



J.J. BCN INTERNACIONAL, S.A.

www.jjbcn.com



HANDBOOK



INDEX

> **01. Actuator Part List**

- S2, S6, S10, B2, B6, B10
- S25, S40, B25, B40

> **02. J4M Series**

- Voltage
- Electrical Connectors
- ID Actuator Label
- Local Visual Position Indicator
- Emergency Manual Override Facility
- External connecting Diagram

> **03. Datasheet**

- J4M 2
- J4M 6
- J4M 10
- J4M 25
- J4M 40

> **04. Bluetooth interface manual**

> **05. Option**

- Modbus

> **06. Guarantee**

> **07. Contact**



01 ACTUATOR PART LIST

MODELS: S2, S6, S10, B2, B6, B10



MODELS: S25, S40, B25, B40



02 J4M SERIES

READ THESE INSTRUCTIONS BEFORE CONNECTING THE ACTUATOR. DAMAGE CAUSED BY NON COMPLIANCE OF THESE INSTRUCTIONS IS NOT COVERED BY OUR WARRANTY.

J4M Electric actuators operate with the use of live electricity. It is recommended that only qualified electrical engineers be allowed to connect or adjust these actuators.

VOLTAGE TO BE CONNECTED

All our actuators model S2 to S40 are ready to work from 24-240 VDC/VAC.

All our actuators model B2 to B40 are ready to work at 12 VDC/VAC ONLY.

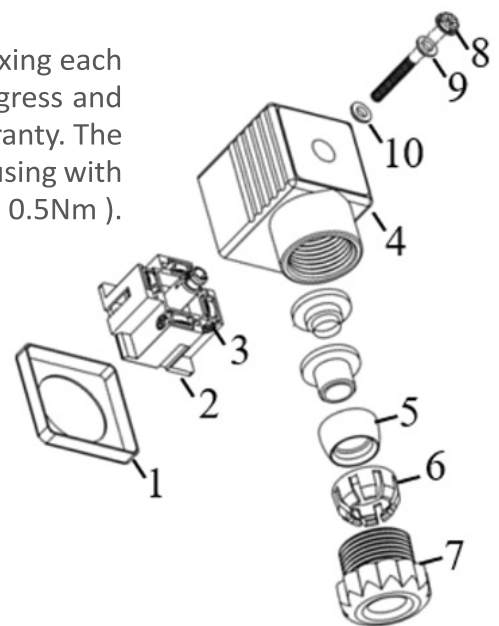
ELECTRICAL CONNECTORS

Warning: Before connecting ensure that the voltage to be applied to the actuator is within the range shown on the identification label. The supplied electrical connectors, used to connect to the actuator are DIN plugs. Ensure the diameter of cable to be used conforms to the maximum and minimum requirements of the DIN plugs to maintain water tightness (Fig.1).







CONNECTOR	SMALL BLACK		BIG GREY or BLACK	
	DIN43650/C		EN175301-803 FORM A	
MODEL	min Ø	máx. Ø	min Ø	máx. Ø
J4M 2 to 40	5mm	6mm	8mm	10,5mm

Warning: Ensure that the square rubber seal is in place when fixing each DIN plug to the actuator. Failure to do so could allow water ingress and damage caused by this installation error will invalidate any warranty. The DIN plugs are fixed to their respective bases on the actuator housing with a screw. Do not over tight the screw (8) when assembling (Max. 0.5Nm).

- | | |
|------------------------|-----------------|
| 1. Gasket | 6. Grommet |
| 2. Terminal strip | 7. Gland - nut |
| 3. Cable fixing screws | 8. Fixing screw |
| 4. Housing | 9. Washer |
| 5. Washer | 10. Gasket |



ID ACTUATOR LABEL

1	<p>MOD.:S25 CONFIRMATIONS: MAX. 24V 1A</p>	<p>SERIE: J4M BLUETOOTH/WIFI</p>	11							
2	<p>VOLTAGE: 24-240 DC OR AC (50/60HZ) (PATENTED)</p>									
3	<p>TEMPERATURE: -20°C + 70°C</p>	<p>DUTY: 75%</p>	12							
4	<p>WORKING TIME: 9.3 SEC / 360°</p>		13							
5	<p>WORKING ANGLE: MAX. 14 TURNS</p>									
6	<p>★ 14 F05/07 IP67</p>		14							
7	<p>MAX. TORQUE: 30 Nm</p>		15							
8	<p>SERIAL N°: 0000000000</p>		16							
9	<p></p>		17							
10	<p>Made In Spain</p>		18							
	<table border="0" style="width: 100%;"> <tr> <td style="text-align: center; width: 50%;">DPS OPTION: IN/OUT</td> <td style="width: 50%;"></td> </tr> <tr> <td>4-20mA <input type="checkbox"/> 0-20mA <input type="checkbox"/> NC <input type="checkbox"/> NO <input type="checkbox"/></td> <td style="vertical-align: top;">OUT different of IN:</td> </tr> <tr> <td>0-10V <input type="checkbox"/> 1-10V <input type="checkbox"/> STAYS PUT <input type="checkbox"/></td> <td></td> </tr> </table>			DPS OPTION: IN/OUT		4-20mA <input type="checkbox"/> 0-20mA <input type="checkbox"/> NC <input type="checkbox"/> NO <input type="checkbox"/>	OUT different of IN:	0-10V <input type="checkbox"/> 1-10V <input type="checkbox"/> STAYS PUT <input type="checkbox"/>		19
DPS OPTION: IN/OUT										
4-20mA <input type="checkbox"/> 0-20mA <input type="checkbox"/> NC <input type="checkbox"/> NO <input type="checkbox"/>	OUT different of IN:									
0-10V <input type="checkbox"/> 1-10V <input type="checkbox"/> STAYS PUT <input type="checkbox"/>										

<p>1 - Actuator Model. 2 - Voltage to be connected. 3 - Actuator ready to bear between -20°C & + 70°C. 4 - Time/Turn. 5 - Working angle. 6 - Plate to fix the valve to the actuator, following ISO 5211. 7 - Actuator with the IP67 protection. 8 - Maximum Operational torque. 9 - Actuator serial number. 10 - Bar code of the serial number.</p>	<p>11 - Actuator series. 12 - Duty: 75%. 13 - QR code for manufacturing. 14 - Actuator with CE certificate. 15 - This product should not be disposed of as unsorted waste. 16 - UK Conformity Assessed. 17 - Quality Control Conformity. 18 - Country where the equipment was manufactured. 19 - DPS configuration.</p>
--	---



LOCAL VISUAL POSITION INDICATOR

All **J4M actuators** are supplied with a local visual position indicator (**Fig.6**).

The OPEN position shows the indicator in BLACK and at the end of the stroke (max 14 turns) shows the full indicator in RED.



EMERGENCY MANUAL OVERRIDE FACILITY:

The **J4M** has 2 operating modes, automatic and manual, the required mode is selected by using a lever on the lower half of the actuator housing (Fig 7).

The 2 positions are marked:

AUTO = Automatic operation

MAN = Manual operation

Warning: Do not remove the selector lever securing screw, as this will allow its internal mechanism to become loose and will cause irreparable damage to the actuator's gearbox. Removing this screw will invalidate the warranty.

When **"AUTO"** position is selected:

The hand wheel rotates automatically, it is very important not to block it, otherwise the actuator could suffer unrepairable damages.





Fig. 7 J4M 2,6 and 10

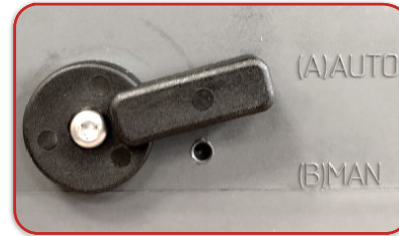
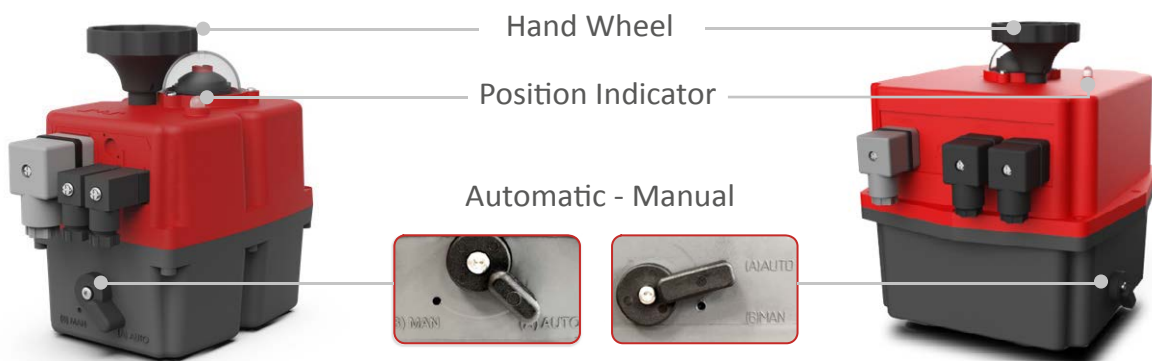


Fig. 7 J4M 25 and 40

J4M 2, 6 and 10

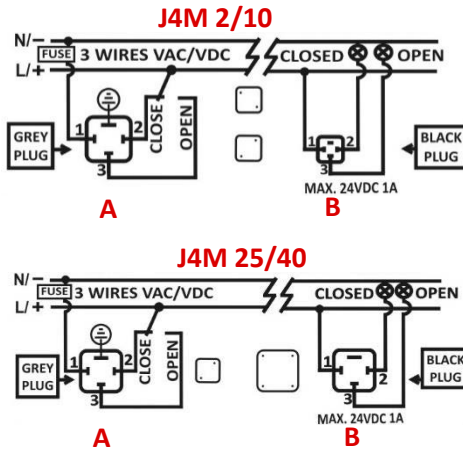
J4M 25 and 40



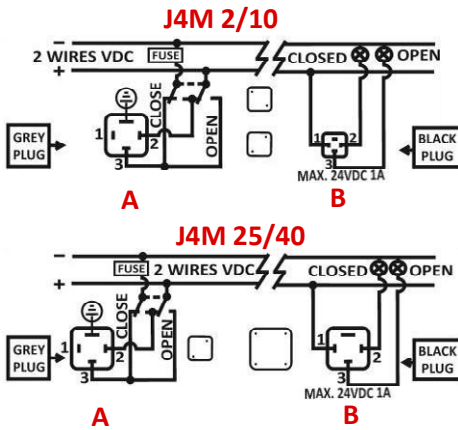
When **“MAN”** function is selected:

- 1 - The electronic system cuts the power to the motor after a few minutes.
- 2 - The mechanical connection between the motor and the output shaft is disconnected.
- 3 - The desired position can be achieved by using the hand wheel.
- 4 - There are two ways to re-activate the motor after being isolated whilst in **“MAN”** position:
 - a) Change from **“MAN”** mode to **“AUTO”**. Deactivate the supply voltage for a few seconds, which resets the actuator and it could operate automatically again.

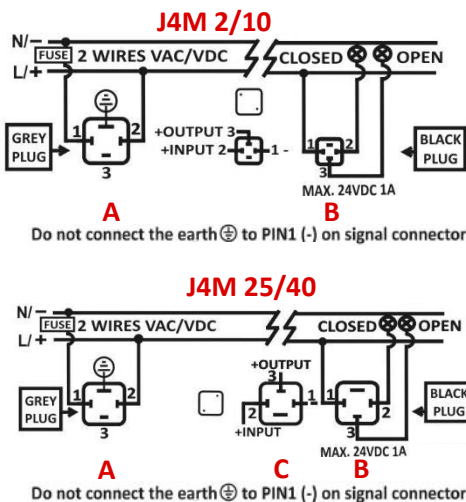


ELECTRICAL DIAGRAMS J4M

3 WIRES ON-OFF

- A** = Power supply plug
- A:** VAC 3 WIRES (Grey plug)
 - PIN 1 = Neutral + PIN 2 = Close
 - PIN 1 = Neutral + PIN 3 = Open
- A:** VDC 3 WIRES (Grey plug)
 - PIN 1 = (-) Negative + PIN 2 = (+) Positive = Close
 - PIN 1 = (-) Negative + PIN 3 = (+) Positive = Open
- B** = Volt free contact, plug
 - PIN 1 / PIN 2 = Close
 - PIN 1 / PIN 3 = Open


2 WIRES ON-OFF

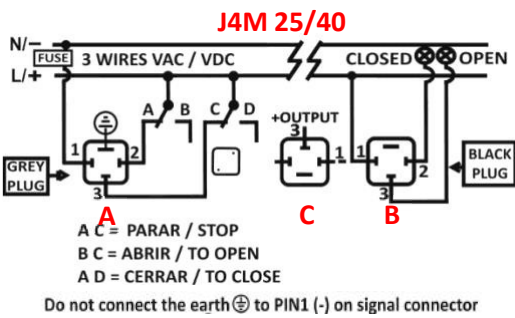
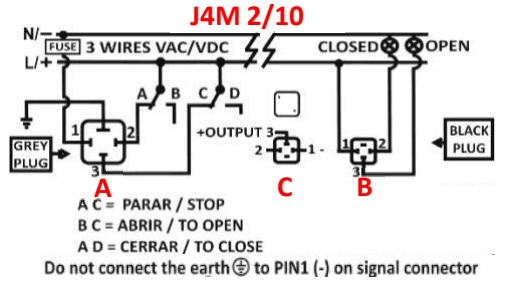
- A** = Power supply plug
- A:** VDC 2 WIRES (Grey plug)
 - PIN 2 = (+) Positive + PIN 3 = (-) Negative = Close
 - PIN 2 = (-) Negative + PIN 3 = (+) Positive = Open
- B** = Volt free contact plug
 - PIN 1 / PIN 2 = Close
 - PIN 1 / PIN 3 = Open


POSITIONER

- A** = Power supply plug
- A:** VAC 2 WIRES (Grey plug)
 - PIN 1 = Neutral + PIN 2 = Phase = Power supply plug
- A:** VDC 2 WIRES (Grey plug)
 - PIN1=(-) Negative + PIN 2=(+) Positive = Power supply plug
- B** = Volt free contact plug
 - PIN 1 / PIN 2 = Closed
 - PIN 1 / PIN 3 = Open
- C** = Instrumentation Signal
 - C:** Input signal : 4/20mA or 0/10V
 - PIN 1 = (-) Negative + PIN 2 = (+) Positive = Input signal
 - PIN 1 = (-) Negative + PIN 3 = (+) Positive = Output signal



ELECTRICAL DIAGRAMS J4M



POSITIONER ONLY OUTPUT

A= Power supply plug

A: VAC 3 WIRES (Grey plug)
 PIN1 = NEUTRAL + PIN 2 = Close
 PIN1 = NEUTRAL + PIN 3 = Open
 PIN1 = NEUTRAL + PIN2+PIN3 = STOP

A: VDC 3 WIRES (Grey plug)
 PIN1 = NEGATIVE + PIN 2 = POSITIVE = Close
 PIN1 = NEGATIVE + PIN 3 = POSITIVE = Open
 PIN1 = NEGATIVE + PIN 2+3 = POSITIVE = Stop

B: Volt free contact, plug
 PIN1 / PIN 2 = Close
 PIN1 / PIN 3 = Open

C: Instrumentation Signal
 PIN1 = (-) Negative + PIN 3 = (+) Positive =
 Output signal



03 Datasheet - J4M 2

GENERAL CHARACTERISTICS

MATERIAL:

Body: Anticorrosive Polyamide, Grey colour / **Optional:** Polypropilene V0, Black colour.
Cover: Anticorrosive Polyamide, Red colour / **Optional:** Polypropilene V0, Natural colour
Output drive: Zamak, Zinc plated / **Optional:** Zamak, TEFLON coated
Flange: ZamaK and Zinc plated / **Optional:** Zamak and TEFLON coated.
Main external shaft: Anticorrosive Polyamide
External screws: Stainless Steel
Gears: Steel and Polyamide
Visual position indicator: Polyamide
Dome: Polycarbonate



Electronic Torque Limiter function
Electric motor: 24VDC Brushless motor
Insulation: Class B
(IEC 60034) Service: S4

