

AuCom

Ready

Run

CSXi SOFT STARTER

Making soft starters simple

AuCom
MOTOR CONTROL SPECIALISTS

RIGHT FROM
THE START

Making soft starters simple

Our CSXi soft starters allow you greater control over the starting and stopping of three phase motors. The CSXi is ideal as a simple soft start control device which also provides motor protection.

The CSXi soft starter is a constant current system, complete with current measurement and control.

In addition to soft start and soft stop, the CSXi provides a range of motor protection functions, including motor overload, phase loss and excess start time.

The CSXi also features a programmable relay.

COMPACT DESIGN

The CSXi soft starter is a compact unit suitable for mounting in a motor control center without the need for an external bypass contactor. At only 165 mm (6.5 inches) deep it is easy to mount in shallow enclosures.

For motors up to 60 A the soft starter can be mounted on a DIN-rail, or the CSXi may be mounted horizontally to use less space.

ENERGY SAVINGS

We have made energy savings simple. The CSXi soft starters are equipped with an internal bypass function to reduce operating costs. CSXi starters are 99.5% efficient during run, produce no harmonics and are the most energy efficient solution for fixed speed applications with variable load.

SIMPLE TO INTEGRATE

With features such as dedicated output relays to control the upstream main contactor and power factor correction capacitors (if used), CSXi soft starters are easy to integrate into complete motor control solutions.



PROTECTION

The CSXi has built-in thermal model motor overload protection. The motor current is continuously monitored and the expected temperature is calculated based on this monitored current.

The user sets the motor trip class, and the CSXi will trip when the calculated motor temperature reaches 105%.

An external motor protection device is not required when using a CSXi soft starter.



TRIP MESSAGES

The CSXi Series allows for fast diagnosis of a trip via two LEDs on the front of the unit. LEDs will flash to indicate the trip. (Note: some trip messages available only with an optional accessory).



Indicator	Description	CSXi
○	No control power	•
●	Ready	•
⚡	Tripped	•
Flash Code	Description	
⚡ x 1	Power circuit	•
⚡ x 2	Excess start time	•
⚡ x 3	Motor overload	•
⚡ x 4	Motor thermistor	•
⚡ x 5	Current imbalance	•
⚡ x 6	Supply frequency	•
⚡ x 7	Phase rotation	•
⚡ x 8	Network communication failure	Opt
⚡ x 9	Starter communication failure	Opt
⚡ x 10	Bypass overload	•

*Protection feature standard

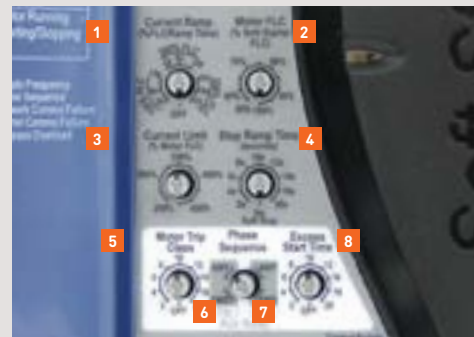
Control made easier

ADJUSTMENTS

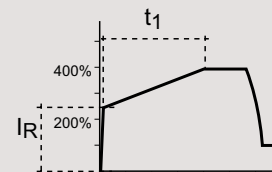
The CSXi has several adjustments for more control:

- Current ramp
- Motor FLC
- Current limit
- Stop ramp time
- Motor trip class
- Auxiliary relay
- Phase sequence
- Excess start time

CSXi CONTROL PANEL



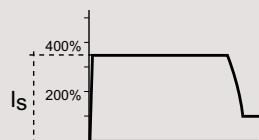
1. Current Ramp



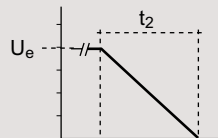
CSXi CONTROL PANEL

2. Motor FLC
CSXi FLC

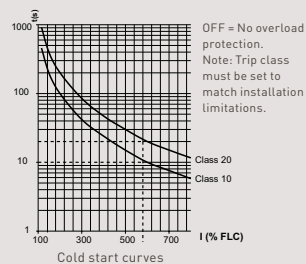
3. Current Limit



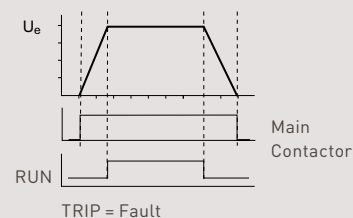
4. Stop Ramp Time



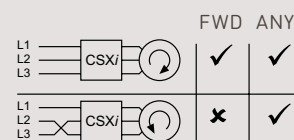
5. Motor Trip Class



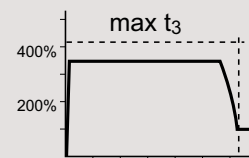
6. Aux Relay Function



7. Phase Sequence



8. Excess Start time



CSXi Pump Panels

Our standardized pump panels are the most cost-effective way for you to add the advantages of CSXi Series soft starters to your system, pre-installed in a NEMA 3R enclosure.

