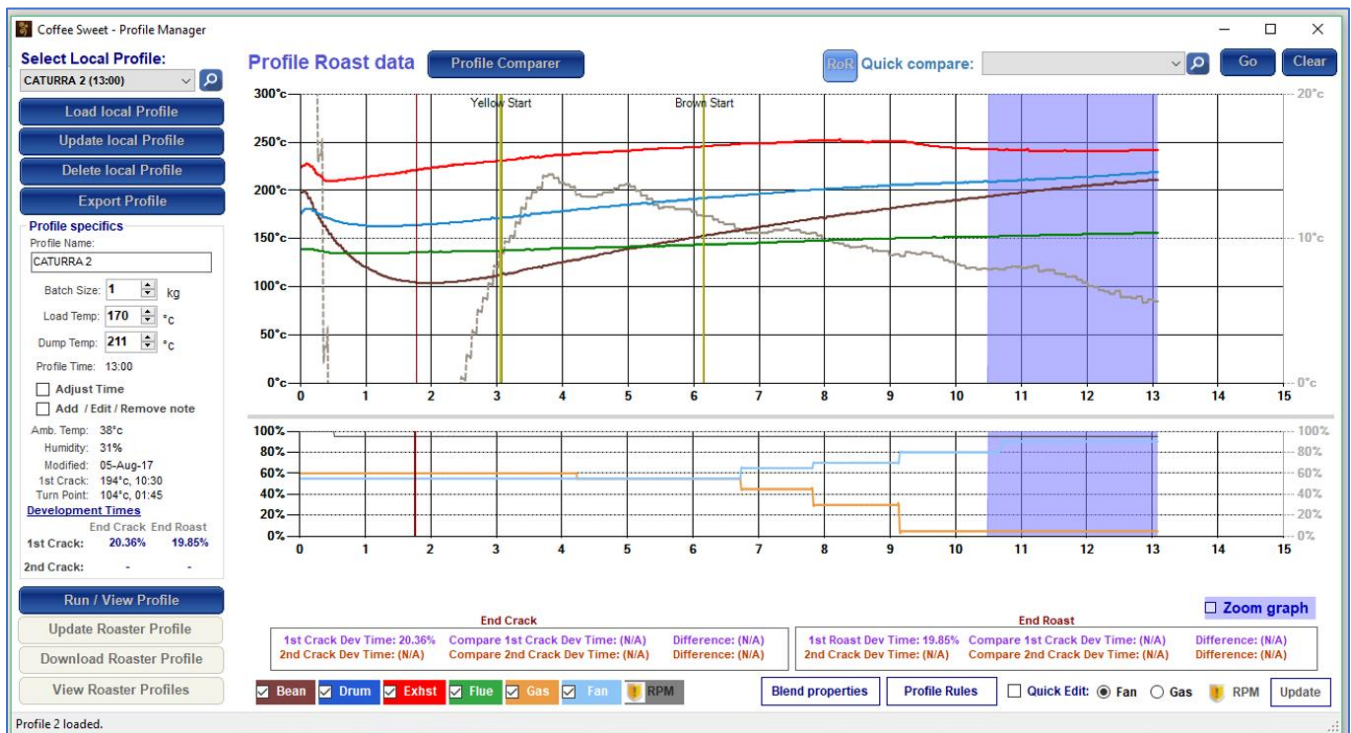


(Updated 29<sup>th</sup> SEPTEMBER 2021)

# COFFEE SWEET USER MANUAL

Product Version: 2.99



Coffee Sweet is an advanced Windows based coffee roasting software platform designed by CRA Technology in Australia. The software enables the integration and control of coffee roasting parameters in a user-friendly software framework. Coffee Sweet can be installed on any coffee roaster either as a full controllable system or as a datalogging interface. Coffee Sweet offers a roasting experience like no other.

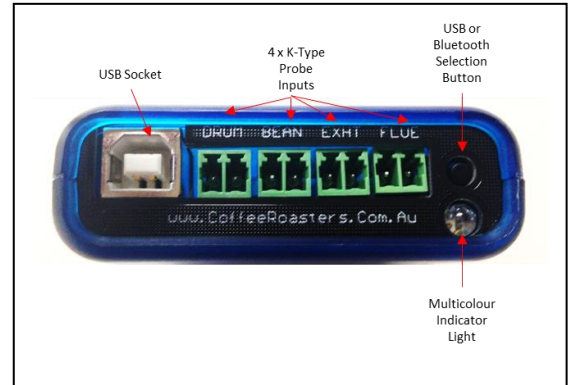
Coffee Sweet is available as a basic free version with the option to purchase additional modules on a subscription basis that allow the user to access more advance control and analytical features.

For more information on Coffee Sweet and it related hardware products please visit [www.cratechnology.com.au](http://www.cratechnology.com.au) .

## HARDWARE REQUIREMENTS

### CRA Bluetooth Datalogger

Bluetooth datalogging units uses the same software with some minor changes to start a roast and without the roaster control functions for gas, fan and drum although these can still be logged manually in the software. 4 thermocouples, Ambient Temperature and Relative Humidity are logged.



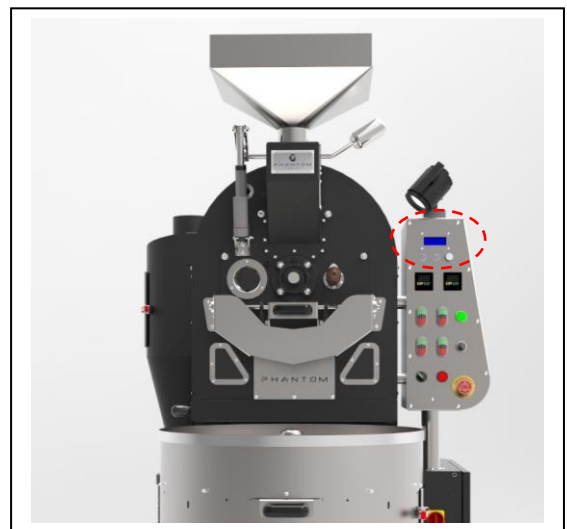
### CRA GEN1 PCB Controller

GEN 1 PCB Controller was used on Has Garanti and other aftermarket retrofits and allows control of the GAS and FAN of the roaster with monitoring of 4 thermocouples, Ambient Temperature and Relative Humidity.



### CRA Phantom Series GEN2 PCB Controller

GEN 2 PCB Controller is designed for Phantom Series Coffee Roasters and allows control of the GAS, FAN, DRUM SPEED, HOPPER DOOR, DRUM DOOR, COOLER DOOR, COOLING and DESTONING CYCLES and the AFTERBURNER. This is a complete roaster automation system with monitoring of 4 thermocouples, Ambient Temperature and Relative Humidity.

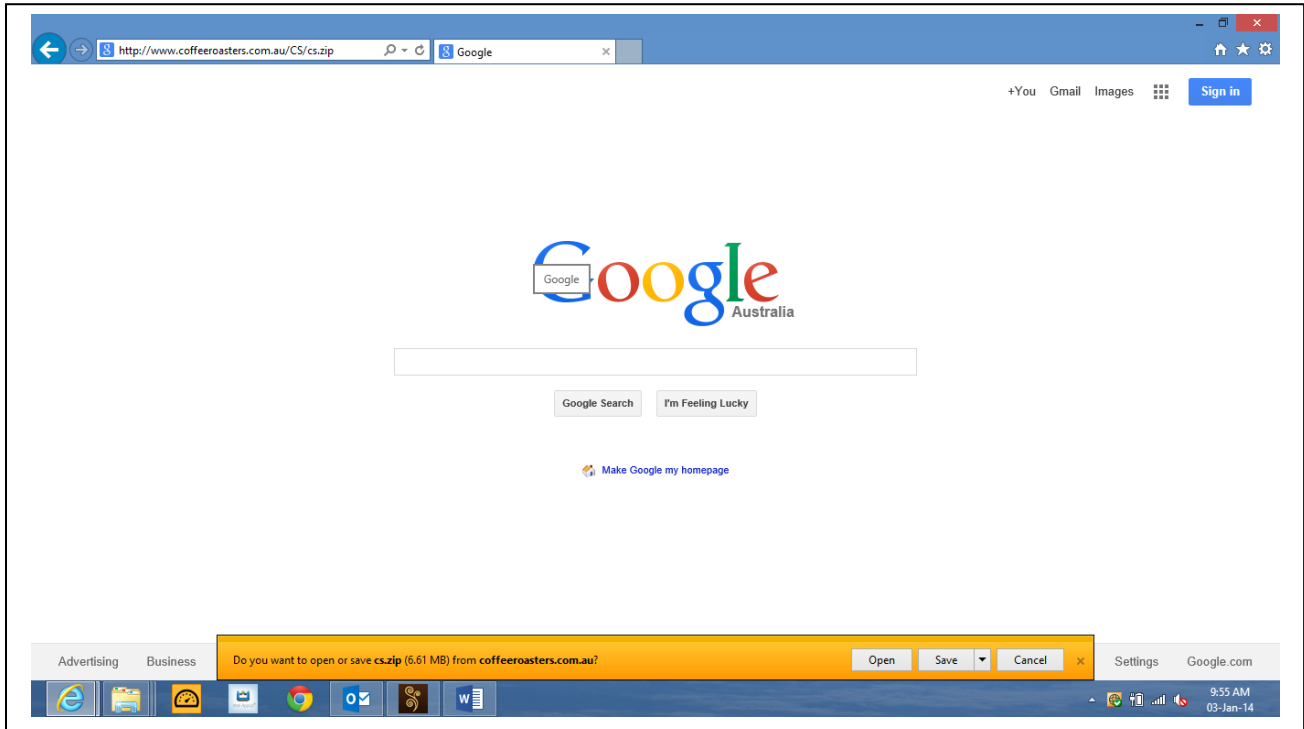


## INDEX

PAGE #	REF	DESCRIPTION
5	1.0	<b>DOWNLOADING AND INSTALLING COFFEE SWEET SOFTWARE</b>
7	2.0	<b>CONNECTIONS</b>
7	2.1	CRA GEN1 PCB Controller
8	2.2	CRA Phantom Series GEN2 Controller
9	2.3	CRA Bluetooth Datalogger
11	3.0	<b>CONNECTING TO COFFEE SWEET SOFTWARE</b>
12	4.0	<b>MAIN WINDOW DISPLAY</b>
13	5.0	<b>GETTING STARTED WITH COFFEE SWEET</b>
13	5.1	<b>SETTINGS MENU</b>
13	5.1.1	<i>DEVICE TAB</i>
14	5.1.2	<i>MAXIMUMS</i>
15	5.1.3	<i>CUP PROPERTIES</i>
16	5.1.4	<i>ROASTING RULES</i>
17	5.1.5	<i>GRAPHS</i>
18	5.1.6	<i>GENERAL</i>
19	5.2	<b>HELP MENU</b>
20	5.3	<b>ABOUT</b>
20	5.4	<b>MY CRA</b>
22	5.5	<b>CRA Phantom Series GEN2 Controller – CONTROL BUTTONS</b>
22	5.5.1	<i>COOLING CYCLE</i>
22	5.5.2	<i>DESTONING CYCLE</i>
23	5.5.3	<i>ACTUATOR DOORS</i>
23	5.5.4	<i>EMERGENCY COOLER EVACUATE</i>
23	5.5.5	<i>EMERGENCY DRUM EVACUATE</i>
24	6.0	<b>HOW TO ROAST USING COFFEE SWEET</b>

<b>24</b>	<b>6.1</b>	<b>MANUAL ROASTING</b>
24	6.1.1	<i>SETUP &amp; STARTING A MANUAL ROAST</i>
27	6.1.2	<i>LIVE ROAST FEATURES</i>
31	6.1.3.1	<i>STOPPING AND SAVING A MANUAL ROAST – GEN 1</i>
32	6.1.3.2	<i>STOPPING AND SAVING A MANUAL ROAST – GEN 2 PHANTOM</i>
33	6.1.4	<i>SAVING THE PROFILE</i>
34	6.1.5	<i>LOADING THE PROFILE</i>
36	6.1.6	<i>EDIT GAS, FAN, DRUM SPEED (Drum Speed only in PRO SWEET)</i>
37	6.1.7	<i>ADJUST PROFILE TIME</i>
38	6.1.8	<i>ADD NOTES (PRO SWEET ONLY)</i>
39	6.1.9	<i>BLEND PROPERTIES</i>
39	6.1.9.1	<b>BLEND ORIGINS (PRO SWEET ONLY)</b>
39	6.1.9.2	<b>CUPPING</b>
40	6.1.10	<i>QUICK COMPARE PROFILE</i>
41	6.1.11	<i>ZOOM GRAPH (PRO SWEET ONLY)</i>
42	6.1.12	<i>ROR DETAIL FOR ALL THERMOCOUPLES</i>
43	6.1.13	<i>GENERATE REPORTS</i>
45	6.1.14	<i>PROFILE COMPARER - MULTIPLES (PRO SWEET ONLY)</i>
<b>47</b>	<b>6.2</b>	<b>MANUAL ROASTING WITH SAVED PROFILE AS BACKGROUND</b>
47	6.2.1	<i>OPTION WITH SETTINGS MENU BEAN TEMPERATURE BASED RULES</i>
50	6.2.2	<i>OPTION WITH PROFILE SPECIFIC BEAN TEMPERATURE BASED RULES</i>
54	6.3	<b>SAVED PROFILE AUTO ROASTING AS A COPY (DOES NOT APPLY TO DATALOGGER)</b>
<b>60</b>	<b>7.0</b>	<b>CLOUD PROFILE BACKUP (PRO SWEET ONLY)</b>
<b>61</b>	<b>7.1</b>	<b>MANAGING CLOUD PROFILES</b>
61	7.1.1	<i>Uploading Profiles to the Cloud</i>
61	7.1.2	<i>Downloading Profiles from the Cloud</i>
<b>62</b>	<b>8.0</b>	<b>TROUBLESHOOTING</b>

