

mesa  
electronic

- CE and cUL® marked
- 100K KA Short Circuit Current (SCCR) tested
- Internal fuse on complete product range
- OLED display for easy diagnostic & configuration
- All firing & control mode types known
- RS485 std and most popular field bus available

POWERED BY INNOVATION

REVO

THE THYRISTOR EVOLUTION  
From 3,5 to 2100A



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# PRODUCT CATALOG

## REVO S FAMILY from 3,5 to 800A

- The family is available in 1-2-3 phase Units
- Nominal voltage 480-600-690V
- Input: SSR or analog Inputs
- Firing: burst firing (fast zero crossing)
- Heater Break: Alarm to diagnostic partial or total load failure and thyristor short circuit
- Its features are able to satisfy the simple application where the communication is not required
- Fuse and fuse holder up to 40A
- Fixed fuses from 60 to 800A
- Internal fuses reduce your labor and dimension of cabinet
- 100 KA short circuit current (SCCR) tested
- CE and cUL approved see pages 12-13



## REVO C CONNECT a real universal unit from 30 to 800A

- REVO C is a communicating family with following main features
- Capability to drive 1 phase or 3 phase loads using 1-2 or 3 leg
- Nominal voltage 480-600-690V
- 100 KA short circuit current (SCCR) tested
- Fuse and fuse holder up to 40A
- Fixed fuses from 60 to 800A
- Internal fuses reduce your labor and dimension of cabinet
- All the most popular FieldBus mounted on internal unit board
- All input signal selectable via PC or OLED display
- All Firing types selectable with capability to switch from one firing to another one while the unit is controlling power to the load
- All Control Mode / Feed Back selectable while the unit is working
- CE and cUL approved see pages 12-13

## REVEX FAMILY from 30 to 280A

REVEX has been designed with these targets:

- Price positioning between REVO S and REVO C
- High performance with precision features equal or less than 1%
- Very high flexibility able to guarantee the migration from obsolete to New products with compatibility in term of dimension and wiring and with better performances

REVEX is a real univereal unit where you can select:

- Input signal in digital mode
- Firing mode: Single cycle, half cycle, burst, phase angle, delayed triggering, different types of adjustable ramp
- Control Mode (V, V<sub>2</sub>, I, I<sub>2</sub>, VxL)
- Communication RS485 with Modbus® protocol standard
- Two Analog input
- Two Digital input
- USB port to program REVEX, should you ever need to re-program from your ordered configuration
- With the units already programmed you can simply switch and go on
- Save money and time straight out the box without the need to read a long manual
- Save money with REVEX and only pay for functionality you need



## REVO C EXTENDED from 1100 to 2100A

- REVO C Extended is an extension of REVO C
- The circuit board and its features are exactly the same of REVO C (see description on left side)
- The board is fisically different and suitable to be mounted on the right side with plug in connection
- Key pad with OLED display is mounted and on it where is possible to see power, current and voltage to set and to read all parameters to read alarms and messages in different languages
- The firing are the same of smaller units from 30 to 800A but some of them are skipped and not suggested by MESA because dangerous with high current ex 2100A

We don't suggest to use very fast firing like half cycle or single firing because can create problems for noise and electromechanical efforts on cables and copper bars

- Nominal voltage 480-600-690V 50 or 60 Hz
- Auxiliary voltage 90-265V with 20 VA power consumption
- Two thermal alarm are available on each phase. These sensors are positioned on heat sink and can be activated by overcurrent or overtemperature inside the cabinet.  
tThermal switch 1 just with warning with message on OLED display.  
tThermal switch 2 Stop and alarm of the unit.
- Very generous ventilation has been provided with two fans for each phase
- For other features and coding see pag 12 of REVO catalog

# MULTICHANNEL THYRISTOR UNIT

MESA has a wide product range able to cover application from 30 to 2100A.

We cover also small amperage from 3,5 to 25A.

This is because there are applications with high number of zones like:

- Thermoforming for plastic
- Thermoforming for glass
- Infrared short waveform

Where is necessary to reduce wiring labor and space of the cabinet.

In addition our multichannel Units can operate with power control optimization, where the pick power is closed to average power value and power factor is close to 1 (in this mode you save money on your energy bill).

The dimensions are very small.

The communication from PLC or multiloop is done from PLC central processing unit directly to the REVO PN input. This avoid to use all PLC output modules.