Model	S2	B2
Voltage VDC/VAC 50/60Hz-0/+5%	24-240 VDC/VAC	12 VDC/VAC ONLY

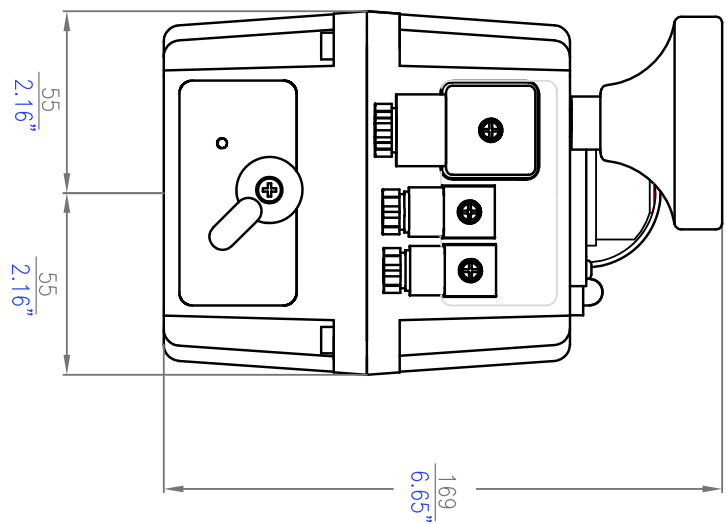
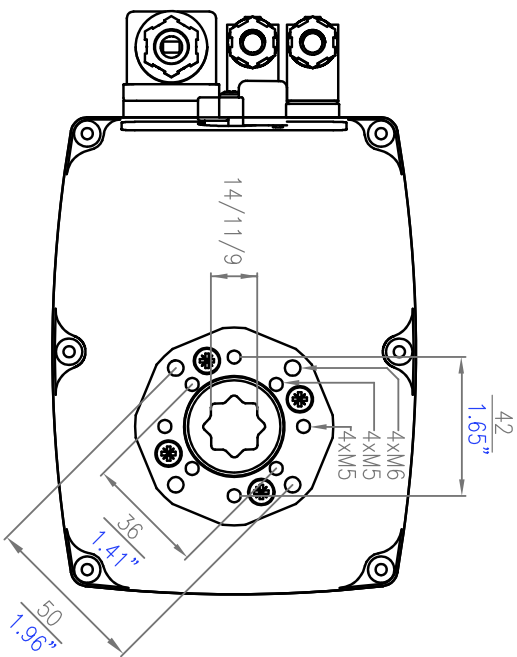
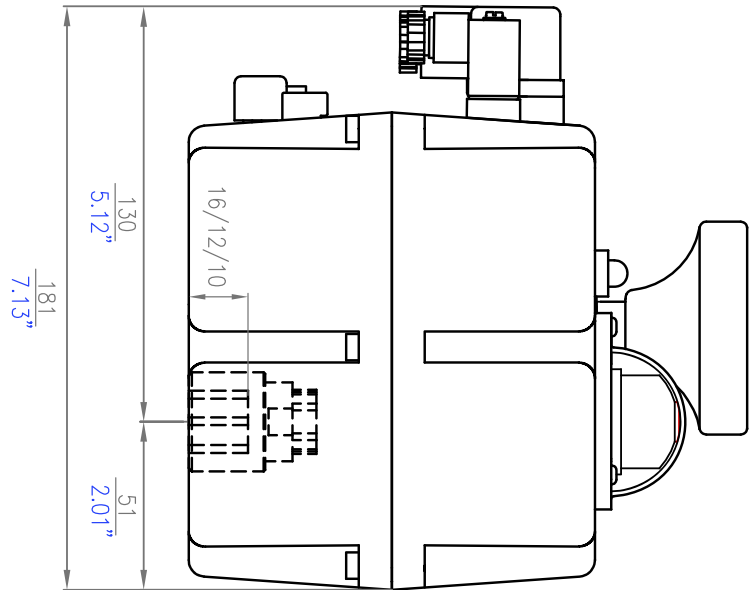
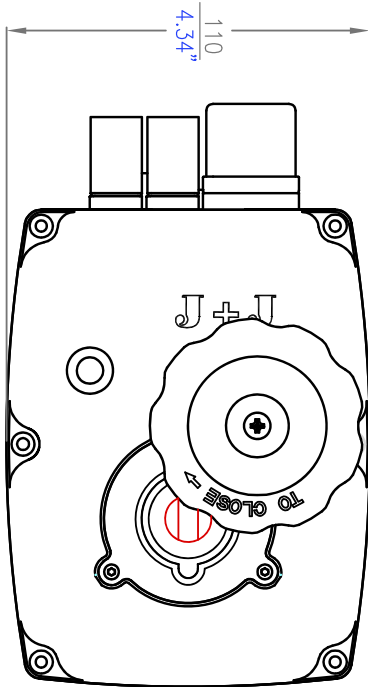
Model	S2 / B2
Operation time unload	4 secs/360°
Minimum operational torque	2Nm/17,70lb/in
Maximum operational torque	5,5Nm/48,68lb/in
Duty rating	75 %
Maximum number turns	14
Confirmations	2 relays (Max. 24V/1A. Open and Close)
Automatic heater	3,5 W
Big Plug	EN175301-803 FORM A
Small Plug	DIN43650/C
Protection IEC 60529 rating	IP67
Temperature	-20°C +70°C / -4°F +158°F
ISO 5210 Plate	Standard: F03/F04/F05 Optional: F07 *17mm
DIN 3337 Female output drive	Standard: *14 Optional: *9, *11mm
Weight	1,9 Kg

MANUFACTURER OPTION

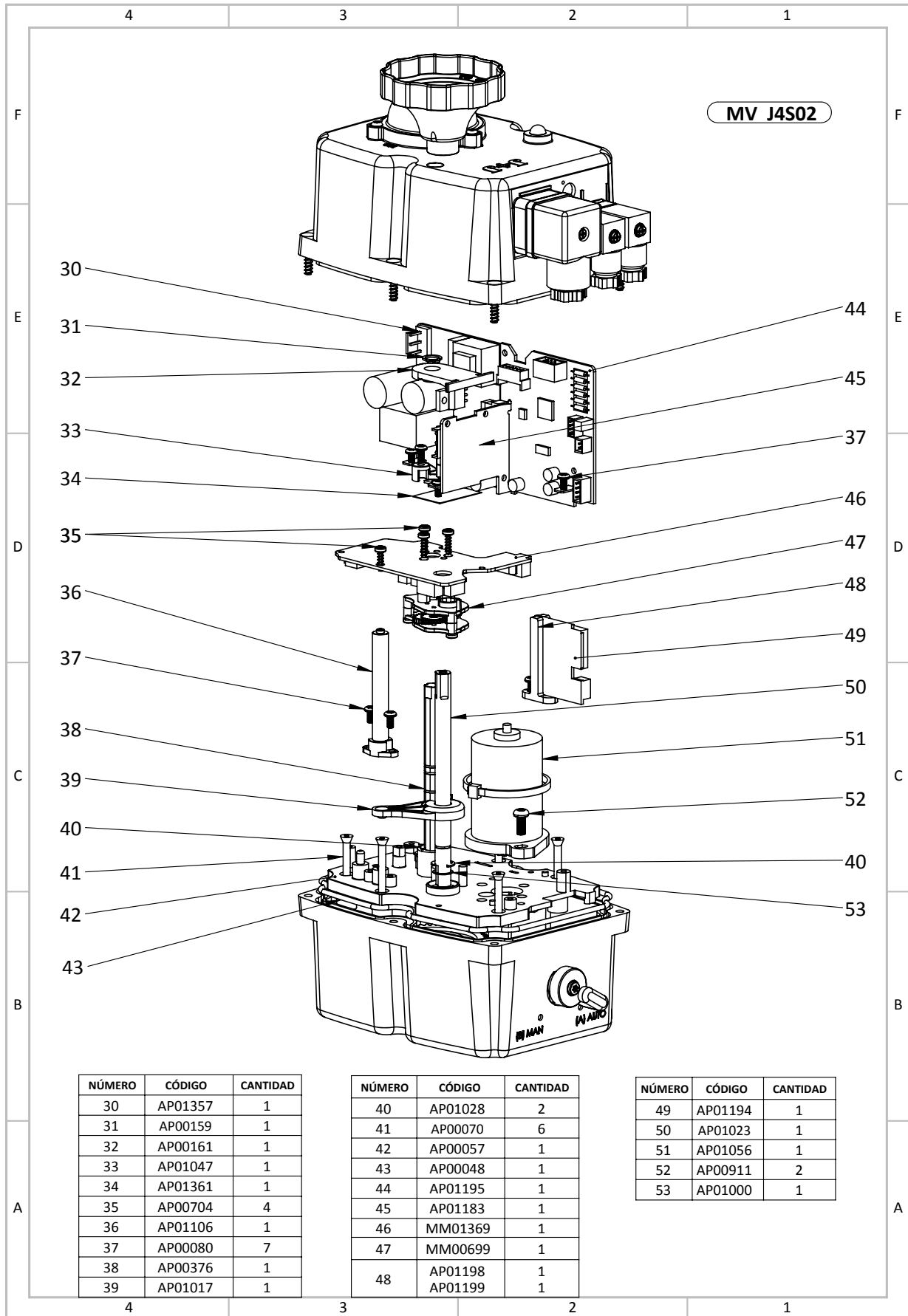


Note: Technical data are the same despite the different casings.

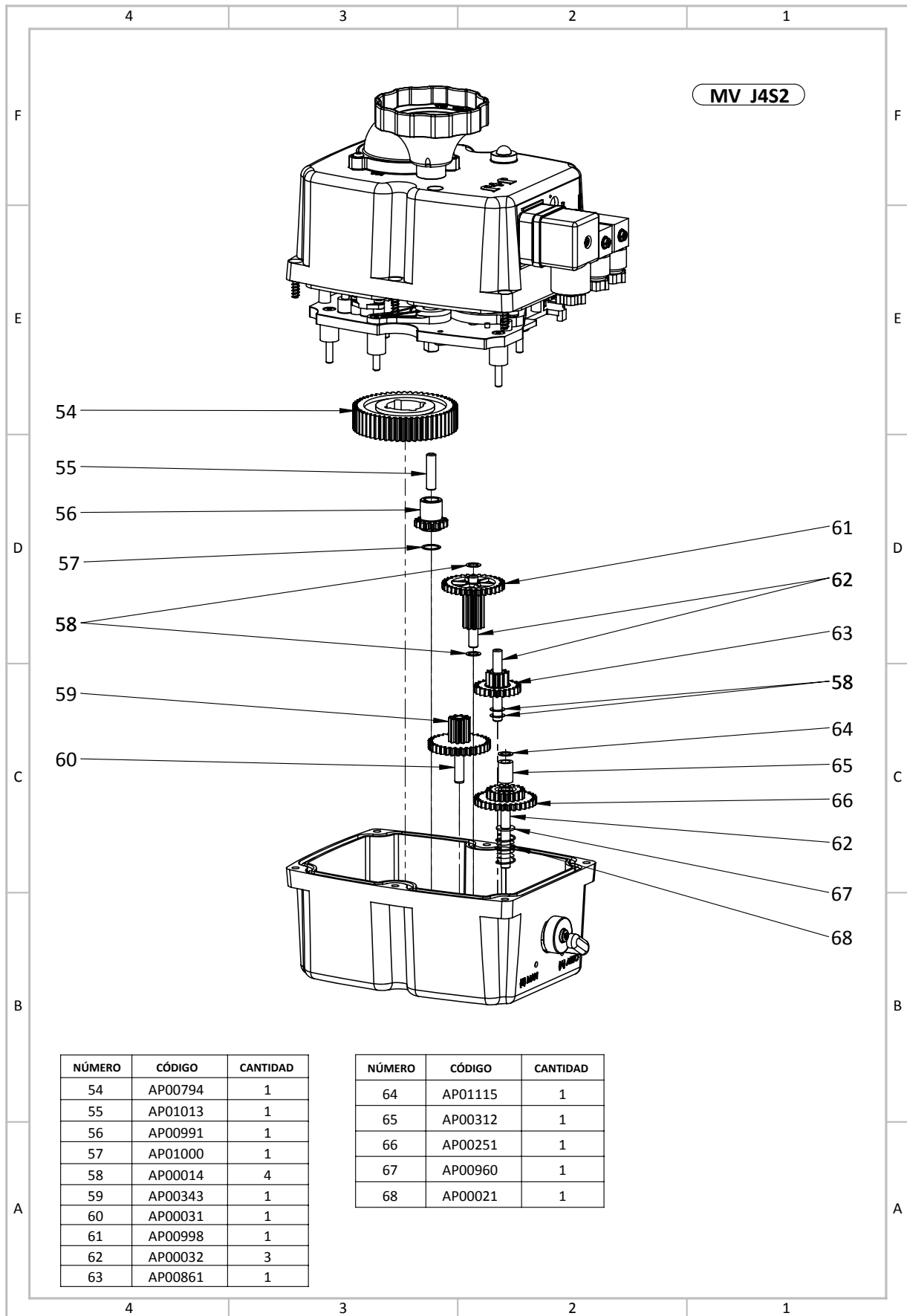
J4M 2 SIZES



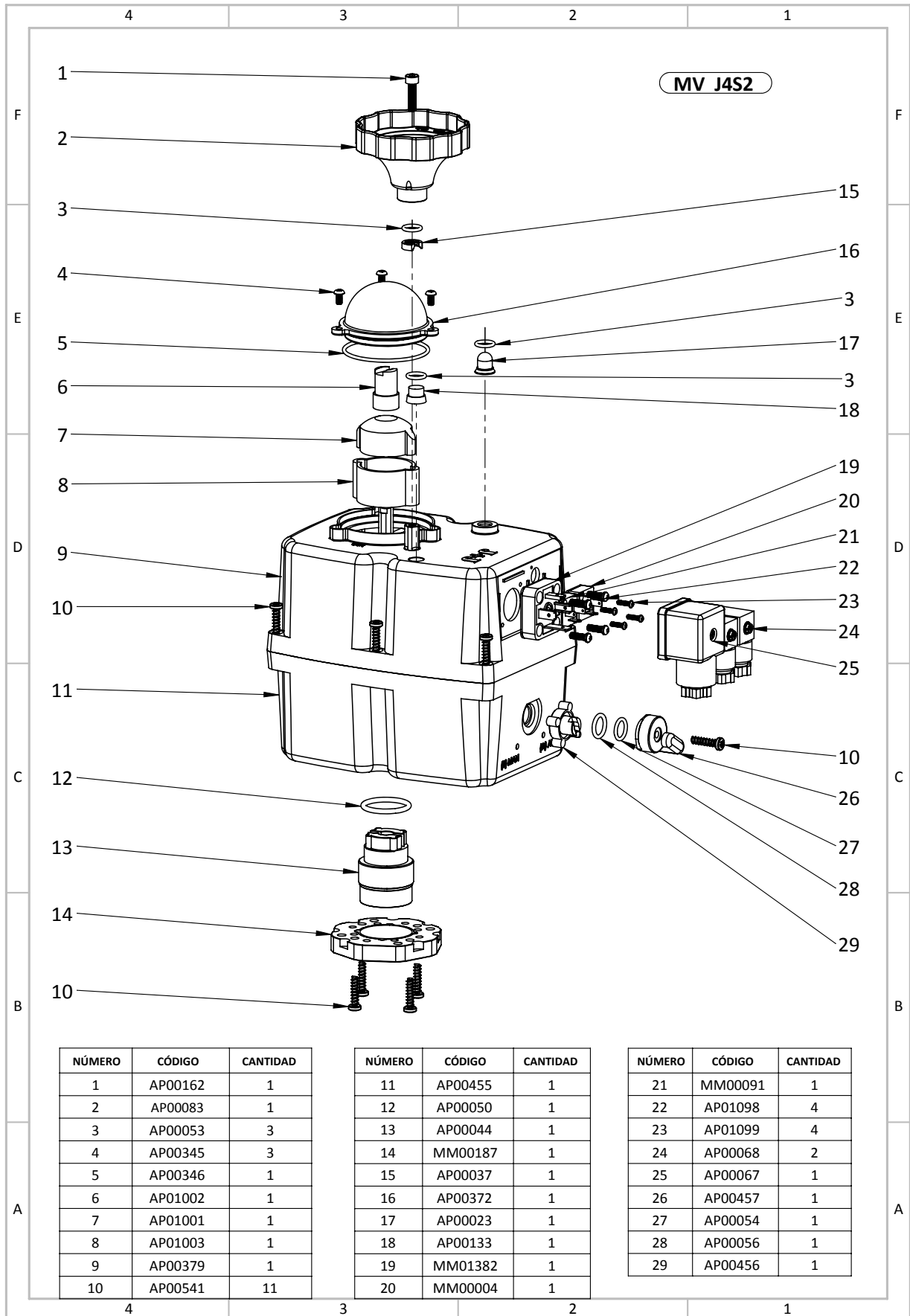
Exploded View



Exploded View



Exploded View

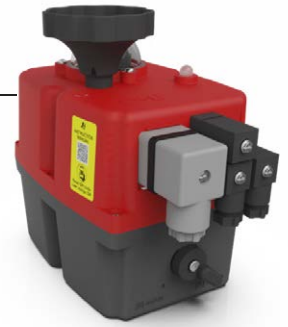


Datasheet - J4M 6

GENERAL CHARACTERISTICS

MATERIAL:

Body: Anticorrosive Polyamide, Grey colour / **Optional:** Polypropilene V0, Black colour.
Cover: Anticorrosive Polyamide, Red colour / **Optional:** Polypropilene V0, Natural colour.
Output drive: Zamak, Zinc plated / **Optional:** Zamak, TEFLON coated
Flange: ZamaK and Zinc plated / **Optional:** Zamak and TEFLON coated.
Main external shaft: Stainless Steel
External screws: Stainless Steel
Gears: Steel and Polyamide
Visual position indicator: Polyamide
Dome: Polycarbonate



Electronic Torque Limiter function
Electric motor: 24VDC Brushless motor
Insulation: Class B
(IEC 60034) Service: S4

Model	S6	B6
Voltage VDC/VAC 50/60Hz-0/+5%	24-240 VDC/VAC	12 VDC/VAC ONLY

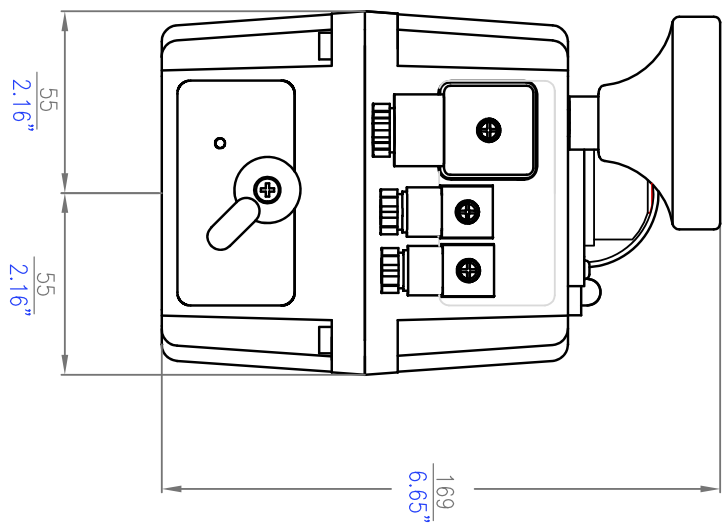
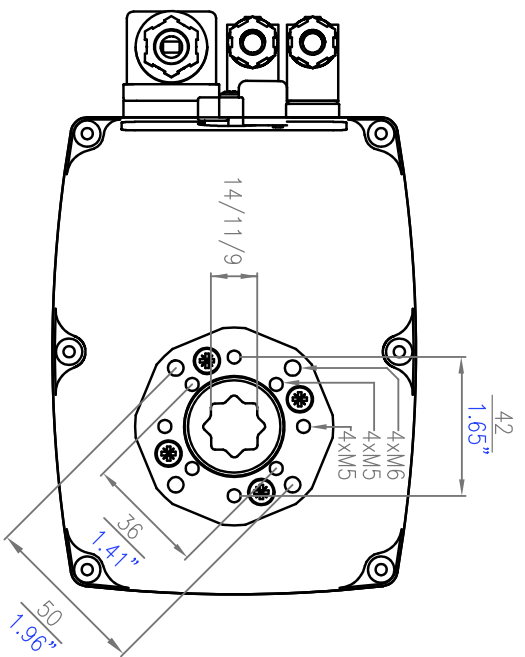
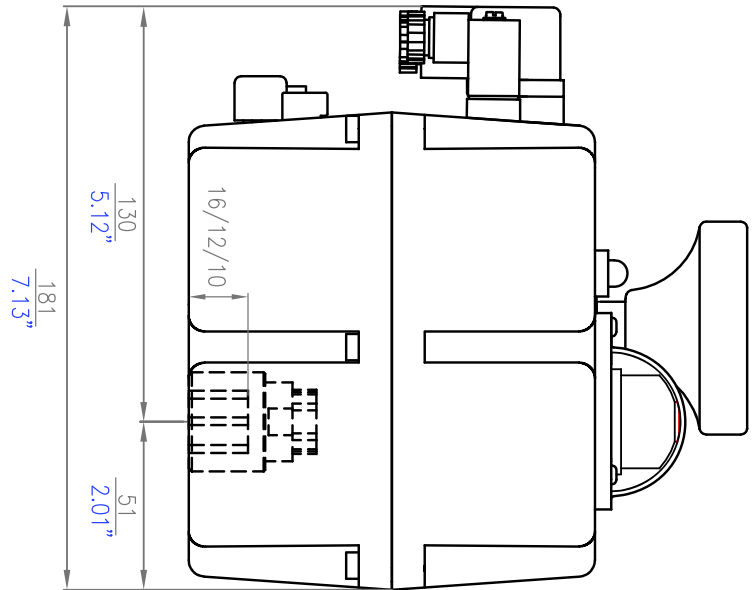
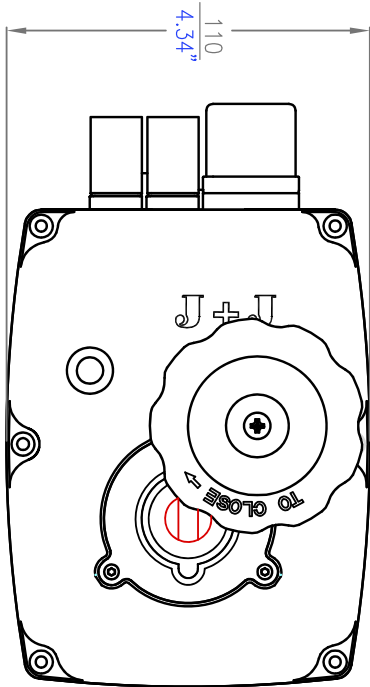
Model	S6 / B6
Operation time unload	3 Secs/360°
Minimum operational torque	5Nm/44,25lb/in
Maximum operational torque	9Nm/79,66lb/in
Duty rating	75 %
Maximum number turns	14
Confirmations	2 relays (Max. 24V/1A. Open and Close)
Automatic heater	3,5 W
Big Plug	EN175301-803 FORM A
Small Plug	DIN43650/C
Protection IEC 60529 rating	IP67
Temperature	-20°C +70°C / -4°F +158°F
ISO 5210 Plate	Standard: F03/F04/F05 Optional: F07 *17mm
DIN 3337 Female output drive	Standard: *14 Optional: *9, *11mm
Weight	1,9 Kg

MANUFACTURER OPTION

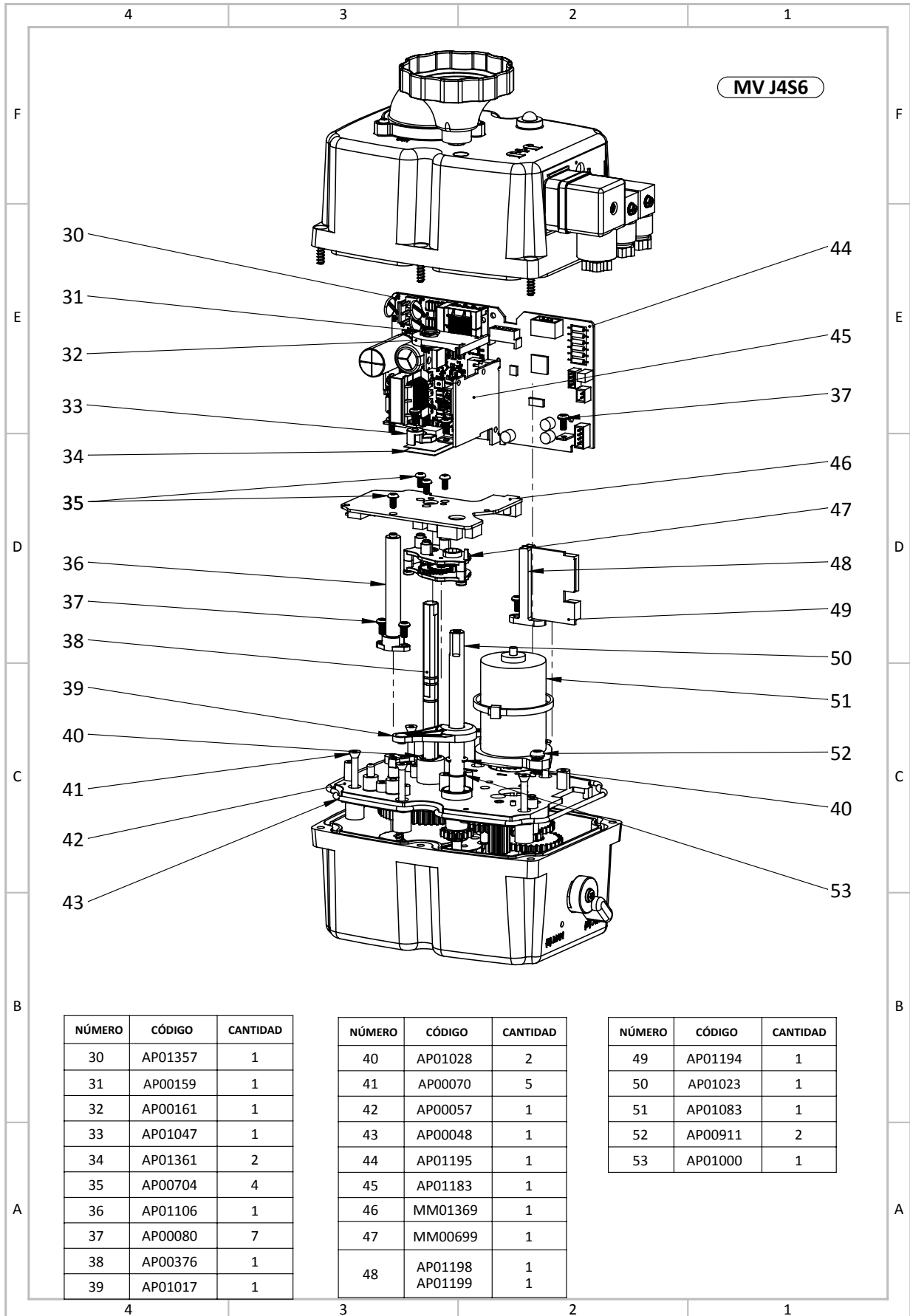


Note: Technical data are the same despite the different casings.