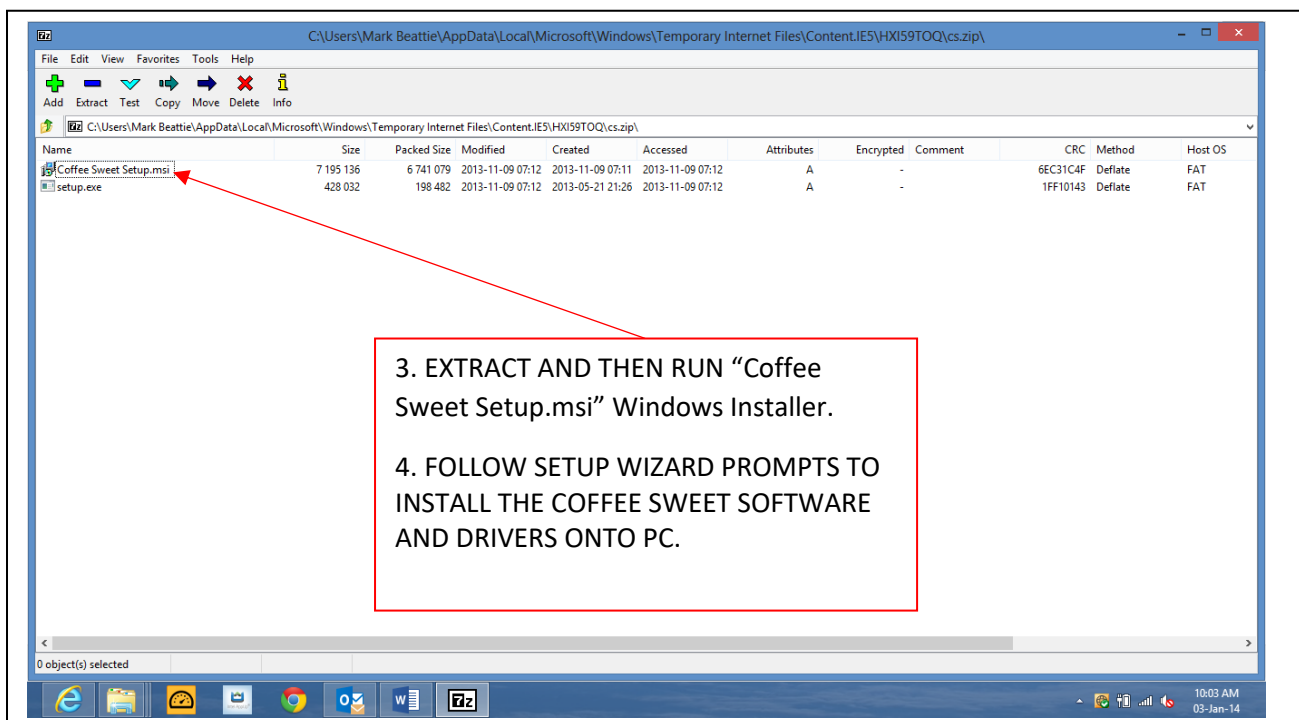
## 1.0 DOWNLOADING AND INSTALLING COFFEE SWEET SOFTWARE



1. Download COFFEE SWEET roast control software from location (type address into browser):

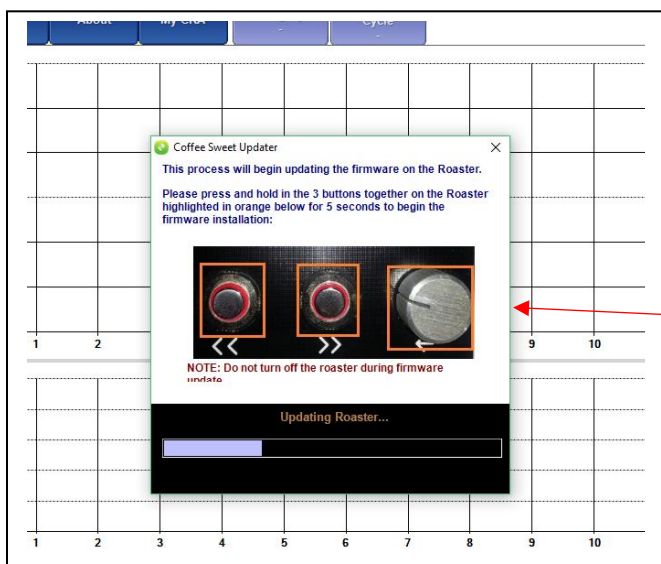
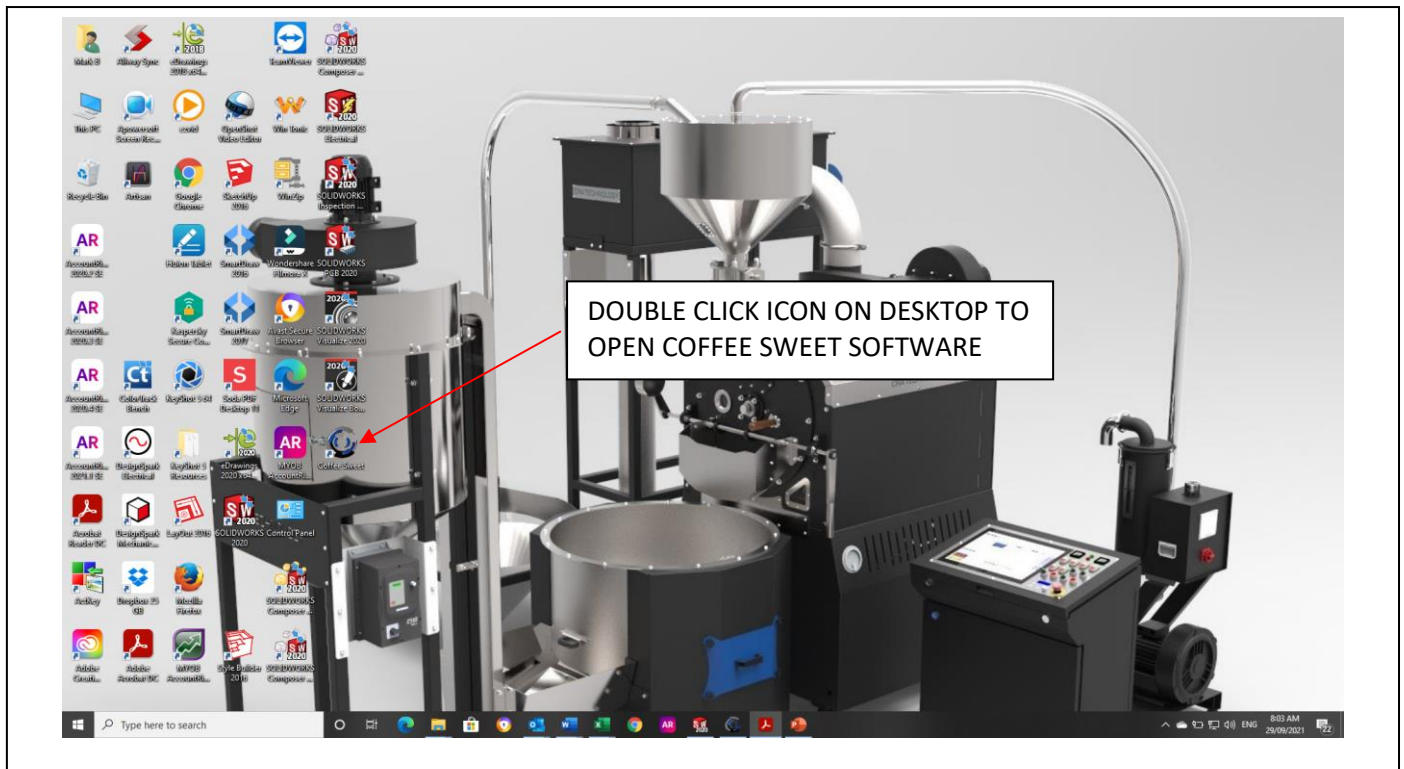
[www.coffeeroasters.com.au/CS/cs.zip](http://www.coffeeroasters.com.au/CS/cs.zip)

2. Click “Open” when prompted



3. WHEN LAUNCHING FOR THE FIRST TIME ENSURE THE ROASTER OR DATALOGGER IS CONNECTED TO PC VIA USB AND ALSO CONNECTED TO THE INTERNET AND WHEN PROMPTED CHOOSE YES TO DOWNLOAD SOFTWARE AND FIRMWARE UPDATES. IF A FIRMWARE UPDATE IS REQUIRED FOLLOW THE ON SCREEN INSTRUCTION TO INSTALL ON THE COFFEE ROASTER PCB. THIS WILL REQUIRE PRESSING THE 2 BUTTONS AND CONTROL KNOB BUT ALL AT THE SAME TIME FOR 3 SECONDS TO ACTIVATE. THIS WILL ENSURE THE FIRMWARE AND SOFTWARE IS UP TO DATE.

**\*\*IMPORTANT\*\*** TO ENSURE YOU ALWAYS RECEIVE THE LATEST UPDATES TO FIRMWARE AND SOFTWARE YOU WILL NEED TO BE CONNECTED TO THE INTERNET WHEN YOU LAUNCH THE COFFEE SWEET SOFTWARE PACKAGE.



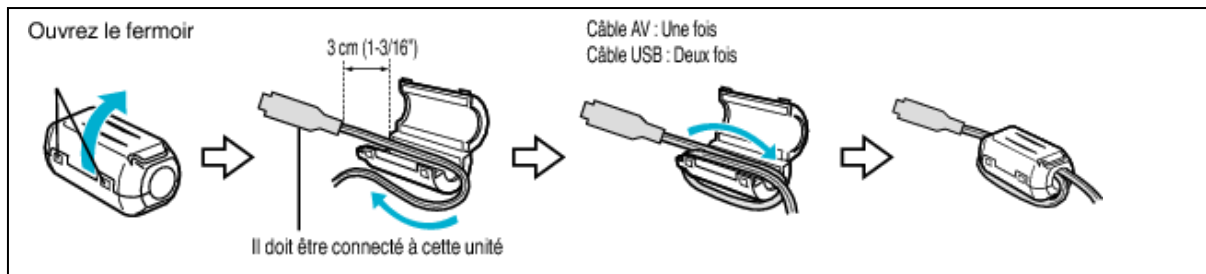
IF PROMPTED FOR FIRMWARE UPDATE FOLLOW INSTRUCTIONS AND HOLD 3 BUTTONS DOWN TOGETHER TO ACTIVATE UPLOAD TO PCB

## 2.0 CONNECTIONS

### 2.1 CRA GEN1 PCB Controller



ALWAYS MAKE SURE TO ATTACH A **FERRITE CORE** TO THE TYPE A MALE CONNECTOR END OF THE USB CABLE PRIOR TO USE. FAILURE TO PROPERLY ATTACH A FERRITE CORE MAY CAUSE ELECTROMAGNETIC INTERFERENCE TO THE PC AND RESULT IN USB CONNECTION DROP OUTS. MUST USE **HIGH QUALITY SHIELDED USB CABLE** ONLY TYPE A MALE TO TYPE B AS PER BELOW.

