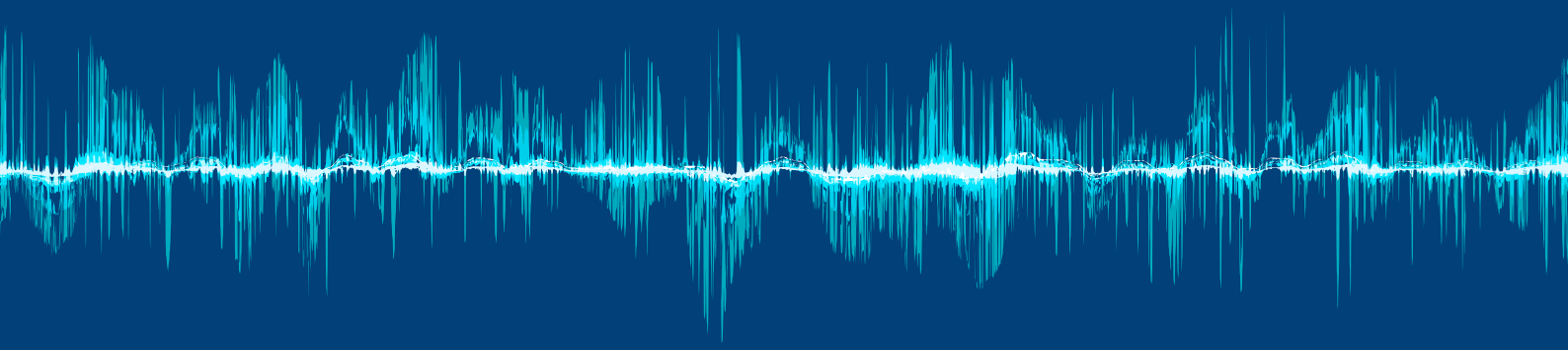
MPI ELETTRONICA
QUALITY VIBRATION CONTROL

SINCE 1988



CONTROLLER FOR INDUSTRIAL ELECTROMAGNETIC VIBRATORS

PRODUCT SPECIFICATION

MADE IN ITALY

MP Elettronica srl
Elettronica Industriale - Sistemi Elettronici - Engineering
Sesto S. Giovanni (MI) - Tel. 02 2403864 - Fax 02 2400643
www.mpelettronica.com - mp@mpelettronica.com

Electronic Controller for Electromagnetic Vibrator

COMPANY PROFILE

MP Elettronica was established more than **35** years ago in Italy and since **1998** the quality management system of the company is certified **ISO 9001:2015**. The company is based in Milan (Italy). Since its establishment MP Elettronica designs, engineers and manufactures controllers for electromagnetic vibrators and nowadays the company has affirmed its market leader position due to its innovative solutions and products. In **1994** the company turns to the current corporate structure and in **1996** opens the local branch in the region of Varese where products are designed and tested. Here the innovative first circuit Amplitude / Analog Frequency was designed and manufactured for the first time and during the years it has replaced the Microprocessor Digital series.

The strengths of MP Elettronica are:

- Technological Know How on designing and expertise in the field
- Customization of the products according the Customer needs (also for small quantity)
- High standards of certified Quality system (UNI EN ISO 9001:2015)
- 99.64% reliability of the products and warranty
- Prompt and lasting technical support through different communication channels
- Flexibility and Fast Delivery
- Excellent Relationship between Quality and Price

The products are highly reliable, certified and comply with the regulations. During the years MP ELETTRONICA has steadily expanded both in national and international markets due to its great experience and expertise in the field.
Nowadays MP Elettronica is a leader company in the field of **controllers for electromagnetic vibrators** and manufactures thousands of controls units which are employed in the different industrial sectors.
The company employs lasting resources in research and commitment aiming at the development of the controllers. The strong relationship between the Company and Customers has lead to improve the wide range of innovative products in the catalogue. The catalogue already includes electronic controllers driven by microprocessor with standard or customized software.
The **Mission** MP Elettronica supplies products and provides integrated solutions to fully meet the needs of its Customers. The company assures the right solution for all Customers' applications, fast and reliable technical support and a delivery time in the next 24 hours.

MP Elettronica is a growing company which successfully exports the products worldwide. Designing and Engineering regularly improve the functions and performances of the products and follow the trend of the Automation market by investing important resources in Research and Development fields.



IQNET Registrazione N° it-1329

QUALITY SYSTEM



Certificato CSQ N° 9105.MPEL

Special executions on request

Inox Box - IP66 (NEMA 4/4X) - Driving module for multiple vibrators - Double speed - Double output - Customized versions and labels - Voltage from 24Vac to 600Vac - Driving vibrators 1500 V/m - 750 V/m - Controllers with feedback for mills - engineering.

Codes of the Products

Our products are identified according to the following scheme: (Lack of model will be replaced by X)

PV YYYYY Z H KKK

Product name	Circuit	Tension/Feeding	Customization
• R3FCX • R5FCX • CV6X • FQPWM • CV20S	• A-circuit • D-din • Z-box	• **1**-115V / • **2**-230V • **3**-400V / • **4**-23/400V • **5**-till to 500V • **6**-400V three phase • **7**-400V 3 phase+neuter	• **STD**-standard • **ABC**-customer code • execution • **SM1-STM**-metal box • **STP**-plastic box

SINCE 1988

MPE® ELETTRONICA QUALITY VIBRATION CONTROL

IQNET RECOGNIZED CERTIFICATION — IMQ CERTIFIED

UNI EN ISO 9001:2015 - CERT.9105 MPEL

INDEX

SMART-ISO SERIES

SMART

Code :	R3FC • R3FSC • R5FC • R4FC • VBS06 • *CV99 - ISO: R3FC-ISO • R3FSC-ISO • R5FC-ISO
Voltage :	230V/115V • 50/60Hz • corrent max 3/4/6/8/10 A RMS
Features :	ON/OFF • 3000/6000 V/min • min/max • ramp
Applications :	Linear feeders • small bowl feeders till 6A
Options :	IP65 (NEMA4/4X) • box aluminum • with sensor NPN/PNP
*	Input 0÷10V - 0÷20mA

