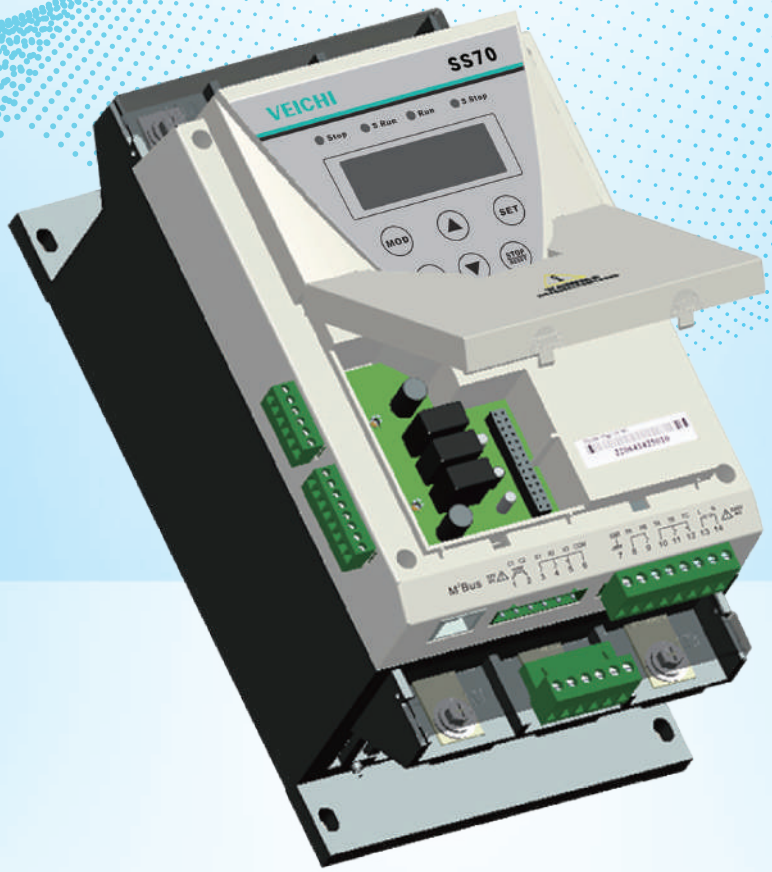
VEICHI

SS70 Series

Intelligent Soft Starter with Built-in Bypass



Stock Code: 688698

About us



Since its inception, VEICHI Electric (Stock Code: 688698) has been a pioneer in electrical transmission and industrial control, specializing in the research, development, production, and distribution of advanced industrial automation products. It serves a global clientele, delivering competitive, secure, and reliable solutions across multiple regions with R&D centers and production facilities in Suzhou, Shenzhen, and Xi'an, along with a wholly-owned subsidiary in India.

The comprehensive product portfolio, including AC drives, servo systems, and control systems, is widely applied in various industries, providing tailored solutions that drive the digital and intelligent transformation of modern manufacturing. Additionally, we are expanding into emerging fields such as robotics, new energy, and medical technologies, offering innovative products like coreless motors, frameless motors, photovoltaic storage inverters, and surgical power systems.

Along the way, VEICHI has developed a robust suite of proprietary technologies with relentless efforts on motors such as vector control, HF injection control, parameter auto-tuning, motor protection, start-up fly track, high-speed weak magnet control, scalar V/F control, high-density water-cooled layout, and IGBT protections. As of September 30, 2024, we hold 222 authorized patents, including 54 invention patents.

And in consequence, it has reaped prestigious accolades, including the third batch of "Specialized, Elaborative, Characteristic, and Emerging 'Little Giant' Enterprise", "High-Tech Enterprise", "High and New Technology Enterprise'', "Jiangsu Provincial Engineering Technology Research Center", "Jiangsu Provincial Enterprise Technology Center", and "Jiangsu Province Industrial Internet Development Demonstration''.

Looking ahead, VEICHI remains unwavering in its commitment to a market-driven and cutting-edge technological innovation. By prioritizing breakthroughs in core technologies, it aims to expand into high-performance, high-quality, and high-reliability applications and drives transformative progress that shapes the future of the electrical transmission and industrial control.