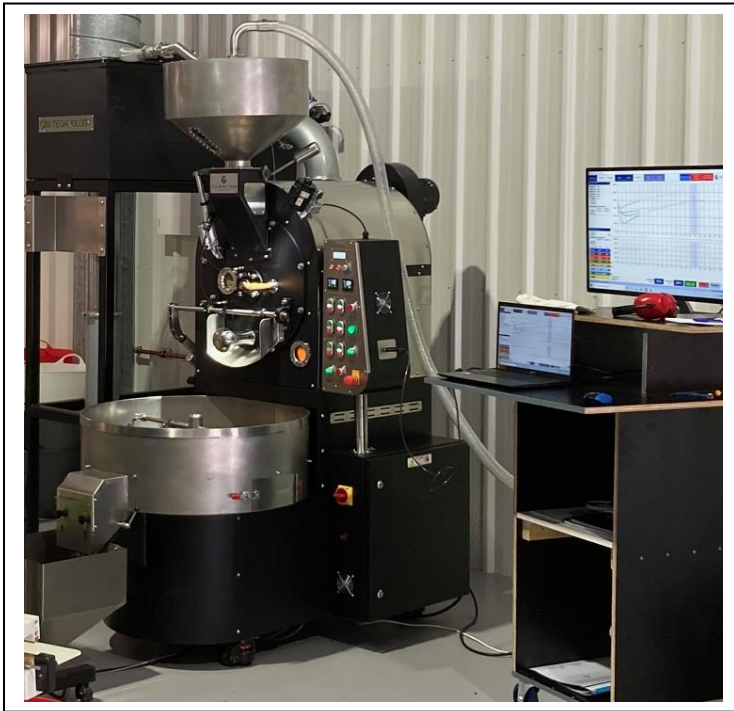


### CONNECT THE CRA CONTROLLER TO PC VIA USB/SERIAL AND CONFIGURE



- TURN ON ROASTER AND START PILOT LIGHTING PROCEDURE
- CONNECT USB PORT ON ROASTER TO USB PORT ON COMPUTER.
- WINDOWS WILL SAY IT IS INSTALLING DRIVER.
- WINDOWS SHOULD NOW RECOGNISE CRA CONTROLLER. YOU CAN CHECK IN CONTROLL PANEL UNDER DEVICE MANAGER

## 2.2 CRA Phantom Series GEN2 Controller



RS232 DB9 PORT

Connection to the PC is via a RS232 DB9 port on the side of the control panel.

**NOTE:** Most new PC do not have RS232 port so in this instance a RS232 to USB adapter will need to be used.

Below is an example of a suitable converter cable:

<https://www.jaycar.com.au/usb-to-db9m-rs-232-converter-1-5m/p/XC4834>

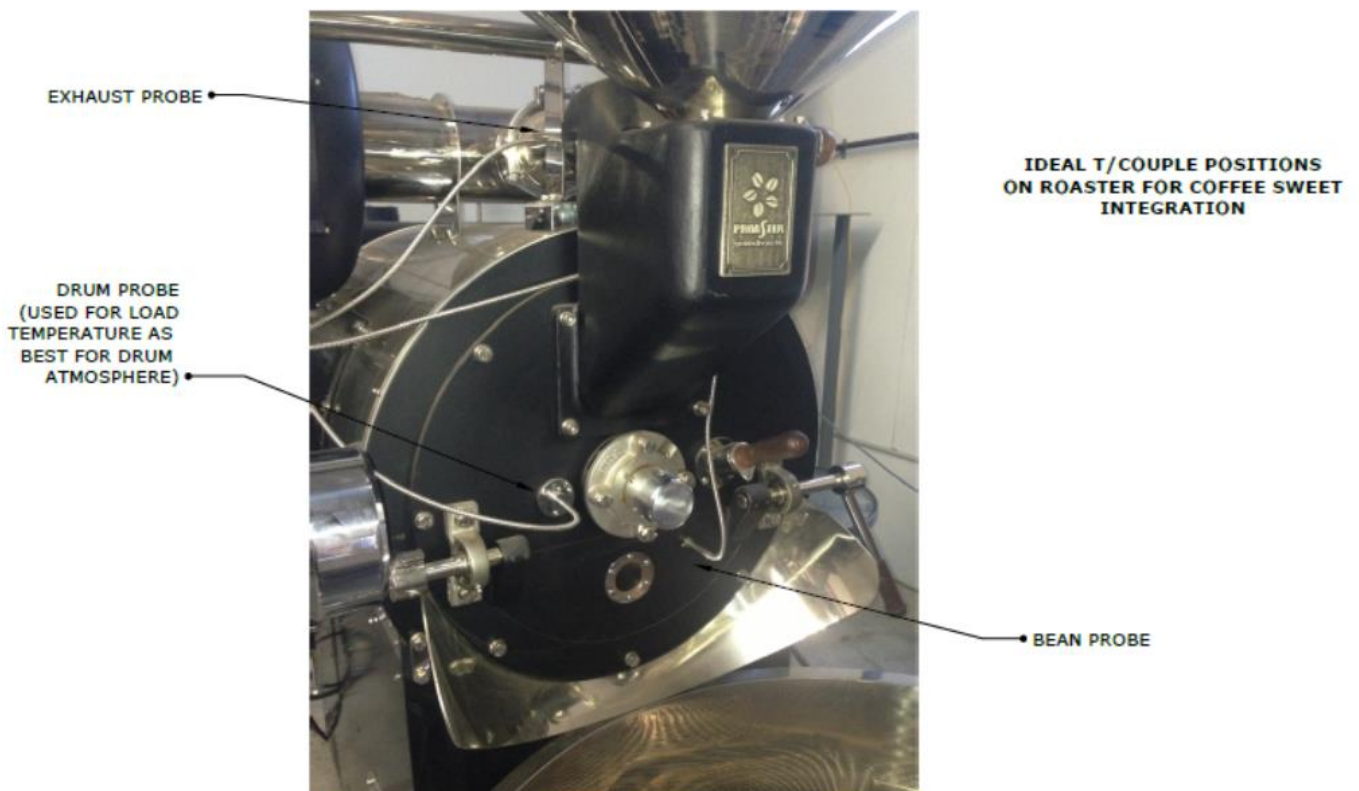
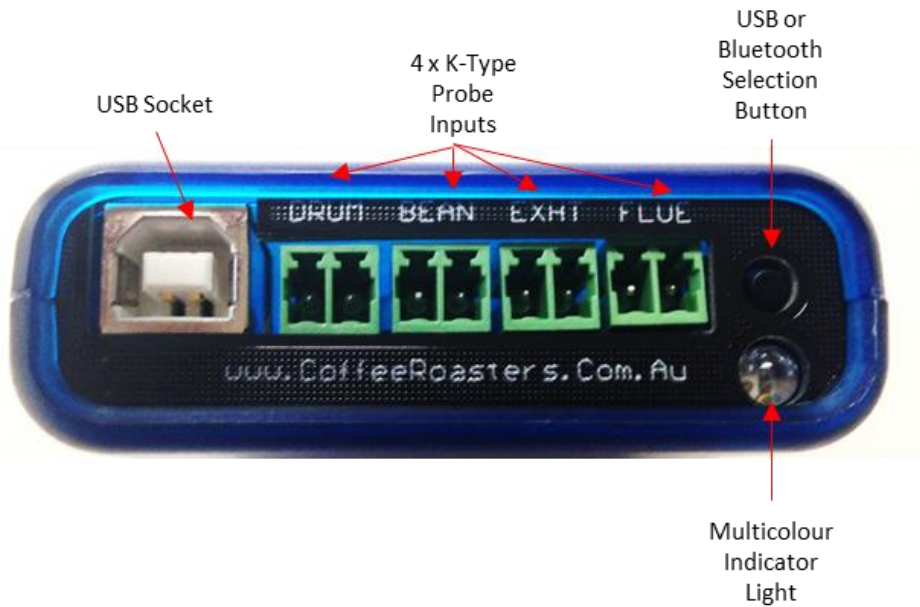
### **IMPORTANT:**

ENSURE THAT THE BAUD RATE FOR THE SOFTWARE MATCHES THE BAUD RATE ON THE ROASTER CONTROLLER. YOU CAN CHECK THE BAUD RATE ON THE CONTROLLER LOOKING IN THE OPTIONS MENU.

TO CHECK THE BAUD RATE ON THE PC PORT YOU WILL NEED TO GO INTO THE SETTINGS MENU IN COFFEE SWEET. YOU CAN SELECT BETWEEN **19200** AND **115200**. **115200 IS A FASTER CONNECTION AND ONLY AVAILABLE TO GEN 2 PHANTOM CONTROLLERS. ALL OTHERS MUST OPERATE ON 19200.**

**IF THE BAUD RATES ARE NOT SET TO THE SAME ON BOTH THE ROAST CONTROLLER FIRMWARE AND THE PC SOFTWARE THEN YOU WILL NOT BE ABLE TO CONNECT.**

## 2.3 CRA Bluetooth Datalogger



1. WHEN LAUNCHING FOR THE FIRST TIME ENSURE THE PCB IS CONNECTED TO YOUR LAPTOP VIA THE USB CABLE AND WHEN PROMPTED CHOOSE YES TO DOWNLOAD SOFTWARE AND FIRMWARE UPDATES. IF A FIRMWARE UPDATE IS REQUIRED:
  - a. PUSH DOWN THE BUTTON ON THE PCB UNIT FOR APP 5 SECONDS UNTIL THE INDICATOR LIGHT FLASHES WHITE. THIS WILL INITIATE THE FIRMWARE UPDATE. NOTE THAT A FIRMWARE UPDATE CAN ONLY BE DONE THROUGH THE USB AND NOT THROUGH BLUETOOTH.
  
2. FOR BLUETOOTH CONNECTION USE USB POWER PACK TO SUPPLY POWER TO THE PCB. PRESS THE SELECTION BUTTON ON THE PCB ONCE (THE INDICATOR LIGHT WILL CHANGE COLOUR). LOOK IN YOUR BLUETOOTH DIRECTORY ON YOUR COMPUTER AND PAIR DEVICE. PASSWORD IS "1234".
  - a. NOTE: IF REVERTING BACK TO USB YOU MUST REMOVE THE PCB FROM YOUR BLUETOOTH PAIRING FOLDER.

**\*\*IMPORTANT\*\***

- THE LOAD TEMPERATURE FOR THE START OF A ROAST IS TAKEN FROM THE DRUM THERMOCOUPLE.
- YOU CAN NOT USE THE SOFTWARE UNLESS YOU HAVE THE DRUM PROBE AND BEAN PROBE CONNECTED. IF ONLY USING A BEAN PROBE THEN YOU MUST INSTALL A BRIDGING K-TYPE CONNECTION TO THE DRUM PROBE INPUT SO THAT THE SOFTWARE HAS A LOAD TEMPERATURE TO GO OFF.

**NOTE: The datalogger does not require the roaster pilot lit to connect to the software as per Section 3.0 as it operates independently from the roaster.**

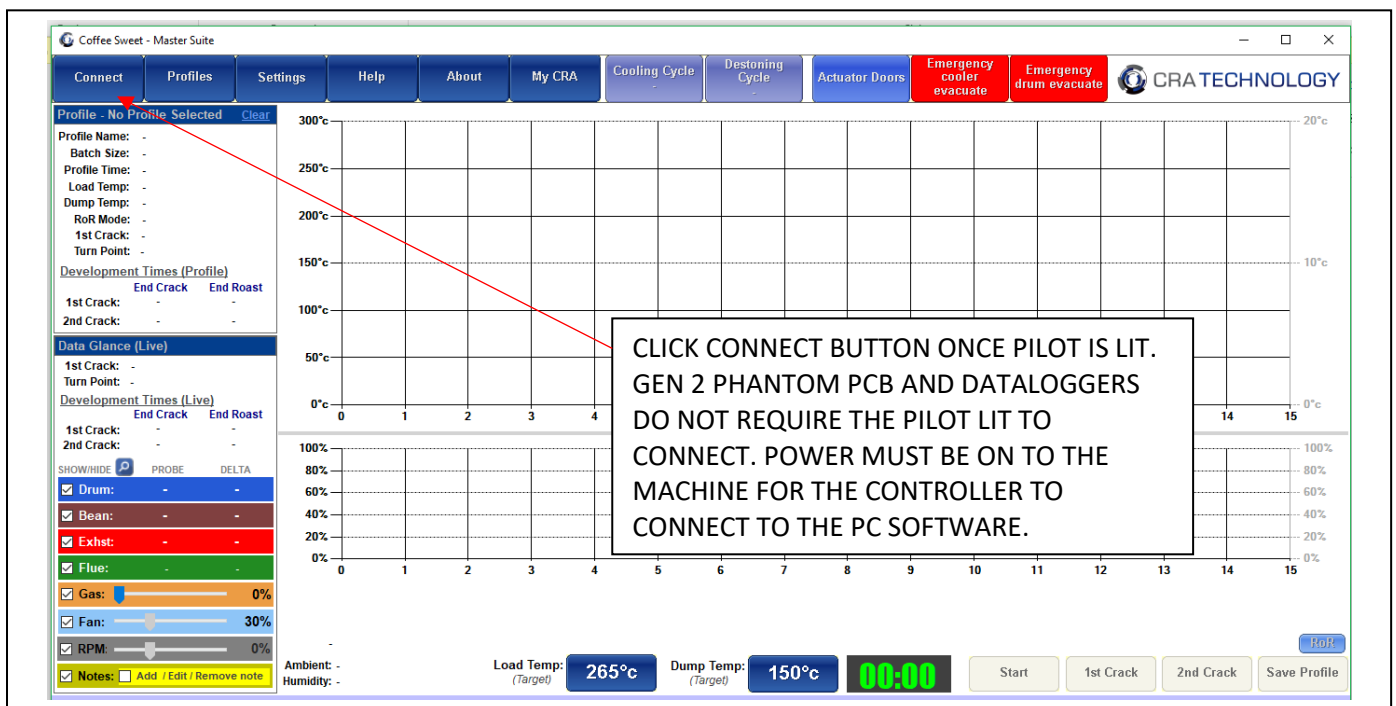
### 3.0 CONNECTING TO COFFEE SWEET SOFTWARE

**STEP 1:** OPEN COFFEE SWEET SOFTWARE BY CLICKING APP ICON ON DESKTOP.



**STEP 2:** TURN ON THE ROASTER AND START PILOT LIGHTING PROCEDURE. PILOT LIGHT MUST ON TO CONNECT TO THE SOFTWARE. THE CONTROLLER ON THE ROASTER WILL GO TO THE MAIN MENU INDICATING THAT THE PILOT LIGHT HAS BEEN SUCCESSFULLY LIT.

