

Object	Parameter	R/W	Modbus Table	Modbus Address	Description	Address space version	
						1.0 FWPKG 4.x	2.0 FWPKG 6.x
LOCATION							
Location				000xx			
	Aggregated warning	R	Discrete Inputs	00001	A problem is pending in whole system (Location)	YES	YES
	Aggregated error	R	Discrete Inputs	00002	A critical problem is pending in whole system (Location)	YES	YES
	Address space major version	R	Input Register	00001	= 3 (Incremented on incompatible change)	YES	CHANGED
	Address space minor version	R	Input Register	00002	= 0 (Incremented on compatible change)	YES	YES
	-	R	Input Register	00003-00009	reserved for modbus related things	YES	YES
	Dev type	R	Input Register	00010	1 - CCU-208 2 - DHW-201 (Calefa)	YES	YES
	Dev hw version	R	Input Register	00011		YES	YES
	Dev sw version	R	Input Register	00012		YES	YES
	Dev sw version minor	R	Input Register	00013		YES	YES
	Dev serial number prefix	R	Input Register	00014	= 1530	YES	YES
	Dev serial number	R	Input Register	00015-00016		YES	YES
	-	R	Input Register	00017-00019	reserved for additional device descriptors	YES	YES
	Address space major version	R/W	Holding register	00001	= 3 (Incremented on incompatible change)	YES	CHANGED
	Address space minor version	R/W	Holding register	00002	= 0 (Incremented on compatible change)	YES	YES
	Modbus slave address	R/W	Holding register	00003	Allowed values: 1 to 247 Default: 1	YES	YES
	Modbus baudrate	R/W	Holding register	00004	Allowed values: 9600, 19200, 38400, 57600 Default:19200	YES	YES
	Modbus mode	R/W	Holding register	00005	0 DISABLED 1 READ_ONLY 2 READ_WRITE 3 WRITE_WITH_PASSWORD Default: 0	YES	YES
	Location name	R/W	Holding register	00010-00025	Placeholder for 32 bytes of location description. See "working with strings" chapter for more info.	YES	YES
	Standby	R/W	Holding register	00026	0 OFF 1 ON	YES	YES
	Vacation	R/W	Holding register	00027	0 OFF 1 ON	YES	YES

ROOMS (INDOOR ZONES)							
Room 1				001xx			
	Aggregated warning	R	Discrete Inputs	00101	A problem is pending in Room	YES	YES
	Aggregated error	R	Discrete Inputs	00102	A critical problem is pending in Room	YES	YES
	Warning - low battery	R	Discrete Inputs	00103	There are one or more peripherals in the room with low battery.	YES	YES
	Error - peripheral lost	R	Discrete Inputs	00104	There are one or more peripherals in the room which are not responding.	YES	YES
	Desired temp	R	Input Register	00101	Shows the desired temperature in the room.	YES	YES
	General Heating/Cooling state (radiator underfloor integration)	R	Input Register	00102	1 IDLE 2 HEATING 3 COOLING 4 BLOCKED_HEATING 5 BLOCKED_COOLING	YES	YES
	General Heating/Cooling blocking source (radiator underfloor integration)	R	Input Register	00103	0 NONE 1 UNKNOWN 2 CONTACT 3 FLOOR_TEMP 4 LOW_ENERGY 5 AIR_TEMP 6 DEW_POINT 7 OUTDOOR_TEMP 8 FAULT (general fault, e.g. missing sensors) 9 FAULT_HTCO 10 PERIODIC_ACTIVATION The number of blocking sources is still growing. There can be another values than listed in this documentation.	YES	YES
	Air temperature	R	Input Register	00104	Current air temperature measured in the room.	YES	YES
	Floor temperature	R	Input Register	00105	Current floor temperature measured in the room.	YES	YES
	Relative humidity	R	Input Register	00106	Current humidity measured in the room.	YES	YES
	Room name	R/W	Holding register	00101 - 00116	String description (32 Bytes, UTF8, NULL terminated)	YES	FORMAT CHANGED

	Room mode	R/W	Holding register	00117	0 SCHEDULE 1 MANUAL In SCHEDULE mode, the “Room temperature setpoint” is not used and the room temperature is controlled by scheduler.	YES	YES
	Room mode override	R/W	Holding register	00118	0 NONE 1 TEMPORARY 2 VACATION_AWAY 3 ADJUST In override mode (> NONE), the “Room temperaturesetpoint” is not used. The requested temperature is corrected by user via room thermostat or mobile application. You can disable the override mode by setting this value to 0 (NONE)	YES	YES
	Room temperature setpoint	R/W	Holding register	00119	Temperature requested by user. This values is not used when - Room mode = SCHEDULE (Scheduler temperature is used) - Location.Vacation = ON (Vacation temperature is used) - Location.Standby = ON (Standby temperature is used) - Temporary mode is activated (User defined temperature is used)	YES	YES
Room 2	Same as Room 1			002xx		YES	YES
Room 3	Same as Room 1			003xx		YES	YES
...				...		YES	YES
Room 16	Same as Room 1			016xx		YES	YES
OUTDOOR ZONES							
Outdoor 1				033xx			
	Aggregated warning	R	Discrete Inputs	03301	A problem is pending in Outdoor zone	YES	YES
	Aggregated error	R	Discrete Inputs	03302	A critical problem is pending in Outdoor zone	YES	YES
	Warning - low battery	R	Discrete Inputs	03303	There are one or more peripherals in the Outdoor zone with low battery.	YES	YES
	Error - peripheral lost	R	Discrete Inputs	03304	There are one or more peripherals in the Outdoor zone which are	YES	YES
	Air Temp	R	Input Register	03301	Used for Frost protection, Cooling blocking, H/C mode switching	-	YES