2005
- Business started in Shenzhen
- First generation of drive on the market

2013
- Suzhou Veichi Electric Co., Ltd established
- First generation of servo system on the market

2014
- Suzhou Veichi first-stage project put into construction

2016
- Suzhou Veichi first-stage project put into operation
- First generation of motion control system on the market

2019
- Veichi restructured to a company limited by shares
- Indian subsidiary established

2020
- A-share science and technology innovation board landing successfully
- Veichi honored with Jiangsu Province Specialized and Sophisticated Enterprise That Produces New and Unique Products

2021
- Veichi subsidiary corporation established
- Veichi honored with national -level Specialized and Sophisticated Enterprise That Produces New and Unique Products

2022
- Xi'an R&D center established
- Veichi digital energy subsidiary corporation established

2023
- Suzhou Veichi second-stage project put into operation
- Suzhou Veichi third-stage project put into construction
- Veichi medical facility subsidiary established

2024
- Intelligent manufacturing factory and digital transformation project successfully closed down

Product Profile



SS70 Series Intelligent Soft Starter with Built-in Bypass

Harnessing the latest advancements in power electronics and microprocessor technology, SS70 is powered by a high-performance DSP core, which ensures real-time performance, superior control, and enhanced safety for your motor control systems.

They are widely used and adaptable, not only for all kinds of general-purpose machineries, such as fans and pumps, but also for conveyor belts, compressors, crushers, and other occasions with heavy loads that require fast response. It also reduces energy consumption through intelligent control to lower long-term operating costs.

Product Feature

Built-in components
No additional bypass contactor required

Compact structure
Advanced integration technology to greatly optimize the spatial layout

Various starting methods
Three starting methods of current limit, current ramp, and voltage ramp available for different applications

Perfect motor protection
Phase loss, over-voltage, under-voltage, overload, over-heat, over-current, current imbalance, start-up timeout, etc. to ensure all-round motor protection



Multi-language interaction
User-friendly interface with multiple language options, and more for customization

Eacy installation
Three-in-three-out main circuit wiring to save installation time and cost to a great extent

IOT communication
Communication function to the upper computer control system with the optional IOT cloud box to realize the icould equipment management

Special soft stopping
Dramatic improvement of motor operating performance, maintenance costs, and motor life extension, and “water hammer” and mechanical shock in water treatment

Naming Rules

SS70 — 008 — 40

Product Series:
SS70

Rated Power:
008: 7.5kW
055: 55kW
315: 315kW

Voltage Level:
40V~380V
46V~460V
69V~690V

Typical Application

It is widely used in three-phase asynchronous motors in the fields of municipal engineering, mining, metallurgy, petroleum, chemical industry, electric power, construction, papermaking, water conservancy and so on.







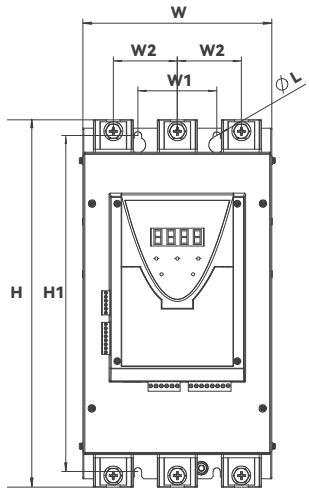


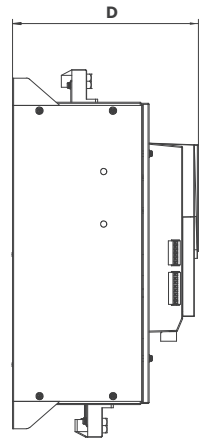

Technical Specifications

Standards		GB14048.6-2016（IEC947-4-2）
Motor type		Three-phase asynchronous motor
Motor power		11A ~ 1260A(5.5kW~630kW)
Input	Control voltage	AC220V±15%，50Hz/60Hz；AC110V±15%
	Rated voltage	AC380V±15%，50Hz/60Hz；AC660V±15%；AC460V±15%
Start time		1s~120s
Stop time		1s~120s
Control mode		Voltage ramp, current ramp and current limit
I/O	DI	3(X1~X3)
	AO	1 (4mA~20mA/0V~10V)
	RO	2
	Command source	Keypad, terminals and RS485 communication
Communication	Communication protocol	1×standard Modbus protocol
Display	LCD display	Display current, voltage, alarm and other motor parameters
Protection and Monitoring		Short-circuit, over-voltage, overload, under-voltage, phase loss, over-current, and overheat
Environment	Working environment	Indoors without corrosive gases that destroy metals and insulating materials No direct sunlight, no combustible gas, oil mist, dripping water, salt, etc.
	Altitude	Derate 0.5% of the rated current for every 100m increase when above 1000m
	Working temperature	-10℃ ~ +40℃. Derate 2% of the rated current for every 1℃ increase when above 40℃
	Humidity	<95%RH, no condensation
	Vibration	<5.9m/s^2(0.6g)
	Storage temperature	-40℃ ~ 70℃
Structure	Protection level	IP20
	Cooling method	Radiator, natural cooling
Installation method		Vertical mounting in cabinet