PRX SERIES

PRX

Code :	PRX92 • PRX99 • PRX13
Voltage :	230V o 115V • 50/60Hz
Features :	For sensor NPN/PNP • 2 delay ON/OFF
Applications :	Linear and bowl feeder "OVERFULL" check
Options :	With circuits R5FC • CV99 • CV6

INDUSTRIAL SERIES

INDUSTRIAL

Code :	CV6/17-CV8/17 • CV12/17-CV15/17 • CV25/17 • CV40/17 • CV70/17 • CV100/17
Voltage :	230V • 400V till 550V • 50/60Hz • corrent max 6/8/12/15/20/25/40/70/100 A RMS
Features :	3000/6000 V/min • input PLC 0/10V-0/20mA• ramp • min/max (man•aut) • 3 ON/OFF • Alarm • Input **double insulation**
Applications :	linear vibrator • bowl feeders
Options :	IP65 • vertical assembly DIN35 (only CV8) • INOX box • 1500 vib/m • 750 vib/m • 25 Hz - 33 Hz
Code :	CV6FS-CV8FS • CV12FS-CV15FS • CV25FS • CV40FS • CV70FS • CV100FS
Voltage :	230V • 400V till 550V • 50/60Hz • corrent max 6/8/12/15/20/25/40/70/100 A RMS
Features :	3000/6000 V/min • input PLC 0/10V-0/20mA• ramp • min/max (man•aut) • 3 ON/OFF • Alarm
Applications :	**linear vibrator • bowl feeders (with amplitude sensor SIND2)**
Options :	IP65 • vertical assembly DIN35 (only CV8) • INOX box • 1500 vib/m • 750 vib/m • 25 Hz - 33 Hz

DIGITAL SERIES AMPLITUDE/FREQUENCY

DIGITAL

Code :	RF4 PWM • RF4 PWM/N • FQ1 PWM • FQ1 PWM/HC • FQ1NG • FQ2NG • FQ3NG
Voltage :	85/260V • 50/60Hz • current max 4/6/8/10/12/16 A RMS
Features :	0/10V - 0/20mA • 2 sensors PNP • 30÷130 Hz • 5÷200 Hz
Applications :	**Amplitude/Frequency digital regulation for vibrator till 16A**
Options :	Custom label • 5÷300 Hz • amplitude sensor SIND3

MCP (DIGITAL) SERIES

MDL/MCP

Code :	**MCP01 • MCP02 • MCP03 • MCP01/LT • MCP02/LT**
Voltage :	85/260V • 50/60Hz • current max 6,3/8A RMS
Features :	Drive system for linear • sensor NPN/PNP • Blow feeder • sensor NPN/PNP • Hopper or motor elevator
Applications :	**Automatic feeders system**

MTR SERIES

MTR

Code :	MTR01 • MTR01 DIG (DIGITAL)
Voltage :	3x400V • 50/60Hz • 3x230V • 50/60 Hz • 230V 50/60Hz
Features :	3 Phase Motor-Driven Feeder and input sensor NPN/PNP
Applications :	3 Phase Motor-Driven Feeder with NPN/PNP sensor On/Off delay and Allarm delay
Options :	Custom label • Din35 version (MTR01) • custom SW (MTR01 DIG)

INSTRUMENTS SERIES

INSTRUMENTS

Code :	AMP METER • VIBROMETER • ALIM01
Voltage :	230V/400V • 50/60Hz
Features :	Amplitude check control with alarms (ALIM01) • current control (AMP-VIB)
Applications :	Amplitude of vibration monitoring with alarms (ALIM01)• current max measurement in electromagnetic vibrators (AMP-VIB)
Options :	IP65 • % amplitude instrument (MTR01) • Voltmeter (AMP-VIB) • DIN35

Module for Automated Loading Systems (linear - circular - vibratory bowl feeder)

MCP01 PV MCP01 Z2 STD 10A RMS Max



Protection		Box
IP55		Aluminum 100x225x210

MCP02 PV MCP02 Z2 STD 10A RMS Max



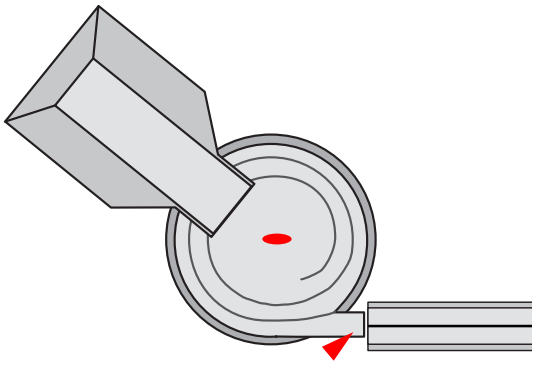
Protection		Box
IP55		Aluminum 100x225x210

MCP03 PV MCP03 Z2 STD 10A RMS Max



Protection		Box
IP65		Aluminum 100x225x210

APPLICATIONS



MCP01LT PV MCP01 Z2 SLT 6A RMS Max



OPTIONAL



Protection		Box
IP65		Aluminum 100x250x105

MCP02LT PV MCP02 Z2 SLT 6A RMS Max



OPTIONAL



Protection		Box
IP55		Aluminum 100x250x105

MPI ELETTRONICA
QUALITY VIBRATION CONTROL

3D ON REQUEST

UNI EN ISO 9001:2015 - CERT.9105 MPEL

Cross reference : Digital Amplitude/Frequency Controller with Microprocessor

	MCP01	MCP02	MCP03	MCP01 LITE	MCP02 LITE
Voltage (50/60 Hz)	80/250	80/250	80/250	80/250	80/250
Amps	15	5/10	3/6/3	6	6/6
ON/OFF	●	●	●	●	●
Sensor NPN/PNP	●	●	●	●	●
0/10V- 0/20 mA	●	●	●	●	●
Amplitude/ Frequency regulation	KEYBOARD	KEYBOARD	KEYBOARD	KEYBOARD	KEYBOARD
Output Hz 50/100	30/80 80/130	30/80 80/130	30/80 80/130	5/200	5/200
Relay ON	●	●	●	●	●
Status Relay	●	●	●	●	●
EMC- CE	●	●	●	●	●
IP	55	55	55	55	55
Dimenzions Box	100x225x210	100x225x210	100x225x210	100x250x105	100x250x105
Photo	1	2	3	4	5

All models are stabilized

Digital Amplitude/Frequency Control for Linear and Circular Vibrators, 4/6/12/16 Amp Versions

Other voltages available on request

Use of 50Hz vibrators in 60Hz markets or vice versa


1


2


3


4


5


6

Module for automatic loading systems (linear - circular - vibrating hopper)

MCP01

Amp. 6/8/10

115V 230V

option Modbus

General

This Module **MCP01** can be used for the automatic driving of a system made up by a vibratory hopper, cylindrical vibratory feeder, linear vibratory feeder or conveyor belt with 2 PNP sensor, output blow air, alarm time out.

