

交流输入电抗器 (ACR) AC Input Reactor

■ 产品概述 (Product Introduction)

进线电抗器可被用于给线路电源提供改进的过载保护,并能减小变频器产生的电流谐波失真。提高输入电源的功率因素,减少高次谐波,抑制变频器在电源设备上的浪涌。

Input reactors orrer overload to line power supply and reduce harmonic distortion arising from frequency inverters,also improve the input supply,reduce ultraharmonic and suppress the surge caused by frequency inverters to the power supply units.

■ 产品应用 (Product Application)

特别在下列环境下推荐使用进线电抗器:

- 1.几个变频器并联紧密连接
- 2.线路电源有来自其他设备的明显 扰动 (干扰, 过电压)
- 3.线路电源各相之间存在电压不平衡, 超过额定电压的1.8%
- 4.在同一线路上安装有大量的变频器
- 5.减小 $\cos \phi$ 校正电容器上的过载, 如果装置中含有一个功率系数校正设备

Particularly apply to the following cases:

1. Multiple frequency inverters in close parallel connection
- 2.Other devices produce interference to line power supply.(disturbance,, over voltage
- 3.Nonbalance among phases of line power supply.(1.8% over than of the rated voltage
- 4.Massive frequency inverters installed on the same line
- 5.Reduce $\cos \phi$ and correct the overload of capacitor,in case the power factor correction devices are installed in system

■ 技术规格 (Technical Specifications)

工作电压 Work Voltage:	220VAC-3300VAC
工作频率 Work Frequency:	50/60Hz.
工作电流 Work Current:	3A-1600A
绝缘等级,Insulation Class:	class F,H
防护等级,Protection class:	IP00-IP22
压降 Voltage drop:	< 4% 大于此范围会引起转矩损失
最大电流 Max Current:	1.5× rated current, Constant 60S
噪音 Noise:	≤65dB
温升 Temperature Rise:	≤85K
抗电强度 Dielectric strength:	铁芯-绕组 3000VAC/50Hz/5mA/10s无飞弧击穿(工厂测试)
绝缘电阻 Insulation Resistor:	1000VDC绝缘阻值 ≥ 100MΩ

使用环境: -10~+45 °C.额定值不会降低。最高可达+55°C, 在45°C以上,
每升高1°C, 额定电流降低2%, 海拔高度不超过2000米。

运行环境温度-25°C~+45°C, 相对湿度不超过90%。

周围无有害气体, 无易燃易爆物品。

周围环境应有良好的通风条件, 如装在柜内, 应加装通风设备。

Operation Environment:-10~+45 °C ,rated value won't lower,when higer than 55 C,
and every 1 C,the current will step down 2%, Under seal level 2000m

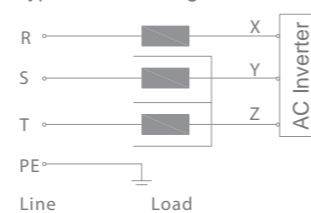
Running ambient temperature -25 °C ~ +45 °C , comparative moisture not over 90%.

No hazardous gas,no inflammables and explosives

With well-ventilated condition,ventilation devices shall be mounted if installioh in panels

典型电路图

Typical Circuit Diagram



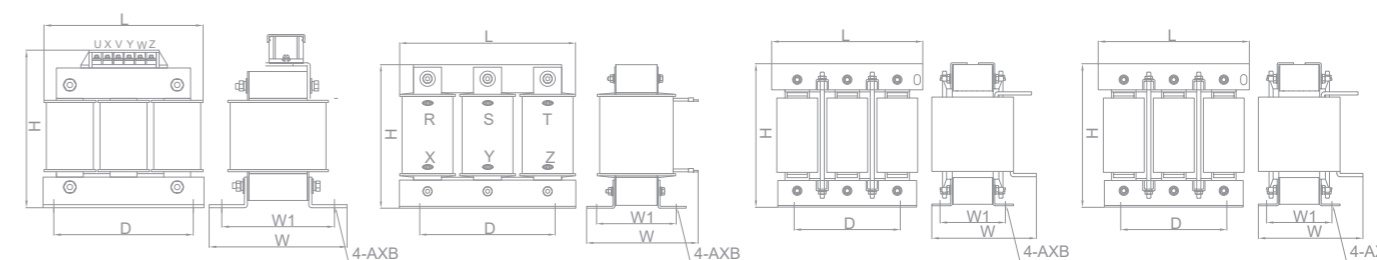
■ 执行标准 (Applicable Standards)

IEC289: 1987 Reactor

GB10229-88 Reactor (eqvIEC289: 1987)

JB9644-1999 Reactors used for semiconductor electrical driving

■ 产品尺寸图 (Product Size)