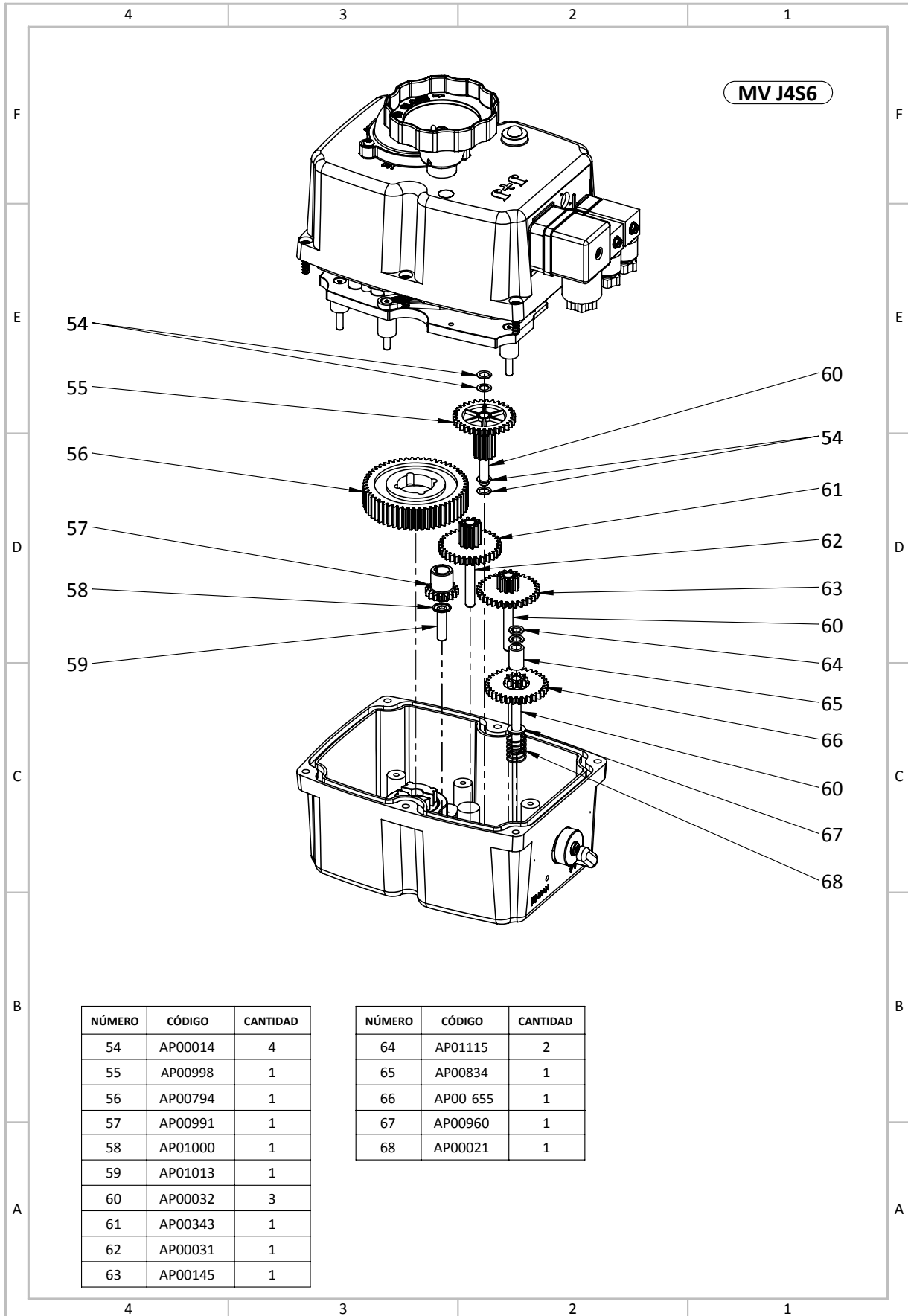
J4M 6 SIZES



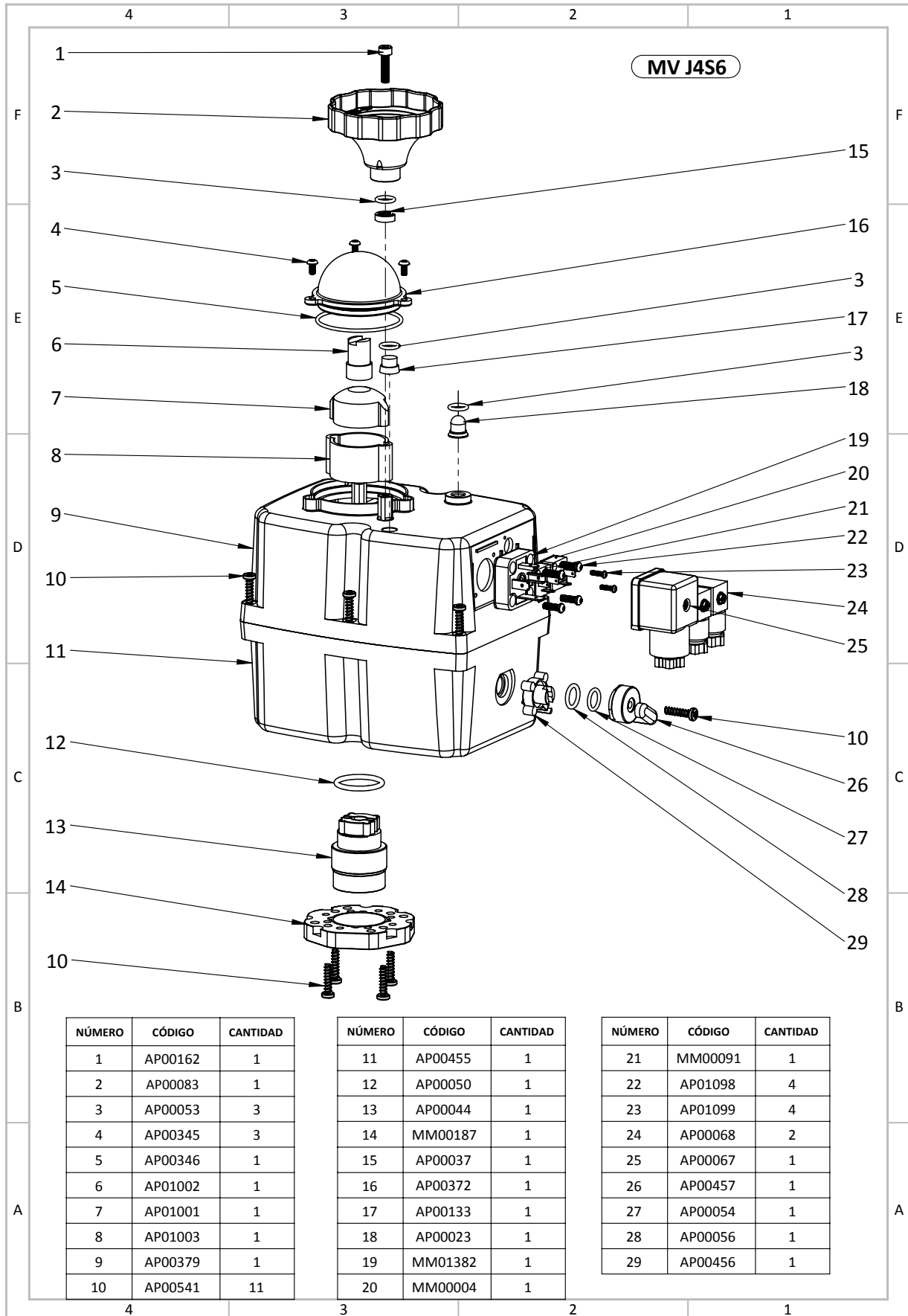
Exploded View



Exploded View



Exploded View



Datasheet - J4M 10

GENERAL CHARACTERISTICS

MATERIAL:

Body: Anticorrosive Polyamide, Grey colour / **Optional:** Polypropilene V0, Black colour.
Cover: Anticorrosive Polyamide, Red colour / **Optional:** Polypropilene V0, Natural colour.
Output drive: Zamak, Zinc plated / **Optional:** Zamak, TEFLON coated
Flange: Aluminum and Cataphoresis / **Optional:** Aluminum and TEFLON coated.
Main external shaft: Stainless Steel
External screws: Stainless Steel
Gears: Steel and Polyamide
Visual position indicator: Polyamide
Dome: Polycarbonate



Electronic Torque Limiter function

Electric motor: 24VDC Brushless motor

Insulation: Class B

(IEC 60034) Service: S4

Model	S10	B10
Voltage VDC/VAC 50/60Hz-0/+5%	24-240 VDC/VAC	12 VDC/VAC ONLY

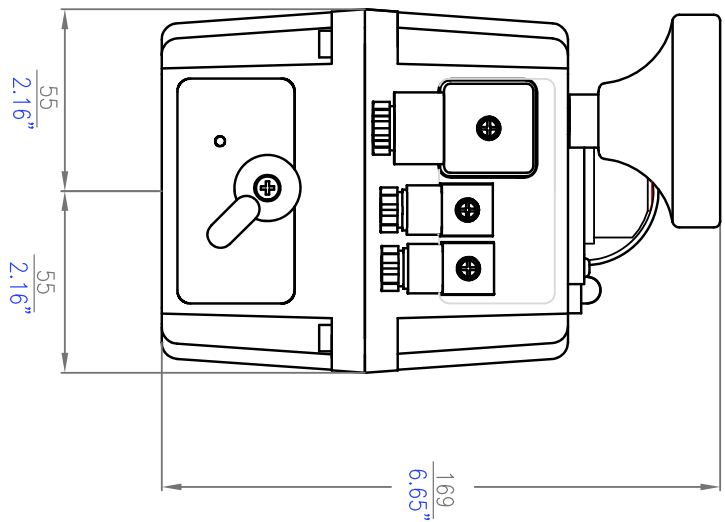
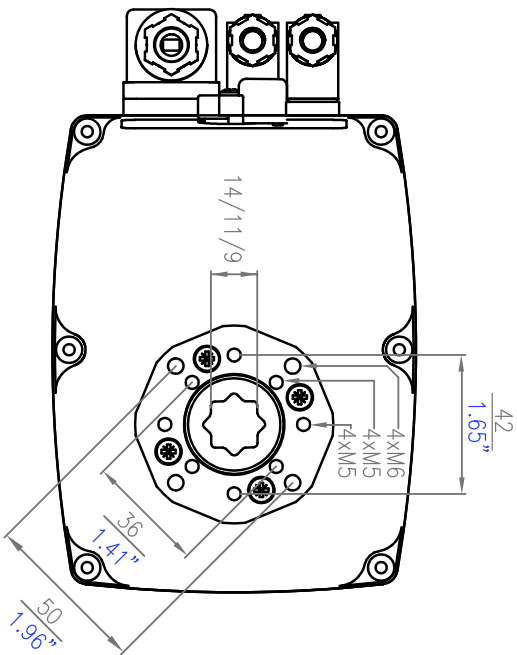
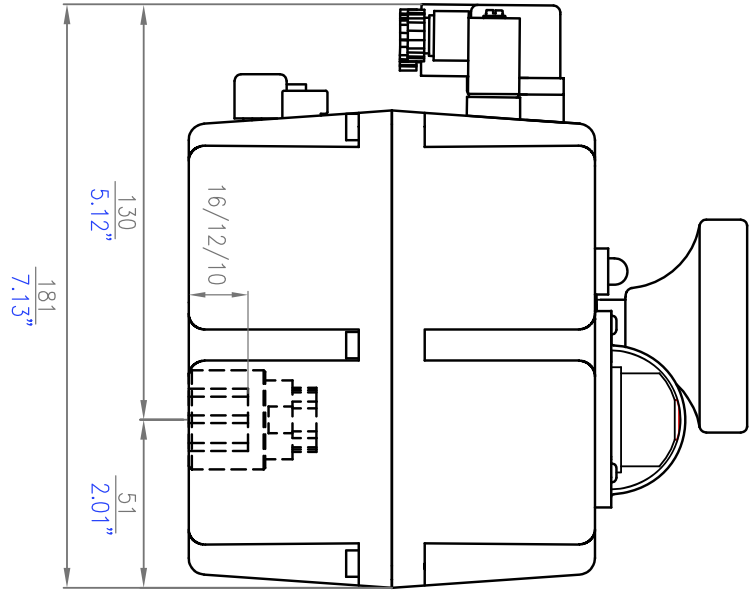
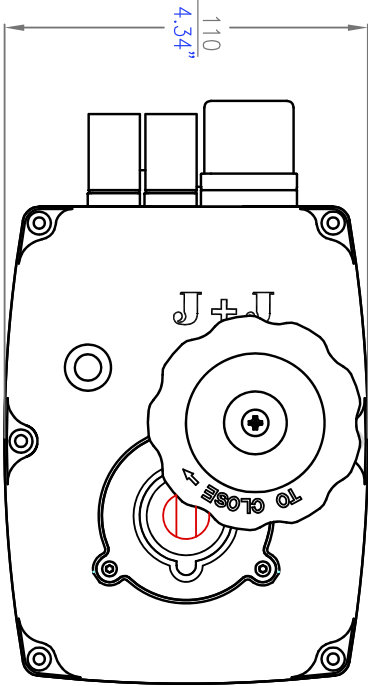
Model	S10 / B10
Operation time unload	12,8 Secs/360°
Minimum operational torque	7Nm/61,96 lb/in
Maximum operational torque	15Nm/ 132,76 lb/in
Duty rating	75 %
Maximum number turns	14
Confirmations	2 relays (Max. 24V/1A. Open and Close)
Automatic heater	3,5 W
Big Plug	EN175301-803 FORM A
Small Plug	DIN43650/C
Protection IEC 60529 rating	IP67
Temperature	-20°C +70°C / -4°F +158°F
ISO 5210 Plate	Standard: F05/F07
DIN 3337 Female output drive	Standard: *17 Optional: *11, *14mm
Weight	1,9 Kg

MANUFACTURER OPTION

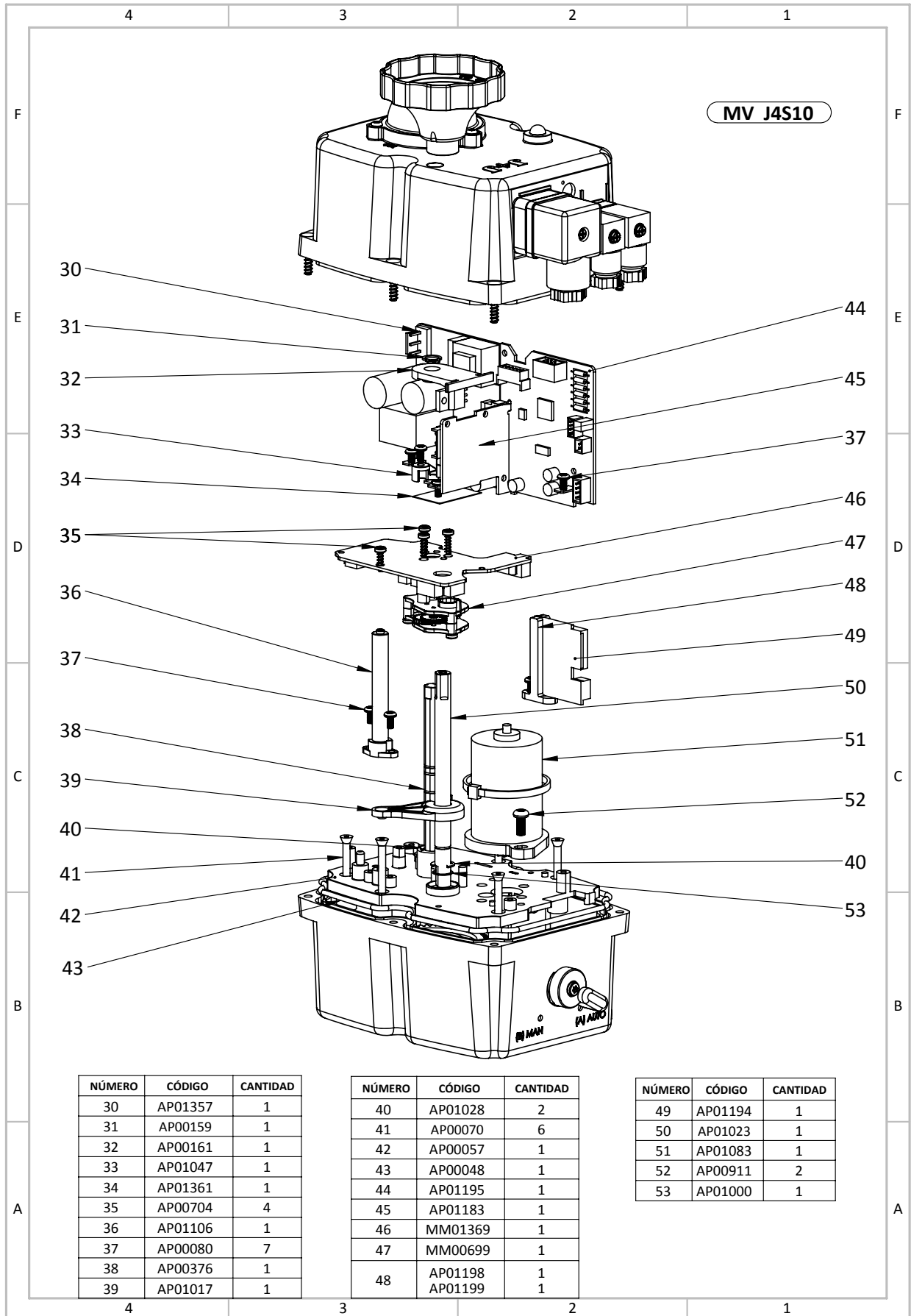


Note: Technical data are the same despite the different casings.

