

Technical Specification

**'T' Series Pulse Jet Valves**



T Series

**Description**

High performance diaphragm valve with threaded ports. Available with integral pilot or as remotely piloted valve. Outlet at 90° to inlet.

**Suitable for**

Dust collector applications, in particular for reverse pulse jet filter cleaning including bag filters, cartridge filters, envelope filters, ceramic filters, and sintered metal fibre filters.

**Construction**

Body: Aluminium (diecast)  
 Ferrule: 304 SS  
 Armature: 430FR SS  
 Seals: Nitrile or Viton (reinforced)  
 Spring: 304 SS  
 Screws: 302 SS  
 Diaphragm Seat: PA-6 (standard), Viton coated mild steel or High Density PE  
*Refer to Q Series Solenoid product data sheet for solenoid construction details.*

**Operation**

Recommended on time range: 50-500ms  
 Recommended time between pulses: 1 minute or greater

**Maintenance**

Before conducting any maintenance activity on the system ensure that components are fully isolated from pressure and power supplies. Pressure and power should not be reapplied until the valve has been fully assembled. Diaphragm and pilot inspection should be conducted annually.

**Approvals**

- Atex II 2D Mechanical
- CSA (U.S) C22.2 No 139-1982, UL 429 (CA & RCA)
- C-Tick (CA)
- EMC 2004/108/EC (CA)
- Low Voltage Directive 2006/95/EC (CA)

**Installation**

1. Prepare supply and blowtube pipes to suit valve specification. Avoid installing valves underneath the tank.
2. Ensure tank and pipes are free from dirt, rust or other particulate.
3. Ensure supply air is clean and dry.
4. Mount valves to inlet pipes and blowtube to valves, ensuring no excess thread sealant can enter the valve itself.
5. Make electrical connections to solenoid or connect RCA pilot port to pilot valve (RCA valves only).
6. Apply moderate pressure to system and check for installation leaks.
7. Fully pressurise system.
8. Test fire and listen for proper actuation and crisp pulse noise.

**Weights**

Size	Integral Pilot (CA) Kg (lbs)	Remote Pilot (RCA) Kg (lbs)	Size	Integral Pilot (CA) Kg (lbs)	Remote Pilot (RCA) Kg (lbs)
10	NA	0.06 (0.14)	45	1.50 (3.30)	1.28 (2.83)
20	0.60 (1.31)	0.38 (0.83)	50	2.89 (6.38)	2.68 (5.92)
25	0.73 (1.61)	0.51 (1.13)	62	3.31 (7.30)	3.09 (6.82)
35	1.04 (2.28)	0.83 (1.83)	76	4.77 (10.52)	4.56 (10.04)

**Maintenance Kits**

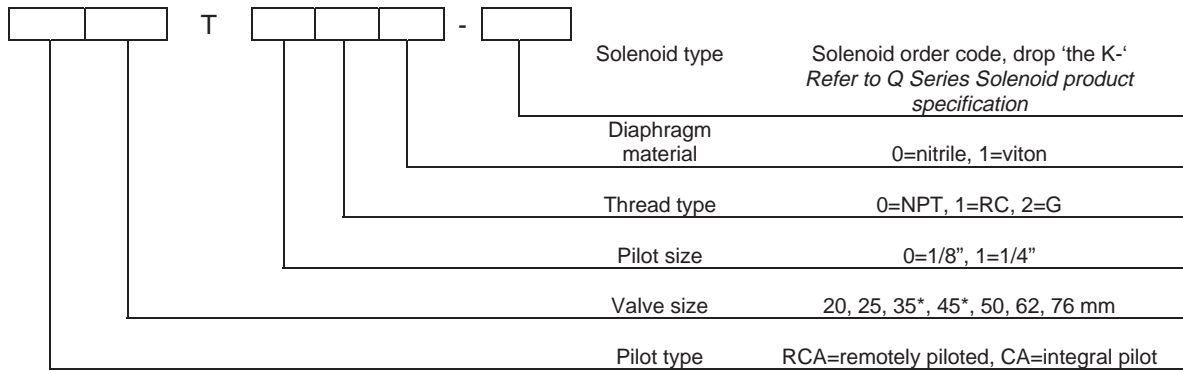
Model	Nitrile	Viton	Low Temperature -60°C (-76°F) Min.	Includes
RCA10T	K1001	K1002	NA	Diaphragm kits include main and secondary diaphragms (where required) and all springs.
CA/RCA20T	K2000	K2007	NA	
CA/RCA25T	K2501	K2503	K2504	*These kits are for discontinued valves.
CA/RCA32T*	K2500	---	NA	
CA/RCA35T	K3500	K3501	K3502	
CA/RCA40T*	K4000	---	NA	
CA/RCA45T	K4502	K4503	K4522	
CA/RCA50/62T	K5004	K5000	NA	
CA/RCA76T	K7600	K7601	NA	
Pilot repair kit	K0380	K0384	NA	o-ring, armature assembly, armature spring, ferrule

