9 Fault processing

9.1 Meanings of the fault alarm codes and countermeasures

No.	Code	Name	Causes	Countermeasures
1	Er-EEP	EEPROM fault	1. EEPROM is damaged	1. Replace the drive
2	Er-Ec1	Encoder line break fault 1	1. The encoder is not connected 2. The encoder connector becomes loose 3. The line of one of the U, V, W phases of the encoder signal cable is broken	1. Connect the encoder 2. Check the encoder connector or replace the encoder cable 3. Replace the encoder cable
3	Er-Ec2	Encoder fault 2	1. Reversed A/B phase of the encoder 2. The line of one of the A, B, Z phases of the encoder signal cable is broken	1. Check that the phases of the encoder are wired correctly 2. Replace the encode cable
4	Er-iTE	Current test fault	1. The current sensor or test circuit is abnormal 2. Powered on when the motor shaft is in a non-stationary state	1. Replace the drive 2. Never power on when the motor shaft is rotating
5	Er-oc1	Hardware overcurrent fault	1. U, V, W phases of the motor are connected reversely 2. Inappropriate parameters cause system divergence 3. Too short ACC/DEC time during starting/stopping 4. Too large instant load	1. Check that the phases of the motor cable are connected correctly 2. Adjust the loop parameters to stabilize the system. Adjust the value of FP0.12 smaller 3. Set the ACC/DEC time appropriately longer 4. Replace with a drive of higher power

No.	Code	Name	Causes	Countermeasures
6	Er-oc2	Line-to-ground short circuit fault	1. One of U, V, W phases of the motor cable is shorted to the ground	Replace the motor cable or test if the motor insulation is aged
7	Er-ou	Overvoltage fault	1. The grid voltage is high 2. The braking resistor is not connected 3. The braking transistor is damaged 4. Too short ACC/DEC time during starting/stopping	1. Test the input voltage of the grid 2. Check if the built-in braking resistor shorting wiring becomes loose, or check if the built-in braking resistor is damaged 3. Replace the drive 4. Set the ACC/DEC time longer
8	Er-uu	Undervoltage fault of the main bus	1. The grid voltage is low 2. The powering-up snubber relay has not picked up	1. Test the input voltage of the grid 2. Replace the drive
9	Er-uu1	Undervoltage fault of the control bus	1. The grid voltage is low 2. The powering-up snubber relay has not picked up	1. Test the input voltage of the grid 2. Replace the drive
10	Er-oL	Overload fault	1. Run overload for a long period of time 2. The load is too heavy in a short period of time	1. Replace with the drive and motor of higher power 2. Replace with the drive and motor of higher power
11	Er-LnE	Line abnormality fault	1. U, V, W phases of the motor are connected reversely	1. Check that the phases of the motor cable are connected correctly
12	Er-oS	Overspeed fault	1. The motor speed is too high 2. Overspeed of the motor.	1. Replace with a motor of higher speed or check the parameter settings

No.	Code	Name	Causes	Countermeasures
			U, V, W phases of the motor are connected reversely	2. Check that the phases of the motor cable are connected correctly
13	Er-oH1	Drive overtemperature fault	1. The temperature of the IGBT module of the drive is too high	1. Improve the ventilation or replace with a servo drive of higher power
14	Er-oE	Over-pulse fault	1. Number of the retention pulses is too large	1. Set the gain parameters of the position loop higher or set the position feed-forward gain higher
15	Er-cTE	Communication fault	1. Too high communication fault rate 2. Communication disconnecting	1. Try to decrease the communication interference 2. Check the connection of the communication cable
16	Er-oT	Write/read overtime fault	1. Overtime when reading/writing EEPROM 2. Damaged EEPROM	1. Replace the drive 2. Replace the drive
17	Er-bcE	Brake overload fault	1. The power of the built-in braking resistor is relatively low 2. The power of the external braking resistor is relatively low	1. Connect an external braking resistor of higher power 2. Replace with a braking resistor of higher power
18	Er-iPo	IPM module fault	1. IPM module detects out overcurrent or undercurrent	1. Adjust FP0.12 smaller to decrease the maximum output torque or replace with a drive of higher power
19	Er-dP	Power supply input phase loss	3-phase input power supply is phase loss or	Check the input voltage or the wire is loose or

No.	Code	Name	Causes	Countermeasures
			seriously uneven.	disconnected.
20	Er-INE	Inertia identification fault	1.Vibration in stopping exceeds 3.5s 2. Too short ACC time 3. The identification speed is below 150r/min	1.Improve the mechanical rigidity 2.Prolong FP1.07 3.Increase FP1.06
21	Er-DrE	Motor parameters matching fault	Wrong FP0.00 setting	Ensure the motor model and the drive model

9.2 Meanings of the warning codes

No.	Warning	Name	Description
1	AL-LT1	Forward travel limit warning	This warning signal is generated when forward travel is limited (PSL terminal disconnects)
2	AL-LT2	Reverse travel limit warning	This warning signal is generated when reverse travel is limited (RVL terminal disconnects)
3	AL-EST	Emergency stop warning	This warning signal is generated when the emergency stop button acts (EMG terminal disconnects)
4	AL-Pof	Low voltage of the main circuit warning	This warning signal is generated when the bus voltage is too low.
5	AL-cTE	Communication abnormality warning	In the case of communication overtime or abnormal, if Pc.26=1, this warning signal is generated.

See chapter 5.2.6 for the detailed method to clear the alarm or warning display when a fault alarm or warning occurs.