Installation Dimensions

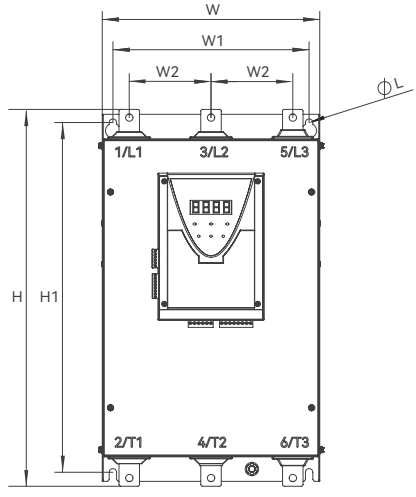


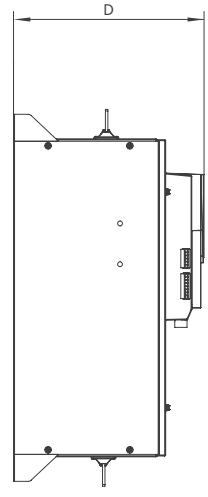




Type	Power	H	W	D	W1	H1	W2	L
M-SG-01	22kW	278	150	143	127	259	45	Φ7
M-SG-02	30-45kW	350	180	177	75	320	61	Φ7
M-SG-03	55-75kW	380	224	193	200	353	71	Φ7







Type	Power	H	W	D	W1	H1	W2	L
M-SG-04	90-110kW	461	266	233	240	428	100	Φ9
M-SG-05	132-250kW	790	320	309	260	745	100	Φ11
M-SG-06	280-630kW	939	330	379	270	850	82	Φ11

Models and Specifications

SS70-380V

Model	Rated Power (kW)	Rated Current (A)	Case Model	Outer Dimensions		
				H	W	D
SS70-006-40	5.5	15	M-SS-01	278	150	158
SS70-008-40	7.5	22	M-SS-01	278	150	158
SS70-011-40	11	27	M-SS-01	278	150	158
SS70-015-40	15	30	M-SS-01	278	150	158
SS70-018-40	18.5	34	M-SS-01	278	150	158
SS70-022-40	22	38	M-SS-01	278	150	158
SS70-030-40	30	65	M-SS-02	350	180	177
SS70-037-40	37	70	M-SS-02	350	180	177
SS70-045-40	45	88	M-SS-02	350	180	177
SS70-055-40	55	110	M-SS-03	380	224	193
SS70-075-40	75	140	M-SS-03	380	224	193
SS70-090-40	90	172	M-SS-04	461	266	233
SS70-110-40	110	200	M-SS-04	461	266	233
SS70-132-40	132	280	M-SS-05	790	320	309
SS70-160-40	160	320	M-SS-05	790	320	309
SS70-185-40	185	355	M-SS-05	790	320	309
SS70-200-40	200	380	M-SS-05	790	320	309
SS70-220-40	220	440	M-SS-05	790	320	309
SS70-250-40	220	480	M-SS-05	790	320	309
SS70-280-40	280	560	M-SS-06	939	330	379
SS70-315-40	315	600	M-SS-06	939	330	379
SS70-355-40	355	700	M-SS-06	939	330	379
SS70-400-40	400	780	M-SS-06	939	330	379
SS70-450-40	450	820	M-SS-06	939	330	379
SS70-500-40	500	960	M-SS-07Cabinet	1000	1200	2200
SS70-550-40	550	1032	M-SS-07Cabinet	1000	1200	2200
SS70-630-40	630	1100	M-SS-07Cabinet	1000	1200	2200