**Product Characteristics and Performance**

Nom. Size	Port Size		Number of diaphragms	Kv	Flow	
	mm	in			Cv	
10	10	3/8	1	2.5		2.9
20	20	3/4	1	12		14
25	25	1	1	20		23
35	40	1.5	1	36		42
45	40	1.5	2	44		51
50	50	2	2	76		88
62	62	2.5	2	91		106
76	76	3	2	144		167

Pressure Range: 30(5) - 860(125) kPa(Psi)  
 Temperature Range: Nitrile Seals: -40°C (-40°F) to 82°C (179.6°F)  
 Viton Seals: -29°C (-20.2°F) to 232°C (449.6°F)

## Order Code



\*Note that the 35 & 45 share the same port sizes.

### Order Code RCA10T Series

RCA10-6T/645 (1/4 NPT)

RCA10-6T/669 (1/4 BSPT)

Examples: CA50T010-300

2" threaded port valve with 1/8" pilot, 2" RC port threads, nitrile seals and 200/240VAC integral pilot with DIN socket terminals.

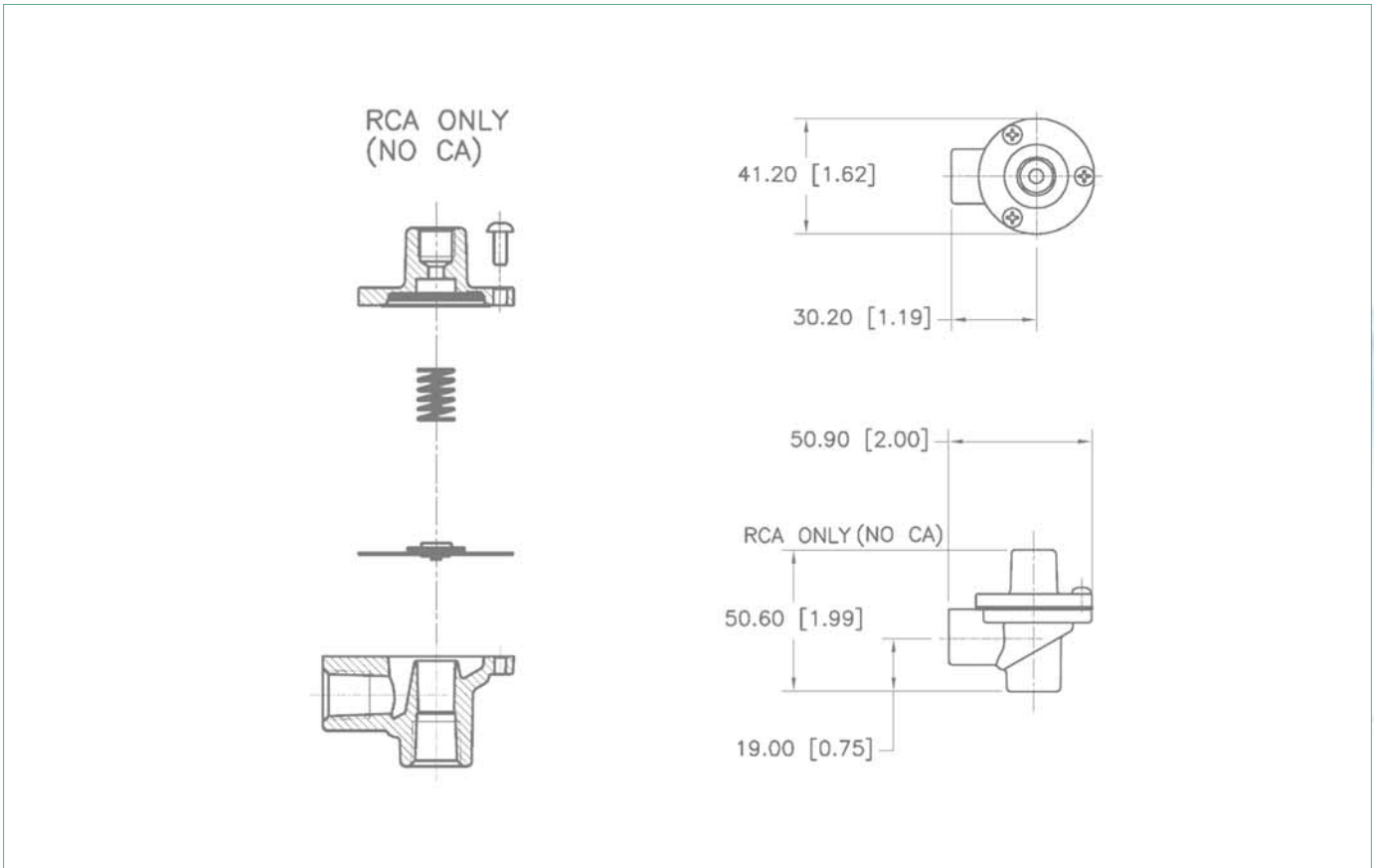
RCA25T001

1" threaded port valve with 1/8" NPT remote pilot port, 1" NPT port threads and viton seals.