General Characteristics

The **MCP01** module allows you to adjust the vibration amplitude of up to 2 vibrating systems • select 3000/6000 V/m • ramp time • ON/OFF delay of the vibrator with a PNP sensor • air blow • part-flow loss time with alarm. The total maximum current is 16A.

Applications

Control of vibrating hopper, circular vibrator or linear vibrator, with PNP level sensor in the circular or linear unit and PNP overflow sensor on the linear unit (both with time delay), and air blow for part-flow loss with alarm.

Options

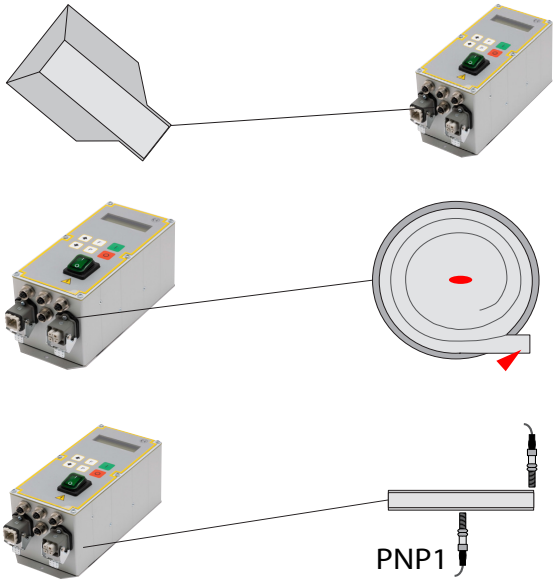
Personalized label • Connector for vibrator • SW custom.



METALLIC BOX
MCP01
PV MCP01 Z2 STD
100x225x210

Technical Specs

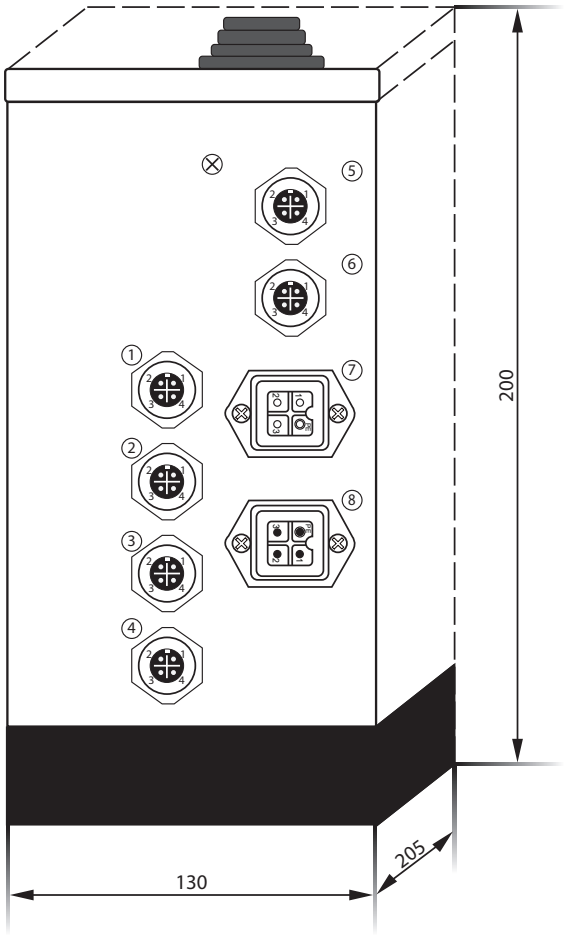
Supply Voltage:	(115V)230V +/- 5% 50/60Hz
Current Max:	16A
Fuses:	6,3A F 250V 5x20 H 1500 A (EN 627-2 CEI)
Min. Load:	50 mA (RMS)
Frequency of Vibration:	3000/6000 V/min. (50Hz)
Time of Ramp:	0,2 sec. or 2 sec. (modifiable)
Regolation Min.:	80V +/- 30%
Regolation Max:	200V - 30%
Delay T1/T2:	0-10 sec.
Alarm Time:	0-15 sec.
Sensor Input:	optoisolated NPN/PNP
Degree of pollution:	2
Position of Assemblage:	horizontal or vertcal
Degree of Protection:	IP54 in box (only circuit IP00)
Temperature of Storage:	-15 °C / + 80 °C
Temperature of Operation:	-5 °C / + 45 °C
Range of Relative humidity:	80% till to 31°C
Installation Class:	II
Altitude:	till to 2000 meters
European Norms:	EMC CE
Guarantee:	1 year (from date on circuit)



Available Versions

Type	Box	Colour	Dimensions	Code	Price €
MCP01	Metallic	GREY	100 x 225 x 210	PV MCP01 Z2 STD	

DIMENSIONS/CONNECTIONS





M12 CONNECTORS

1 SENSOR 1

1	*+24V*
2	
3	*GND*
4	*INPUT*
5	

6 SENSOR 4

1	*+24V*
2	*STATUS CH1*
3	*GND*
4	*INPUT FC4*
5	*EV ON/OFF*

2 SENSOR 3

1	*+24V*
2	
3	*GND*
4	*INPUT*
5	

7 CHANNEL 1

1	VIBRATOR
2	VIBRATOR
3	
PE	GND

3 ENABLE/CHANNELS

1	*+24V*
2	*CH1*
3	*GND*
4	
5	

8 LINEA 230V

1	L
2	N
3	
PE	GND

4 OUTPUT 1 - AIR JET

1	*+24V Out Air*
2	*Status*
3	*0 V*
4	*+24V Out 2*
5	

1	
2	
3	
PE	

5 TIME OUT/COUNTER

1	*+24V TO CH1*
2	*OUT COUNTER 24V*
3	*0 V*
4	
5	

1	
2	
3	
PE	

STANDARD MODEL

Digital Control MCP02 10Amp

M12 Connectors :

Input: *1°/3°/4° sensor PNP*

Input: *enable +24V – free-contact voltage*

Output: *Out1/Out2 signal +24V*

Output: *status +24V*

Output: *blow air +24V*

Output: *signal +24V time out*

NORMS OF GUARANTEE

1) The controller is guaranteed for a period of 1 year from the date shown on the inside.