## REVO PN multichannel thyristor units

Designed specifically for industrial multi-zone applications, REVO PN can be configured to control between 4 and 24 channels/zones. Typically each zone is sized for 25A but by using the front panel connector, loads of up to 210A can be connected. Important power control functionality is offered by REVO PN including:

- Elimination of power overshoot
- Power factor maintained close to 1
- Keeps your instantaneous power within the limits of your electricity supply contract
- Stay connected with the most popular Field Bus protocols
- Eliminate use of PLC output modules by using comms for power to CPU connections
- Alarm notification per zone of heater break and thyristor short circuit
- Product footprint for 24 zone package 60% less than using standard thyristor stacks
- Dramatic savings with less wiring & smaller cabinet enclosures
- REVO PN's considered design not only helps you save start-up costs but ensures you keep on saving money throughout the products lifetime.
- This solution includes electronic circuit control and up to 24 thyristor mounted inside.





### REVO PC power controller

- Multi channel power control
- Suitable to communicate with PLC & Multiloop
- Dedicated to solve applications
- Space & wiring reduction
- Most popular Field Bus available
- CE EMC and cUL® listed
- Elimination of power overshoot
- Power factor maintained close to 1
- Power control optimization
- When loads are very small from 3,5 to 7A
- REVO-PC can be connected with REVO-SX below



### REVO SX specification

- This unit is available in three version as in drawing below
- Each unit includes Fuse and Fuse holder, thyristor and heat sink with its own firing circuit
- Zero crossing firing
- Insulated input
- LED for on off status indication
- LED fr fuse failure indication
- Plug in connection for auxiliary and power terminations
- Small dimensions: Width 36 mm, depth 86 mm, height 121 mm
- Din rail mounting or screw mounting
- REVO SX can be used in applications with many zones and low power as thermoforming, blow moulding and hot runners

Diagram of control connection 4x3,5A

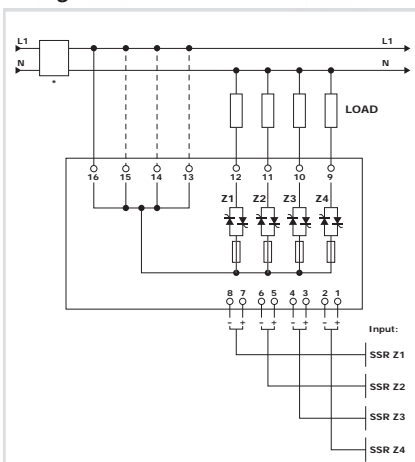


Diagram of control connection 3x4,5A

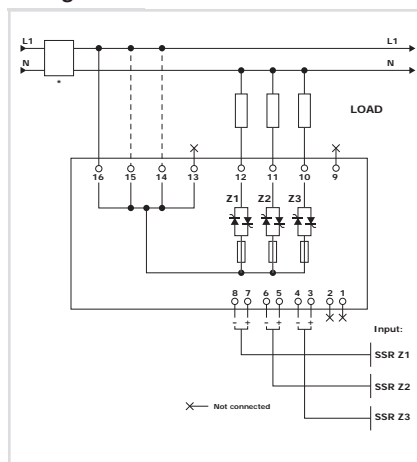
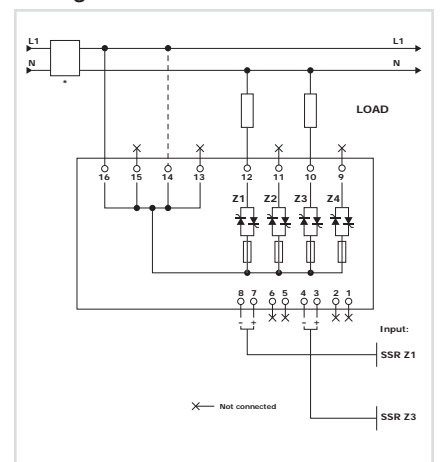


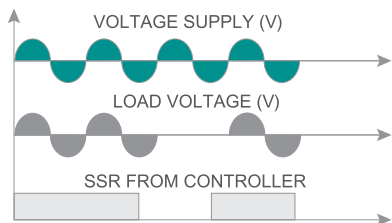
Diagram of control connection 2x7A



# GLOSSARY

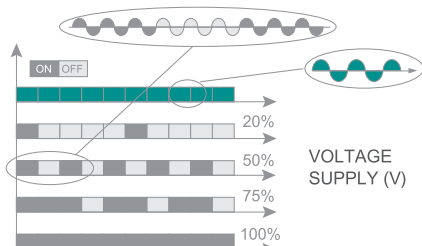
## ZERO CROSSING ZC

ZC firing mode is used with the logic output from a temperature controller and so the thyristor operates like a contactor. The cycle time is performed by the temperature controller. Zero crossing minimizes interferences as the thyristor unit switches ON-OFF at zero voltage.