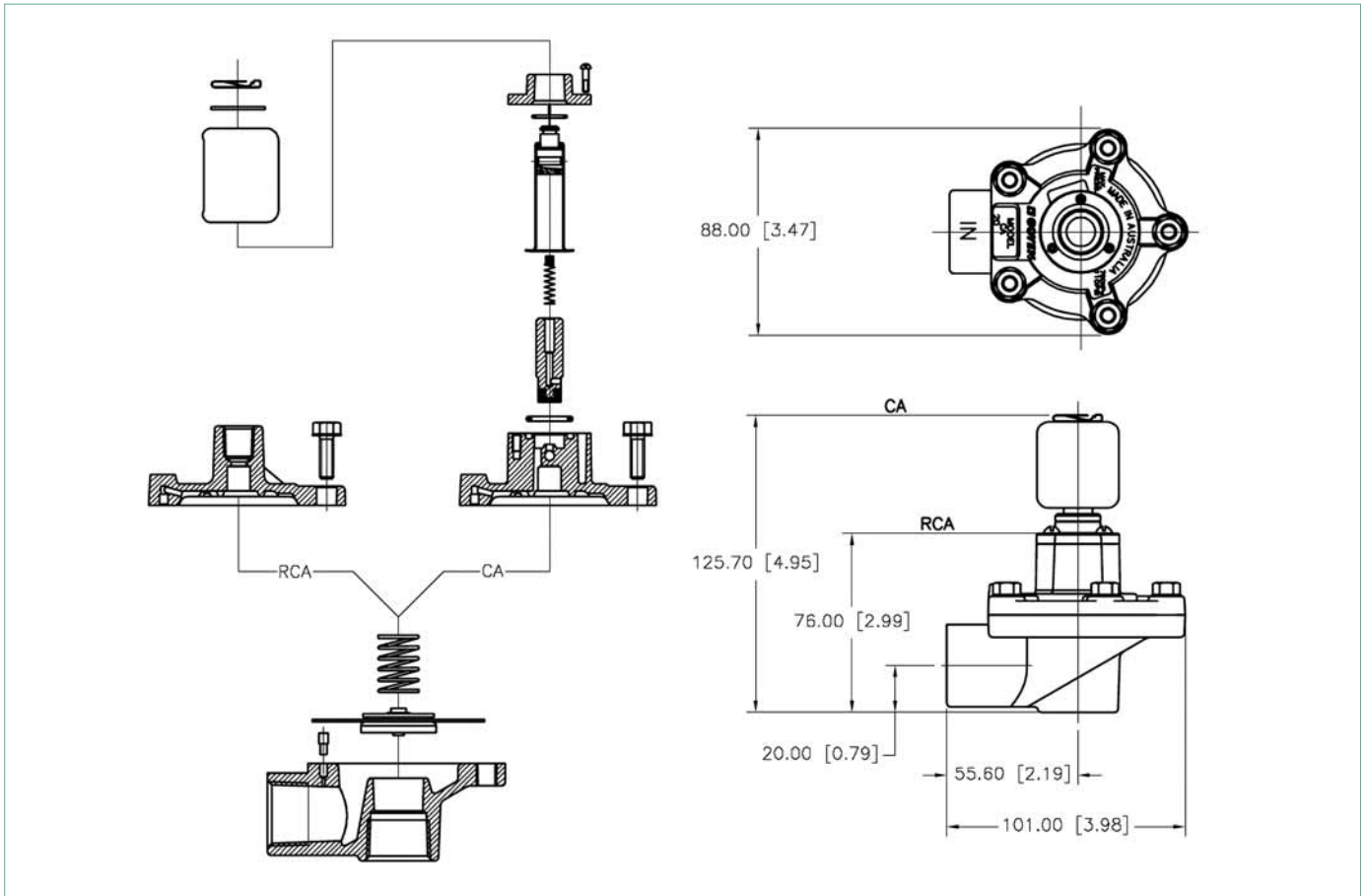
## Dimensions

(Dimensions in mm and [inches])

