## 14.1. Fault codes

Display	Meaning	Possible causes
LP	Low pressure protection is active	Low refrigerant charge (gas leak)
		Pressure transducer fault
		EEV malfunction or disconnected
		Lack of water flow
HP	High pressure protection is active	Pressure transducer fault
		EEV malfunction or disconnected
		Outdoor coil blocked (by leaves, paper, etc.)
		Outdoor fan malfunction
OL	Overload protection (input IN#2 is	Check overload switches (if used)
	open circuit)	
FREEZE	Water freeze protection is active	Insufficient water flow
		Water temperature sensors dislocated
HI-t	High temperature protection is active	Low refrigerant charge (gas leak)
		Compressor suction gas temperature sensor
		dislocated
		EEV malfunction or disconnected
HI-SL	High suction line temperature	Low refrigerant charge (gas leak)
	protection is active	Compressor suction gas temperature sensor
		dislocated
		EEV malfunction or disconnected
Lo-dSH	Low discharge superheat protection	EEV malfunction or disconnected
	active	Incorrect EEV operating mode selected
		Excess refrigerant charge
Hi-dSH	High discharge superheat protection	Low refrigerant charge (gas leak)
	active	Compressor suction gas temperature sensor
		dislocated
		EEV malfunction or disconnected
CRL	Low compression ratio protection	The compressor does not start
CRH	High compression ratio protection	Pressure transducer fault
		EEV malfunction or disconnected
		Indoor fan or controller malfunction
diFF-P	The pressure differential is too high	Incorrect DIP switch settings
	for the inverter compressor to start	Pressure transducer fault
		EEV malfunction or disconnected

Display	Meaning	Possible causes
F12	Low pressure transducer fault	Transducer cable disconnected
		Faulty transducer
		Complete loss of refrigerant (gas leak)
F13	High pressure transducer fault	Transducer cable disconnected
		Faulty transducer
		Complete loss of refrigerant (gas leak)
F14	Suction line temperature sensor fault	Sensor cable disconnected
F15	Discharge line temperature sensor fault	Sensor cable disconnected
F16	De-ice temperature sensor fault	Sensor cable disconnected
F17	Leaving water temperature sensor fault	Sensor cable disconnected
F18	Entering water temperature sensor fault	Sensor cable disconnected
F19	Outdoor ambient temperature sensor fault	Sensor cable disconnected
F20	Superheat is unknown	Missing sensor
F22	BMS fault	Loss of serial communications
F23	Slave #1 communications fault	Loss of serial communications
F24	Slave #2 communications fault	Loss of serial communications
F25	Slave #3 communications fault	Loss of serial communications
F26	Invalid DIP switches setting	
F29	Microcontroller too hot	Inadequate electrical box ventilation
F30	Supply voltage out of bounds	Electrical short circuit / overload
F31	Slave fault	A slave system is reporting a fault
F32	Internal fault	UC8 circuit board malfunction
F33	High discharge superheat protection	Loss of refrigerant (gas leak)
		Faulty transducer
		EEV malfunctioning or disconnected
F34	Pressures not equalising	Pressure transducer connections
		swapped
		Incorrect pressure transducer fitted
		EEV malfunctioning or disconnected
F35	Reverse cycle valve fault	Reverse cycle valve disconnected
F39	Variable speed compressor driver reports a fault	Check inverter driver
F42	Evaporating temperature too high	EEV malfunctioning or disconnected
F43	Condensing temperature too low	EEV malfunctioning or disconnected
F44	Invalid EEV mode selection	Incorrect DIP switch setting
F45	Low evaporating temperature	Not in use
F46	No communications with the 6-	Wires disconnected.
	temperature board (6TB)	

## 14.2. Inverter fault codes

The following set of fault codes relate to the Power+ compressor driver.

The fault code shown on the controller is F100 plus the alarm code as reported by the Power+ driver. For detailed information about the Power+ alarm codes refer to the **Carel Power+ speed drive user manual**, **chapter 8.3: Alarms table**. A brief summary follows here:

Display	Meaning	Possible causes
F100	No communications between Power+ driver	No power to the driver
	and UC8	Communications cable disconnected
		Driver incorrect DIP switch settings
F101	Motor over-current	Incorrect compressor model selected
		Insufficient airflow
		Fan malfunction
F102	Motor overload	
F103	Over-voltage	Mains supply voltage too high
F104	Under-voltage	Mains supply voltage too low
F105	Drive too hot	Insufficient cooling of the drive
F106	Drive too cold	
F107	Drive over-current	Incorrect compressor model selected
		Insufficient airflow
		Fan malfunction
F108	Motor too hot	
F109	Reserved	
F110	Drive internal error	
F111	Incorrect parameter	Incorrect compressor model selected
F112	Excessive drive DC bus ripple	Unbalanced mains phase voltages
F113	Communication fault	Communications cable disconnected
F114	Internal fault	
F115	Auto-tuning fault	
F116	Driver is disabled (input STO is open circuit)	Wire links to the drive disconnected
F117	Motor phase fault	Loose compressor motor wire
F118	Internal fan fault	Faulty fan in the driver
F119	Speed fault	
F120	Power factor correction circuit overload	
F121	Mains input voltage too high	Mains supply voltage too high
F122	Mains input voltage too low	Mains supply voltage too low
F123	Drive internal fault	
F124	Reserved	
F125	High earth current fault	
F126	Drive processor overload	
F127	Drive memory loss	
F128	Drive overload protection	
F129	Safety intervention fault	
F197	Drive reports incorrect compressor speed	
F198	Drive and compressor mismatch	Incorrect compressor model selected
F199	Drive configuration fault	Remove mains power, then re-apply