2) The guarantee covers the free replacement or repair of components parts that are defective at origin for manufacturing.

3) The guarantee is not valid for damage caused accidentally due to improper use or negligence and in case of alterations or repair carried out by unauthorized persons.

Design and specifications could be subjected to change without notice.

Module for automatic loading systems (linear - circular - vibrating hopper)

MCP02

Amp. 6/8/10

115V 230V

option Modbus

General

The MCP02 module allows automatic operation of a feeding system composed of: vibrating hopper, circular vibrator, linear vibrator, with two PNP sensors, air-blow output, and part-flow alarm, with all parameters selectable via the keypad.

General Characteristics

The MCP02 module allows adjustment of the vibration amplitude for up to 2 vibrating systems – selection of 3000/6000 V/m – ramp time – ON/OFF delay of the vibrator via PNP sensor – air blow – part-flow loss time with alarm. The total maximum currents are 10 A, with 3 A for the linear vibrator, 6 A for the circular vibrator, and 3 A for the vibrating hopper.

Applications

Control of vibrating hopper, circular vibrator, or linear vibrator, with PNP level sensor in the circular or linear unit and PNP overflow sensor on the linear unit (both timed), plus air blow for part-flow loss with alarm.

Options

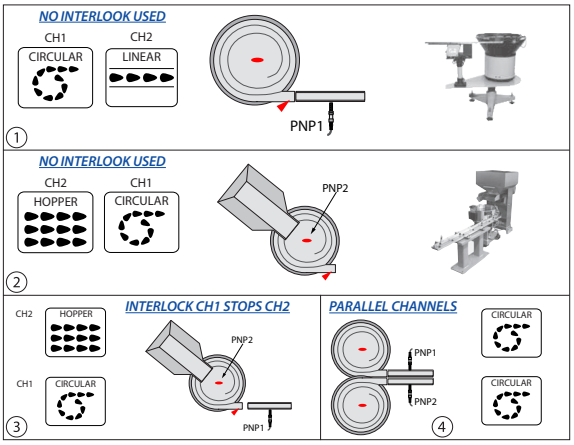
Personalized label • Connector for vibrator • SW custom.

Technical Specs

Supply Voltage:	85/250V +/- 5% 50/60Hz
Current Max:	3A - 6A - 3A (RMS)
Fuses:	6,3A F 250V 5x20 H 1500 A (EN 627-2 CEI)
Min. Load:	50 mA (RMS)
Frequency of Vibration:	3000/6000 V/min. (50Hz)
Time of Ramp:	0/10 sec.
Regolation Min.:	80V +/- 30%
Regolation Max:	200V - 30%
Delay T1/T2:	0-10 sec.
Alarm Time:	0-15 sec.
Sensor Input:	optoisolated NPN/PNP
Degree of pollution:	2
Position of Assemblage:	horizontal or vertcal
Degree of Protection:	IP55
Temperature of Storage:	-15 °C / + 80 °C
Temperature of Operation:	-5 °C / + 45 °C
Range of Relative humidity:	80% till to 31°C
Installation Class:	II
Altitude:	up to 2000 meters
European Norms:	EMC CE



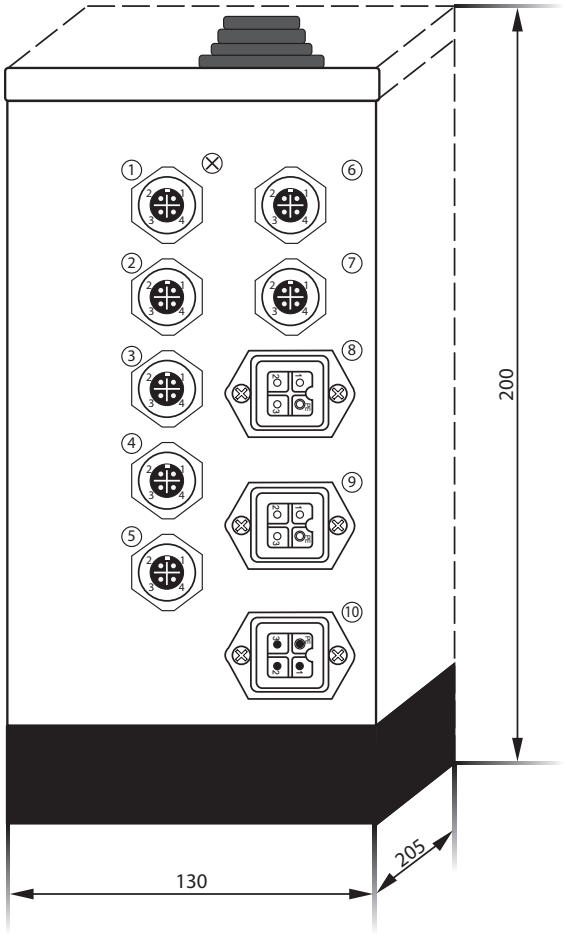
METALLIC BOX MCP02
PV MCP02 Z2 STD
100x225x210



Available Versions

Type	Box	Colour	Dimensions	Code	Price €
MCP02	Metallic	GREY	100 x 225 x 210	PV MCP02 Z2 STD	