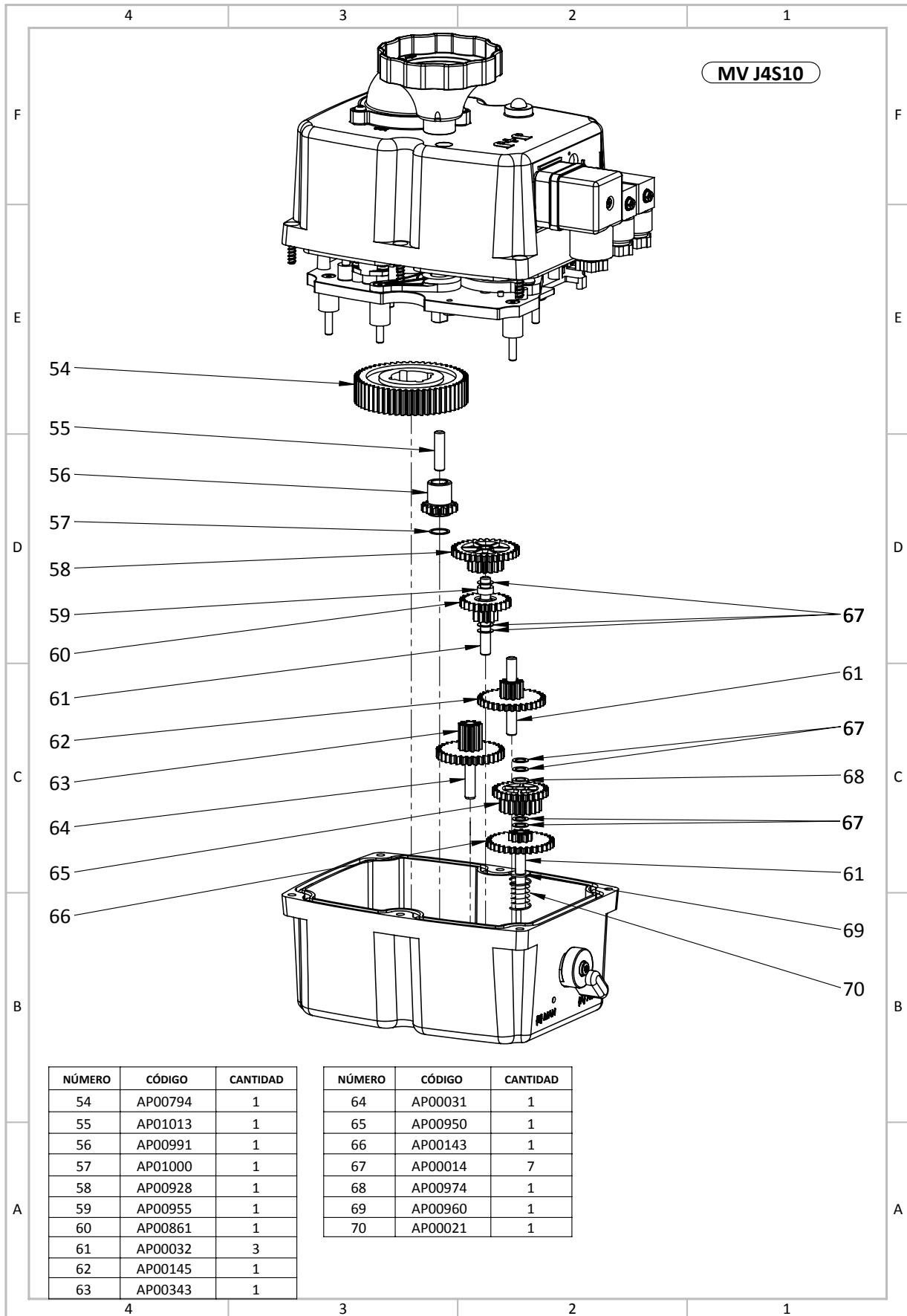
J4M 10 SIZES



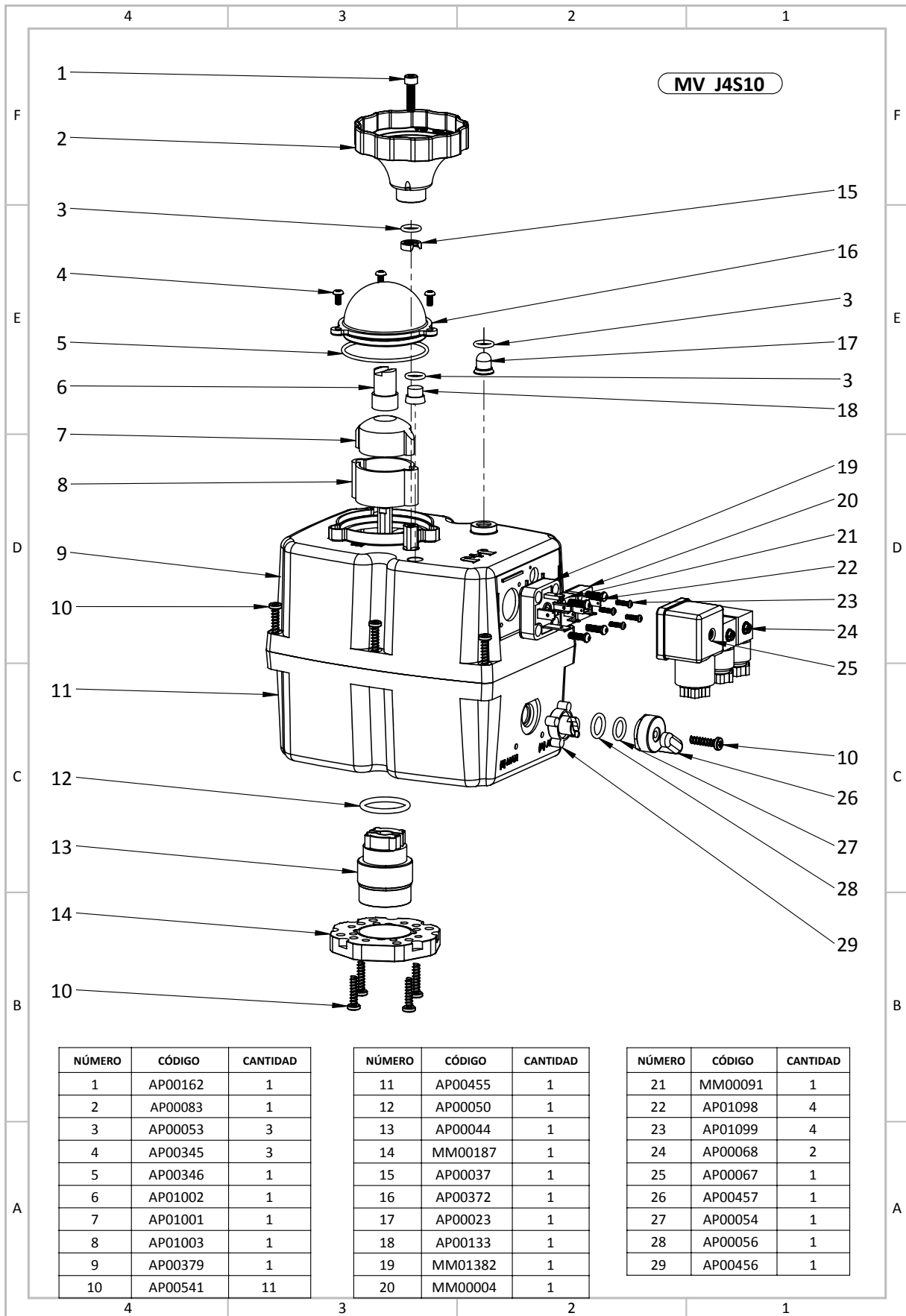
Exploded View



Exploded View



Exploded View



NÚMERO	CÓDIGO	CANTIDAD
1	AP00162	1
2	AP00083	1
3	AP00053	3
4	AP00345	3
5	AP00346	1
6	AP01002	1
7	AP01001	1
8	AP01003	1
9	AP00379	1
10	AP00541	11

NÚMERO	CÓDIGO	CANTIDAD
11	AP00455	1
12	AP00050	1
13	AP00044	1
14	MM00187	1
15	AP00037	1
16	AP00372	1
17	AP00023	1
18	AP00133	1
19	MM01382	1
20	MM00004	1

NÚMERO	CÓDIGO	CANTIDAD
21	MM00091	1
22	AP01098	4
23	AP01099	4
24	AP00068	2
25	AP00067	1
26	AP00457	1
27	AP00054	1
28	AP00056	1
29	AP00456	1

Datasheet - J4M 25

GENERAL CHARACTERISTICS

MATERIAL:

Body: Anticorrosive Polyamide, Grey colour / **Optional:** Polypropilene V0, Black colour.
Cover: Anticorrosive Polyamide, Red colour / **Optional:** Polypropilene V0, Natural colour.
Output drive: Zamak, Zinc plated / **Optional:** Zamak, TEFLON coated
Flange: Aluminum and Cataphoresis / **Optional:** Aluminum and TEFLON coated.
Main external shaft: Stainless Steel
External screws: Stainless Steel
Gears: Steel and Polyamide
Visual position indicator: Polyamide
Dome: Polycarbonate



Electronic Torque Limiter function
Electric motor: 24VDC Brushless motor
Insulation: Class B
(IEC 60034) Service: S4

Model	S25	B25
Voltage VDC/VAC 50/60Hz-0/+5%	24-240 VDC/VAC	12 VDC/VAC ONLY

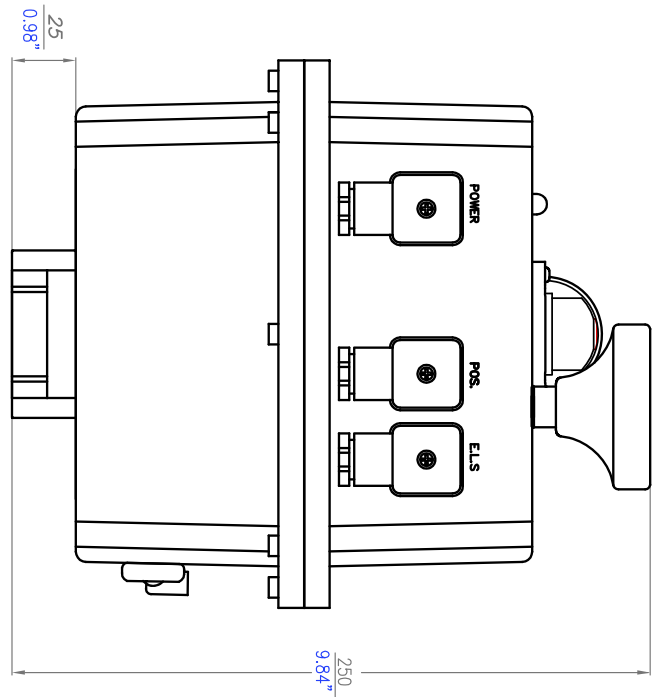
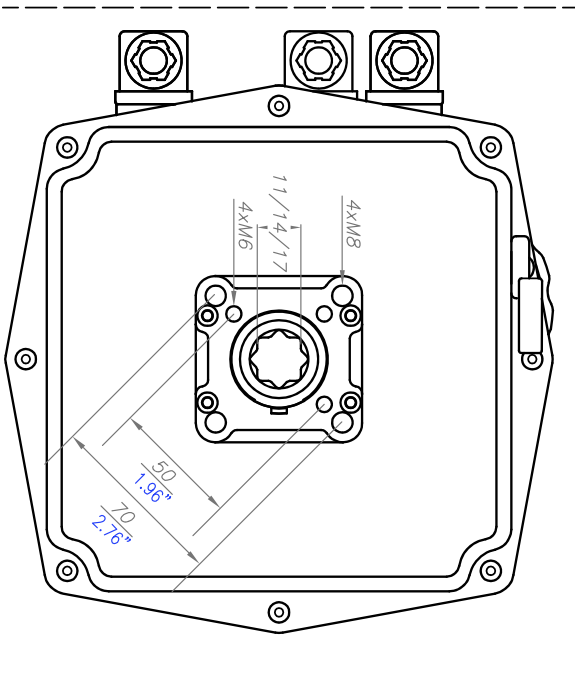
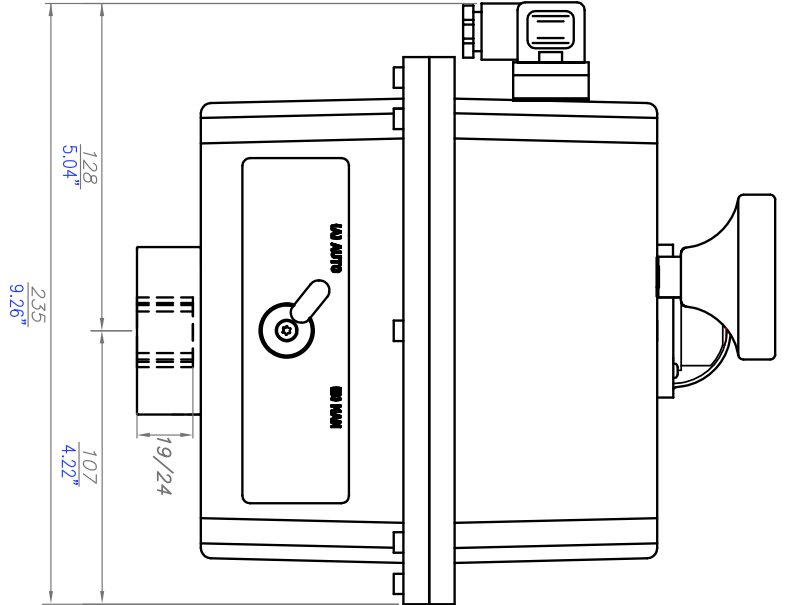
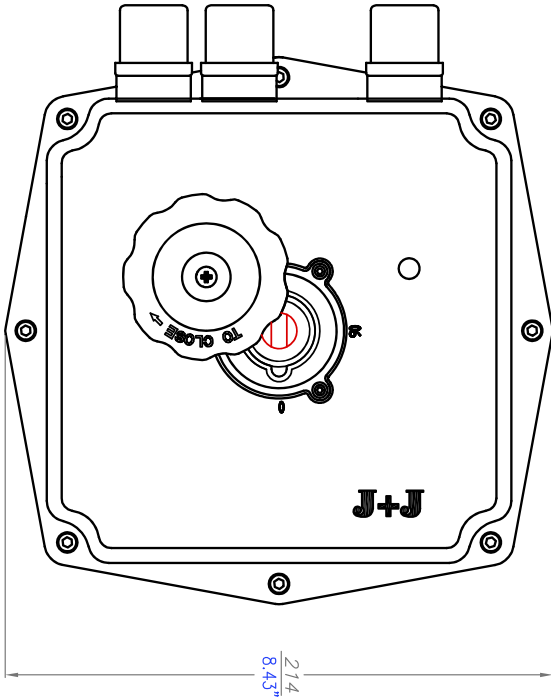
Model	S25 / B25
Operation time unload	9,3 Secs/360 ^a
Minimum operational torque	10Nm / 88,51 lb/in
Maximum operational torque	30Nm /265,52 lb/in
Duty rating	75 %
Maximum number turns	14
Confirmations	2 relays (Max. 24V/1A. Open and Close)
Automatic heater	3,5 W
Big Plug	EN175301-803 FORM A
Small Plug	DIN43650/C
Protection IEC 60529 rating	IP67
Temperature	-20°C +70°C /-4°F +158°F
ISO 5210 Plate	F05/F07
DIN 3337 Female output drive	Standard *17 Optional *11 and *14
Weight	3.8 Kg

MANUFACTURER OPTION



Note: Technical data are the same despite the different casings.

J4M 25 SIZES



Exploded View

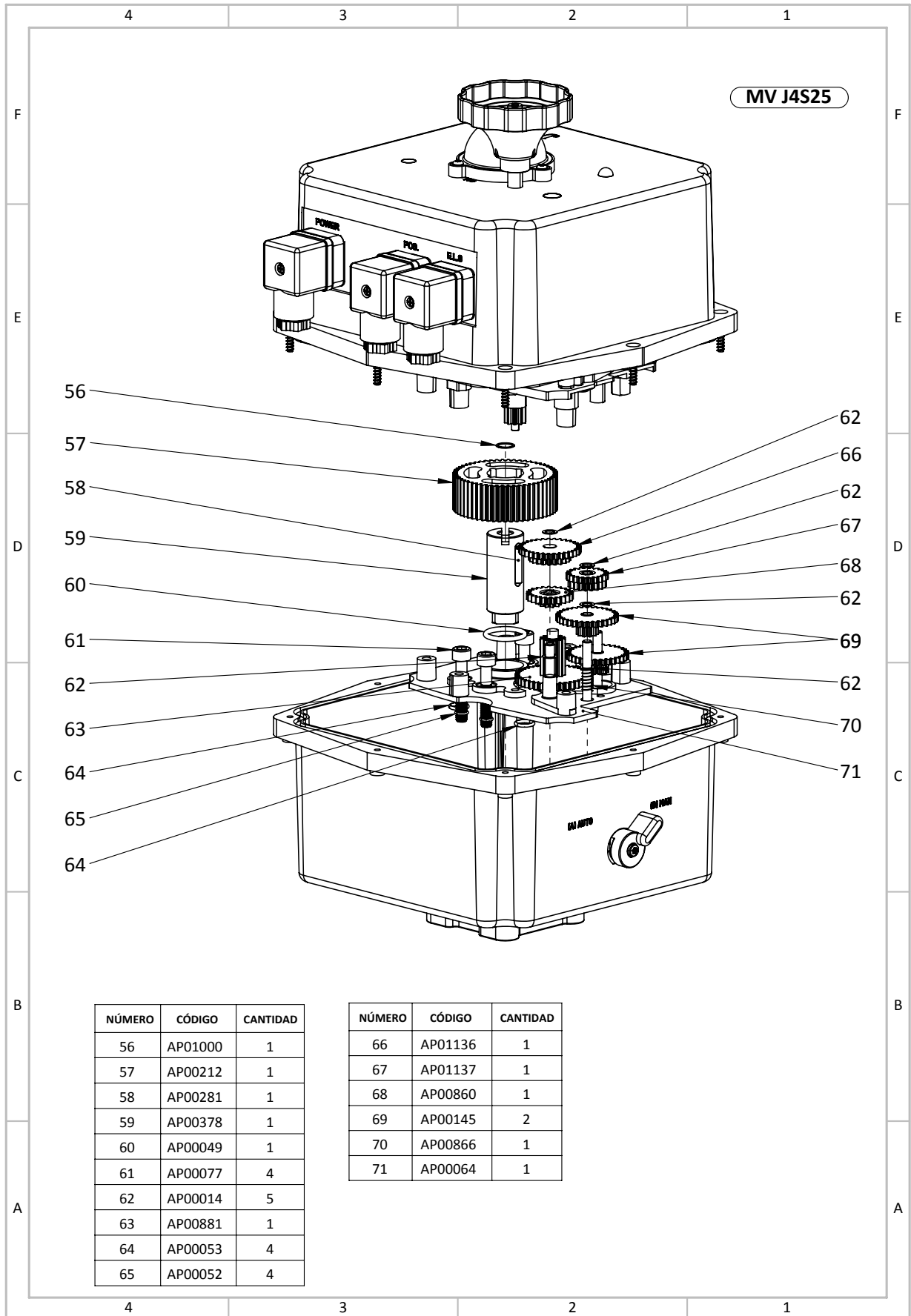
MV J4S25

NÚMERO	CÓDIGO	CANTIDAD
30	AP01370	1
31	AP01126	1
32	AP00159	1
33	AP00161	1
34	AP00080	8
35	AP00698	4
36	MM01369	1
37	MM00699	1
38	AP00964	1
39	AP01106	1