**STEP 3:** CLICK CONNECT BUTTON ON SOFTWARE. IF CONNECTION SUCCESSFUL THE TEMPERATURES WILL DISPLAY AND IT WILL SHOW AS CONNECTED IN THE BOTTOM LEFT OF THE SCREEN.



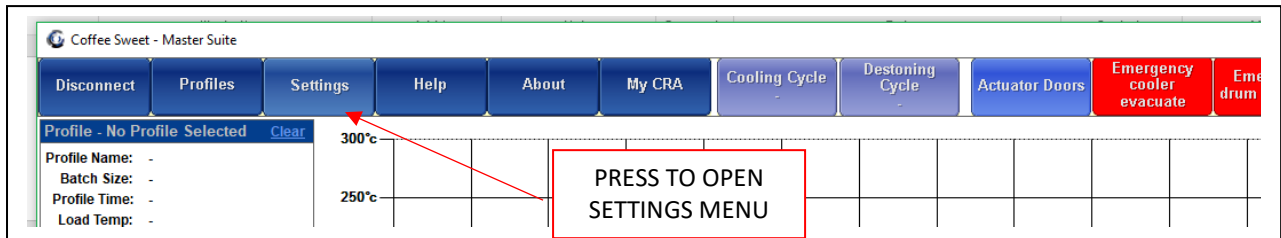
### 4.0 MAIN WINDOW DISPLAY

The screenshot displays the main window of the CRA Technology software, which is used for coffee roasting control. The interface is divided into several functional areas:

- Top Bar:** Contains menu buttons such as "Emergency drum evacuate", "Emergency cooler evacuate", "Actuator Doors", "Destoning Cycle", "Cooling Cycle", "my CRA", "About", "Help", "Settings", "Profiles", and "Disconnect".
- Left Panel:** A vertical sidebar with buttons for "Emergency drum evacuate", "Emergency cooler evacuate", "Actuator Doors", "Destoning Cycle", "Cooling Cycle", "my CRA", "About", "Help", "Settings", "Profiles", and "Disconnect".
- Main Display Area:**
  - Temperature & Bean RoR Graph:** A large graph showing temperature (0°C to 300°C) and RoR (0% to 100%) over time (0 to 15 minutes).
  - GAS, FAN & DRUM GRAPH:** A smaller graph showing gas, fan, and drum parameters over time.
  - LIVE TEMP & RoR:** A section displaying real-time temperature and RoR data.
  - CONTROL SLIDER:** A slider control for adjusting parameters.
- Right Panel:**
  - Buttons:** Includes "Start", "1st Crack", "2nd Crack", "RoR", "Save Profile", and "Control Enabled".
  - Timers:** A digital display showing "00:00" for the profile timer.
  - Temperature Controls:** "Load Temp: 37°C (Target)" and "Dump Temp: 150°C (Target)".
  - Environmental Data:** "Ambient: 28°C" and "Humidity: 87%".
  - Profile Management:** "TICK TO ADD NOTES TO PROFILE" and "PRESS TO START ROASTING".
  - Status Bar:** "Connected on COM13 - Firmware 3.006".
- Annotations:** Red boxes with arrows point to specific features:
  - MENU BUTTONS:** Points to the top bar.
  - PROFILE DATA WINDOW:** Points to the left sidebar.
  - LIVE PROFILE DATA:** Points to the live data section.
  - TEMPERATURE & BEAN RoR GRAPH:** Points to the main graph.
  - GAS, FAN & DRUM GRAPH:** Points to the secondary graph.
  - LIVE TEMP & RoR:** Points to the live data section.
  - CONTROL SLIDER:** Points to the slider control.
  - Buttons to display RoR graph all probes:** Points to the "RoR" button.
  - Buttons to set load & dump temps:** Points to the "Load Temp" and "Dump Temp" controls.
  - Profile timer:** Points to the "00:00" display.
  - Press to start roasting:** Points to the "Start" button.
  - Press when 1st & 2nd crack starts &:** Points to the "1st Crack" and "2nd Crack" buttons.
  - Ambient temp & relative humidity:** Points to the "Ambient" and "Humidity" displays.
  - Tick to add notes to profile:** Points to the "Notes" section.
  - Status bar:** Points to the bottom status information.

## 5.0 GETTING STARTED WITH COFFEE SWEET

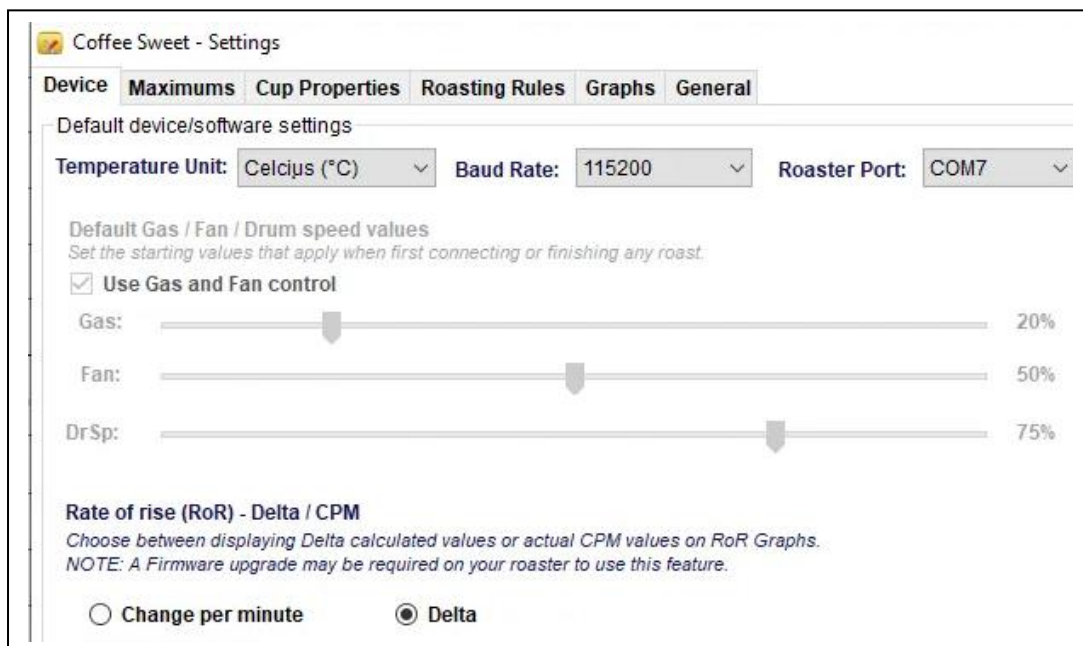
### 5.1 SETTINGS MENU



#### 5.1.1 DEVICE TAB

This menu allows the user to set:

- **Temperature Unit:** Celsius or Fahrenheit
- **Data Port Connection:** Set to Auto or the exact Comm Port for the device
- **Baud:** Sets the connection speed protocol. Note only the Phantom Roasters can run on **115200**. Earlier Gen 1 and Datalogger devices are required to run on **19200**.
- **Default Gas, Drum Fan and Drum Speed Values (%):** These values will action automatically once the roast starts.
- **Rate of Rise Formula**
  - **Change Per Minute (CPM)** – Calculates the exact increase in temperature rate of rise per minute. Calculation is based on 15sec increments. Note this value will be less smooth as there is no inbuilt smoothing applied to the values.
  - **Delta** – Calculates the Delta RoR per minute. This is a complex formula that includes a smoothing algorithm to reduce noise and produce a smoother **CURVE**.



## 5.1.2 MAXIMUMS

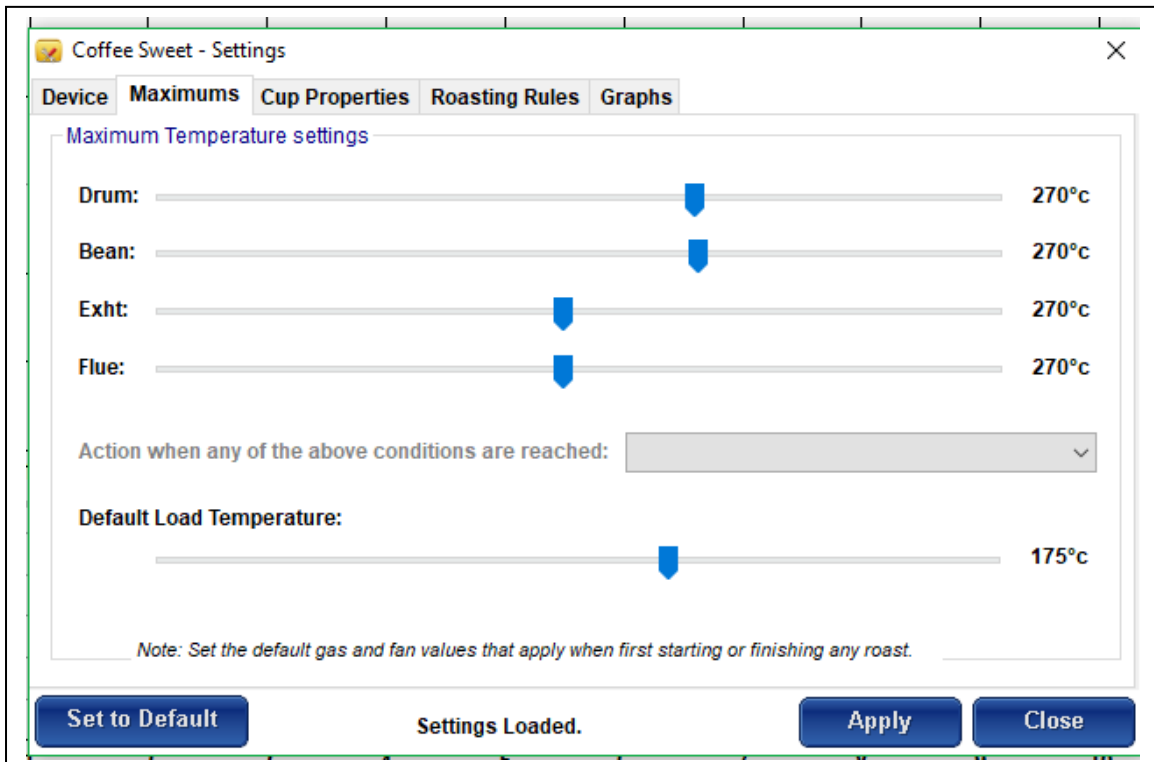
This menu allows the user to set:

- **Maximum Temperatures:** The maximum setting for the temperature on each thermocouple. If the temperature reaches the setpoint then the controller will indicate an overtemperature and attempt to regulate the burner off to reduce the temperature. If the temperature drops under the setting the alarm will stop and the burner will come back on.

**NOTE:** For the non **DATALOGGER PCBs** there will be a **hardcoded temperature at either 300deg or 400deg depending on what is set in the PCB controller menu. The maximum on this PC menu is dictated by this value and if the temperature reaches this value the controller will go into **FIRE SAFETY** and shut down the burner and fan.**

- **Default Load Temperature:** Sets the temperature for loading the coffee into the drum and starting a roast. Profile timer and graphing will only commence once this temperature is reached, and the software indicates to **LOAD BEANS**.

**NOTE:** Value is based off the **DRUM TEMPERATURE PROBE**



Coffee Sweet - Settings

Device Maximums Cup Properties Roasting Rules Graphs

Maximum Temperature settings

Drum: 270°C

Bean: 270°C

Exht: 270°C

Flue: 270°C

Action when any of the above conditions are reached: [Dropdown]

Default Load Temperature: 175°C

Note: Set the default gas and fan values that apply when first starting or finishing any roast.