## BURST FIRING BF

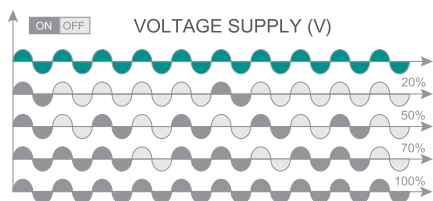
This firing is performed digitally within the thyristor unit at zero volts, producing no EMC interferences. Analogue input is necessary for BF and the number of complete cycles must be specified for 50% power demand. This value can be between 1 and 255 complete cycles, determining the speed of firing. When 1 is specified, the firing mode becomes Single Cycle (SC).



Soft Start + Burst Firing now available as an option at 1 PH and 3 PH.

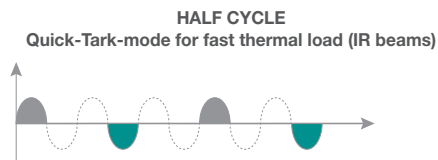
## SINGLE CYCLE SC

SC is the fastest zero crossing switching method. At 50% input signal, one cycle is ON and one cycle is OFF. At 75%, 3 cycles are ON and one cycle is OFF. If power demand is 76% the unit performs the same as for 75% but every time the unit switches ON the microprocessor divides 76/75 and memorises the ratio. When the sum is one the unit delivers one cycle more to the load. With this firing it is necessary to have analogue input.



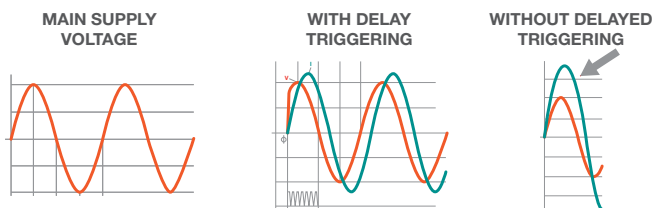
## HALF CYCLE

This is a super fast firing used with short infrared elements to avoid flickering and harmonic generated by phase angle firing.



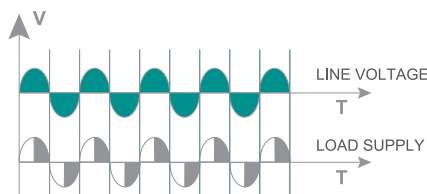
## DELAYED TRIGGERING DT

Used to switch the primary coil of transformers when coupled with normal resistive loads (not cold resistance) on the secondary, DT prevents the inrush current when zero voltage (ON-OFF) is used to switch the primary. The thyristor unit switches OFF when the load voltage is negative and switches ON only when positive with a preset delay for the first half cycle.



## PHASE ANGLE PA

PA controls the power to the load by allowing the thyristor to conduct for part of the AC supply cycle only. The more power required, the more the conduction angle is advanced until virtually the whole cycle is conducting for 100% power. The load power can be adjusted from 0 to 100% as a function of the analogue input signal, normally determined by a temperature controller or potentiometer, PA is normally used with inductive loads.



## FEEDBACK/CONTROL MODE

Supply voltage fluctuations changes the power to the load. To overcome this effect the voltage supplied to the load is measured and compared with the power demand from the controller. The error signal is used to automatically hold the power at the value requested.

Three types of control mode are available:

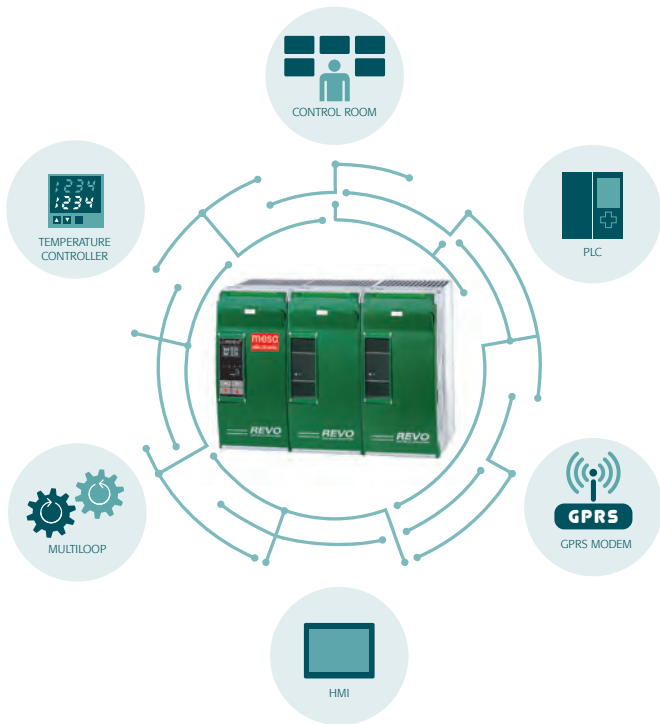
Voltage control mode, where the input signal is proportional to the voltage output (voltage f/b).