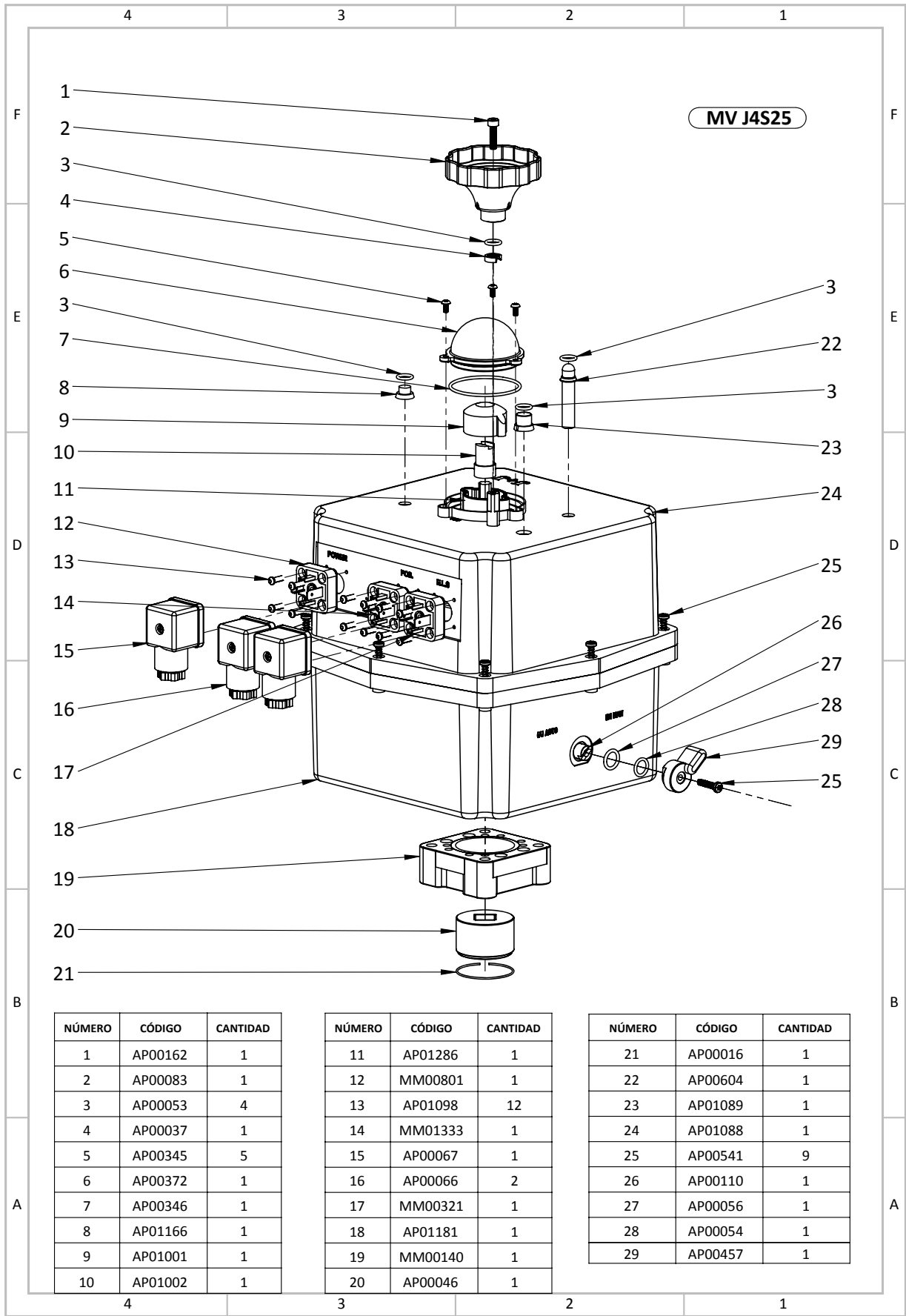
NÚMERO	CÓDIGO	CANTIDAD
40	MM00977	1
41	AP00492	5
42	AP00423	1
43	AP01195	1
44	AP01183	1
45	AP01194	1
46	AP01198	1
	AP01199	1
47	AP01108	1
48	AP01161	1

NÚMERO	CÓDIGO	CANTIDAD
49	AP01224	1
50	AP01180	1
51	AP01084	1
52	AP00911	2
53	AP00291	2
54	AP00059	1
55	AP00008	1

Exploded View



Exploded View



Datasheet - J4M 40

GENERAL CHARACTERISTICS

MATERIAL:

Body: Anticorrosive Polyamide, Grey colour / **Optional:** Polypropilene V0, Black colour.
Cover: Anticorrosive Polyamide, Red colour / **Optional:** Polypropilene V0, Natural colour.
Output drive: Zamak, Zinc plated / **Optional:** Zamak, TEFLON coated
Flange: Aluminum and Cataphoresis / **Optional:** Aluminum and TEFLON coated.
Main external shaft: Stainless Steel
External screws: Stainless Steel
Gears: Steel and Polyamide
Visual position indicator: Polyamide
Dome: Polycarbonate

Electronic Torque Limiter function
Electric motor: 24VDC Brushless motor
Insulation: Class B
(IEC 60034) Service: S4



Model	S40	B40
Voltage VDC/VAC 50/60Hz-0/+5%	24-240 VDC/VAC	12 VDC/VAC ONLY

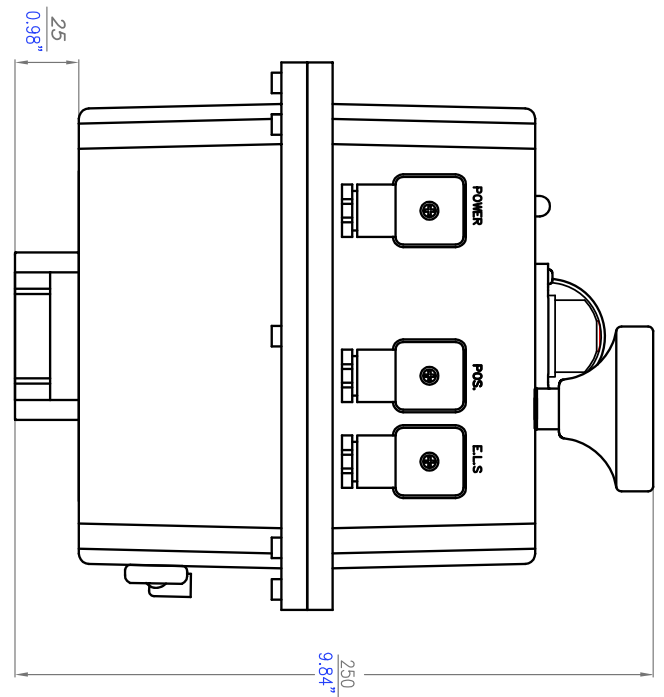
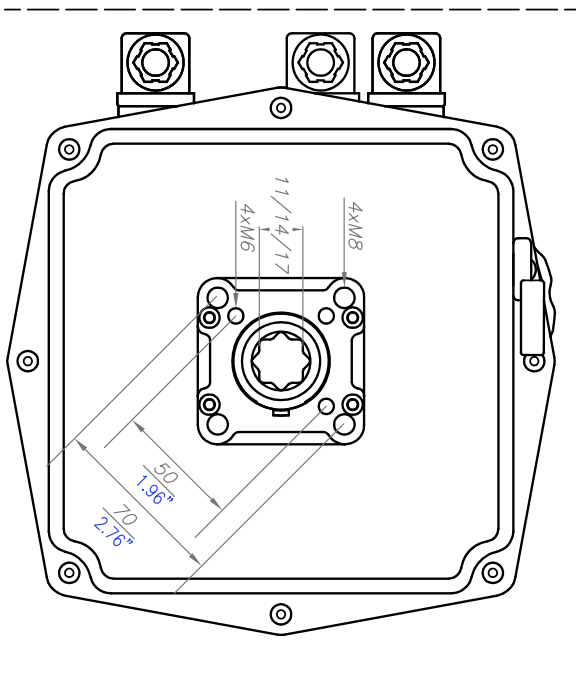
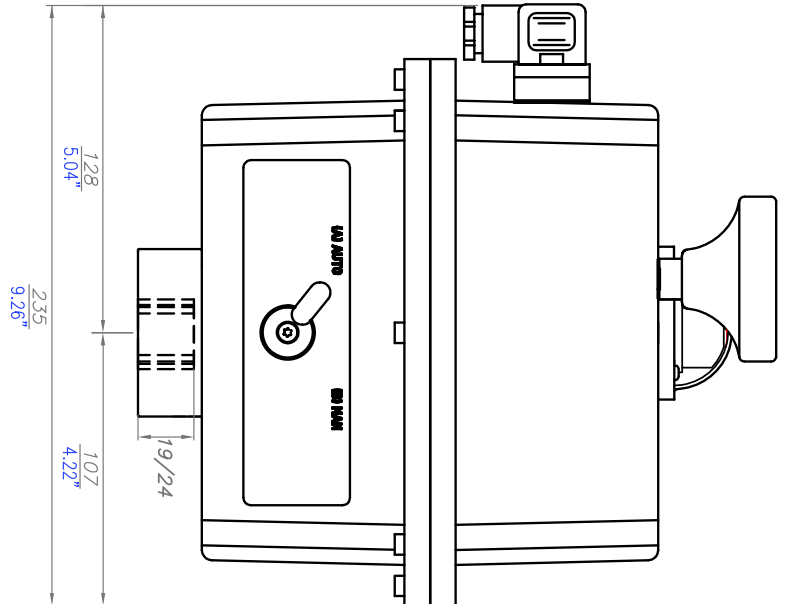
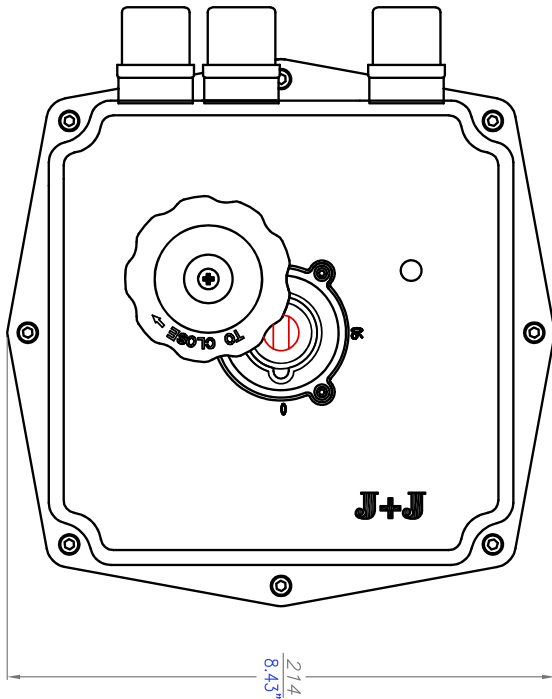
Model	S40 / B40
Operation time unload	12 Secs/360°
Minimum operational torque	16Nm /141,61 lb/in
Maximum operational torque	50Nm / 422,54 lb/in
Duty rating	75 %
Maximum number turns	14
Confirmations	2 relays (Max. 24V/1A. Open and Close)
Automatic heater	3,5 W
Big Plug	EN175301-803 FORM A
Small Plug	DIN43650/C
Protection IEC 60529 rating	IP67
Temperature	-20°C +70°C /-4°F +158°F
ISO 5210 Plate	F05/F07
DIN 3337 Female output drive	Standard *17 Optional *11 and *14
Weight	3.8 Kg

MANUFACTURER OPTION

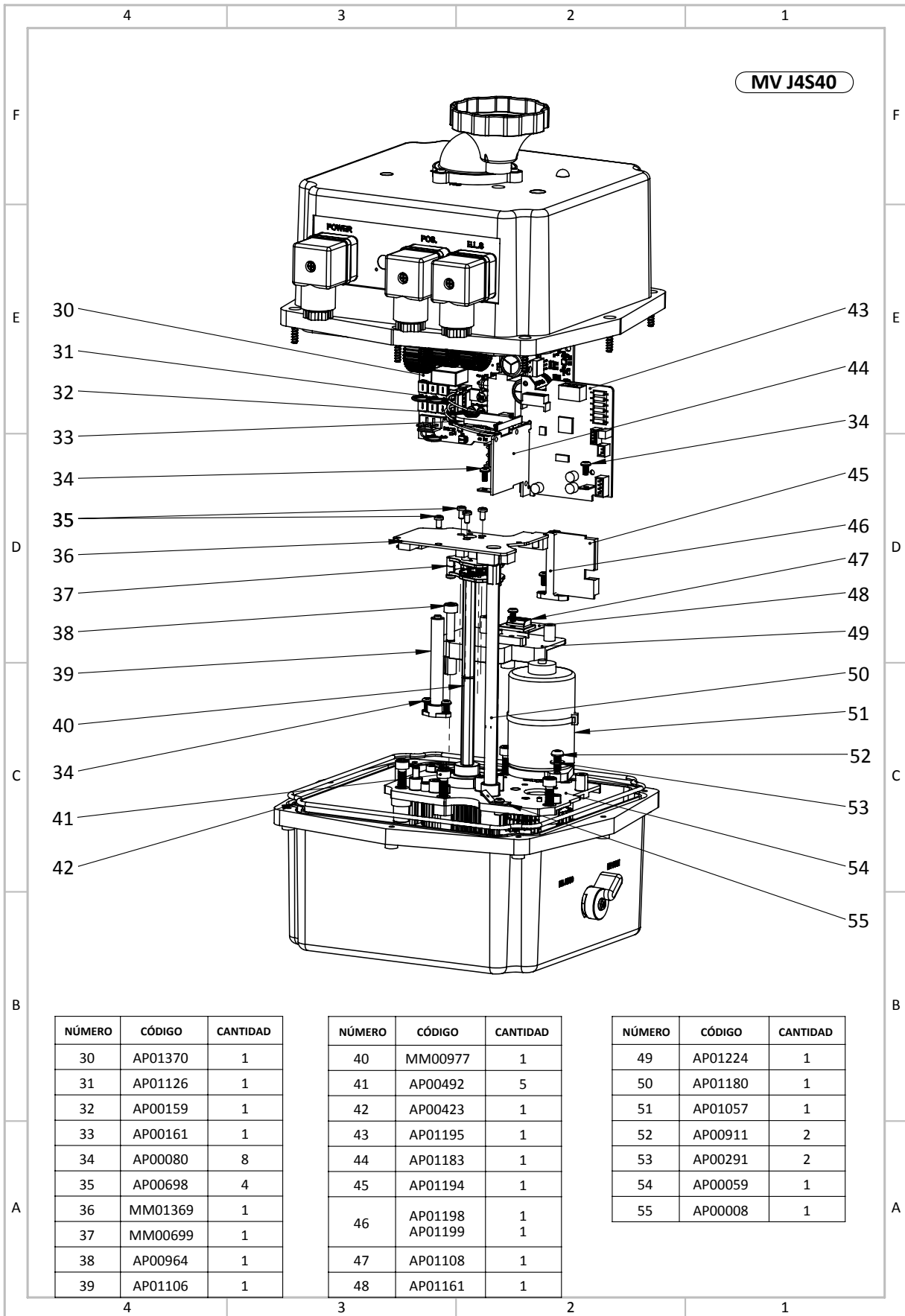


Note: Technical data are the same despite the different casings.