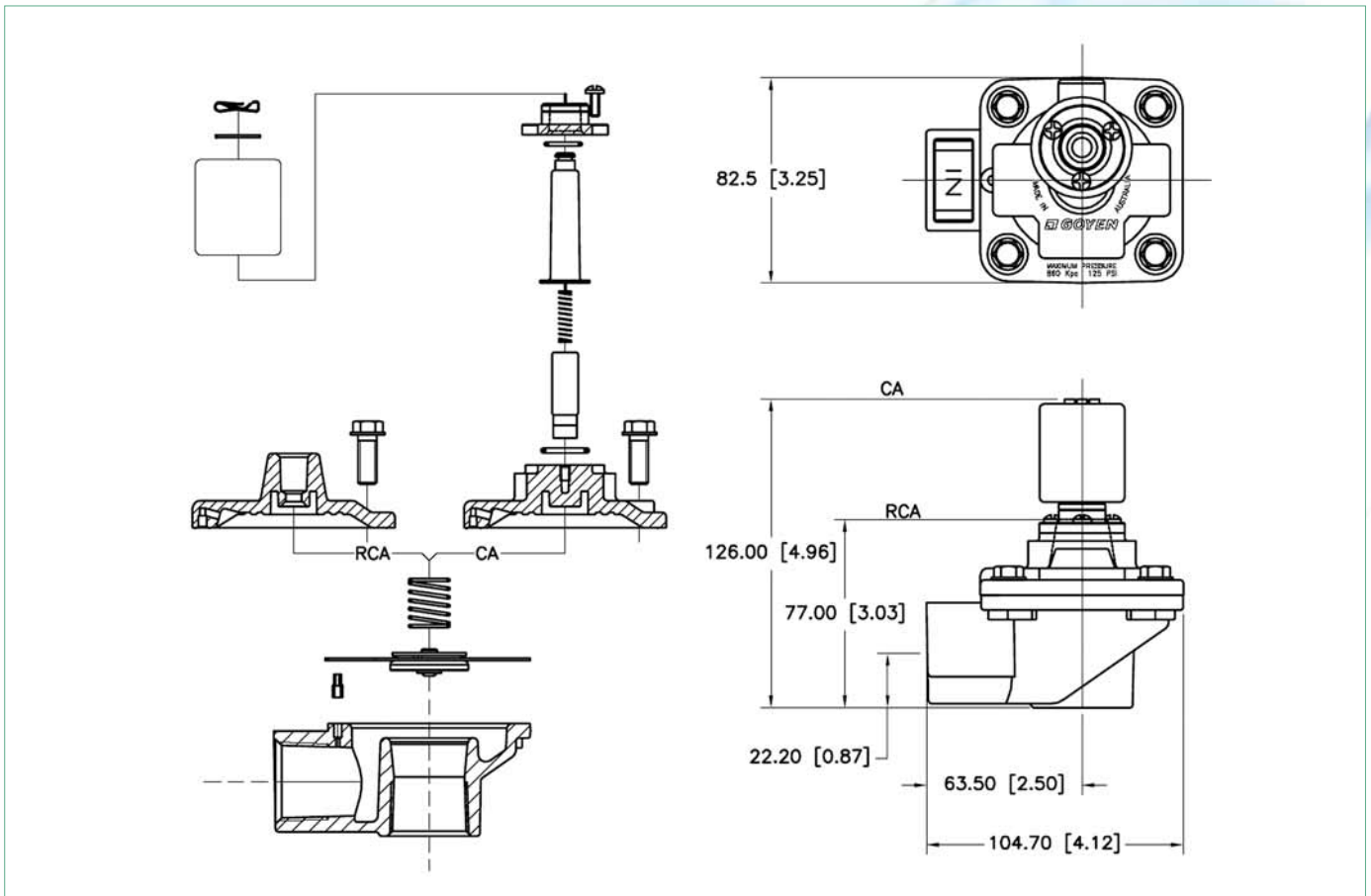
### RCA10T