Current control mode, where the input signal is proportional to the current output (current f/b).

Power control mode, where the input signal is proportional to the power output (power f/b).

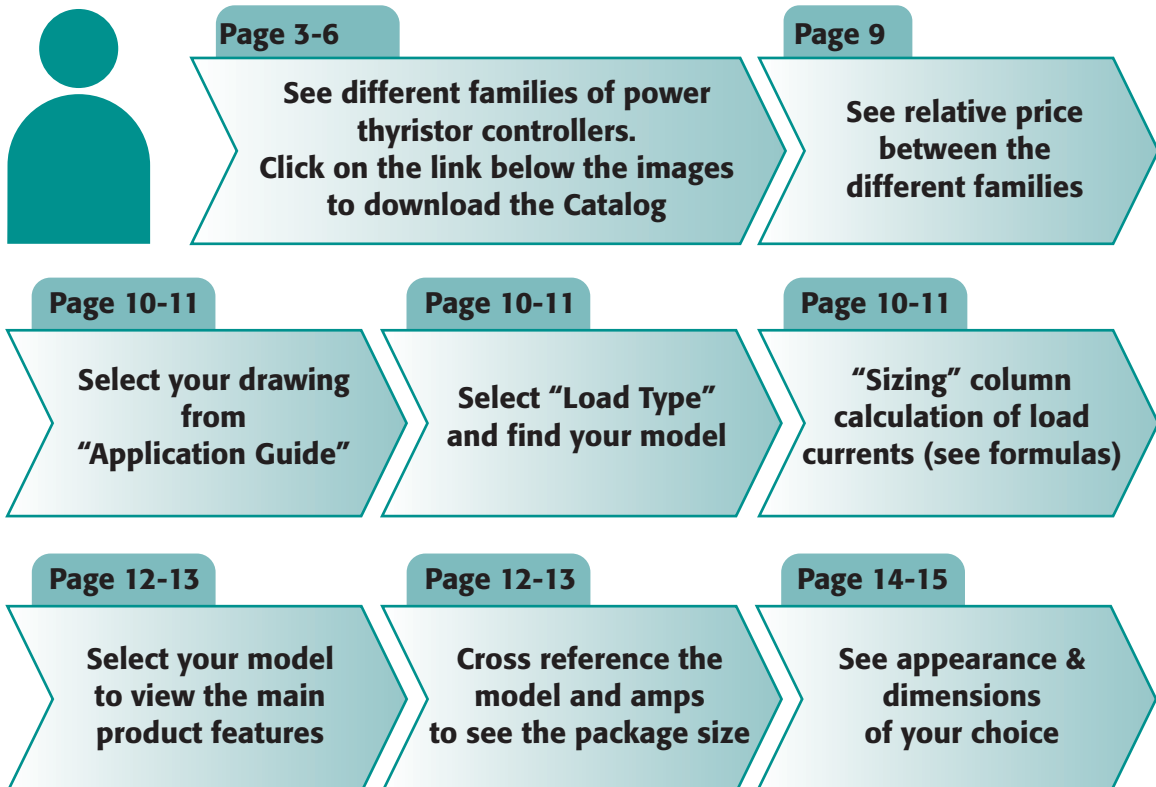
As an option it is possible to transfer control mode from voltage to power via a simple digital command.

# CONNECTIVITY AND CONFIGURATION



READ	WRITE
Set Point	Set Point
Alarm	Configuration Parameters
Voltage	
Power	
Current	
Heater Break Alarm	
SCR Short Circuit Alarm	