	Air Temp Filtered	R	Input Register	03302	Used in Heat curve calculations, H/C blocking (to be changed)	-	YES
	Air Temp Geometrical	R	Input Register	03303	Not yet used in the code (pending issue)	-	YES
	Name	R/W	Holding Register	03301 - 03316	String description (32 Bytes, UTF8, NULL terminated)	-	YES
	Air Temp BMS Override	R/W	Holding Register	3317	Enables to put artificial externa temperature used for ITC1 INVALID ... it will not be used	-	YES
DHW CONTROLLERS							
DHW Calefa				065xx			
	Aggregated warning	R	Discrete Inputs	06501	A problem is pending in DHW	YES	YES
	Aggregated error	R	Discrete Inputs	06502	A critical problem is pending in DHW	YES	YES
	Warning - Retentive Low Energy	R	Discrete Inputs	06503		YES	YES
	Error - DHW temp high	R	Discrete Inputs	06504		YES	YES
	Error - Motor failure	R	Discrete Inputs	06505		YES	YES
	Error - DHI sensor failure (source inlet)	R	Discrete Inputs	06506		YES	YES
	Error - DHO sensor failure (source return)	R	Discrete Inputs	06507		YES	YES
	Error - DHW sensor failure	R	Discrete Inputs	06508		YES	YES
	Error - DCW sensor failure	R	Discrete Inputs	06509		YES	YES
	Desired DHW temp	R	Input Register	06501	Shows the desired temperature of the domestic hot water.	YES	YES
	State	R	Input Register	06502	1 IDLE 2 HEATING (hot water is consumed by user) 3 BYPASS (keeping heat exchanger hot for circulation) 4 BLOCKED_HEATING 5 BLOCKED_BYPASS Shows, whether the system wants to heat or to have bypass activated.	YES	YES
	Blocking source	R	Input Register	06503	Same as Heating/Cooling blocking source	YES	YES
	Circulation state	R	Input Register	06504	0 NONE (disabled) 1 IDLE 2 ON	YES	YES
	Name	R/W	Holding Register	06501 - 06516	String description (32 Bytes, UTF8, NULL terminated)	YES	FORMAT CHANGED

	Mode	R/W	Holding Register	06517	0 SCHEDULE 1 SCHEDULE_ADAPTIVE 2 ECO 3 COMFORT Eco = circulation and hot bypass are disabled Comfort = circulation and hot bypass are enabled	YES	YES
	User interface access level (calefa display lock)	R/W	Holding Register	06518	< 40 USER (user menu) >= 40 INSTALLER (inst. menu)	YES	YES
	Block request	R/W	Holding Register	06519	0 NONE 1 BLOCK_REQUEST When BLOCK_REQUEST is set, then the system blocks heating and bypass to eliminate consumption from heat supplier.	YES	YES
	Power consumption limit	R/W	Holding Register	06520		YES	YES
	DHW temp set	R/W	Holding Register	06521	Requested temperature of domestic hot water.	YES	YES
	DHW bypass temp	R/W	Holding Register	06522		YES	YES
	Circulation - Pump present	R/W	Holding Register	06523	0 DISABLED 1 ENABLED (scheduler)	YES	YES
	Circulation - Inlet temp	R/W	Holding Register	06524	When circulation is enabled and there is NO dhw consumption, then the DHW temperature is regulated to this value.	YES	YES
HCC CONTROLLERS							
HCC1				077xx			
	Aggregated warning	R	Discrete Inputs	07701	A problem is pending in ITC	-	YES
	Aggregated error	R	Discrete Inputs	07702	A critical problem is pending in ITC	-	YES
	Error - inlet sensor failure		Discrete Inputs	07703		-	YES
	Error - High temp cut-off activated	R	Discrete Inputs	07704	Safety mechanism "high temp cut-off" is activated	-	YES
	State	R	Input Register	07701	1 IDLE 2 HEATING 3 COOLING 4 BLOCKED_HEATING 5 BLOCKED_COOLING	-	YES
	Blocking source	R	Input Register	07702	Same as Heating/Cooling blocking source	-	YES
	Pump - Demand	R	Input Register	07703	1 IDLE 2 ON	-	YES
	Pump - State	R	Input Register	07704	1 IDLE 2 ON	-	YES

	Measured inlet temperature	R	Input Register	07705	Measured temperature of the inlet heating/cooling water.	-	YES
	Desired inlet temperature	R	Input Register	07706	Desired temperature of the inlet heating/cooling water. The value which the ITC regulator wants to meet.	-	YES
	Name	R/W	Holding Register	07701-07716	String description (32 Bytes, UTF8, NULL terminated)	-	YES
	Heat curve - type	R/W	Holding Register	07717	0 MANUAL 1 CALCULATED 2 UNDERFLOOR 3 RADIATORS	-	YES
	Heat curve - manual slope	R/W	Holding Register	07718	Curve slope.Used only in MANUAL	-	YES
	Heat curve - parallel displacement	R/W	Holding Register	07719	Shifts calculated temperature up/down	-	YES
	Heat curve - min inlet	R/W	Holding Register	07720	Lowest possible temperature	-	YES
	Heat curve - max inlet	R/W	Holding Register	07721	Highest possible temperature	-	YES
	Heat curve - gain	R/W	Holding Register	07722	Static gain of desired temperature calculation	-	YES
	High Temp Cut-Off - Mode	R/W	Holding Register	07723	Heating is blocked, when inlet temperature exceeds the limit. Alarm is raised, pump is switched off (ignoring all pump delay). 0 DISABLED 1 ENABLED	-	YES
	High Temp Cut-Off - Temp	R/W	Holding Register	07724	Limit temperature for High Temp Cut-Off	-	YES
HCC2	same as HCC1			078xx		-	YES