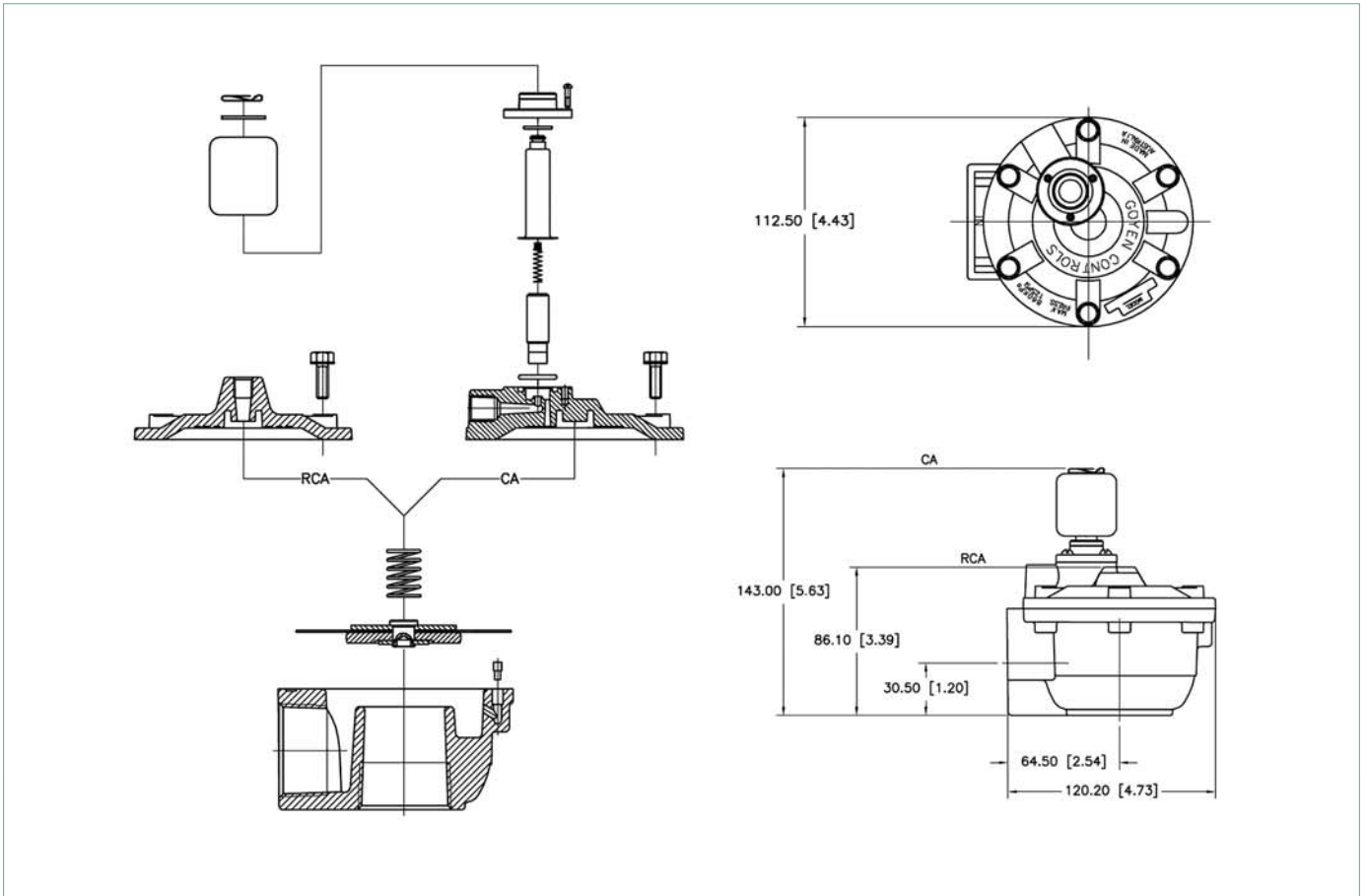
CA/RCA20T