# HOW TO USE THE GENERAL CATALOG



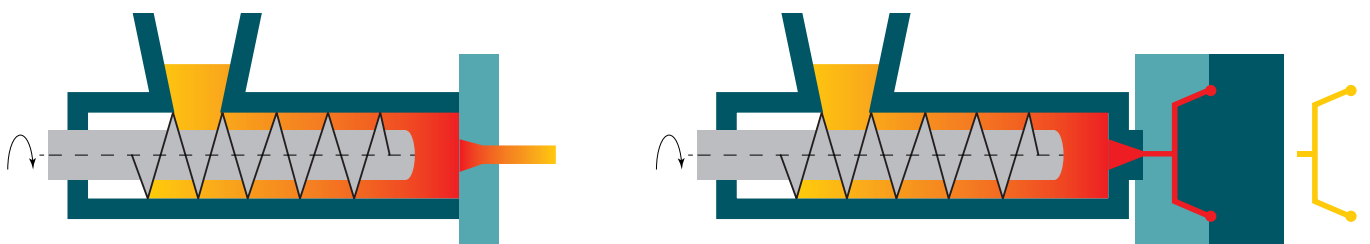


# SELLING PRICE VS FEATURES



## APPLICATIONS

- PLASTIC: Extrusion, Injection Molding, Vulcanization, Forming
- GLASS: Feeder, Windscreen Bombing, Float Plant
- SEMICONDUCTOR: Crystal Pulling, Spreading Furnaces
- AUTOMOTIVE: Paint Drying, Polymerization
- HEAT TREATMENT: Sintering, Vacuum Furnaces
- MATERIAL TEST: Climatic Chamber, Shock Chambers
- LIFE SCIENCES: Sterilization, Laboratory Furnaces
- FOOD & BEVERAGE: Sterilization, Cooking, Drying System



# APPLICATION GUIDE FOR THYRISTOR UNIT SELECTION

APPLICATION GUIDE	LOAD TYPE	MODEL	CURRENT RANGE	N. OF UNITS	PHASE CTRL
	Normal resistance infrared medium and long waveform	REVO SSR	It depends on heat sink	1	1
		REVO S 1PH	30-800A	1	1
		REVO C 1PH	30-2100A	1	1
	Quartz lamp infrared short waveform	REVO C 1PH	30-2100A	1	1
	Molibdenum, Tungstenum, Kanthal® super, Platinum	REVO C 1PH	30-2100A	1	1
		REVO S 1PH	30-800A	1	1
	Silicon carbide elements	REVO C 1PH	30-2100A	1	1
	Transformers coupled with normal resistance	REVO C 1PH	30-2100A	1	1
	Transformers coupled with cold resistances (Kanthal® super)	REVO C 1PH	30-2100A	1	1
		Normal Resistance	REVO S 2PH	30-800A	1
REVO C 2PH		30-2100A	1	2	
	Normal Resistance	REVO S 3PH	30-500A	1	3
		REVO C 3PH	30-2100A	1	3
	Silicon carbide elements	REVO C 3PH	60-2100A	1	3
	Molibdenum, Tungstenum, Kantal® Super, Platinum, Quartz lamp infrared short waveform	REVO C 3PH	60-2100A	1	3
	Three phase transformer	REVO C 3PH	60-2100A	1	3
	Three phase normal load resistance with open delta connection	REVO S 3PH	30-800A	1	3
		REVO C 1PH	30-2100A	3	3
	Cold resistance	REVO C 1PH	30-2100A	3	3

CONTROL MODE: V = Voltage feedback V<sup>2</sup> = Square voltage feedback

SUGGESTED FIRING MODE FOR YOUR APPLICATIONS						OTHER FEATURES				SIZING		NOTE	
ZC	HC	SC	BF	BF Simplified	S+BF	DT	PA	CL	Control	V	I		
•												For general resistance applications with low variations in temperature and age. For low inertia loads use Single Cycle (SC) or Phase Angle (PA). For Infrared Short it's also available Half Cycle that is a very Fast Firing	
•				•						V	$\frac{P}{V}$		
•				•						V	$\frac{P}{V}$		
	•	•					•			V <sup>2</sup>		These resistances change with temperature but have low variations with age. Starting current with cold elements can be 16 times nominal current (Kanthal® super). Infrared lamp short waveform can reach 8 time nominal current.	
							•	•		I <sup>2</sup>	V		$\frac{P}{V}$
			•				•			V to Vxl	V	$\frac{P}{V}$	These resistances change value with temperature and age and value at the end of element life is 4 times the initial value. Constant power regulation is necessary with V to Vxl Transfer.
						•				Vxl	V	$\frac{P}{V \cos \phi}$	Transformers and inductors have inrush current on start up. Phase Angle plus Soft Start and current limit are required. To switch the transformer ON-OFF, use DT firing that will automatically switch ON-OFF when current value is at zero.
							•	•		I <sup>2</sup>	V	$\frac{P}{V \cos \phi}$	Use Phase Angle + Current Limit
•				•						V	$\frac{P}{1.73V}$	Revo S - Revo C 2PH are suitable to control resistive loads with delta or star connection without neutral.	
			•							Vxl	V		$\frac{P}{1.73V}$
•				•						$\frac{V}{1.73}$	$\frac{P}{1.73V}$	Three phase load with star plus neutral connection must be controlled on the three phases.	
			•							Vxl			
							•			V to Vxl	V	$\frac{P}{1.73V}$	On three phase silicon carbide elements Vxl feedback is suggested to have a constant power control. This is necessary to compensate resistance change with temperature and age. Resistance value at the end of element life is 4 times the original value. With Revo C use BF firing and Power Limit.
							•	•		I <sup>2</sup>			These resistances change with temperature but have low variations with age. Start up current with cold elements can be many times the nominal current value. In this case it is necessary to use Phase Angle + Current Limit.
							•	•		I <sup>2</sup>	V	$\frac{P}{1.73V \cos \phi}$	Three phase Revo C units are specially designed to drive three phase transformers coupled on secondary with normal or special resistive loads.
•				•			•	•		I <sup>2</sup>	V	$\frac{P}{3V}$	Open delta can be driven by three phase unit.
							•	•		I <sup>2</sup>	V	$\frac{P}{3V}$	