Picture A

Picture B

Picture C

Picture D

380V输入电抗器 380V AC Input Reactor

电抗器型号 Reactor Type	图号 Picture NO.	适配功率 Power (kw)	额定电流 Rated Current(A)	电感量 Inductance Value(mH)	压降 Voltage Drop	绝缘等级 Insulation rank	尺寸 Dimension(±5mm)					
							L	D	W	W1	H	AxB
ACR-0005-2M80-0.4SC	图 A Picture A	1.5	5	2.8	2%	F、H	115	90	95	70	135	6X11
ACR-0007-2M00-0.4SC		2.2	7	2	2%	F、H	115	90	95	70	135	6X11
ACR-0010-1M40-0.4SC		3.7	10	1.4	2%	F、H	115	90	95	70	135	6X11
ACR-0015-0M94-0.4SC		5.5	15	0.94	2%	F、H	115	90	95	70	135	6X11
ACR-0020-0M70-0.4SC	图 B Picture B	7.5	20	0.7	2%	F、H	115	90	95	70	135	6×15
ACR-0030-0M47-0.4SC		11	30	0.47	2%	F、H	155	95	130	63	135	6×15
ACR-0040-0M36-0.4SC		15	40	0.36	2%	F、H	155	95	135	76	135	6×15
ACR-0050-0M28-0.4SC		18.5	50	0.28	2%	F、H	155	95	135	76	135	6×15
ACR-0060-0M24-0.4SC	图 C Picture C	22	60	0.24	2%	F、H	195	120	135	72	165	8.5×20
ACR-0080-0M18-0.4SC		30	80	0.18	2%	F、H	195	120	155	92	165	8.5×20
ACR-0090-0M16-0.4SC		37	90	0.156	2%	F、H	195	120	155	92	165	8.5×20
ACR-0120-0M12-0.4SA		45	120	0.117	2%	F、H	230	150	170	83	220	11×18
ACR-0150-094U-0.4SA	图 D Picture D	55	150	0.094	2%	F、H	230	150	170	88	220	11×18
ACR-0200-070U-0.4SA		75	200	0.07	2%	F、H	250	182	175	98	230	11×18
ACR-0250-056U-0.4SA		110	250	0.056	2%	F、H	250	182	175	98	230	11×18
ACR-0290-048U-0.4SA		132	290	0.048	2%	F、H	290	214	200	102	250	11×18
ACR-0330-042U-0.4SA	图 D Picture D	160	330	0.042	2%	F、H	290	214	200	102	250	11×18
ACR-0390-036U-0.4SA		185	390	0.036	2%	F、H	290	214	205	107	250	11×18
ACR-0490-028U-0.4SA		220	490	0.028	2%	F、H	320	243	230	124	320	12×20
ACR-0600-024U-0.4SA		280	600	0.024	2%	F、H	320	243	250	140	320	12×20
ACR-0660-022U-0.4SA	图 D Picture D	300	660	0.022	2%	F、H	320	243	250	140	320	12×20
ACR-0800-17U5-0.4SA		380	800	0.0175	2%	F、H	365	260	280	135	390	15×25
ACR-1000-014U-0.4SA		450	1000	0.014	2%	F、H	365	260	280	139	410	15×25
ACR-1200-11U7-0.4SA		550	1200	0.0117	2%	F、H	395	260	340	160	390	15×25
ACR-1600-08U6-0.4SA		630	1600	0.0086	2%	F、H	395	260	340	160	435	15×25

备注: 其他规格尺寸, 可根据用户要求制造。Remark: Dimension can be customization

电抗器型号 Reactor Type	图号 Picture NO.	适配功率 Power (kw)	额定电流 Rated Current(A)	电感量 Inductance Value(mH)	压降 Voltage Drop	绝缘等级 Insulation rank	尺寸 Dimension(±5mm)					
							L	W	H	D	W1	A×B
ACR-0005-5M60-0.7SC	图 A Picture A	3.7	5	5.6	2%	F、H	155	80	180	95	61	6X15
ACR-0007-4M00-0.7SC		5.5	7	4	2%	F、H	155	80	180	95	61	6X15
ACR-0010-2M80-0.7SC		7.5	10	2.8	2%	F、H	155	80	180	95	61	6X15
ACR-0015-1M87-0.7SC		11	15	1.87	2%	F、H	155	91	180	95	76	6X15
ACR-0020-1M40-0.7SC	图 B Picture B	15/18.5	20	1.4	2%	F、H	155	91	180	95	76	6X15
ACR-0030-0M93-0.7SC		22	30	0.93	2%	F、H	195	140	165	120	92	8.5X20
ACR-0040-0M70-0.7SC		30	40	0.7	2%	F、H	195	145	165	120	92	8.5X20
ACR-0050-0M56-0.7SA		37/45	50	0.56	2%	F、H	195	150	165	120	92	8.5X20
ACR-0060-0M47-0.7SA	图 C Picture C	55	60	0.47	2%	F、H	200	180	165	120	110	8.5X20
ACR-0080-0M35-0.7SA		75	80	0.35	2%	F、H	250	200	230	182	94	11X18
ACR-0090-0M31-0.7SA		90	90	0.31	2%	F、H	250	200	230	182	94	11X18
ACR-0120-0M23-0.7SA		110	120	0.23	2%	F、H	250	190	230	182	113	11X18
ACR-0150-0M19-0.7SA	图 D Picture D	132	150	0.19	2%	F、H	290	210	250	214	112	11X18
ACR-0200-0M14-0.7SA		160/185	200	0.14	2%	F、H	290	220	250	214	122	11X18
ACR-0250-0M11-0.7SA		220	250	0.11	2%	F、H	290	220	250	214	122	11X18
ACR-0290-096U-0.7SA		240	290	0.096	2%	F、H	320	250	285	243	134	11X18
ACR-0330-085U-0.7SA	图 D Picture D	280/300	330	0.085	2%	F、H	320	250	285	243	150	11X18
ACR-0390-072U-0.7SA		380	390	0.072	2%	F、H	320	260	320	243	150	11X18
ACR-0490-057U-0.7SA		450	490	0.057	2%	F、H	380	300	340	260	160	15X25
ACR-0600-047U-0.7SA		550	600	0.047	2%	F、H	380	320	340	260	184	15X25
ACR-0660-042U-0.7SA		630	660	0.042	2%	F、H	380	320	340	260	186	15X25