Models and Specifications

SS70-460V

Model	Rated Power (kW)	Rated Current (A)	Case Model	Outer Dimensions		
				H	W	D
SS70-006-46	5.5	9	M-SS-02	350	180	177
SS70-008-46	7.5	12	M-SS-02	350	180	177
SS70-011-46	11	17	M-SS-02	350	180	177
SS70-015-46	15	23	M-SS-02	350	180	177
SS70-018-46	18.5	29	M-SS-02	350	180	177
SS70-022-46	22	34	M-SS-02	350	180	177
SS70-030-46	30	46	M-SS-02	350	180	177
SS70-037-46	37	57	M-SS-02	350	180	177
SS70-045-46	45	70	M-SS-02	350	180	177
SS70-055-46	55	85	M-SS-02	350	180	177
SS70-075-46	75	116	M-SS-03	380	224	193
SS70-090-46	90	139	M-SS-03	380	224	193
SS70-110-46	110	170	M-SS-04	461	266	233
SS70-132-46	132	205	M-SS-04	461	266	233
SS70-160-46	160	248	M-SS-05	790	320	309
SS70-185-46	185	287	M-SS-05	790	320	309
SS70-200-46	200	310	M-SS-05	790	320	309
SS70-220-46	220	341	M-SS-05	790	320	309
SS70-250-46	250	387	M-SS-05	790	320	309
SS70-280-46	280	434	M-SS-05	790	320	309
SS70-315-46	315	488	M-SS-06	939	330	379
SS70-355-46	355	550	M-SS-06	939	330	379
SS70-400-46	400	620	M-SS-06	939	330	379
SS70-450-46	450	697	M-SS-06	939	330	379
SS70-500-46	500	775	M-SS-07Cabinet	1000	1200	2200
SS70-550-46	550	852	M-SS-07Cabinet	1000	1200	2200
SS70-630-46	630	976	M-SS-07Cabinet	1000	1200	2200