DIMENSIONS/CONNECTIONS





M12 CONNECTORS

1 SENSOR 1

1	*+24V*
2	
3	*GND*
4	*INPUT*
5	

2 SENSOR 2

1	*+24V*
2	
3	*GND*
4	*INPUT*
5	

3 SENSOR 3

1	*+24V*
2	
3	*GND*
4	*INPUT*
5	

4 ENABLE/CHANNELS

1	*+24V*
2	*CH1*
3	*GND*
4	*CH2*
5	

5 OUTPUT 1-AIR JET

1	*+24V Out Air*
2	*Status*
3	*0V*
4	*+24V Out 2*
5	

6 TIME OUT/COUNTER

1	*+24V TO CH1*
2	*OUT COUNTER 24V*
3	*0V*
4	*+24V TO CH2*
5	

7 SENSOR 4

1	*+24V*
2	*STATUS CH1*
3	*GND*
4	*INPUT*
5	*STATUS CH2 - EV ON/OFF*

8 CHANNEL 2

1	VIBRATOR
2	VIBRATOR
3	
PE	GND

9 CHANNEL 1

1	VIBRATOR
2	VIBRATOR
3	
PE	GND

10 LINE 230V

1	L
2	N
3	
PE	GND

STANDARD MODEL

Digital Control MCP02 10Amp

M12 Connectors :

Input: *1°/2°/3°/4° sensor PNP*

Input: *enable +24V – free-contact voltage*

Output: *Out1/Out2 signal +24V*

Output: *status +24V*

Output: *blow air +24V*

Output: *signal +24V time out*

NORMS OF GUARANTEE

1) The controller is guaranteed for a period of 1 year from the date shown on the inside.

2) The guarantee covers the free replacement or repair of components parts that are defective at origin for manufacturing errors.

3) The guarantee is not valid for damage caused accidentally due to improper use or negligence and in case of alterations or repair carried out by unauthorized persons.

Design and specifications could be subjected to change without notice.

Module for automatic loading systems (linear - circular - vibrating hopper)

MCP03

Amp. 6/8/10 | 115V 230V | IP 55 | option Modbus

General

The MCP12 module enables automatic operation of a feeding system consisting of a vibrating hopper, circular vibrator, and linear vibrator, with two PNP sensors, air-blow output, and part-flow loss alarm, with all parameters selectable via the keypad.

General Characteristics

The MCP12 module allows adjustment of the vibration amplitude for up to three vibrating systems – selection of 3000/6000 V/m – ramp time – ON/OFF delay of the vibrator via PNP sensor – air blow – part-flow loss time with alarm. The total maximum currents are 10A, with 3A for the linear vibrator • 6A for the circular vibrator • 3A for the vibrating hopper.

Applications

Control of vibrating hopper, circular vibrator, and linear vibrator, with PNP level sensor in the circular unit and PNP overflow sensor on the linear unit (both timed), plus air blow for part-flow loss with alarm.

Options

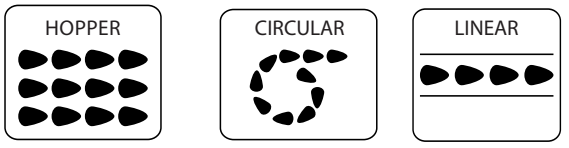
Personalized label • Connector for vibrator • SW custom.

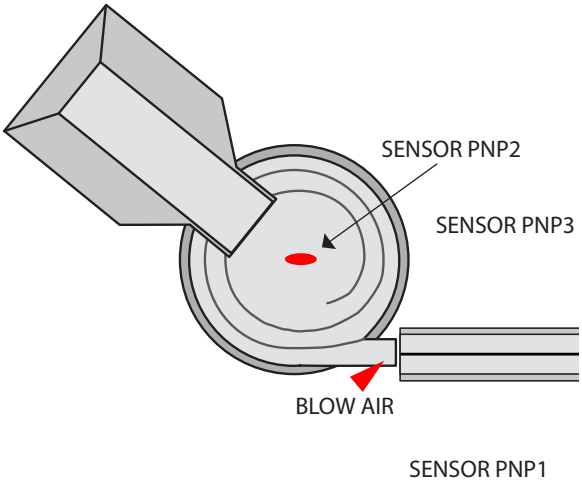
Technical Specs

Supply Voltage:	(115V) 230V ± 5% 50/60Hz
Current Max:	3A - 6A - 3A (RMS)
Fuses:	6,3A F 250V 5x20 H 1500 A (EN 627-2 CEI)
Min. Load:	50 mA (RMS)
Frequency of Vibration:	3000/6000 V/min. (50Hz)
Time of Ramp:	0,2 sec. or 2 sec. (modifiable)
Regolation Min.:	80V +/- 30%
Regolation Max:	200V - 30%
Delay T1/T2:	0-10 sec.
Alarm Time:	0-15 sec.
Sensor Input:	optoisolated NPN/PNP
Degree of pollution:	2
Position of Assemblage:	horizontal or vertcal
Degree of Protection:	IP54 in box (only circuit IP00)
Temperature of Storage:	-15 °C / + 80 °C
Temperature of Operation:	-5 °C / + 45 °C
Range of Relative humidity:	80% till 31°C
Installation Class:	II
Altitude:	till 2000 meters
European Norms:	EMC CE



METALLIC BOX
MCP12
PV MCP12 Z2 STD
100x225x210

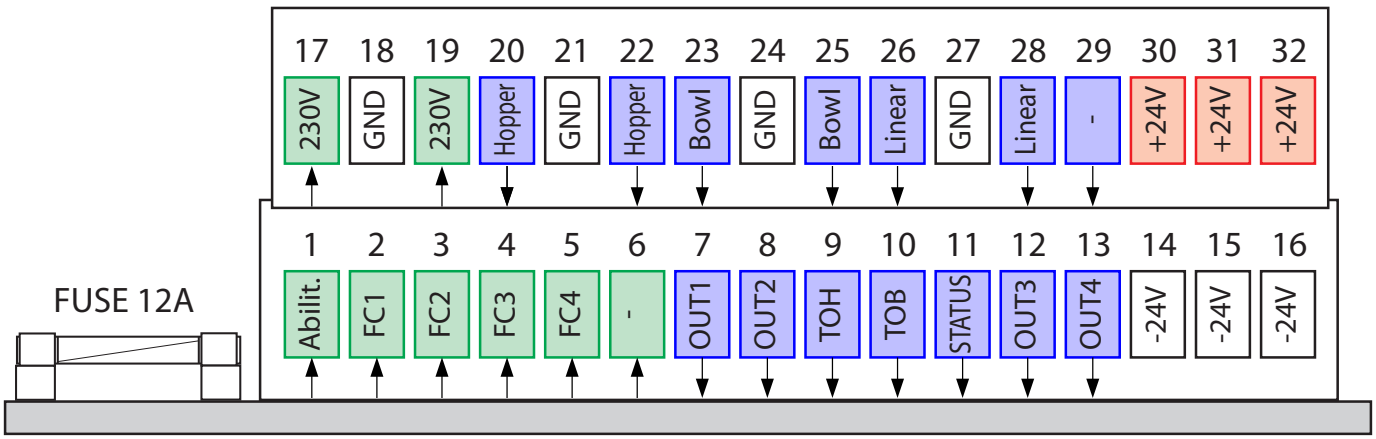




Available Versions

Type	Box	Colour	Dimensions	Code	Price €
MCP03	Metallic	GREY	130 x 225 x 210	PV MCP12 Z2 STD	