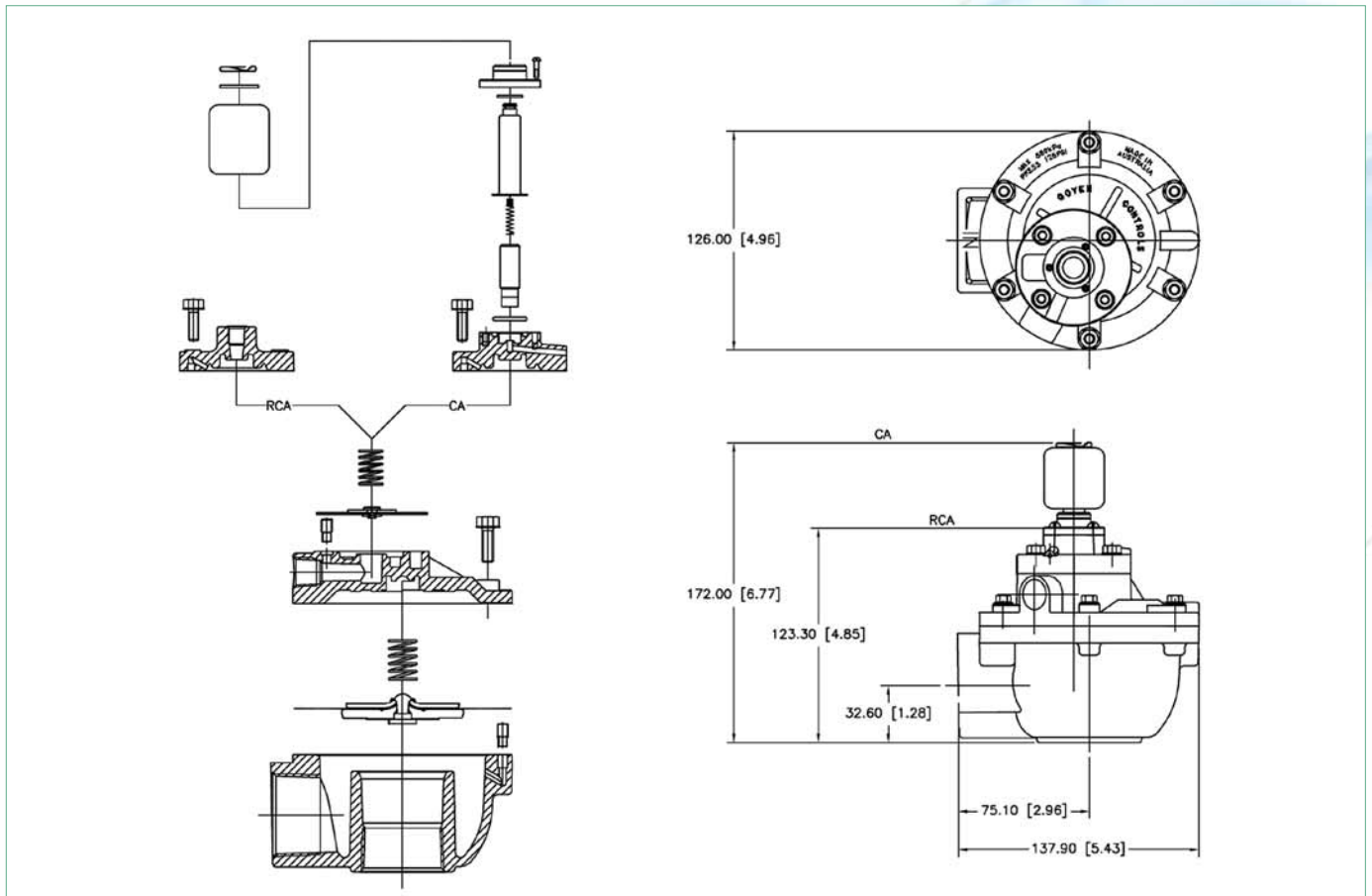
CA/RCA25T



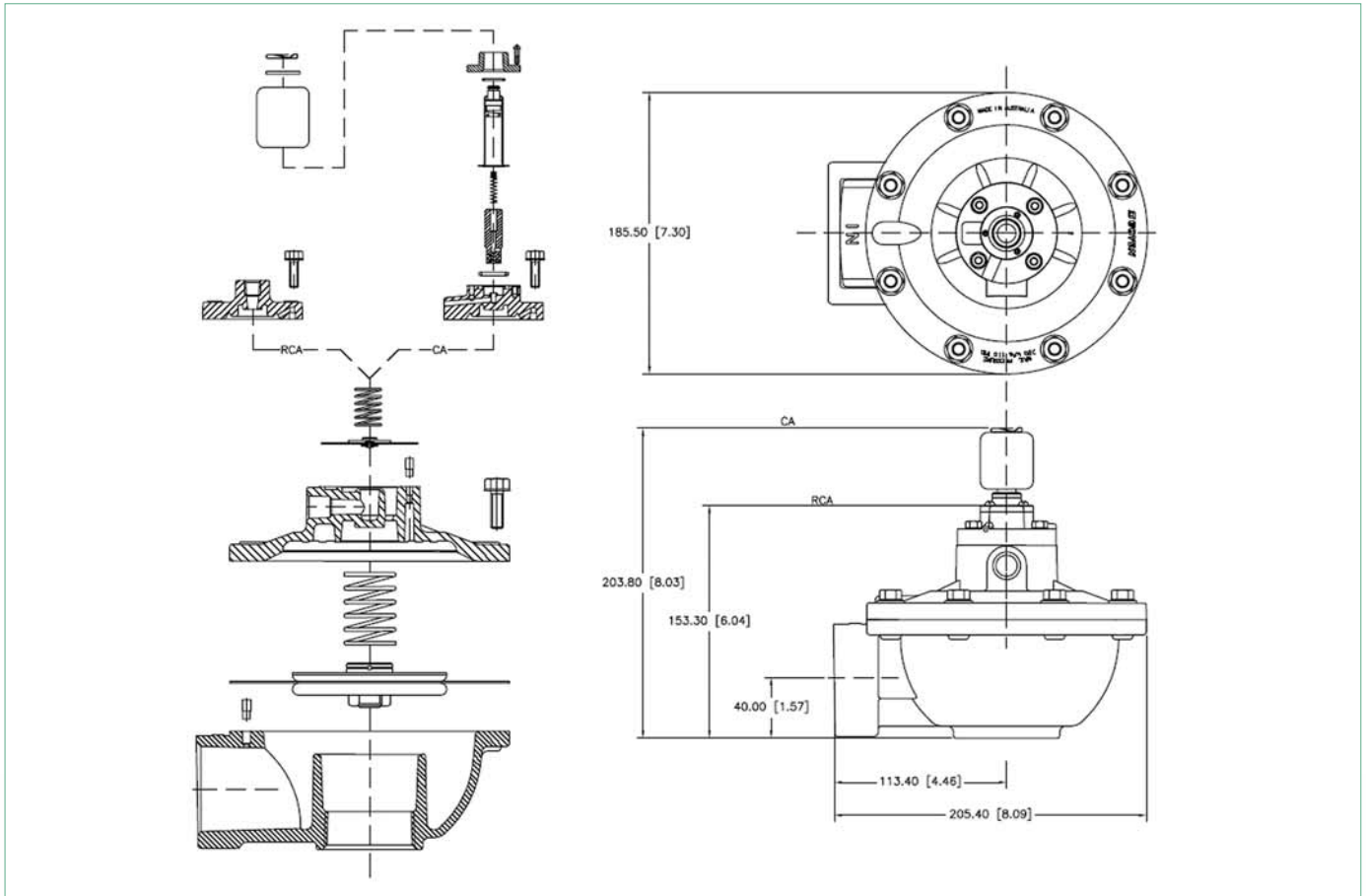
