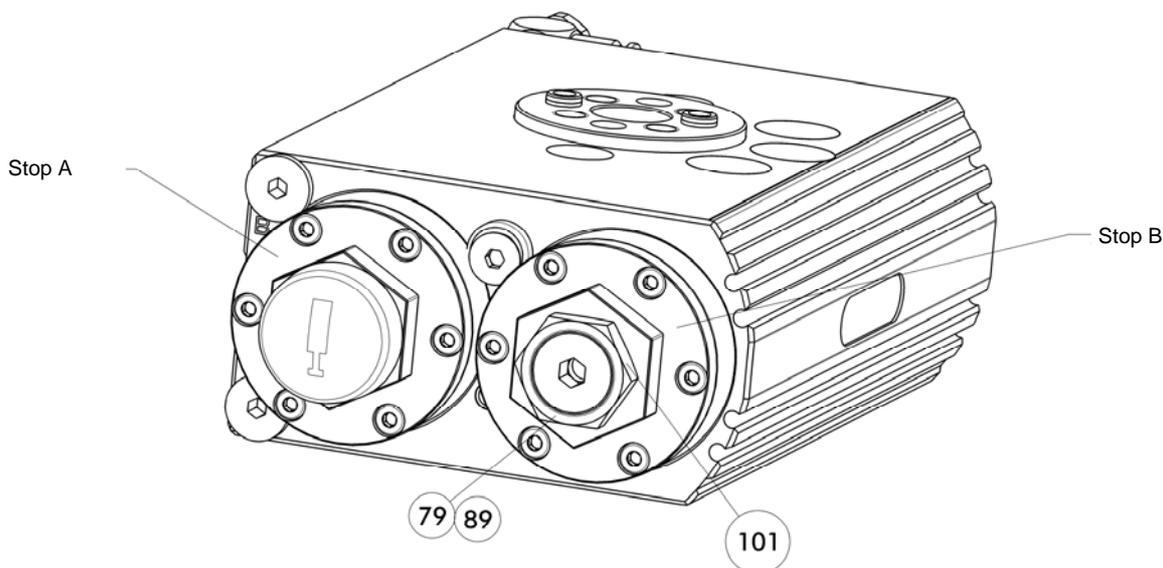


Important!

Do not adjust the end stops by turning the axial face hexagon socket or the shock absorber (VM versions). This can cause the components to come apart.

- Use an open-end or box-end wrench (SRU 20: 19, SRU 35-60: 32), placing it on the hexagon nut of the stop cover (see illustration above).
- (4) Bleed air connection A and apply air to connection B; then check the end position. Adjust the end positions if necessary.
 - (5) Bleed air connection B and apply air to connection A. Unit rotates to stop B (base setting 180°).
 - (6) Set the desired end position by turning the stop B.
 - (7) Tighten the screw (item 35) securely.
(SRU 20 – 40: 10 Nm, SRU 50 – 60: 24 Nm)
 - (8) Rotate several times to check the correct setting of the end position Adjust the end positions if necessary.

3. Adjustment shock absorber stroke



- (1) Remove the end caps (item 104).
- (2) To adjust the shock absorption in the end position, loosen the nut (item 101) at the stop A with a wrench (SRU 20/25: 14, SRU 35-60: 24), providing counter support for the stop bolt (item 79 or 89) with an Allen wrench.
- (3) Screwing the stop bolt (item 79/89) out shortens the damping stroke by 1.0 mm per revolution for the SRU 20/25 and 1.5 mm per revolution for the SRU 35-60.
- (4) Check the damping effect by rotating the loaded unit.
- (5) Now turn the stop bolt back until the unit moves gently into the end position, without impact.
(This setting is dependent on the load)
- (6) Tighten the nut (item 101), providing counter support for the stop bolt (item 79 or 89) with an Allen wrench (SRU 20/25: 5, SRU 35/40: 6, SRU 50/60: 8).

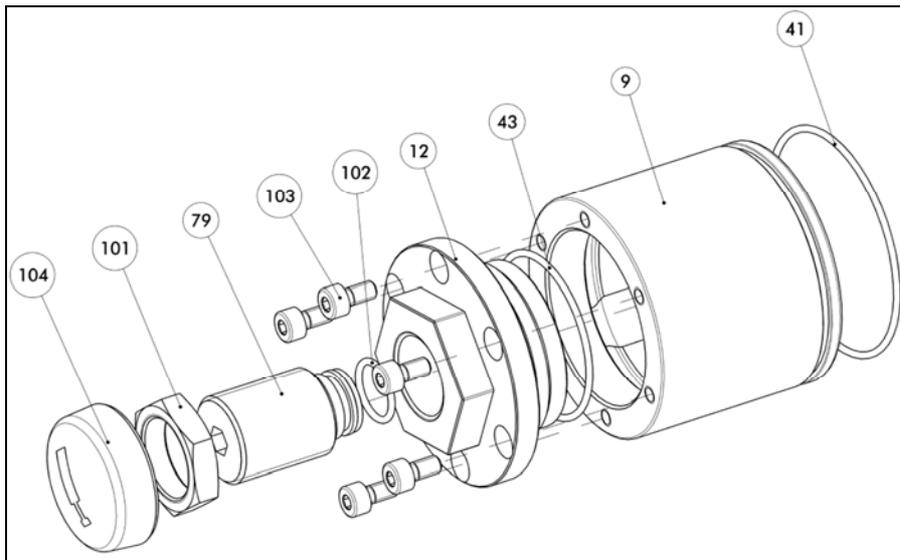


Important!

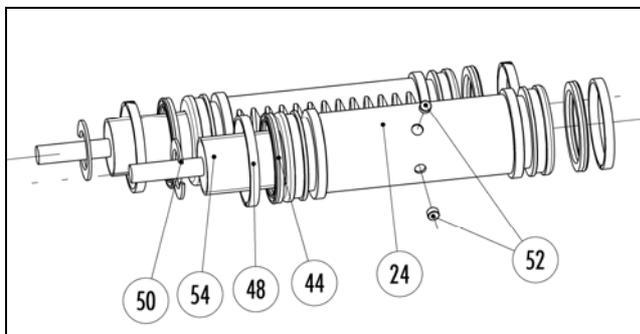
The maximum adjustment range is 2.5 mm for the SRU 20/25 and 3.0 mm for the SRU 35-60. Above these ranges, the air overflows to protect the unit.

4. Replacing a shock absorber

The shock absorbers have a limited life. Therefore, they should be checked regularly (every 2 million cycles) to ensure that they are functioning properly. The shock absorber is operating correctly if the unit moves gently into the end positions. The shock absorbers are specially inspected and available only from SCHUNK.



Item	Designation
9	adjusting sleeve
12	stop cover
41	O-ring
43	O-ring
79	stop pin
101	nut
102	O-ring
103	screw
104	end cap



Item	Designation
24	piston
44	cylinder seal
48	guide ring
50	safety ring
52	magnet
54	shock absorber

- (1) Loosen the screws (item 102).
- (2) Remove the cover (Item 12).
- (3) Remove the safety rings (Item 50) from the pistons.
- (4) Pull out the shock absorbers (item 54) and remove all fitting disks from the hole.
- (5) Insert the new shock absorbers. Note the shock absorber projection (see table on page 2).
- (6) Place fitting disks under the safety rings so that there is no play.
- (7) Mount the stop cover.
- (8) Screw the stop cover securely.
- (9) Check the shock absorption. If necessary, adjust the shock absorption (see Chapter 3).