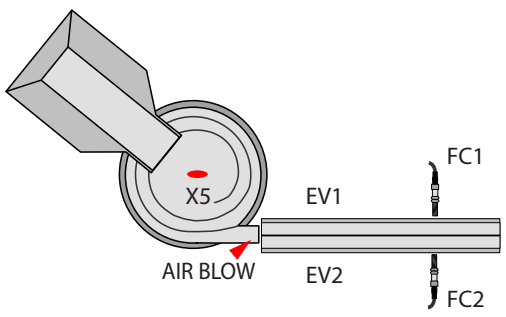
MORSETTIERA MR1-MR2



1	Enable	17	230V } LINE
2	FC1 - Sensor 1	18	GND } LINE
3	FC2 - Sensor 2	19	230V } LINE
4	FC3 - Sensor 3	20	Hopper } Hopper
5	FC4 - optional	21	GND } Hopper
6	Input 6	22	Hopper } Hopper
7	Out 1 - Air Blow	23	Circular Vibrator
8	Out 2 - Piece Presence	24	GND
9	TOH - Time Out Hopper	25	Circular Vibrator
10	TOB - Time Out Circular	26	Linear Vibrator } Linear
11	Stato +24V	27	GND } Linear
12	Out 3 - optional	28	Linear Vibrator } Linear
13	Out 4 - optional	29	Output 8 - optional
14	-24V	30	+24V
15	-24V	31	+24V
16	-24V	32	+24V

MDL/MCP

Menù : ALT MODE>YES (Circular operation with linear dual-track)



FC1	FC2	EV1	EV2	X5
0	0	0	0	1
1	0	1	0	1
0	1	0	1	1
1	1	1	1	0

Module for Automatic Loading Systems (Linear - Circular - Vibrating Hopper)

MCP01/LT

Amp. 6/8/10 | 115V 230V | SIND3

NEW



METALLIC BOX MCP01
PV MCP01 Z2 STD
100x250x105

General

The **MCP01** module allows the automatic operation of a feeding system composed of: Vibrating Hopper, Circular Vibrator, Linear Vibrator, with two PNP sensors, air blow output, piece flow absence alarm with all parameters selectable from the keyboard.

General Characteristics

The **MCP01** module allows you to adjust the vibration amplitude for up to 2 vibrating systems • Select 3000/6000 V/m • Ramp time • ON/OFF delay of the vibrator with PNP sensor • Air blow • Piece flow absence time with alarm . The total maximum currents are 10A total 3A for Linear Vibrator 6A for Circular Vibrator 3A for Vibrating Hopper.

Applications

Control of Vibrating Hopper, Circular Vibrator, or Linear Vibrator, Circular Vibrator, with PNP level sensor in Circular or Linear and PNP overflow sensor on the linear (both timed), air blow for piece flow absence with alarm.



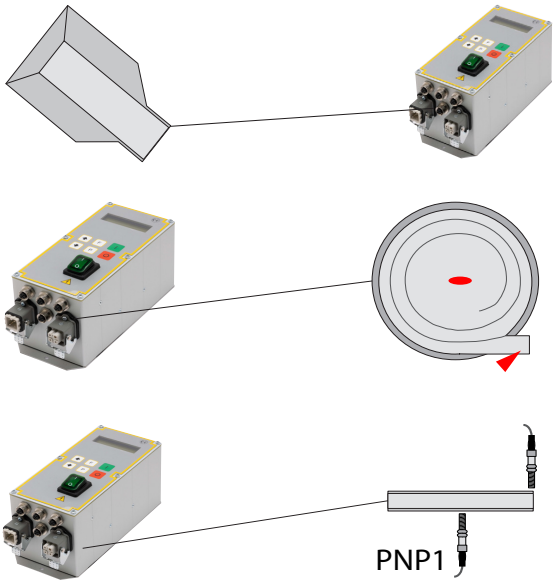
SENSOR SIND3
PV SIND3 A2 STD

Options

Customized front panel • Connector for vibrators • Customized software.

Technical Specs

Power Supply Voltage:	(115V) 230V ± 5% 50/60Hz
Consumption:	1,5W max
Max Current:	3A - 6A - 3A (RMS)
Minimum Load:	50 mA (RMS)
Vibration Frequency:	3000/6000 vib/min. (50Hz)
Ramp Time:	0/10 sec.
Min./Max. Adjustment:	0/210V
On/Off:	0-30 sec.
Blow Delay:	0/10 sec.
Piece Flow Absence Time:	30/180 sec.
Sensor Inputs:	Optoisolators
Sensors:	PNP 24V- NO/NC
Operating Temperature:	0/50° C
Relative Humidity Range:	80% up to 31°C
Altitude:	up to 2000 meters
Protection Degree:	IP55
European Standards:	EMC CE
Warranty:	12 months (from the date on the circuit).



Available Versions

Type	Box	Colour	Dimensions	Code	Price
MCP01/LT	Metallic	GRAY	100 x 250 x 105	PV MCP01 Z2 STD	

MCP01/LT

GENERAL

This module **MCP01/LT** can be used for the automatic driving of a system made up of: 1 vibrating system, with 1 **PNP** sensors, air blow output, absence pieces alarm, production counter, password, user menu with all parameters selectable from the keyboard.