Vxl = Power feedback I = Current feedback Firing = BF Simplified 4-8-16 Cycles at 50% Power Demand with Analog Input only

# FEATURES COMPARISON

		BASIC PRODUCTS WITHOUT COMMUNICATION			UNIVERSAL
DESCRIPTION		REVO S 1PH	REVO S 2PH	REVO S 3PH	REVEV 1PH
CODE		RS1	RS2	RS3	RX1
MAIN VOLT.	Max voltage 480V	●	●	●	●
	Max voltage 600V	●	●	●	●
	Max voltage 690V <b>(1)</b>	●	●	●	
LOAD TYPE	Single phase	●			●
	3 phase load star no neutral or delta		●	●	
	3 phase load star with neutral			●	
	3 phase load open delta			●	
INPUT	SSR 4:30VDC	●	●	●	●
	4:20 mA	○	○	○	●
	0:10 Vdc	○	○	○	●
	Potentiometer	○	○	○	●
FIRING	Zero crossing	●	●	●	●
	Half Cycle				●
	Single Cycle				●
	Burst firing				●
	Burst firing simplified 4-8-16 Cycles at 50% <b>(2)</b>	●	●	●	●
	Delayed triggering				●
	Phase Angle				●
Soft Start					
CONTROL MODE	No Feed Back	●	●	●	●
	Voltage				●
	Voltage Square				●
	Current				●
	Current Square				●
	Power Vxl				●
	Transfer from V to Vxl or I to Vxl				○
OPTION	Current limit				●
	Heater break Alarm HB	○	○	○	●
	Logging				
	Totalizer (Energy)				
TOOLS					
	PC Configurator Software (Line analyzer Free of Charge)				●
COMM.	N°1 Modbus® RTU				●
	N°2 Modbus® RTU				○
	N°1 Profibus DP + N°1 Modbus® RTU				○
	N°1 Profinet® + N°1 Modbus® RTU				○
	N°1 Modbus® TCP + N°1 Modbus® RTU				○
CURRENT	DESCRIPTION	REVO S 1PH	REVO S 2PH	REVO S 3PH	REVEV 1PH
	SIZE / Approval	SIZE / Approval	SIZE / Approval	SIZE / Approval	SIZE / Approval
	30	SR3-SR6/CE-cUL	SR4-SR7/CE-cUL	SR5-SR8/CE-cUL	SR6/CE
	35	SR3-SR6/CE-cUL	SR4-SR7/CE-cUL	SR5-SR8/CE-cUL	SR6/CE
	40	SR3-SR6/CE-cUL	SR4-SR7/CE-cUL	SR5-SR8/CE-cUL	SR6/CE
	60	SR12/CE-cUL <b>(3)</b>	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(3)</b>	SR24/CE
	75		F/SR15/cUL	F/SR16/cUL	
	90	F/SR15/CE-cUL <b>(3)</b>	F/SR15/CE <b>(3)</b>	F/SR17/CE <b>(3)</b>	F/SR24/CE
	120	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(4)</b>	F/SR17/CE-cUL <b>(4)</b>	F/SR15/CE
	150	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(4)</b>	F/SR17/CE-cUL <b>(4)</b>	F/SR15/CE
	180	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(4)</b>	F/SR17/CE-cUL <b>(4)</b>	F/SR15/CE
	210	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(4)</b>	F/SR17/CE-cUL <b>(4)</b>	F/SR15/CE
	280	F/S10/CE	F/2xS10/CE		F/S10/CE
	300	F/S12/CE-cUL	F/S14/CE-cUL	F/S14/CE-cUL	
	350			F/S14/CE-cUL	
	400	F/S12/CE-cUL	F/S14/CE-cUL	F/S14/CE-cUL	
	450		F/S14/CE-cUL	F/S14/CE-cUL	
	500	F/S12/CE-cUL	F/S14/CE-cUL	F/S14/CE-cUL	
	600	F/S12/CE-cUL	F/S14/CE-cUL		
	700	F/S12/CE-cUL	F/S14/CE-cUL		
800	F/S15/CE	F/S16/CE	F/S17/CE		
1100					
1400					
1600					
1800					
2100					