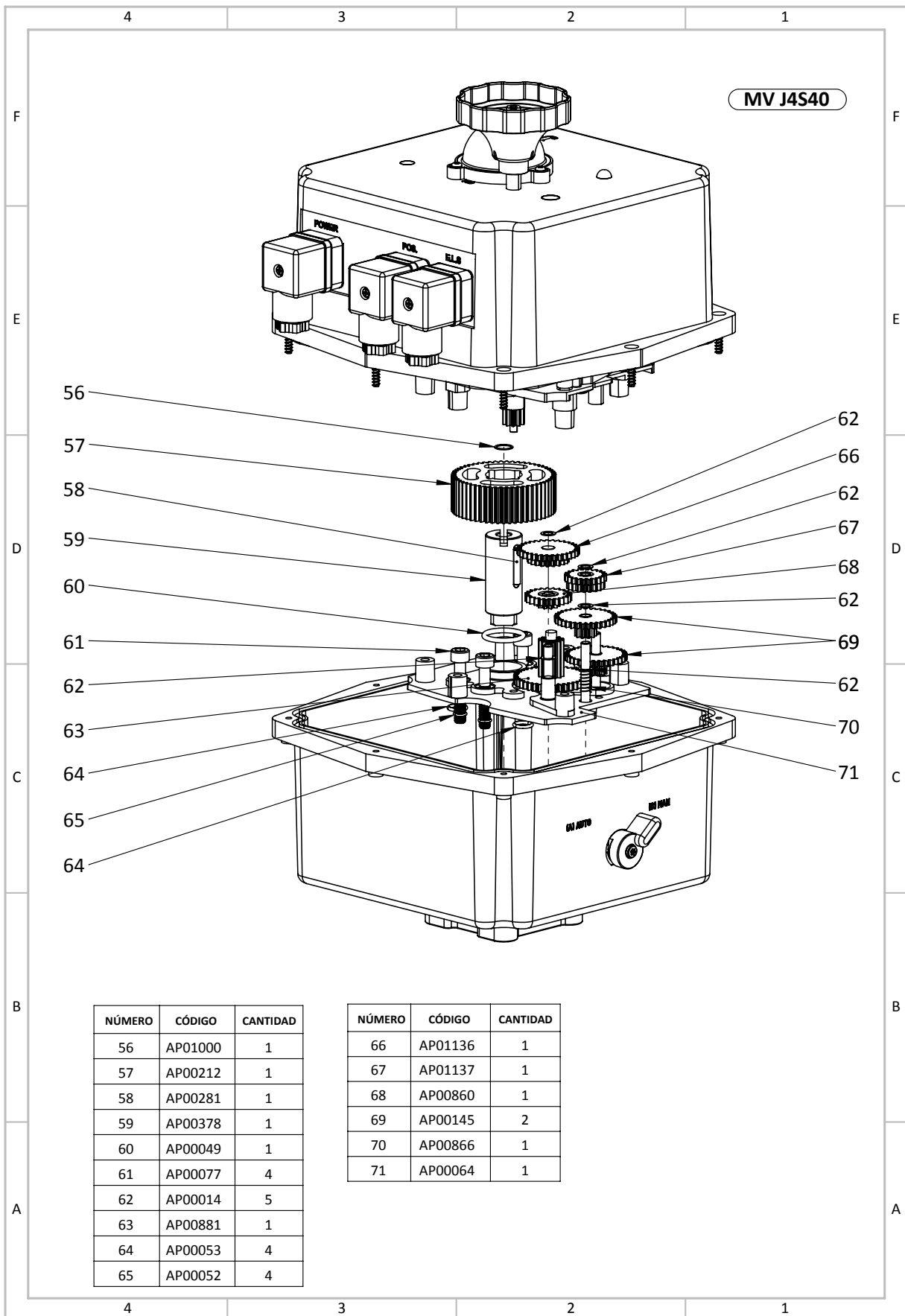
J4M 40 SIZES



Exploded View



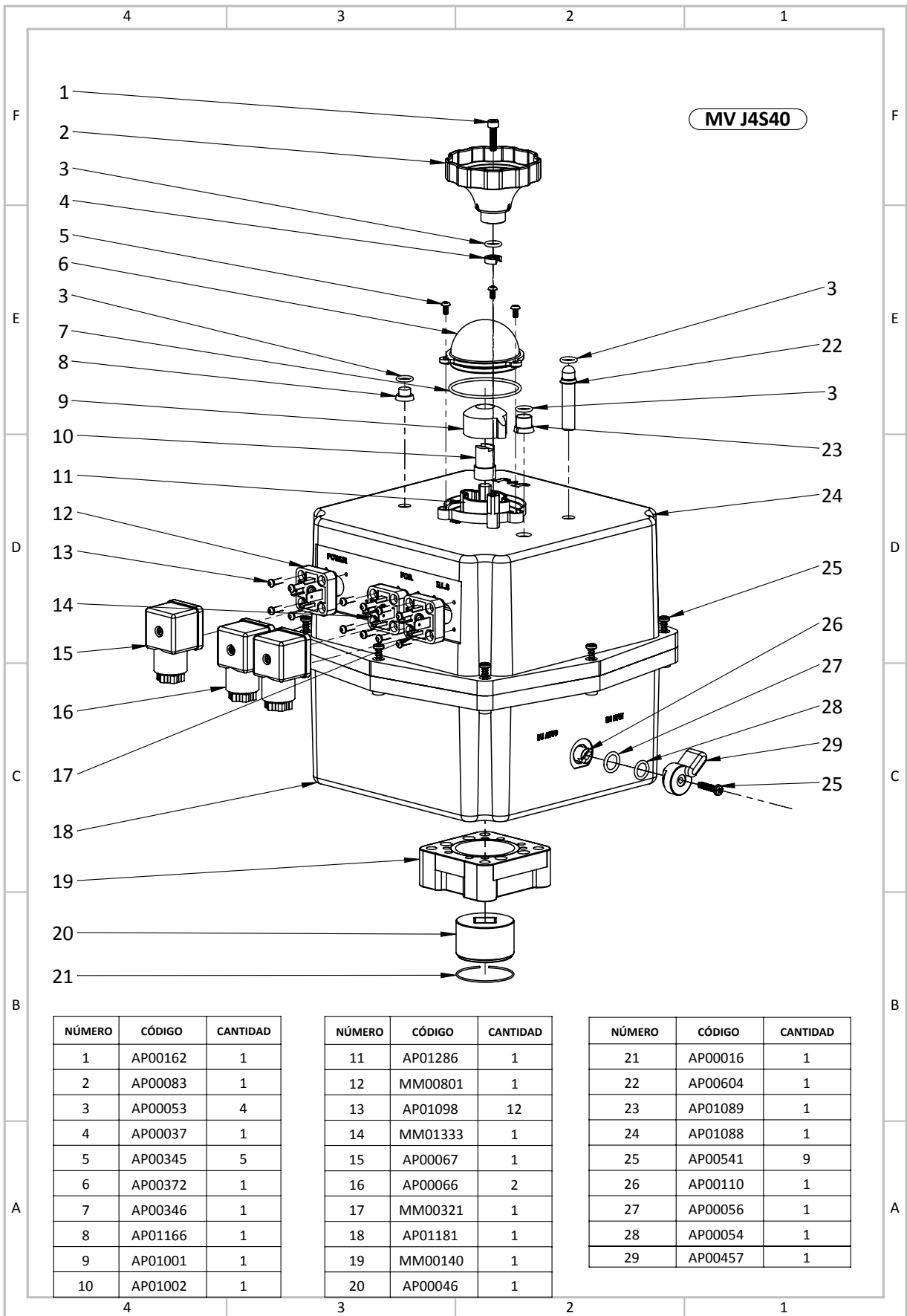
Exploded View



NÚMERO	CÓDIGO	CANTIDAD
56	AP01000	1
57	AP00212	1
58	AP00281	1
59	AP00378	1
60	AP00049	1
61	AP00077	4
62	AP00014	5
63	AP00881	1
64	AP00053	4
65	AP00052	4

NÚMERO	CÓDIGO	CANTIDAD
66	AP01136	1
67	AP01137	1
68	AP00860	1
69	AP00145	2
70	AP00866	1
71	AP00064	1

Exploded View



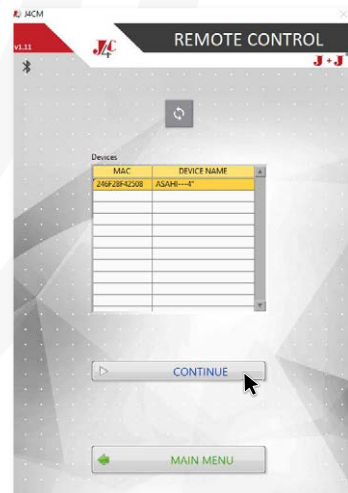
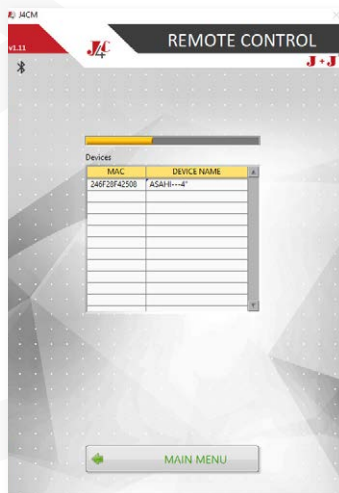
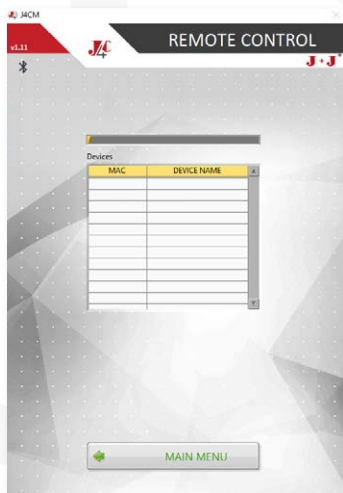
04 INTERFACE BLUETOOTH PROGRAM

ACTUATORS INTERFACE USER MANUAL

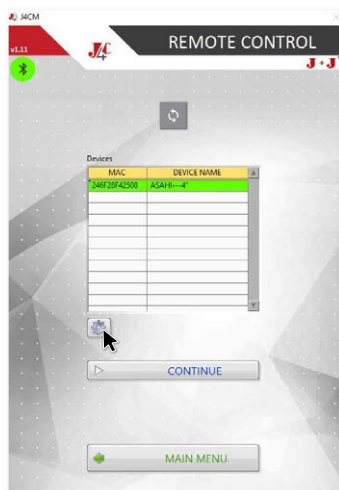
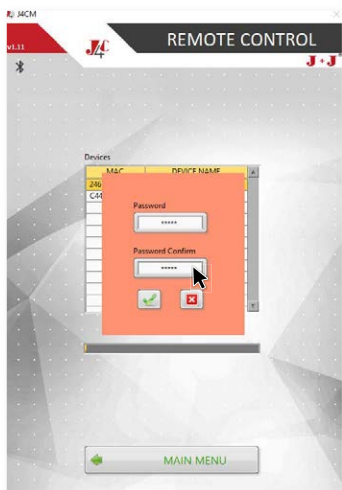
OPEN INTERFACE PROGRAM



Click on **“BLUETOOTH”**

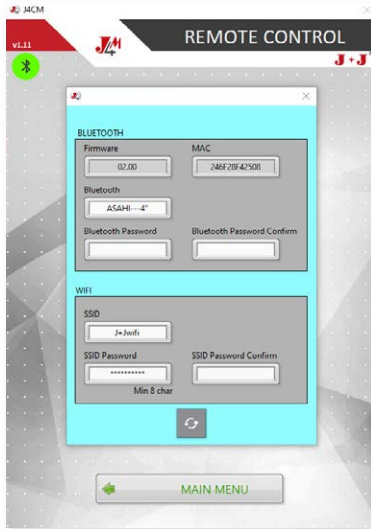


Select the **MAC** or the **DEVICE NAME** to which you'd like to connect and click on **“CONTINUE”**



- The Bluetooth icon in **green** color, shows that the program is **connected** to the actuator.
- The icon in **red** color means the program has **lost connection** with the actuator.
- The icon in **grey** color means that **none actuator** has been connected to the program, since it has been opened.

Enter the Password, confirm the Password and Accept.
Password configured from the factory - 12345



· Click on to configurate the **BLUETOOTH** parameters.

· **Read only parameters:**

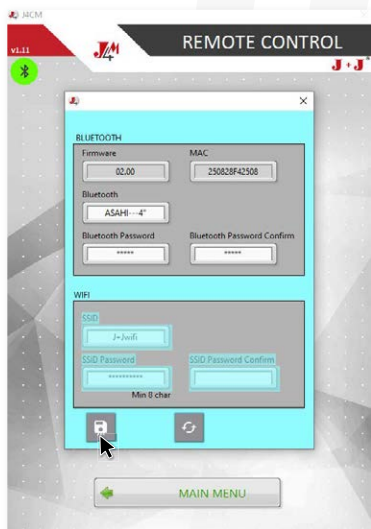
Firmware: Firmware version.

MAC: Bluetooth MAC.

· **Adjustable parameters:**

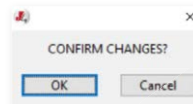
To change the Bluetooth and password, follow the steps:

1. Write the new name, on the *Bluetooth* field.
2. Write the new password, on the Password field.
3. Write the new password, on the Bluetooth Password Confirm field.

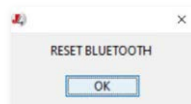


· **Save all changes** by clicking on

· Click on **OK**, to confirm all changes.



· **To apply all changes**, the program will lose the connection with the actuator. To recover, click on **OK**.

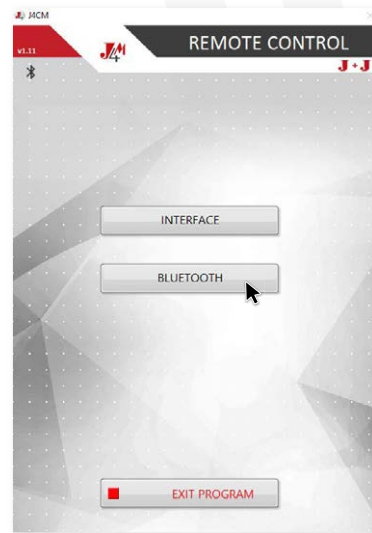


· **WIFI:** WIFI parameters are for factory use only.

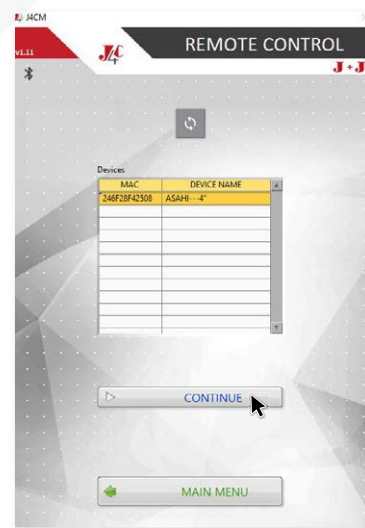
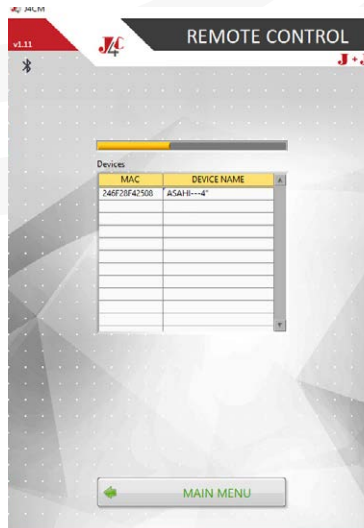
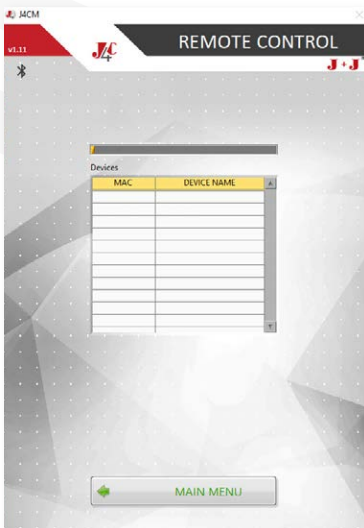




After the **RESET BLUETOOTH** has finished, click on to the program be reset.

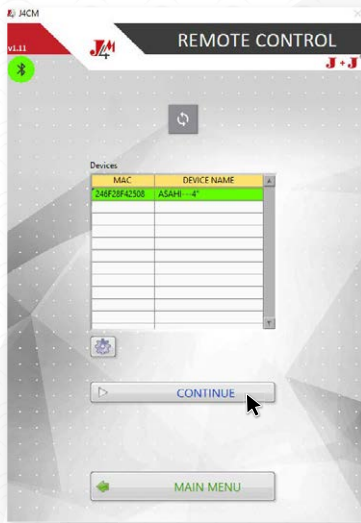


Click on **“BLUETOOTH”**



Select the **MAC** or the **DEVICE NAME** to which you'd like to connect and click on **“CONTINUE”**





The Bluetooth icon in **green** color, shows that the program is connected to the actuator.



The icon in **red** color means the program has lost connection with the actuator.



The icon in **grey** color means that none actuator has been connected to the program, since it has been opened.