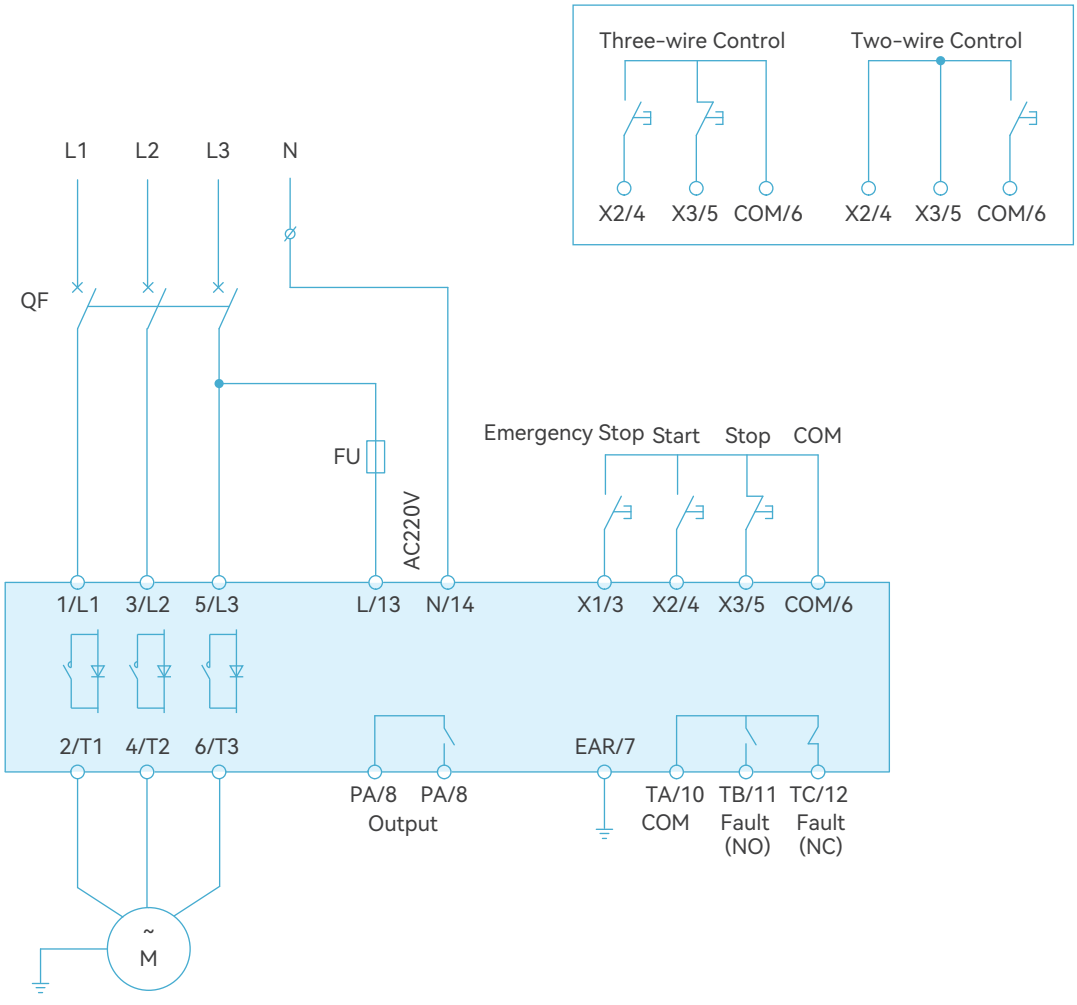
Models and Specifications

SS70-690V

Model	Rated Power (kW)	Rated Current (A)	Case Model	Outer Dimensions		
				H	W	D
SS70-006-69	5.5	6	M-SS-02	350	180	177
SS70-008-69	7.5	8	M-SS-02	350	180	177
SS70-011-69	11	11	M-SS-02	350	180	177
SS70-015-69	15	15	M-SS-02	350	180	177
SS70-018-69	18.5	19	M-SS-02	350	180	177
SS70-022-69	22	23	M-SS-02	350	180	177
SS70-030-69	30	31	M-SS-02	350	180	177
SS70-037-69	37	38	M-SS-02	350	180	177
SS70-045-69	45	46	M-SS-02	350	180	177
SS70-055-69	55	57	M-SS-02	350	180	177
SS70-075-69	75	77	M-SS-02	350	180	177
SS70-090-69	90	93	M-SS-03	380	224	193
SS70-110-69	110	114	M-SS-03	380	224	193
SS70-132-69	132	136	M-SS-04	461	266	233
SS70-160-69	160	165	M-SS-04	461	266	233
SS70-185-69	185	191	M-SS-04	461	266	233
SS70-200-69	200	207	M-SS-05	790	320	309
SS70-220-69	220	227	M-SS-05	790	320	309
SS70-250-69	250	258	M-SS-05	790	320	309
SS70-280-69	280	289	M-SS-05	790	320	309
SS70-315-69	315	325	M-SS-05	790	320	309
SS70-355-69	355	367	M-SS-05	790	320	309
SS70-400-69	400	413	M-SS-05	790	320	309
SS70-450-69	450	465	M-SS-05	790	320	309
SS70-500-69	500	517	M-SS-06	939	330	379
SS70-550-69	550	568	M-SS-06	939	330	379
SS70-630-69	630	651	M-SS-06	939	330	379
SS70-710-69	710	733	M-SS-07Cabinet	1000	1200	2200

Wiring

SS70 Series Intelligent Soft Starter with Built-in Bypass



Note:
SS70 built-in bypass intelligent soft starter adopts two kinds of start-stop control methods from the keypad and terminals (two-wire and three-wire). 1. Two-wire control is a holding signal and three-wire control is a trigger signal.
1. The keypad is invalid with 2-wire control.
2. The keypad is valid with 3-wire control.
3. X3 and COM must be kept closed when the keypad is valid.
4. Terminal signal valid when >200ms

R&D and Manufacturing

R&D Capacity

- Excellent professional and technical talents in the field of industrial control in China have gathered in VEICHI with R&D personnel accounting for 37.16% of the total employees, while technical personals with bachelor's degrees or above for 75.19%.
- VEICHI is always committed to providing customers with stable and trustworthy products and technical services in accordance to the research and development concept of "strive for excellence by innovating technologies".
- Annual R&D investment of accounts for about 10% of the whole revenue. EMC laboratory, safety laboratory, reliability laboratory, product performance testing laboratory and a number of experimental platforms for multiple industrial applications are established successively.
- In-depth cooperation with many famous universities and research institutions in China has been established and "Jiangsu Postdoctoral Innovation Practice Base" and "Jiangsu Postgraduate Workstation" set up successively.

Intelligent Automation Production

- Products are based on digital technologies from the beginning of product development, to production programming and then production, that is the whole production cycle, with an annual output up to 914,600 units.
- 5 fully imported MT high-speed chip mounting lines, 5 automatic coating lines, 4 DIP testing lines, 1 automated line equipped with robotic arms, 12 production lines ensure production of all of the VEICEHI products.
- All of the products are checked by the quality management mode of 3 (tri-inspection system)+ 1(proportional inspection) during the whole process, and all of them are carried out automatically so as to ensure the performance.
- Three major production management system WMS, MES and ERP together ensure that the unique code of each product is traceable in the system to manage product quality.






ISO9001:2015
ISO14001:2015
ISO45001:2018

Full series with CE certification

Dedicated products with 3C certification

Customized products with RoHS2.0 certification

Measurement Management System AAA certification

5-star after-sales service certification

QC080000 Management System

VEICHI

Suzhou Veichi Electric Co.,Ltd

No.1000 Songjia Road,Guoxiang street,Wuzhong
Economic and Technological Development Zone
Tel:+86-512-6617 1988 Fax:+86-512-6617 3610
Facebook:https://www.facebook.com/veichigroup
WhatsApp: +86-138 2881 8903
Https://www.veichi.com

Official Website

Version:Y5/2-04

Any contents in this book are subject to change without notice. Veichi Electric Co., Ltd all rights reserved, reproduction in all its forms is strictly prohibited.