● STANDARD ○ OPTION SIZE See next page F Fan Air Cooling; nothing before SIZE: Natural Air Cooling (1) cUL® Approval is for Voltage ≤ 600V

THYRISTOR UNITS FULLY CONFIGURATION WITH COMMUNICATION						
REVEX 2PH	REVEX 3PH	REVO C 1PH	REVO C 2PH	REVO C 3PH	DESCRIPTION	
RX2	RX3	RC1	RC2	RC3	CODE	
•		•	•	•	Max voltage 480V	MAIN VOLT.
•		•	•	•	Max voltage 600V	
		•	•	•	Max voltage 690V <b>(1)</b>	
•	•	•	•	•	Single phase	LOAD TYPE
	•			•	3 phase load star no neutral or delta	
		• (5)		•	3 phase load star with neutral	
•	•	•	•	•	3 phase load open delta	
•	•	•	•	•	SSR 4:30VDC	INPUT
•	•	•	•	•	4:20 mA	
•	•	•	•	•	0:10 Vdc	
•	•	•	•	•	Potentiometer	
•	•	•	•	•	Zero crossing	FIRING
		•			Half Cycle	
		•			Single Cycle	
•	•	•	•	•	Burst firing	
•		•			Burst firing simplified 4-8-16 Cycles at 50% <b>(2)</b>	
		•		•	Delayed triggering	
		•		•	Phase Angle	
		•		•	Soft Start	
•	•	•	•	•	No Feed Back	CONTROL MODE
•	•	•	•	•	Voltage	
•	•	•	•	•	Voltage Square	
•	•	•	•	•	Current	
•	•	•	•	•	Current Square	
•	•	•	•	•	Power Vxl	
○	○	•	•	•	Transfer from V to Vxl or I to Vxl	
•		○		○	Current limit	OPTION
	○	○	○	○	Heater break Alarm HB	
		○	○	○	Logging	
		○	○	○	Totalizer (Energy)	
•	•	•	•	•	PC Configurator Software (Line analyzer Free of Charge)	TOOLS
•	•	•	•	•	N°1 Modbus® RTU	COMM.
○	○	○	○	○	N°2 Modbus® RTU	
○	○	○	○	○	N°1 Profibus DP + N°1 Modbus® RTU	
○	○	○	○	○	N°1 Profinet® + N°1 Modbus® RTU	
○	○	○	○	○	N°1 Modbus® TCP + N°1 Modbus® RTU	
REVEX 2PH	REVEX 3PH	REVO C 1PH	REVO C 2PH	REVO C 3PH	DESCRIPTION	
SIZE / Approval	SIZE / Approval	SIZE / Approval	SIZE / Approval	SIZE / Approval	SIZE / Approval	
SR9/CE	SR10/CE	SR9/CE	SR10/CE-cUL	SR11/CE-cUL	30	CURRENT
SR9/CE	SR10/CE	SR9/CE-cUL	SR10/CE-cUL	SR11/CE-cUL	35	
SR9/CE	SR10/CE	SR9/CE-cUL	SR10/CE-cUL	SR11/CE-cUL	40	
SR25/CE	F/SR26/CE	SR12/CE-cUL <b>(3)</b>	SR13/CE-cUL <b>(3)</b>	SR14/CE-cUL <b>(3)</b>	60	
					75	
F/SR25/CE	F/SR26/CE	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(3)</b>	F/SR17/CE-cUL <b>(3)</b>	90	
F/SR16/CE	F/RS17/CE	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(4)</b>	F/SR17/CE-cUL <b>(4)</b>	120	
F/SR16/CE	F/RS17/CE	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(4)</b>	F/SR17/CE-cUL <b>(4)</b>	150	
F/SR16/CE	F/RS17/CE	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(4)</b>	F/SR17/CE-cUL <b>(4)</b>	180	
F/SR16/CE	F/RS17/CE	F/SR15/CE-cUL <b>(3)</b>	F/SR16/CE-cUL <b>(4)</b>	F/SR17/CE-cUL <b>(4)</b>	210	
F/2xS10/CE					280	
		F/S12/CE-cUL	F/S14/CE-cUL	F/S14/CE-cUL	300	
					350	
		F/S12/CE-cUL	F/S14/CE-cUL	F/S14/CE-cUL	400	
			F/S14/CE-cUL	F/S14/CE-cUL	450	
		F/S12/CE-cUL	F/S14/CE-cUL	F/S14/CE-cUL	500	
		F/S12/CE-cUL	F/S14/CE-cUL	F/S17/CE	600	
		F/S12/CE-cUL	F/S14/CE-cUL	F/S17/CE	700	
		F/S15/CE	F/S16/CE	F/S17/CE	800	
		F/SR18/CE	F/SR19/CE	F/SR20/CE	1100	
		F/SR21/CE	F/SR22/CE	F/SR23/CE	1400	
		F/SR21/CE	F/SR22/CE	F/SR23/CE	1600	
		F/SR21/CE	F/SR22/CE	F/SR23/CE	1800	
		F/SR21/CE	F/SR22/CE	F/SR23/CE	2100	

