

Manual BC20 Control Service Guide



To Access the following menus, with the in the OFF mode, press and hold the upper encoder (Timer Knob) until "0000" appears. Then turn the encoder till the first number of the desired code appears, and push in the knob to proceed to the next number. Continue until the code is entered and push in the knob to access the menu associated with the code.

Factory Programming: Code = 3228

Parameter Selection	Description	Default Value Setting BC20G
P-01	Temperature Unit (F/C)	F
P-02	Cool Down Temp	100F
P-03	Ready Beep	ON
P-04	Fan Reversal Time	00:00 (No reverse)
P-05	Cook Done Beeper	Yes
P-06	Delime Interval	30 Hours
P-07	Flush Interval	24 Hours
P-08	Appliance Type	Gas
P-09	Machine Type	BC20
P-10	Max Steam On Demand Time	20
P-11	Min Hot Air Set Point	140F
P-12	Man Hot Air Set Point	500F
P-13	Min Steam Set Point	85F
P-14	Max Steam Set Point	225F
P-15	Max Core Probe Pull Temp	200F
P-16	Upper Hot Air Hysteresis	2F
P-17	Lower Hot Air Hysteresis	2F
P-18	Upper Steam Hysteresis	2F
P-19	Lower Steam Hysteresis	2F
P-20	Upper Ready Band	25F
P-21	Lower Ready Band	10F
P-22	Cavity Probe Offset	0F
P-23	Core Probe Offset	-2F
P-24	Boiler Duty Cycle %	33
P-25	User Response Timeout	5
P-26	Sleep Mode Timeout	1
P-27	Counter Start Delay	2
P-28	Quench Probe	NO
P-29	SCK Address	30
P-30	Act Oven Temp Display	NO
P-31	Remote Beeper	YES
P-32	Calibrate Cavity Set Temp	CCDR/CDR
End	Exit Factory Programming	END

Manager Programming: Code = 6647

Parameter Selection	Description	Default Value Setting BC20G
P-01	Temperature Unit (F/C)	F
P-03	Ready Beep	ON
P-04	Fan Reversal Time	00:00 (No reverse)
P-05	Cook Done Beeper	Yes
P-25	User Response Timeout	5
P-26	Sleep Mode Timeout	1
P-27	Counter Start Delay	2
P-31	Remote Beeper	YES
P-32	Calibrate Cavity Set Temp	CCDR/CDR
End	Exit Factory Programming	END

Service Access: Code = 7378

CNT (Count)	
Count Number	Count Description
C-01	Heat-Hot Air Time
C-02	Heat-Boiler Time
C-03	High Float Counts
C-04	Low Float Counts
C-05	Drain Counts
C-06	Fill Valve Counts
C-08	Quench Valve Counts
C-09	Motor Reversal Counts
C-10	Motor Gentle Time
C-11	Motor Low Time
C-12	Motor High Time
C-13	Motor Turbo Time
C-14	Door Counts
C-16	Delime Pump Time
C-17	Preheat Thermostat Counts
C-18	Steam Time
C-19	Combi Time
C-20	Hot Air Time
C-21	Cavity Hi Limit
C-22	Boiler Hi Limit Counts
C-23	Cavity Probe Error Counts
C-24	Delime Counts
C-25	Delime Cancel Counts

C-26	Flush Counts
C-27	Flush Cancel Counts
DIAG (Diagnostics)	
Diagnostic Number	Diagnostic Test
D-01	Cavity Heat Relay
D-02	Boiler Heat Relay
D-03	Water High Level Float Status
D-04	Water Low Level Float Status
D-05	Drain Relay
D-06	Fill Relay
D-07	Steam Relay
D-08	Quench Relay
D-09	Motor Reversal Relay (Gentle Speed)
D-10	Motor Gentle
D-11	Motor Low
D-12	Motor High
D-13	Motor Turbo
D-14	Door Status
D-15	Lights Relay
D-16	Delime Pump Relay
D-17	Software Flash Number
D-18	Software Number
D-19	Software Download Number
D-20	SIB Software Number
D-21	Cavity Set Temperature
D-22	Cavity Act Temperature
D-23	Cooling Fan Probe Temperature
D-24	Quench Probe Temperature
D-25	Core Probe Temperature
D-26	Boiler Probe Temperature
D-27	Main Switch
D-28	Fan Feedback Input
D-29	Cook Done Relay
D-30	Vent Relay
D-33	Cool Fan Relay
D-34	Hot Air Relay
D-35	Hot Air Enable Relay
D-37	All Relays
D-38	Display and LED Test
END	

Below are the Error Codes the control can display and their meaning:

Code	Meaning
E-01	Cavity Probe Error - The reading from the probe is registering less than 32F or greater than 675F.
E-02	Boiler Probe Error - The reading from the probe is registering less than 32F or greater than 575F.
E-03	High Float Error - The High Level switch has not opened after 15 minutes of FILL output from the control.
E-04	Low Float Error - The Low Level switch has not opened after 15 minutes of FILL output from the control.
E-05	Communication Error - The control lost signals from the relay board for 3 seconds.
E-06	Cooling Fan Probe Error - The reading from the probe is registering less than 32F or greater than 575F.
E-07	Delime Error - The Level Switches do not close after 10 minutes of Drain output. OR the Level Switches do not Open after 10 minutes of Fill output.
E-08	Cavity High Temp Error - Up to Rev J: If the cavity probe reads 565F or over 150F above set point. Rev K and up: If the cavity probe reads 665F (to 674) this error will occur.
E-09	Boiler Over Temp Error - The boiler probe is reading greater than 220F.
E-10	Quench Probe Error - The reading from the probe is registering less than 32F or greater than 575F.
E-11	Fill Valve Error - The High AND Low Level Switches do not open after 15 minutes of Fill Output.
E-12	Fan Error - The Drive at Speed input was missing for 15 seconds.
E-13	Meat Probe Error - The reading from the probe is registering less than 675F and greater than 565F.
E-14	Flush Error - The High AND Low Level Switches do not close after 10 minutes of Drain Output.

Also note the following functions:

To Manually Flush the Unit:

To initiate the flush process the user turns the mode switch to COOL DOWN and pushes in the upper encoder knob (3 seconds) until display scrolls message “FLUSHING”, flush cycle is started. During display scrolling message “FLUSHING”, the display scrolls message “CLOSE DOOR” and beeper is one once every second if the door is opened.

To Manually Delime the Unit:

To initiate the Delime process the user turns the mode switch to COOL DOWN and pushes in the lower encoder knob (3 seconds) until the DELIME LED flashes at 5 times per second. The user then turns the mode switch to the OFF position.

To Manually Prime the Delime Pump:

To initiate the Pump the user turns the mode switch to COOL DOWN and pushes in the lower and upper encoder knobs together which activates the pump. When primed, release the knobs and turn the unit OFF.