MCP01/LT allows you to adjust the vibration amplitude of 1 Vibrating system • 3000/6000 Vpm • Ramp time • delay ON/OFF with PNP sensor • Air jet • Alarm absence pieces. High/Low speed function.

The total maximum current is **8A**.

- ☑ 1 PNP sensor inputs for the flow control of the material
- ☑ 2 24v outputs for air-jet, counter, Time Out channel
- ☑ 1 output status+ 24V (Power ON-enable ON), channel status CH1.
- ☑ 1 enable input 24V or with free-voltage contact.
- ☑ 1 power outputs 0/210V for adjusting the vibrator.



PARTICULAR INSTRUCTION

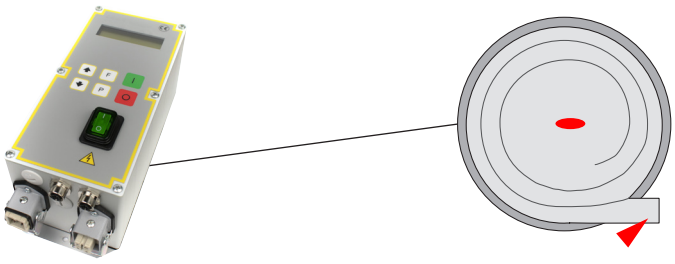
MCP01/LT Contoller has the output of 1 channel for the control and management of systems usually made up of 1 vibrator.

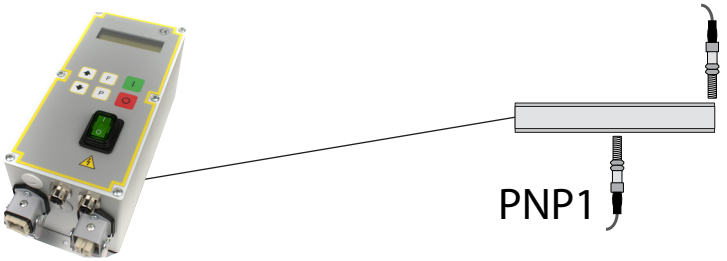
Up to 1 sensors can be used :

-FC1

FC1 is usually the sensor placed on the linear, to stop the (CH1) in case of overflow.







FUNCTIONS

Linear or Circular (CH1)

Feeder Speed
Invert Enable
Start Ramp
Stop Ramp
Vibration Limit max/min
Vibrating Frequency
50/100 Hz(60/120Hz)

Sensor PNP 1 Linear
Invert sensor 1
Delay ON
Delay OFF
Time out (absence pieces)

Output EV
Output 1: Air-Jet ON
Delay OFF Air-Jet

Speed Setting:
0/10V
0/20 mA
Key Board

Module for Automatic Loading Systems (Linear - Circular - Vibrating Hopper)

MCP02/LT

Amp. 6/8/10 | 115V 230V | SIND3

NEW

General

The **MCP02** module allows the automatic operation of a feeding system composed of: Vibrating Hopper, Circular Vibrator, Linear Vibrator, with two PNP sensors, air blow output, piece flow absence alarm with all parameters selectable from the keyboard.

General Characteristics

The **MCP02** module allows you to adjust the vibration amplitude for up to 2 vibrating systems • Select 3000/6000 V/m • Ramp time • ON/OFF delay of the vibrator with PNP sensor • Air blow • Piece flow absence time with alarm . The total maximum currents are 10A total 3A for Linear Vibrator 6A for Circular Vibrator 3A for Vibrating Hopper.



METALLIC BOX
MCP02
PV MCP02 Z2 STD
100x250x105

Applications

Control of Vibrating Hopper, Circular Vibrator, or Linear Vibrator, Circular Vibrator, with PNP level sensor in Circular or Linear and PNP overflow sensor on the linear (both timed), air blow for piece flow absence with alarm.



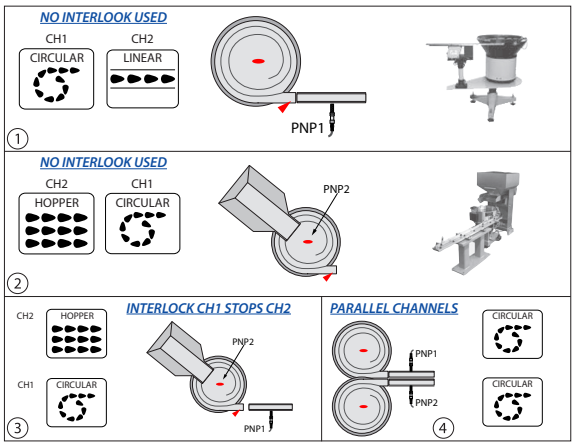
SENSOR SIND3
PV SIND3 A2 STD

Options

Customized front panel • Connector for vibrators • Customized software.

Technical Specs

Power Supply Voltage:	(115V) 230V ± 5% 50/60Hz
Consumption:	1,5W max
Max Current:	3A - 6A - 3A (RMS)
Minimum Load:	50 mA (RMS)
Vibration Frequency:	3000/6000 vib/min. (50Hz)
Ramp Time:	0/10 sec.
Min./Max. Adjustment:	0/210V
On/Off:	0-30 sec.
Blow Delay:	0/10 sec.
Piece Flow Absence Time:	30/180 sec.
Sensor Inputs:	Optoisolators
Sensors:	PNP 24V- NO/NC
Operating Temperature:	0/50° C
Relative Humidity Range:	80% up to 31°C
Altitude:	up to 2000 meters
Protection Degree:	IP55
European Standards:	EMC CE
Warranty:	12 months (from the date on the circuit).



Available Versions

Type	Box	Colour	Dimensions	Code	Price
MCP02/LT	Metallic	GRAY	100 x 250 x 105	PV MCP02 Z2 STD	

MODULE FOR ELECTROMAGNETIC VIBRATORS LINEAR - CIRCULAR – HOPPER
MCP02/LT

GENERAL

This Module **MCP02/LT** can be used for the automatic driving of a system made up by a linear vibratory with circular and bowl feeder or hopper, with 4 **PNP** sensor, output blow air, Alarm Time Out, production counter , password, user menu with all parameters selectable by keys.
MCP02/LT allows you to adjust the vibration amplitude up to two vibrating systems
• 3000/6000 V/m • ramp time • Delay ON/OFF with PNP sensor • Air-Jet • Alarm absence pieces. High/low speed function.
Total max current **8A**: Vibrating channel 1 max **6A** – vibrating channel 2 max **2A**.