**(2)** It's possible just using Analog Input Ex. 4:20mA **(3)** SIZE 11 at 690V (no cUL®) **(4)** SIZE 13 at 690V (no cUL®) **(5)** Use n° 3 1PH units

# SIZE AND DIMENSIONS



**SR0** H 97 x W 36 x D 32 - 0,12kg.



**SR1** H 97 x W 36 x D 92 - 0,29kg.



**SR2** H 121 x W 36 x D 87 - 0,27kg.



**SR3** H 121 x W 36 x D 125 - 0,44kg.



**SR4** H 121 x W 72 x D 125 - 0,88kg.



**SR5** H 121 x W 108 x D 125 - 1,32kg.



**SR6** H 121 x W 36 x D 185 - 0,61kg.



**SR7** H 121 x W 72 x D 185 - 1,22kg.



**SR8** H 121 x W 108 x D 185 - 1,83kg.



**SR9** H 121 x W 72 x D 185 - 1,15kg.



**SR10** H 121 x W 108 x D 185 - 1,76kg.



**SR11** H 121 x W 144 x D 185 - 2,4kg.



**SR24** H 169 x W 116 x D 183 - 2,10 kg



**SR25** H 180 x W 116 x D 183 - 2,35 kg



**SR26** H 180 x W 167 x D 183 - 2,70 kg



**SR12** H 269 x W 93 x D 170 - 3,4kg.



**SR13** H 269 x W 186 x D 170 - 6,8kg.



**SR14** H 269 x W 279 x D 170 - 10,2kg.

**SR15** H 273 x W 93 x D 170 - 3,6kg.

**SR16** H 273 x W 186 x D 170 - 7,0kg.

**SR17** H 273 x W 279 x D 170 - 10,6kg.



**SR10** H 350 x W 120 x D 230 - 5,50 kg



**2xSR10** H 350 x W 240 x D 230 - 11,00 kg



**S11** H 440 x W 137x D 270 - 10,5kg.



**S12** H 520 x W 137 x D 270 - 15kg.



**S13/S14** H 440/520 x W 262 x D 270 - 18/22kg.



**S15** H 560 x W 137x D 270 - 10,5kg.



**S16** H 560 x W 275 x D 270 - 21kg.



**S17** H 560 x W 411 x D 270 - 31,5kg.



**SR18** H 550 x W 329 x D 347 - 27kg.



**SR19** H 550 x W 523 x D 347 - 49kg.



**SR20** H 550 x W 717 x D 347 - 72kg.



**SR21** H 640 x W 329 x D 347 - 32/40kg.



**SR22** H 640 x W 523 x D 347 - 59/75kg.



**SR23** H 640 x W 717 x D 347 - 86/110kg.

**NOTES:**

From SR9 to SR17 The thyristor unit are represented with OLED Display Std for REVO C family

The REVO S Family have a blind frontal unit.

OLED Digital Display is available to read Voltage, Current and Power HB alarm has been selected.

Sizes from 18 to 23 represented REVO C Extended Family; Standard version is without plastic IP20 that is available as an option.

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