BENEFITS

Using one of our standard panel configurations makes it easy for you to add a soft starter to your system, with most of the wiring already completed for you. Pushbuttons and indicator lights can also be added, for the ultimate in easy installation.

STANDARD FEATURES

Each CSXi Pump Panel includes:

- NEMA 3R enclosure
- CSXi soft starter with integral bypass
- Circuit breaker with door operator (35 kAIC)
- Control power transformer
- Space heater with thermostat



Unit shown with options.

PUMP PANEL SPECIFICATIONS

Model	Motor HP (nominal)			Max FLC (A)	CB Rating (A)	Dimensions			
	230 VAC	460 VAC	575 VAC			H	W	D	
							(inches)		
CSX-0014	5	10	15	18	40	20	16	8	
CSX-0034	10	25	30	34	60	20	16	8	
CSX-0040	15	30	40	42	70	20	16	8	
CSX-0052	20	40	50	60	100	20	16	8	
CSX-0065	25	—	60	75	125	24	20	10	
CSX-0077	30	60	75	85	150	24	20	10	
CSX-0096	—	75	100	100	175	24	20	10	
CSX-0125	50	100	125	140	225	24	20	10	
CSX-0156	60	125	150	170	300	24	20	10	
CSX-0180	75	150	200	200	350	24	20	10	

Ratings are based on 6 second start time at 400% FLC.

Contact us for other duty ratings or for help with sizing.

CSXi Series features & options

Feature Sets	CSXi
STARTING FUNCTIONS	
Constant current	•
Current ramp	•
STOPPING	
Coast to stop	•
Soft stop	•
PROTECTION	
Motor overload	•
Phase loss	•
Excess start time	•
Phase sequence	•
Current imbalance	•
Motor thermistor	•
Power circuit fault	•
Supply frequency	•
Instantaneous overcurrent	•
Bypass overload	•
Communications failure	•
INTERFACE	
Fixed relay output (main contractor relay)	•
Programmable relay (trip or run)	•
Run relay output	•
ACCESSORIES (OPTIONAL)	
Remote operator	•
Modbus	•
Profibus	•
DeviceNet	•
PC software	•
Ethernet/IP	•
Modbus TCP	•
ProfiNET	•



APPROVALS



Efficient motor control

GET IT RIGHT FROM THE START

Design of energy efficient systems requires consideration of the system as a whole. Using energy efficient components is important but selection of the correct motor control mode (fixed or variable speed) is also critical. Approximately 80% of motor applications are most efficiently operated at a fixed speed. Using a variable speed drive (VSD) with such a system is hugely inefficient, regardless of the efficiency of the motor you are running.

CSXi – THE MOST ENERGY EFFICIENT OUTCOME FOR FIXED SPEED APPLICATIONS

99.5%
Efficiency

Internal bypass makes CSXi Series soft starters 99.5% efficient when running.

80%
Reduction in
wasted energy

Compared to a misapplied drive, the 99.5% efficiency of CSXi Series equates to around an 80% reduction in waste energy.

0%
Harmonics

CSXi Series produces no harmonics during run, improving overall power quality and eliminating system losses resulting from harmonics.

The future starts with AuCom

We develop motor control products for industrial applications across the world. Our focus on research and development, as well as manufacturing, supply and support, ensures that when you choose to work with AuCom, you're working with a global leader. Almost 40 years of experience added to our expertise and ability means you can rely on us to get it right from the start.

OUR APPROACH

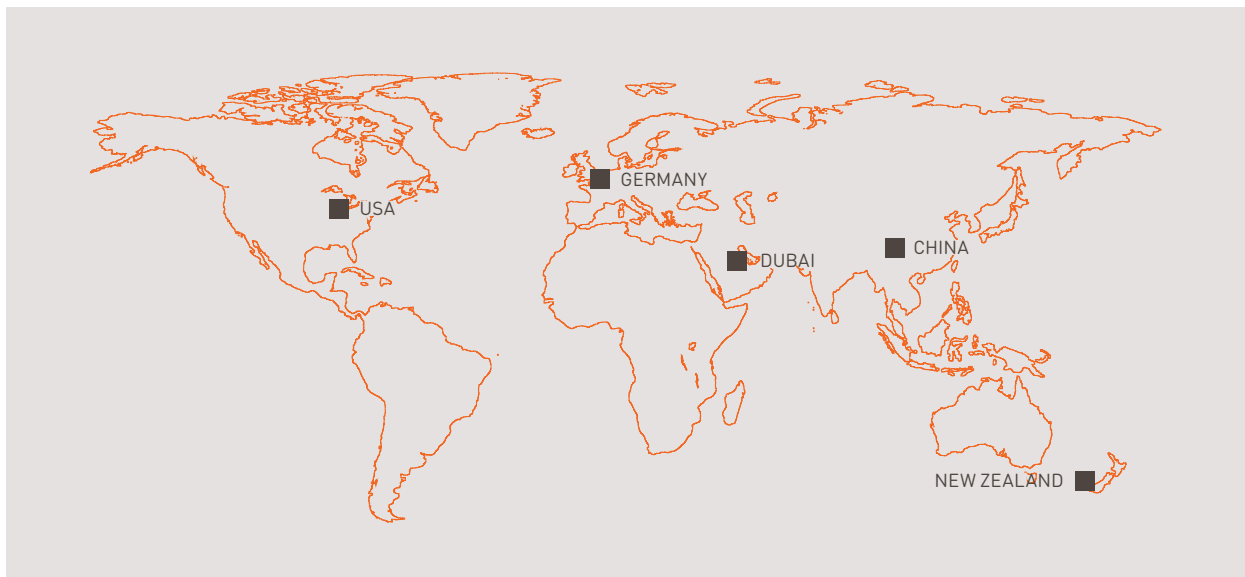
We start with a challenge or application, working with you to define and develop a solution that's not only fit for purpose today, but fully supported into tomorrow.