- ☑ 2 sensor inputs PNP for track and jet control, presence signal (max 20 mA), counting pieces.
- ☑ 3 output 24V for air-jet, presence piece (max 100mA), Counter, Time Out channel and EV ON/OFF.
- ☑ 1 Output status +24V (Power ON - Enable ON), channel status CH1 and CH2.
- ☑ 2 Enable input 24VDC or volt-free contacts for each channel.
- ☑ 2 power outputs 0/210V for the 2 vibrators adjustment.

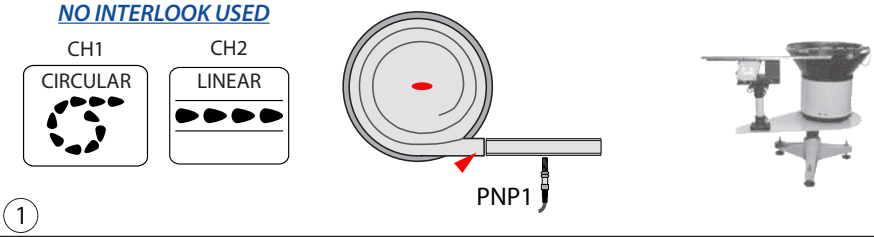
PARTICULAR INSTRUCTION

The controller MCP0/LT2 has the output of two channels for the control and the management
of systems usually made up of Linear and Circular, or hopper and Circular. It has 7 different logics to allow the use of the two vibrating channels in various other configurations.
In Logic menu, you can select the logic according to the requirements.
Sensor PNP1 e PNP2 can be used with:
- No Interlook used
- CH1 Interlook CH2
- Parallel Channels

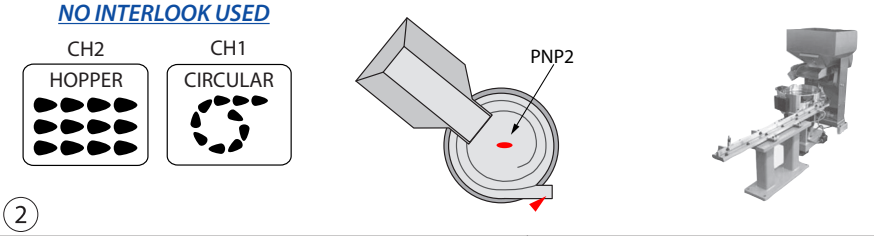
AVAILABLE VERSIONS

Linear-bowl feeder
Or bowl feeder and Hopper with 2 sensor

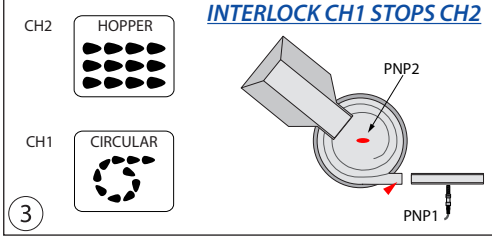
NO INTERLOOK USED



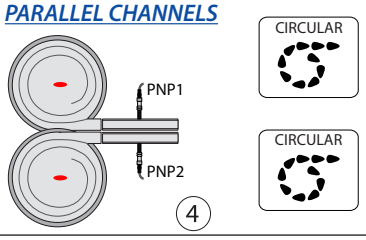
NO INTERLOOK USED



INTERLOCK CH1 STOPS CH2



PARALLEL CHANNELS





Functions

Linear-Circular (CH2-CH1)
Circular-Hopper (CH2-CH1)
Feeder Speed
Invert Enable
Start Ramp
Stop Ramp
Vibration Limit max/min
Vibrating Frequency
50/100 Hz(60/120Hz)

Sensor PNP 1 Linear
Invert sensor 1
Delay ON
Delay OFF
Time out (absence pieces)

PNP 2 Sensor Air-Jet
Invert sensor 2
Delay ON
Delay OFF
Time out (absence pieces)

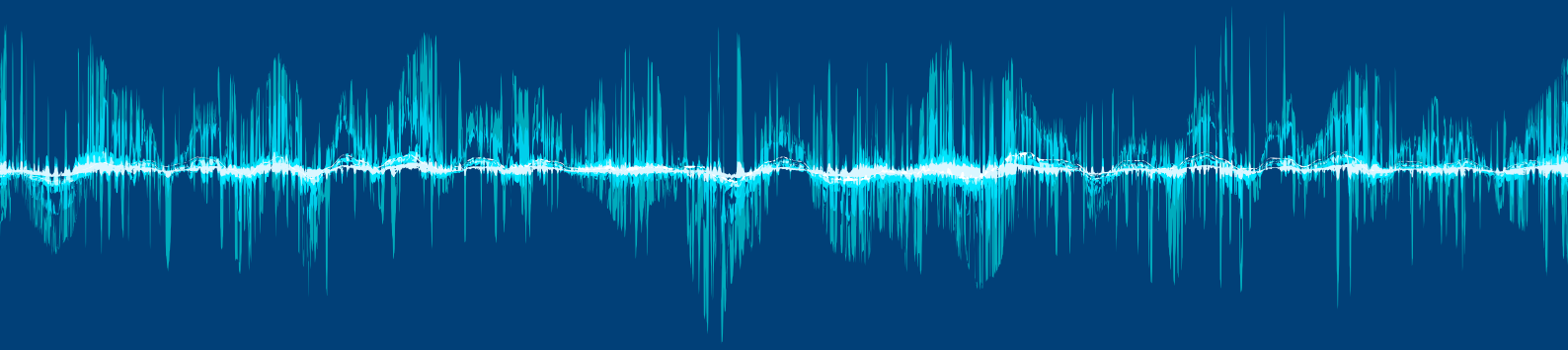
Output EV
Output 1: Air-Jet ON
Delay OFF Air-Jet

Sensor Logic
NO Intelook used
CH1 Interlock CH2

Speed Setting:
0/10V
0/20 mA
Key Board

Rev. 2026-09

www.mpelettronica.com



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QUALITY VIBRATION CONTROL

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