Click on **"CONTINUE"**, to get into the actuator menu.



PARAMETERS: Read all actuator parameters.

COUNTERS: Read all actuator counters.

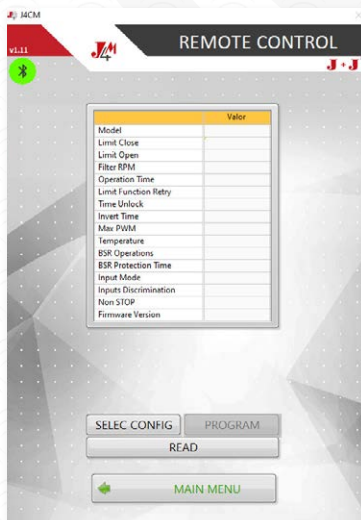
DPS PARAM: Please do not use. For factory use only.

DPS: For factory use only.

REMOTE CONTROL: For on-off actuators only.

MULTI TURN CONFIG: Set your J4M actuator up.

EXIT: click on **EXIT** to leave the program.



Click on **PARAMETERS**, the screen will show all the parameters and values recorded in the factory.

Click on **READ**, to read parameters.

Short definition of **PARAMETERS:**

Model: This is a 5-6-digit field. The first 2 or 3 digits are showing the actuator model.

Firmware Version: Is the software version of the actuator Control PCB.

The rest of parameters are to optimize the working features of our actuators.

Should any of the mentioned parameters be modified, we would send you a file to be copied in your PC, and follow the steps:

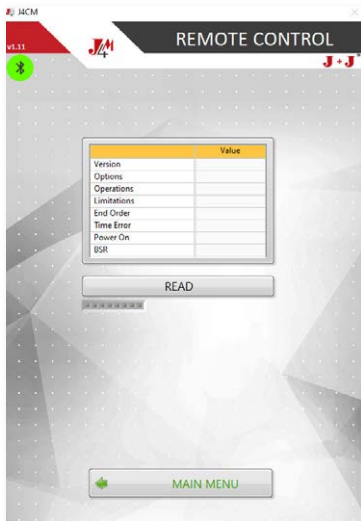
Click on **SELEC CONFIG** and a new screen will be shown.

Click on **PROGRAM**.

The actuator will have loaded the new configuration.

To go back, click on **MAIN MENU**.





If you click on **COUNTERS** option, a screen will appear with all the **COUNTERS** values. To see the values, click on **READ**.

Short definition of the **COUNTERS**:

Version: Is the software version of the actuator Control PCB.

Options: Internal parameter for our engineers to work with.

Operations: Number of times our actuator has pressed the micro switch and confirm the position.

Limitations: Number of times the limiter torque function has been activated.

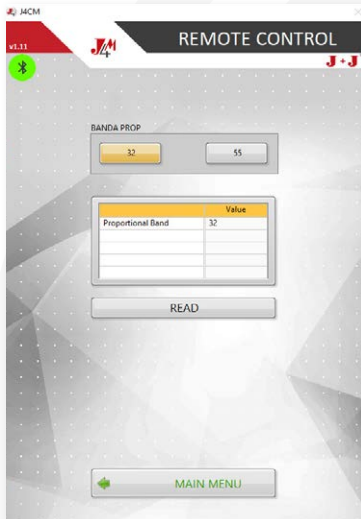
End Order: Internal parameter for our engineers to work with.

Time Error: Number of times the motor stopped, provably exceeding the **“Working time”** parameter value and the actuator is neither in the open, nor in the close position. Provably happening when the user has put the declutching lever in MAN position, to move the actuator manually.

Power On: Number of times the actuator has been powered on.

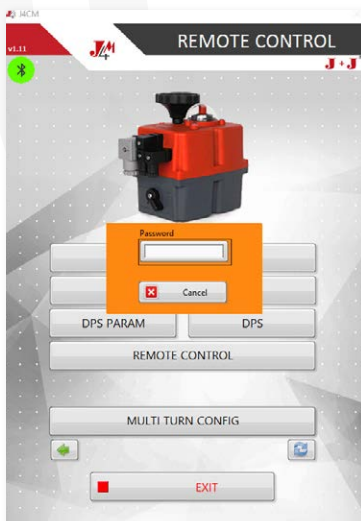
BSR: Number of times the actuator has been powered on by the BSR system, due to an external power cut. It is compulsory to have a BSR System mounted on the actuator.

To go back, click on **MAIN MENU**.



DPS PARAM: For factory use only.

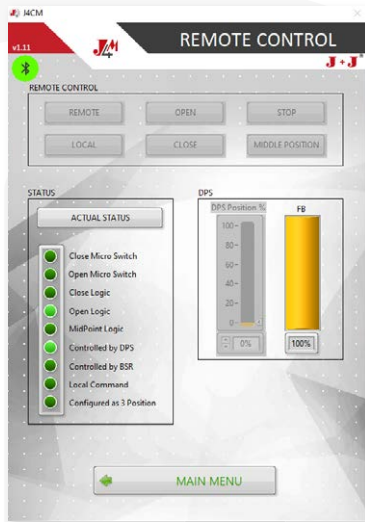
To go back, click on **MAIN MENU**.



DPS: For factory use only.

To go back, click on **MAIN MENU**.





REMOTE CONTROL: For **On-Off actuators** only.

You could **OPEN/CLOSE/ STOP OR MIDDLE POSITION** by clicking on each option.

Click on **"ACTUAL STATUS"** to update the actuator status.

To go back, click on **MAIN MENU**.



Click on **MULTI TURN CONFIG**. The computer will show the following screen. You could set the J4M actuator up, mounted on both a Needle or a Diaphragm valve.

VERY IMPORTANT:

First of all, and before doing anything else, please drive the actuator to the OPEN position, and put the declutching lever in MAN position too.

Click on **NEEDLE** or **DIAPHRAGM** and later click on **CONTINUE**.

To go back, click on **MAIN MENU**.

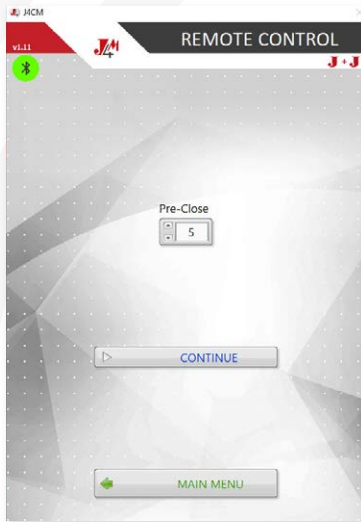


If you are making the set up for the first time, the **SELECT TORQUE** option will be disabled.

Click on **SELECT TORQUE AND CALIBRATE**.

To go back, click on **MAIN MENU**.





Select between value 2 and 5 of the **Pre-Close** parameter.

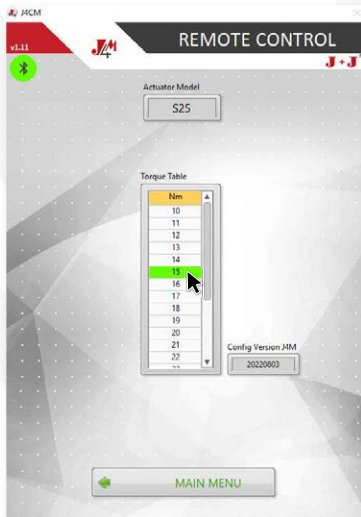
Pre-Close:

With the **NEEDLE** configuration, the actuator will never close the valve 100%, as this valve is thought to be for regulation function only. In this case, the **Pre-Close** parameter value, has to be between 2 – 5, which is the % of the way between the open and the close position, deactivated to protect the needle of the valve.

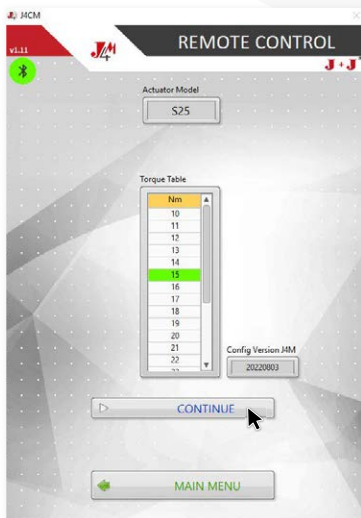
With the **DIAPHRAGM** configuration, the actuator is thought to open and close the valve 100%.

In this case, the **Pre-Close** value will be between 5 - 10 % of the way between Open and Close position. From this point, the actuator will go to the Close position, with the configured torque.

Select the **Pre-Close** value you would like to configurate and click on **CONTINUE**.

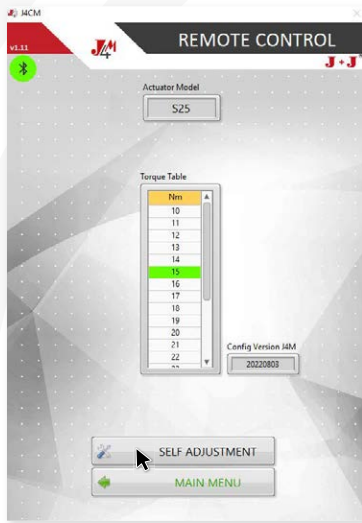


Select the value of the valve Closing torque.

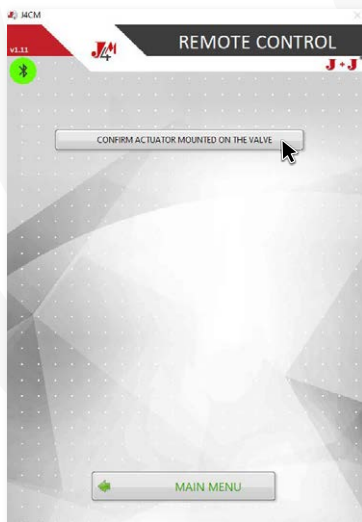


Click on **CONTINUE**.

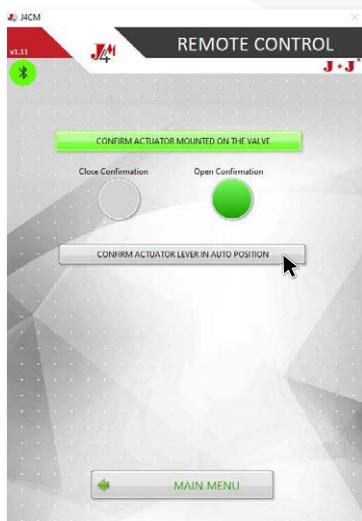




Click on **SELF ADJUSTMENT**.



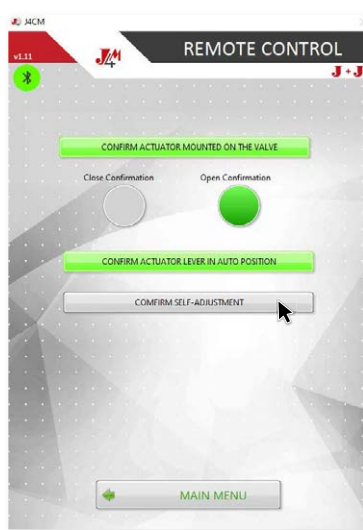
Click on **CONFIRM ACTUATOR MOUNTED ON THE VALVE**.



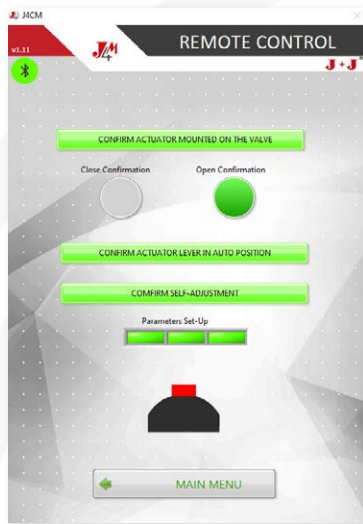
If the actuator is in OPEN position, **Open Confirmation** button will be in green color. If not, drive the actuator to the OPEN position and the button will become green.

Put the declutching lever in AUTO position, and click on **CONFIRM ACTUATOR LEVER IN AUTO POSITION**.

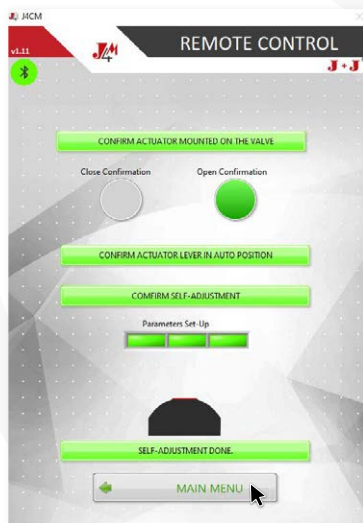




Click on **CONFIRM SELF-DJUSTMENT.**



The actuator will make a complete maneuver set-up, loading all the configuration parameters and the **OPEN & CLOSE** position.



Self-adjustment done.
To go back, click on **MAIN MENU.**



BLUETOOTH

communication via BLUETOOTH

We have introduced the BLUETOOTH communication system in our actuators, in order to communicate with our actuators, from any **IOS or ANDROID** devices.

From our phone, tablet or PC device we could order our actuator to open/close or stop, we could also be informed about additional data from our actuator.

The communication between our devices is protected by a password.

Via BLUETOOTH we could identify and communicate within a max distance of 20m.

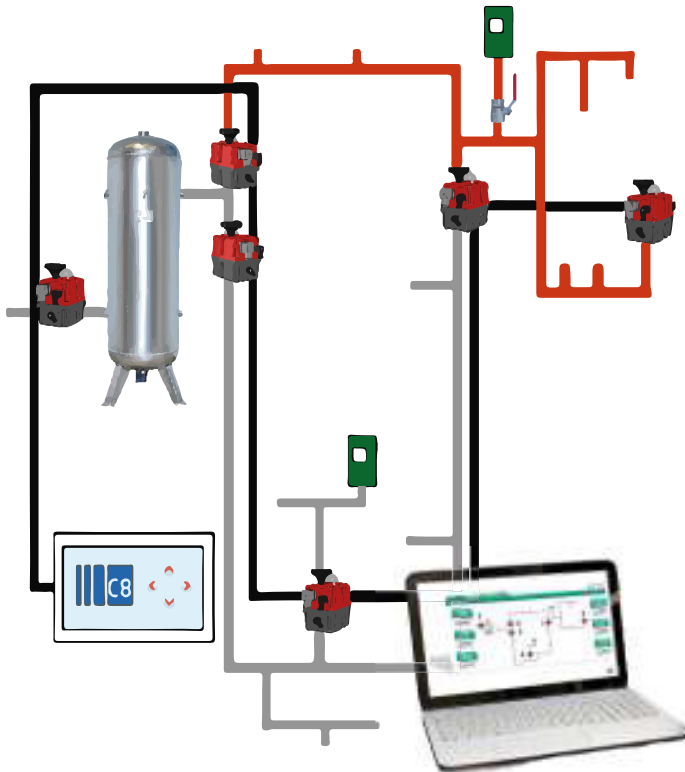


05 MODBUS



MODBUS system

- Plug and play.
- Each device could be operated manually.
- Could be seen from the control panel and PC.
- Fast and flexible, starting by 1 actuator up to 255.
- Up to 1.200m distance range.
- Locally connect the device and communicate with a data cable.
- Could name the devices, make a plant synoptic, send alarm mails..



06 GUARANTEE

OUR WARRANTY INCLUDES SOLELY AND EXCLUSIVELY THE REPAIR OR REPLACEMENT OF THE DEFECTIVE PARTS IN OUR WORKSHOP OR IN THE PLACEMENT OF THE INSTALLATION, AND DOES NOT COVER INDEMNIFICATIONS OR OTHER EXPENSES.

The warranty will be void if the device has been open, if the defects are the result of the misuse or if our products have been handled, repaired or modified outside our workshop or have been installed with materials or by methods not in accordance with our STANDARDS.

The party alleging the existence of a defect of workmanship shall accredit the suitable use of the product and, if appropriate the correct installation of the same.

The expenses of the return and reshipment of the defective materials will be for the account of the buyer.



07 CONTACT

J.J. BCN INTERNACIONAL, SA



Polígon Industrial Sud
Carrer de l'Orfeó Català, 7 • 08440 Cardedeu
Barcelona (Spain)



(+34) 93 871 33 04



info@jjbcn.com



www.jjbcn.com