Set to Default Settings Loaded. Apply Close

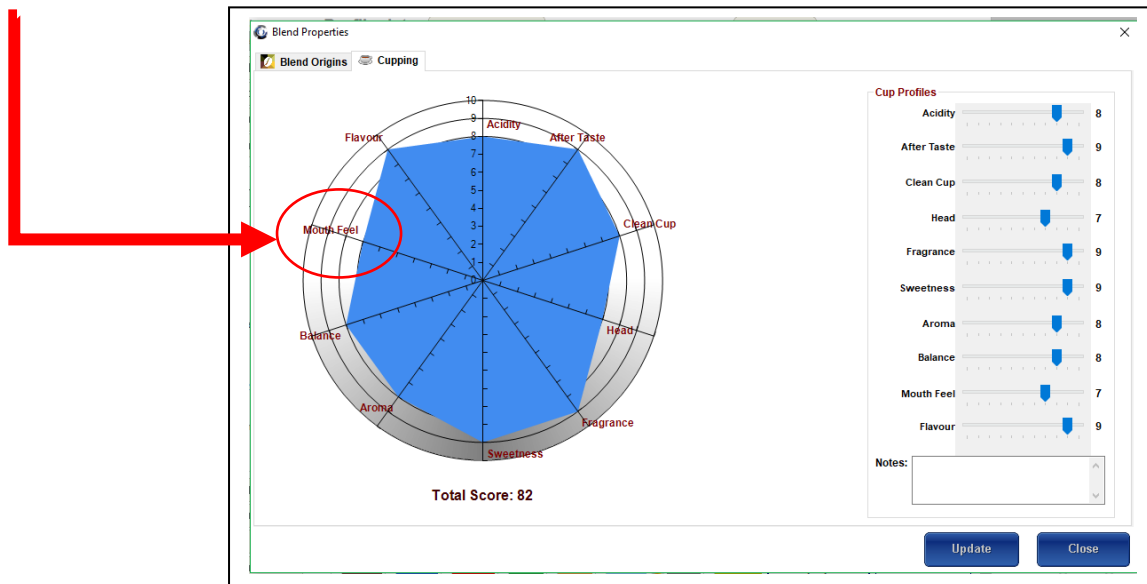
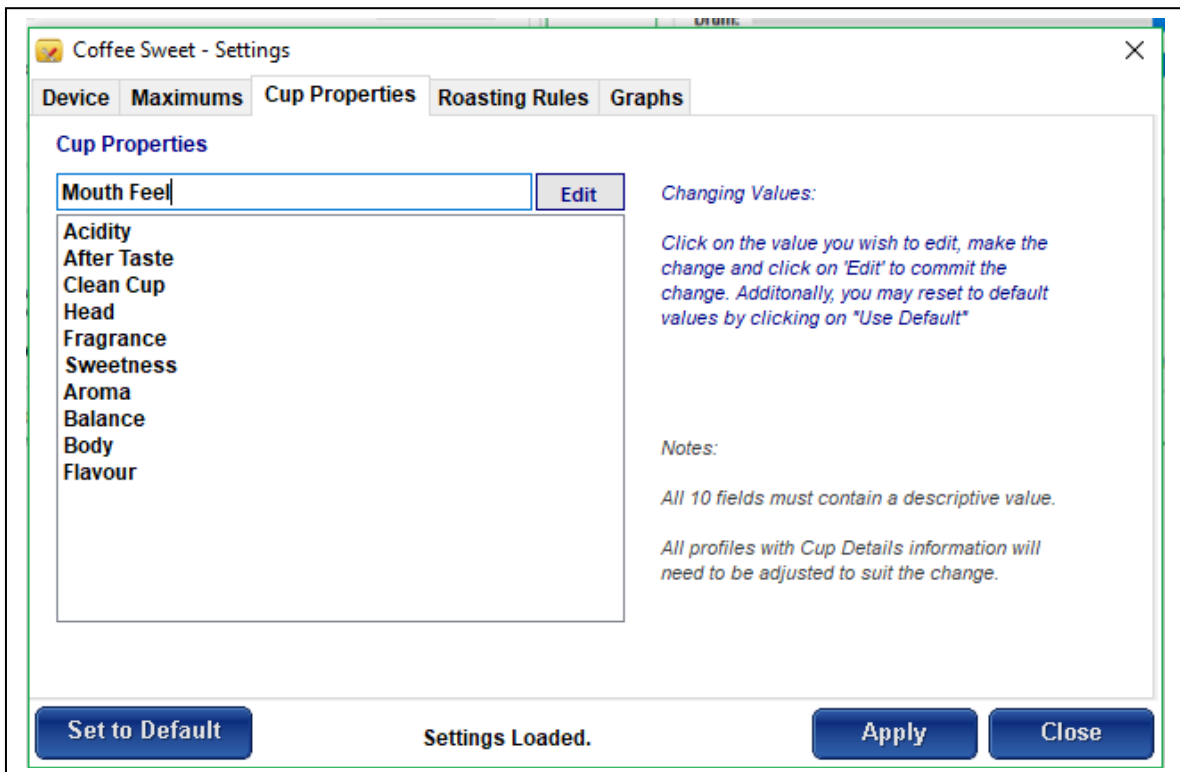
### 5.1.3 CUP PROPERTIES

This menu allows the user to set:

**Cup Properties:** The 10 sensory values used for the cupping wheel in the **BLEND PROPERTIES** section of the **PROFILES MENU**.

To change a value, click on the one you want to change then type the new value in the box then click edit to action the change. The new value will replace the one highlighted.

**NOTE: All 10 fields must contain a value**



### 5.1.4 ROASTING RULES

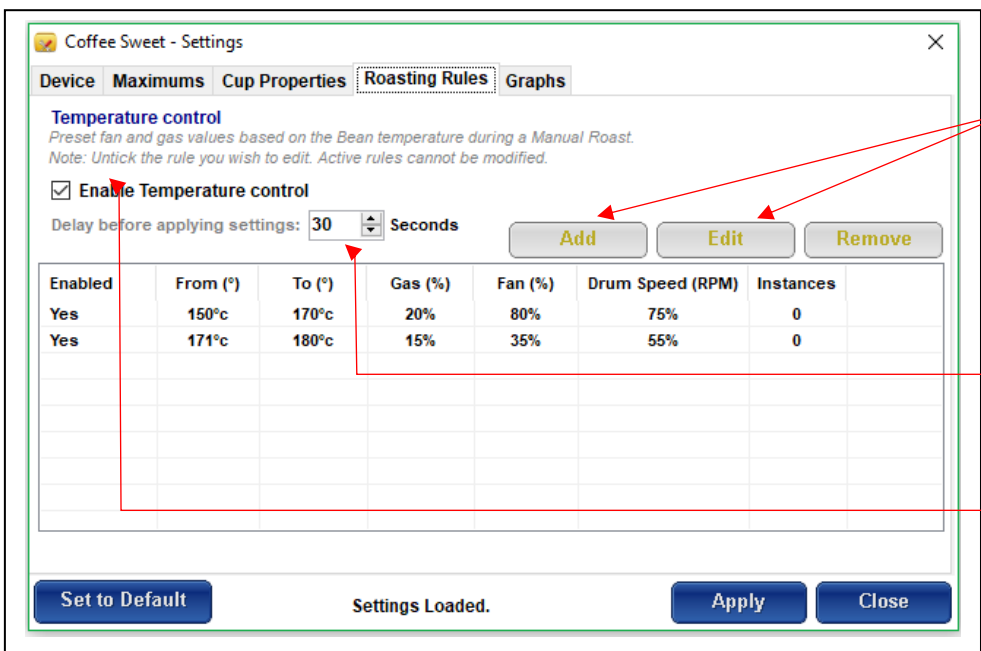
This menu allows the user to set:

**Temperature Based Rules:** Set automatic changes for Drum, Gas and Drum Speed based on Bean Temperature interval periods.

**NOTE:**

**Free Coffee Sweet:** Limit to 10 rules and no Drum Speed Rules (menu looks different to below, but functionality is similar)

**License Pro Coffee Sweet:** Unlimited Rules and additional Drum Speed Rule control



**Coffee Sweet - Settings**

Device | Maximums | Cup Properties | **Roasting Rules** | Graphs

**Temperature control**  
Preset fan and gas values based on the Bean temperature during a Manual Roast.  
Note: Untick the rule you wish to edit. Active rules cannot be modified.

**Enable Temperature control**

Delay before applying settings: 30 Seconds

[Add] [Edit] [Remove]

Enabled	From (°)	To (°)	Gas (%)	Fan (%)	Drum Speed (RPM)	Instances
Yes	150°c	170°c	20%	80%	75%	0
Yes	171°c	180°c	15%	35%	55%	0

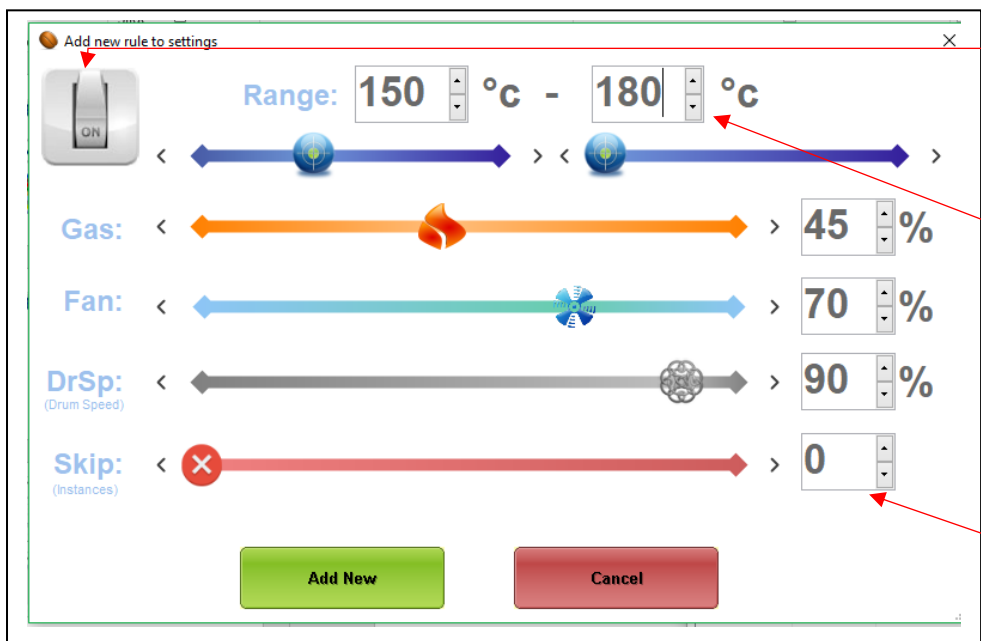
[Set to Default] Settings Loaded. [Apply] [Close]

PRESS TO ADD OR EDIT A RULE

NOTE: TO EDIT EXISTING RULE FIRST HIGHLIGHT IT THEN CLICK EDIT.

SET DELAY FOR RULES FROM THE START OF THE ROAST.

CHECK BOX MUST BE ENABLES FOR RULES TO WORK DURING A PROFILE



**Add new rule to settings**

ON

Range: 150 °c - 180 °c

Gas: 45 %

Fan: 70 %

DrSp: (Drum Speed) 90 %

Skip: (Instances) 0

[Add New] [Cancel]