备注：其他规格尺寸，可根据用户要求制造。Remark: Dimension can be customization

成品识别码 (Product Identification Code)

ACR	-	0060	-	0M24	-	0.4SC
输入电抗器 AC Input Reactor		额定电流 Rated Current 3A-1600A		电感量 Resistance Value M:mH U:uH		0.4:Working Voltage 0.2=220V,0.4=380V,0.7=690V,1.1=1140V S: D=Single Phase Reactor S=Three Phase Reactor C: C=Copper A:Aluminium



交流输出电抗器 (OCR) AC Output Reactor

产品概述 (Product Introduction)

安装在变频器输出端，用于限制变频器与电机连接电缆的容性充电电流，钝化变频器输出的PWM波的电压上升率。电机电缆长度超过一定值时，建议在变频器与电机之间插入一个电机电抗器。用于补偿在长导线时的电容再充电电流。此最大长度决定于变频器的额定值以及电机电缆的类型。

Installed at the output end of the frequency converter, it is used to limit the capacitive charging current of the cable connecting the frequency converter and the motor, and to passivate the voltage rise rate of the PWM wave output by the frequency converter. When the length of the motor cable exceeds a certain value, it is recommended to insert a motor reactor between the

产品应用 (Product Application)

- 1.将dv/dt限制到500V/us
- 2.将电机端子上的过电压限制到：1000V至400V~(rms值) 1150V至460V~(rms值)
- 3.打开滤波器与电机之间的接触器所引起的滤波器干扰
- 4.减小电机接地泄漏电流

- 1.Limit dv / dt to 500V/us
- 2.Limit the overvoltage of motor terminal to: 1000V to 400V ~ (rms) 1150V to 460V ~ (rms)
- 3.Filter interference caused by opening the contactor between the filter and the motor
- 4.Reduce the earth leakage current of motor

技术规格 (Technical Specifications)

- 1.工作电压：220VAC-3300VAC
- 2.工作频率：50/60Hz.
- 3.额定电流：3A-1600A
- 4.载波频率：2-8KHz.
- 5.绝缘等级：class F,H
- 6.使用环境：-10~+45℃,额定值不会降低。最高可达+55℃,在45℃以上,每升高1℃,额定电流降低2%
- 7.防护等级：IP00-IP22
- 8.压降：<4% 大于此范围会引起转矩损失
- 9.最大电流：1.5×额定电流,持续60S
- 10.噪音：≤65dB
- 11.温升：≤85K
- 12.抗电强度：铁芯-绕组 3000VAC/50Hz/5mA/10s无飞弧击穿(工厂测试)
- 13.绝缘电阻：1000VDC绝缘阻值≥100MΩ
- 14.海拔高度不超过2000米。
- 15.运行环境温度-25℃~+45℃,相对湿度不超过90%。
- 16.周围无有害气体,无易燃易爆物品。
- 17.周围环境应有良好的通风条件,如装在柜内,应加装通风设备。

- 1.Work voltage: 220VAC-3300VAC
- 2.Work frequency: 50/60Hz.
- 3.Work current: 3A-1600A
- 4.Carrier frequency :2-8KHz
- 5.Insulation class: class F, H
- 6.Operation Environment:-10℃+45℃,rated value won't lower,when higer than 45℃,and every 1℃,the current will step down 2%
- 7.Protection class: IP00-IP22
- 8.Voltage drop: <4% higher than the range will cause the loss of torque
- 9.Max Current: 1.5 × Rated current,continuous 60S
- 10:Noise: ≤ 65dB
- 11.Temperature Rise: ≤ 85K
- 12 Dielectric strength: Core Coil 3000VAC/50Hz/5mA/10s no electric arcing puncture (factory test)
- 13.Insulation Resistor: 1000VDC insulation resistance value ≥ 100MΩ
- 14.Under seal level 2000m
- 15.Running ambient temperature -25℃~+45℃, comparative moisture not over 90%.
- 16.No hazardous gas,no inflammables and explosives
- 17.With well-ventilated condition,ventilation devices shall be mounted if installation in panels

典型电路图
Typical Circuit Diagram