CA/RCA35T



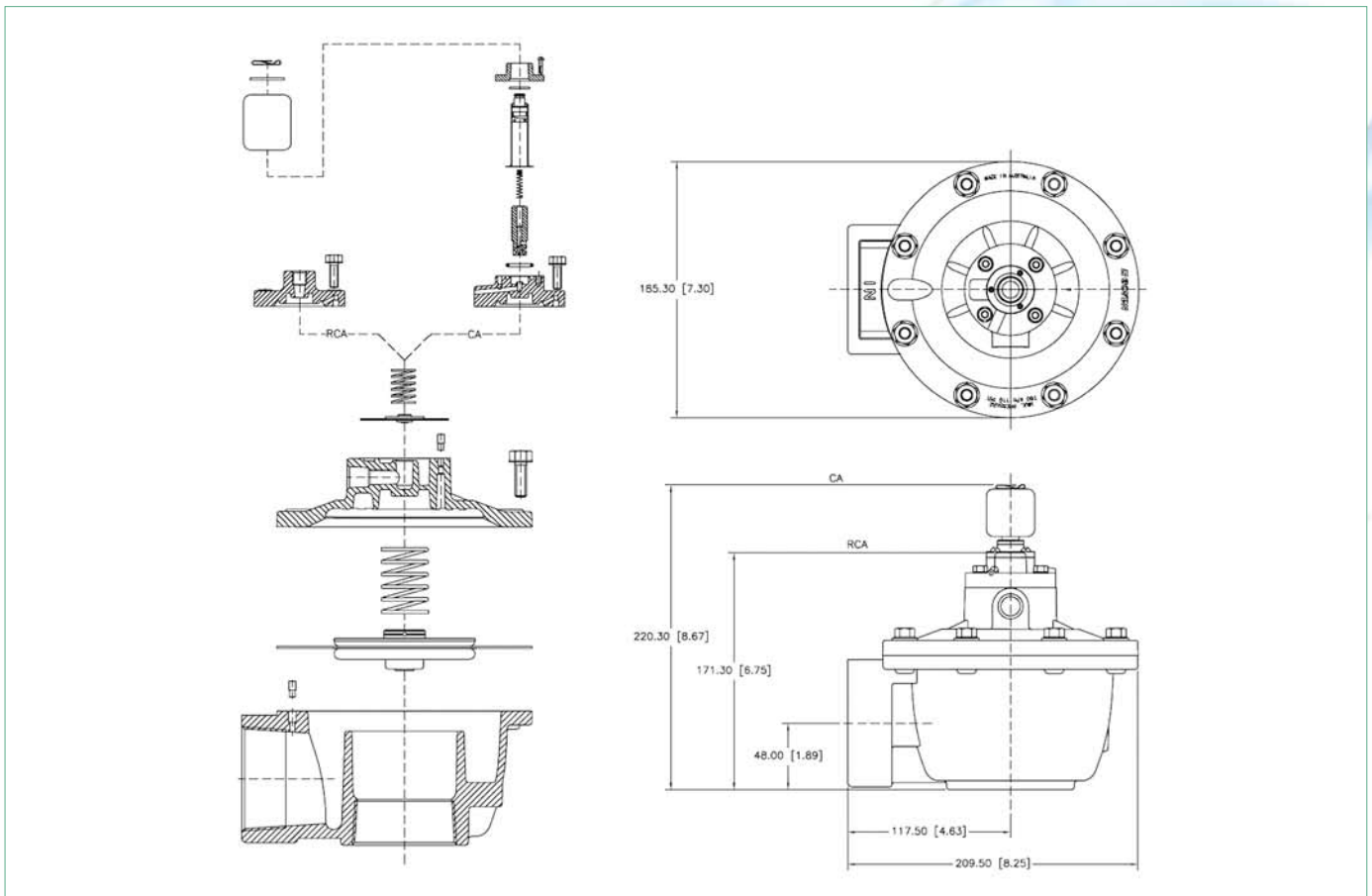
CA/RCA45T



CA/RCA50T



CA/RCA62T



CA/RCA76T