PRESS TO TURN RULE ON

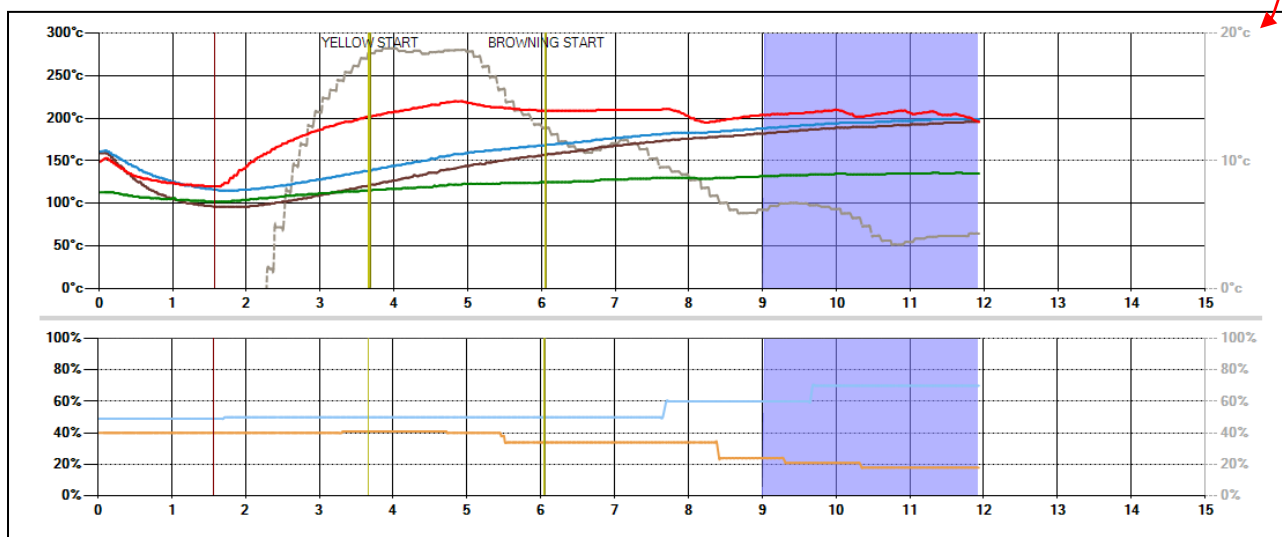
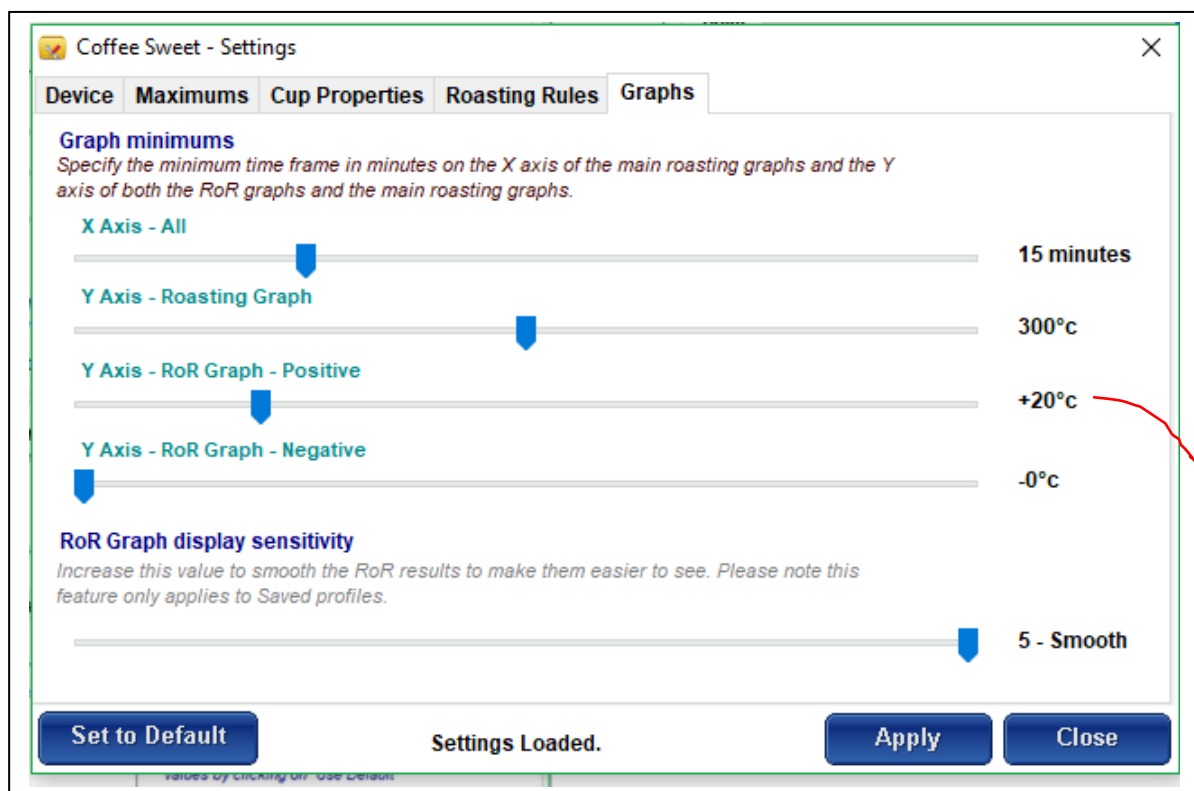
VALUE WILL BE HELD DURING THIS RANGE

CAN USE TO SKIP AN INSTANCE OF A RULE

## 5.1.5 GRAPHS

This menu allows the user to set:

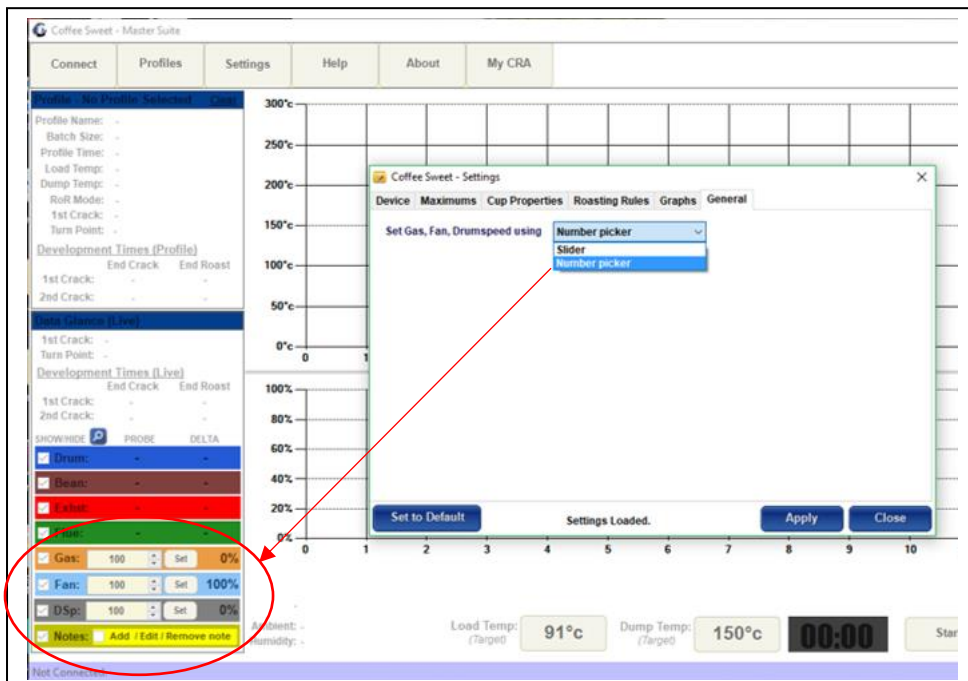
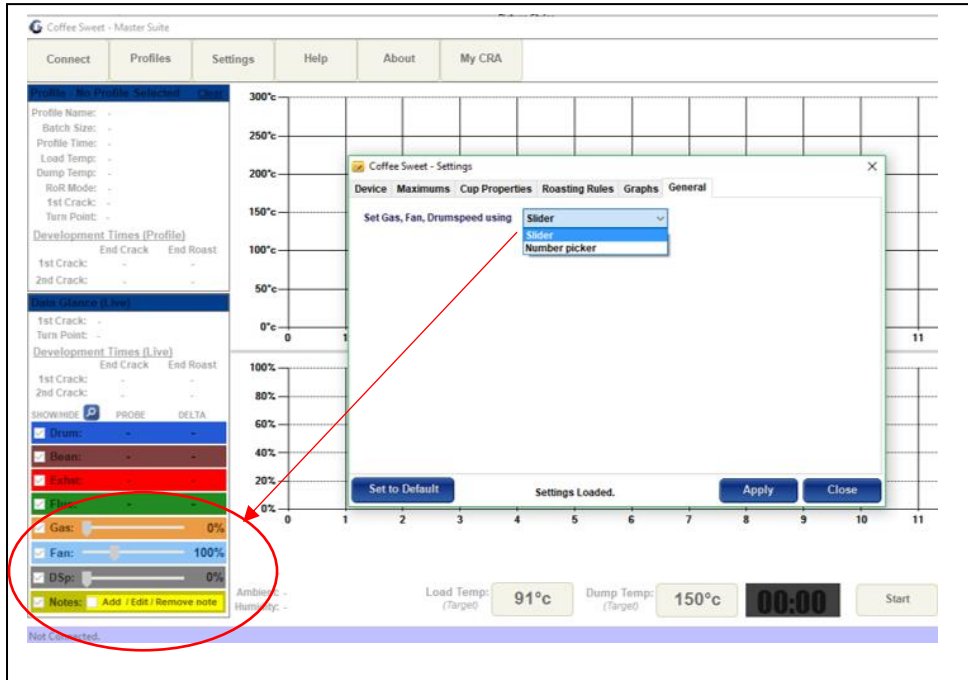
- **Graph Minimums:** Set the X and Y axis range for all graphs  
**NOTE:** If values go outside of the graph range during roasting the software will automatically resize the graph.
- **RoR Graph Display Sensitivity:** Sets the sensitivity of the RoR graphing. Set to Smooth increase smoothing of the RoR curve.  
**NOTE:** Delta RoR as standard setting will produce a much smoother graph due to the inbuilt smoothing algorithm.



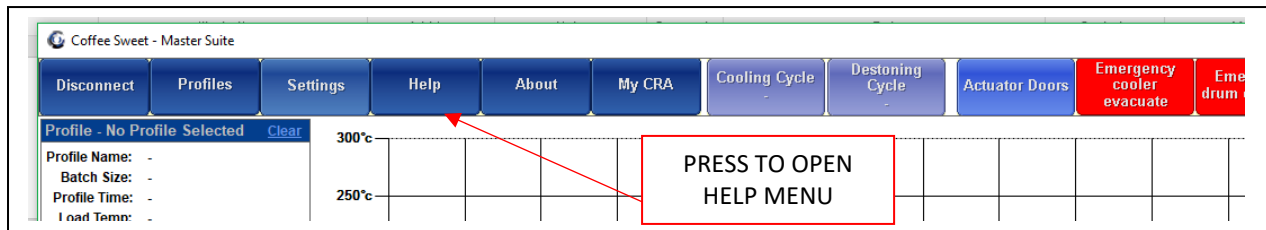
## 5.1.6 GENERAL

This menu allows the user to set:

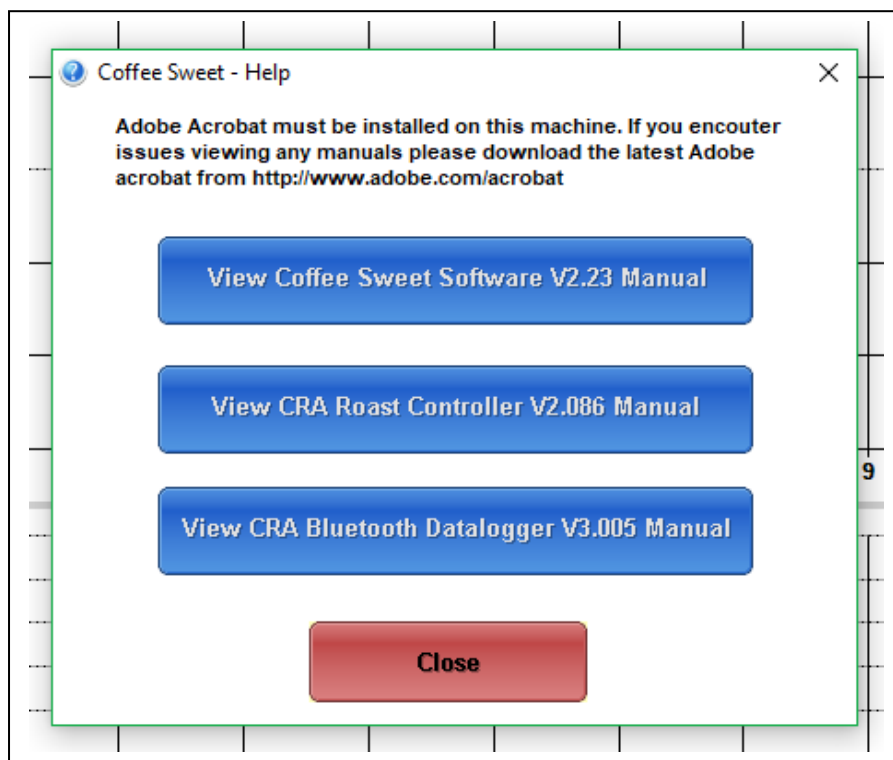
- **The function of the main gas/fan/drum control panel**
  - **Slider:** The use slider bars to adjust gas/fan/drum values
  - **Number Picker:** The user can type in a number then hit set when wanting to activate the change



## 5.2 HELP MENU



The HELP MENU houses all the manuals for the various PCB controllers as well as this software manual.

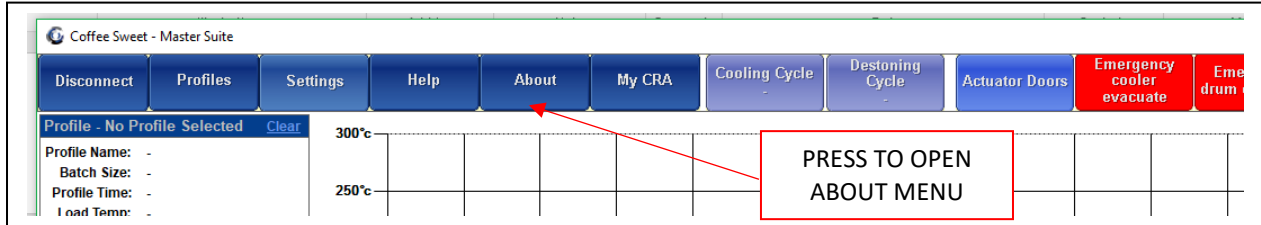


**CLICK** TO DOWNLOAD THE MANUALS AS A PDF DOCUMENT

**NOTE: WHEN THE SOFTWARE IS UPDATED THE MANUAL ARE ALSO UPDATED.**

## 5.3 ABOUT

This menu contains information about the software version, its developers and a button for **SUPPORT** which allows us to open a communications window to monitor communications and various built in fault codes.