OUR PEOPLE

The power behind our success doesn't rely on our innovative products alone. Our people play a pivotal role. That's why, with AuCom, it's always personal. Combining dedication and experience with ability and passion, we don't just listen more closely, we draw on the breadth of our expertise to better understand your unique requirements and offer real solutions and ongoing support.

OUR PARTNERS

We choose partners that are experts, not only in soft start and motor control, but in understanding the needs of their industry. We work closely with our partners to ensure customers receive only the best support and advice.



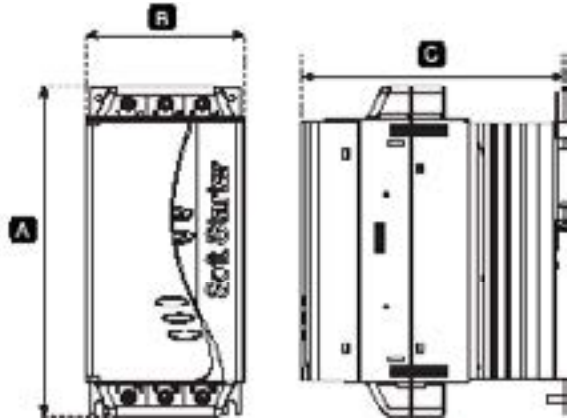
We have high standards

AuCom is accredited to ISO9001:2000, with all products designed and tested to international standards such as IEC 60947-4-2, UL 508, CCC and CISPR-11. All of our products are thoroughly tested in certified facilities and in the field before release, and every soft starter is tested before leaving the factory.



CSXi Series specifications

DIMENSIONS AND WEIGHTS



	A Height	B Width inches	C Depth	Weight lbs
CSXi-007				
CSXi-015				
CSXi-018	7.99	3.86	6.50	5.29
CSXi-022				
CSXi-030				
CSXi-037				
CSXi-045	8.46	5.71	7.60	9.48
CSXi-055				
CSXi-075				
CSXi-090	9.45	7.95	8.43	14.99
CSXi-110				

CURRENT RATINGS

Model	STANDARD DUTY							
	40 °C				50 °C			
	Motor HP (nominal)			Max FLC (A)	Motor HP (nominal)			Max FLC (A)
230 VAC	460 VAC	575 VAC	230 VAC		460 VAC	575 VAC		
CSXi-007	5	10	15	18	5	10	15	17
CSXi-015	10	25	30	34	10	20	30	32
CSXi-018	15	30	40	42	—	30	—	40
CSXi-022	—	—	—	48	15	—	40	44
CSXi-030	20	40	50	60	20	40	50	55
CSXi-037	25	—	60	75	25	50	60	68
CSXi-045	30	60	75	85	30	60	75	78
CSXi-055	—	75	100	100	40	75	100	100
CSXi-075	50	100	125	140	50	100	125	133
CSXi-090	60	125	150	170	60	125	150	157
CSXi-110	75	150	200	200	—	150	—	186

Ratings are based on 6 second start time at 400% FLC.
Contact us for other duty ratings or for help with sizing.

Other solutions

AuCom offers a complete range of soft starters. Whether you need a simple product for starting only, or a comprehensive motor control center you can trust AuCom to offer a product to match.

	Soft Start	Motor Protection	Advanced Interface	Internal Bypass	Current Range	Voltage Range
EMX3	•	•	•	•	≤ 1600 A	≤ 690 VAC
MVE Series	•	•	•	•	≤ 1200 A	≤ 15 kV



We've got you covered

AuCom's expertise and knowledge extends well beyond the products we make. We're about helping you achieve efficient and effective control of your machines and processes no matter what the industry or application.



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