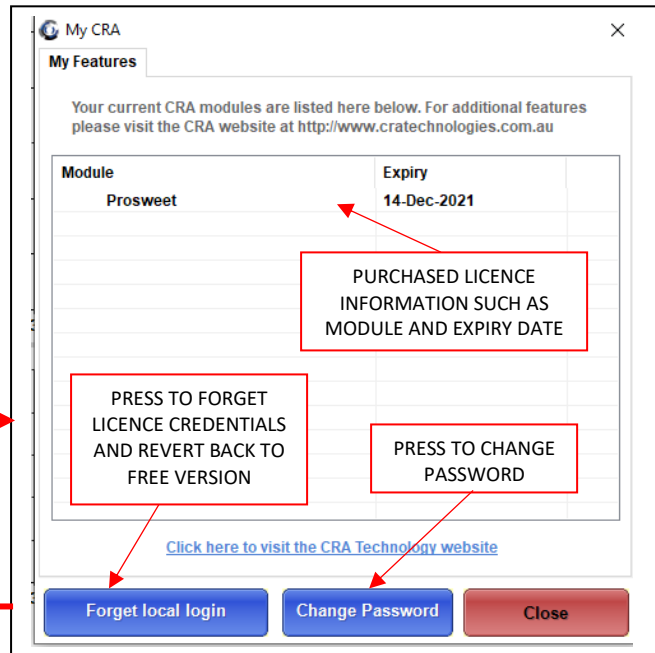
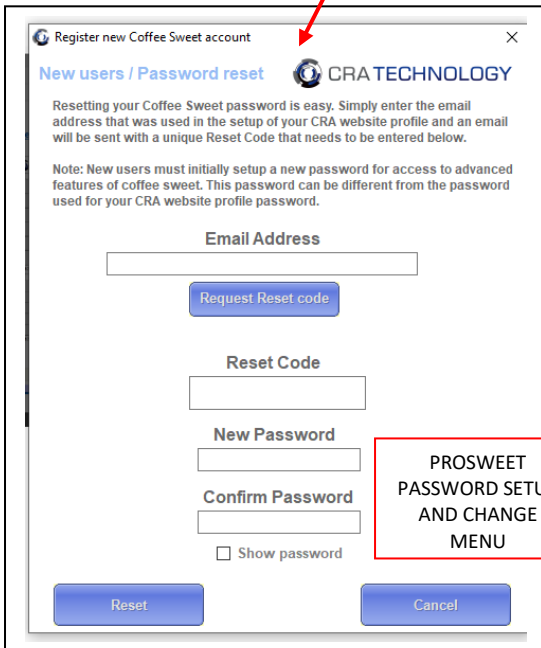
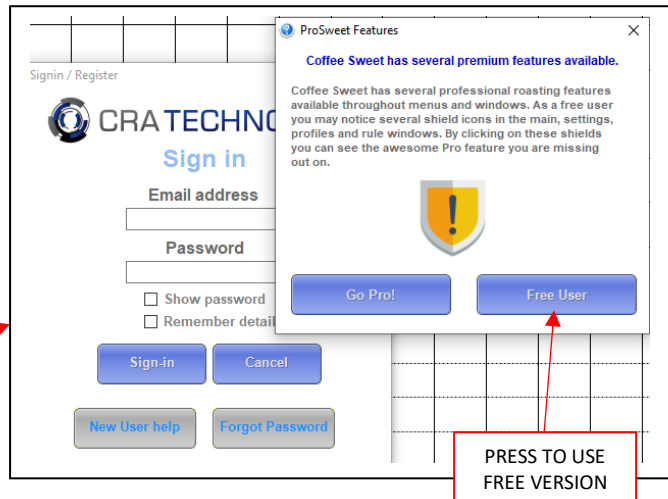
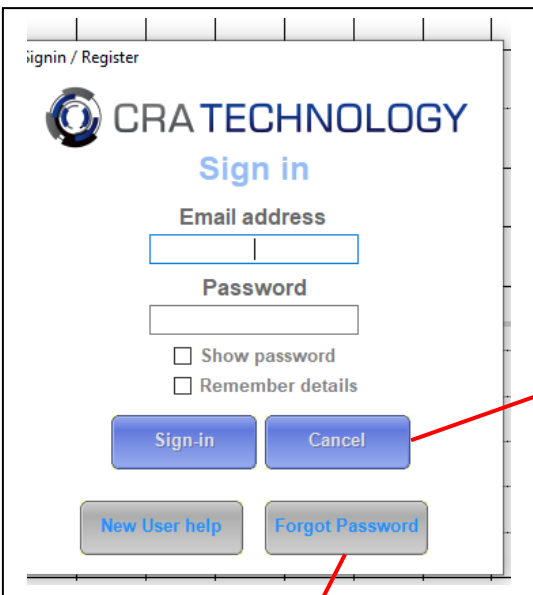
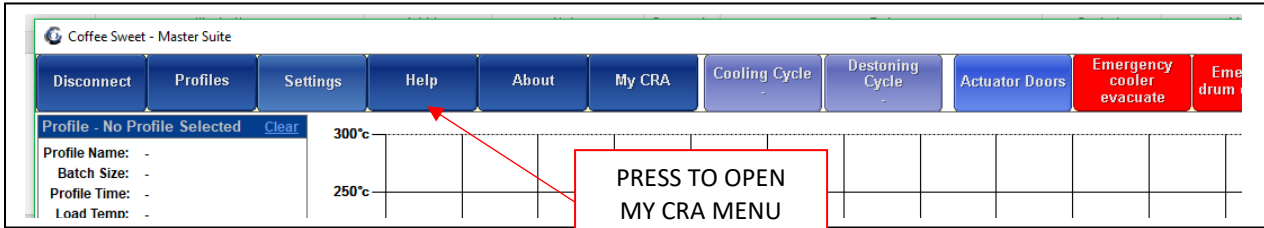


**PRESS TO SUPPORT MENU.  
NOTE THIS IS PASSWORD  
PROTECTED AND FOR USE BY  
DEVELOPERS FOR PROVIDED  
SUPPORT AND BUG  
MONITORING**

**LINK TO CRA WEBSHOP FOR  
PURCHASING PROSWEET  
LICENCE UPGRADE**

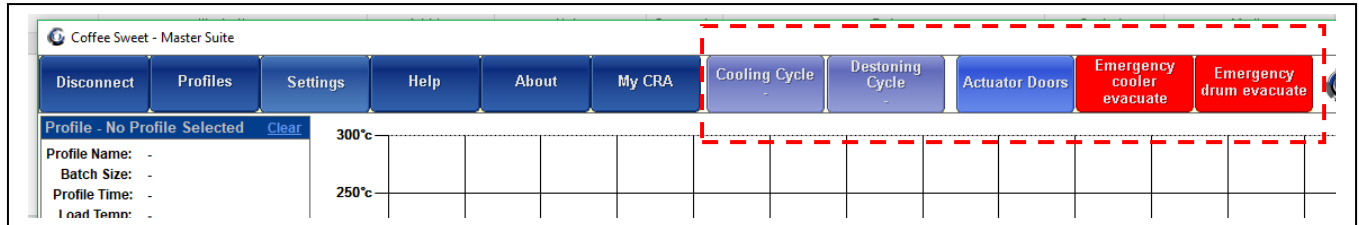
## 5.4 MY CRA

This menu allows the user to login and change passwords if they have a license subscription for PROSWEET and contains information about user license expiry. This menu only applies to users on a licensed version such as PROSWEET upgrade.



## 5.5 CRA Phantom Series GEN2 Controller – CONTROL BUTTONS

These buttons are only available to users with either Phantom Coffee Roasters or roasters that have been upgraded with Phantom GEN2 PCB controller.

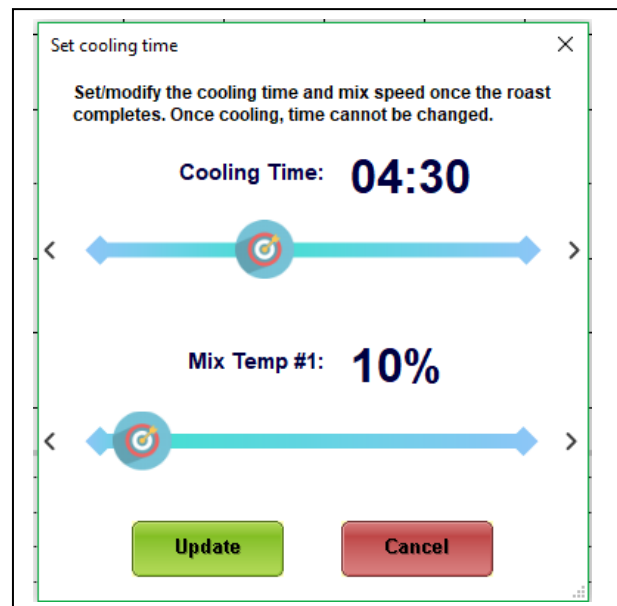


### 5.5.1 COOLING CYCLE

Set the automatic cooling time and mixer speed for once the roast has completed.

- **EXAMPLE:** After the coffee is dumped from the drum the cooler fan will run for 4:30min with the mixer at 10% speed.

**NOTE:** This menu can only be adjusted after starting a roast. You can adjust the mixer speed during the cooling process, but the time cannot be changed once cooling has started.



### 5.5.2 DESTONING CYCLE

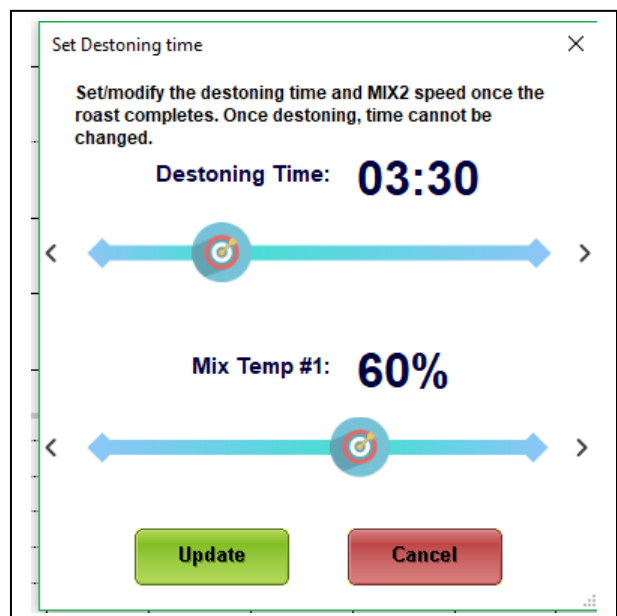
Set the automatic destoning time and mixer speed once the cooling process has completed.

- **EXAMPLE:** After the coffee is dumped from the cooling tray the destoner will run for 3:30min with the mixer at 60% speed.

**NOTE:** This menu can only be adjusted after starting a roast. You can adjust the mixer speed during the cooling process, but the time cannot be changed once cooling has started.

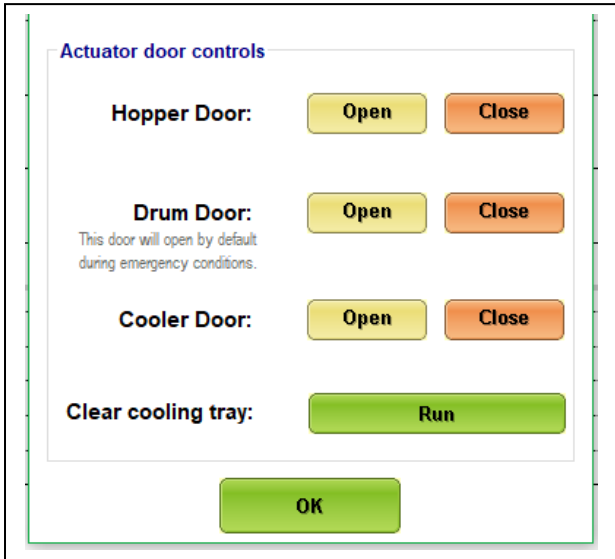
**NOTE:** The destoner has a ramp up period to ensure the fan I up to full speed prior to receiving coffee from the cooler tray.

**IMPORTANT – ENSURE THE COOLER DOOR ACTUATOR TIME IS AT MINIMUM EQUAL TO THE DESTONING TIME.**



### 5.5.3 ACTUATOR DOORS

This menu allows for manual control of the electric actuators controlling the doors.



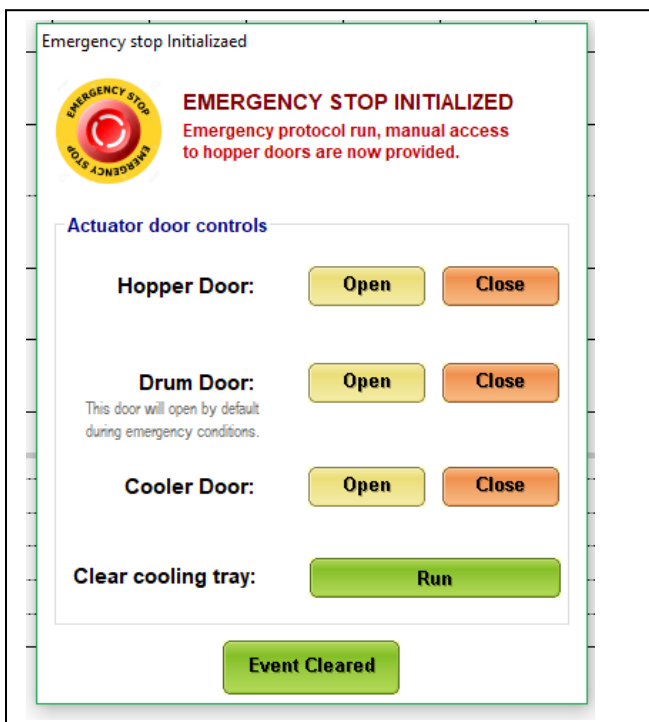
**NOTE: PRESSING THESE BUTTONS WILL ACTIVATE THE DOORS TO OPEN AT ANY STAGE WHETHER ROASTING OR NOT. IF MANUALLY OPERATING THE DOORS IT IS IMPORTANT TO MAKE SURE DOORS ARE IN THE CLOSED POSITION BEFORE PROCEEDING TO THE NEXT ROAST.**

### 5.5.4 EMERGENCY COOLER EVACUATE

This button is used to clear the cooling tray if the user has accidentally cancelled the “**COOLING AND DESTONING PROCESS**”. If pressed the Destoning process will commence activating the cooler mixer, cooler door and the destoner and will run for the cooling time set.

### 5.5.5 EMERGENCY DRUM EVACUATE

This button stops the roast and evacuates the drum by opening the drum door.



**NOTE: PRESSING THESE BUTTONS WILL IMMEDIATELY CANCEL THE ROAST AND THE DRUM DOOR WILL OPEN BUT THE COOLING CYCLE WILL NOT RUN. THIS IS FOR EMERGENCIES SUCH AS IN THE CASE OF A DRUM FIRE REQUIRING THE DRUM TO BE EVACUATED IMMEDIATELY.**

**ENSURE TO CLEAR EVENT ONCE SITUATION IS OK AND RETURN DRUM DOOR TO NORMAL POSITION.**

## 6.0 HOW TO ROAST USING COFFEE SWEET

Coffee Sweet allows for a unique roasting experience with various options to roast both manually and with various forms of automation. In this section we will cover the various forms of roasting that Coffee Sweet allows.

Roasting with Coffee Sweet can be categorized into the following modes:

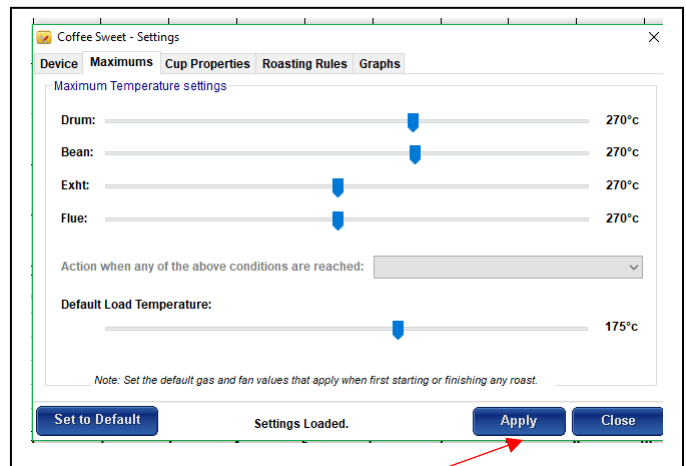
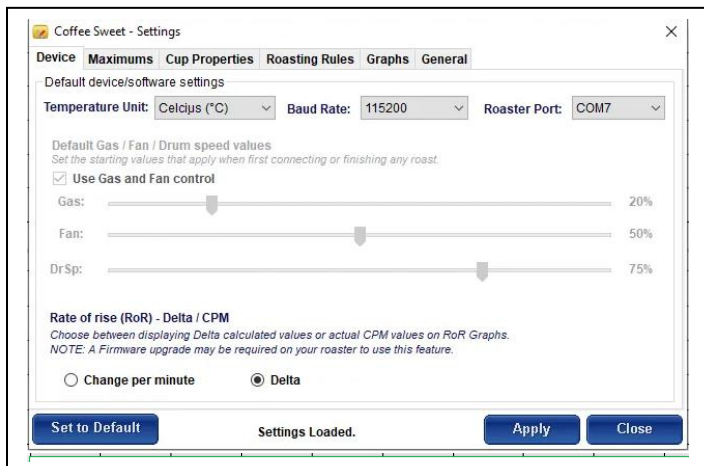
1. **MANUAL ROASTING**
  - OPTION WITH SETTINGS MENU BEAN TEMPERATURE BASED RULES
2. **MANUAL ROASTING WITH SAVED PROFILE AS BACKGROUND**
  - OPTION WITH SETTINGS MENU BEAN TEMPERATURE BASED RULES
  - OPTION WITH PROFILE SPECIFIC BEAN TEMPERATURE BASED RULES
3. **SAVED PROFILE AUTO ROASTING AS A COPY**

### 6.1 MANUAL ROASTING

#### 6.1.1 SETUP & STARTING A MANUAL ROAST

To setup up for a manual roast the user is required to go into the setting menu and enter their starting values for:

- **Gas 5.1.1 DEVICE TAB**
- **Fan 5.1.1 DEVICE TAB**
- **Drum Speed 5.1.1 DEVICE TAB**
- **Load Temperature 5.1.2 MAXIMUMS**



AFTER CHOOSING STARTING  
VALUES YOU MUST HIT APPLY  
BEFORE STARTING THE ROASTER

After applying settings hit start **START** button to commence roast.

**USERS MUST ALSO SET THE DUMP TEMPERATURE. THIS WILL AUTOMATICALLY STOP THE PROFILE AND DUMP THE COFFEE AT THIS TEMPERATURE. NOTE: IF NOT WANTING TO USE THIS FUNCTION SET IT HIGHER THAN PLANNED DUMP.**

**YOU CAN ALSO ADJUST THE LOAD TEMPERATURE FROM THIS BUTTON**

**START WILL COMMENCE THE PREHEAT PROCESS. GRAPH AND TIMER WILL START ONCE DRUM LOAD TEMPERATURE IS REACHED**

Profile: No Profile Selected  
 Profile Name: -  
 Batch Size: -  
 Profile Time: -  
 Load Temp: -  
 Dump Temp: -  
 RoR Mode: -  
 1st Crack: -  
 Turn Point: -

Development Times (Profile)  
 End Crack End Roast  
 1st Crack: -  
 2nd Crack: -

Data Glance (Live)  
 1st Crack: -  
 Turn Point: -  
 Development Times (Live)  
 End Crack End Roast  
 1st Crack: -  
 2nd Crack: -

SHOW/HIDE PROOF DELTA  
 Drum: 142°C -5.8°C  
 Bean: 141°C -5.4°C  
 Exhst: 143°C -6.1°C  
 Flue: 109°C -2.8°C  
 Gas: 0%  
 Fan: 60%  
 DSp: 0%

Notes: Add / Edit / Remove note

Ambient: 32°C Humidity: 40%

Load Temp: (Target) 150°C Dump Temp: (Target) 210°C 19:12 Start 1st Crack 2nd Crack Save Profile

Connected on COM3 - Firmware: 4.033

No profile selected

You have not selected a profile to run. Would you like to start a Manual roast?  
 The current Load temp is: 150°C

Yes No

**AFTER HITTING START YOU ARE PROMPTED TO CONFIRM THE LOAD TEMPERATURE IS CORRECT – PRESS YES TO CONTINUE AND BEGIN PREHEAT**

**BURNER OR FAN WILL MANAGE TO LOAD TEMP THE QUICKEST WAY AUTOMATICALLY.**

**NOTE: DATALOGGER USERS HAVE TO MANAGE THIS MANUALLY ON THEIR GAS/FAN CONTROLS**

**PREHEATING CONFIRMED IN STATUS BAR**

Profile: No Profile Selected  
 Profile Name: -  
 Batch Size: -  
 Profile Time: -  
 Load Temp: -  
 Dump Temp: -  
 RoR Mode: -  
 1st Crack: -  
 Turn Point: -

Development Times (Profile)  
 End Crack End Roast  
 1st Crack: -  
 2nd Crack: -

Data Glance (Live)  
 1st Crack: -  
 Turn Point: -  
 Development Times (Live)  
 End Crack End Roast  
 1st Crack: -  
 2nd Crack: -

SHOW/HIDE PROOF DELTA  
 Drum: 139°C -5.9°C  
 Bean: 139°C -5.3°C  
 Exhst: 141°C -5.8°C  
 Flue: 108°C -3.3°C  
 Gas: 100%  
 Fan: 45%  
 DSp: 95%

Notes: Add / Edit / Remove note

Ambient: 32°C Humidity: 40%

Load Temp: (Target) 150°C Dump Temp: (Target) 210°C 00:00 Stop 1st Crack 2nd Crack Save Profile

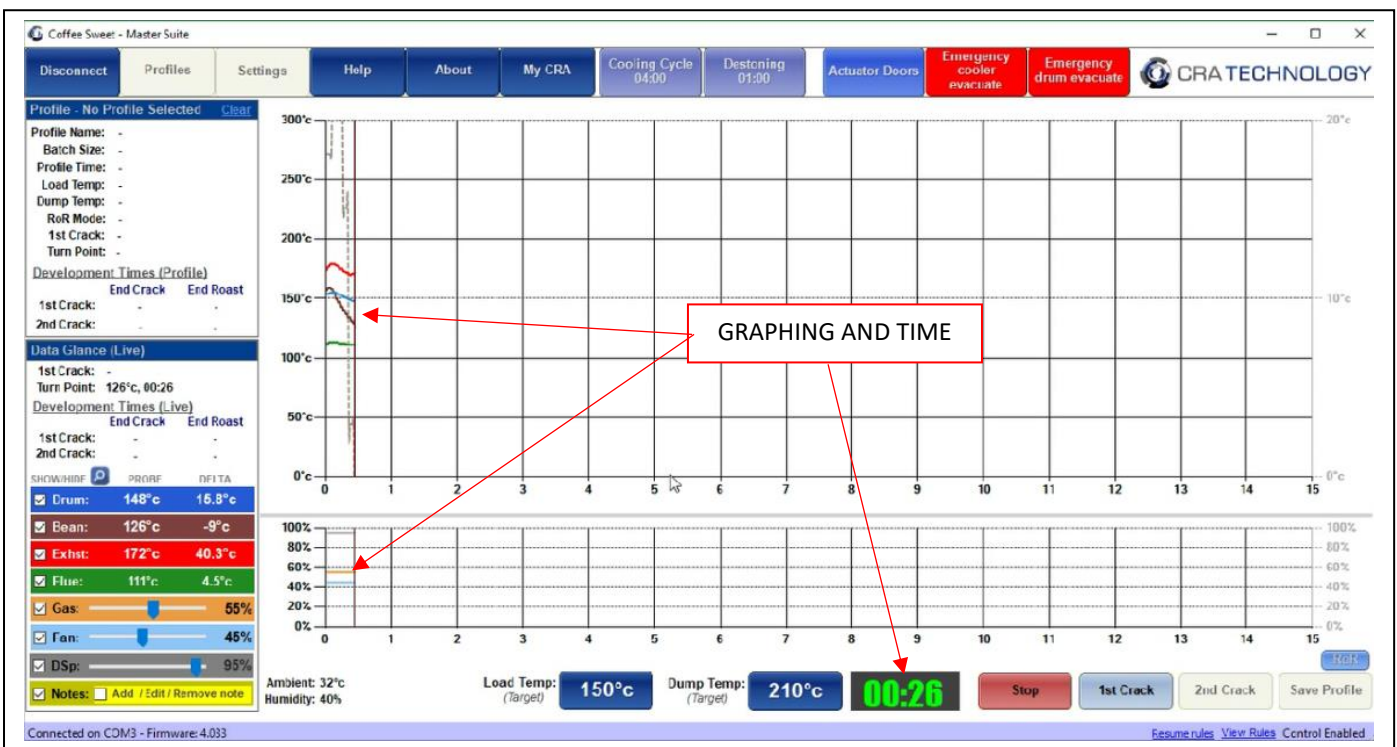
Connected on COM3 - Firmware: 4.033

Preheating drum for Manual Roast... Resume rules View Rules Control Enabled

When Load Temperature is reached on the Drum Probe, load beans either manually into the roaster or Phantom Roasters will load automatically via the actuator controlled hopper door.



The Graphing and profile timer will commence after the "Load Beans Now" prompts finished.

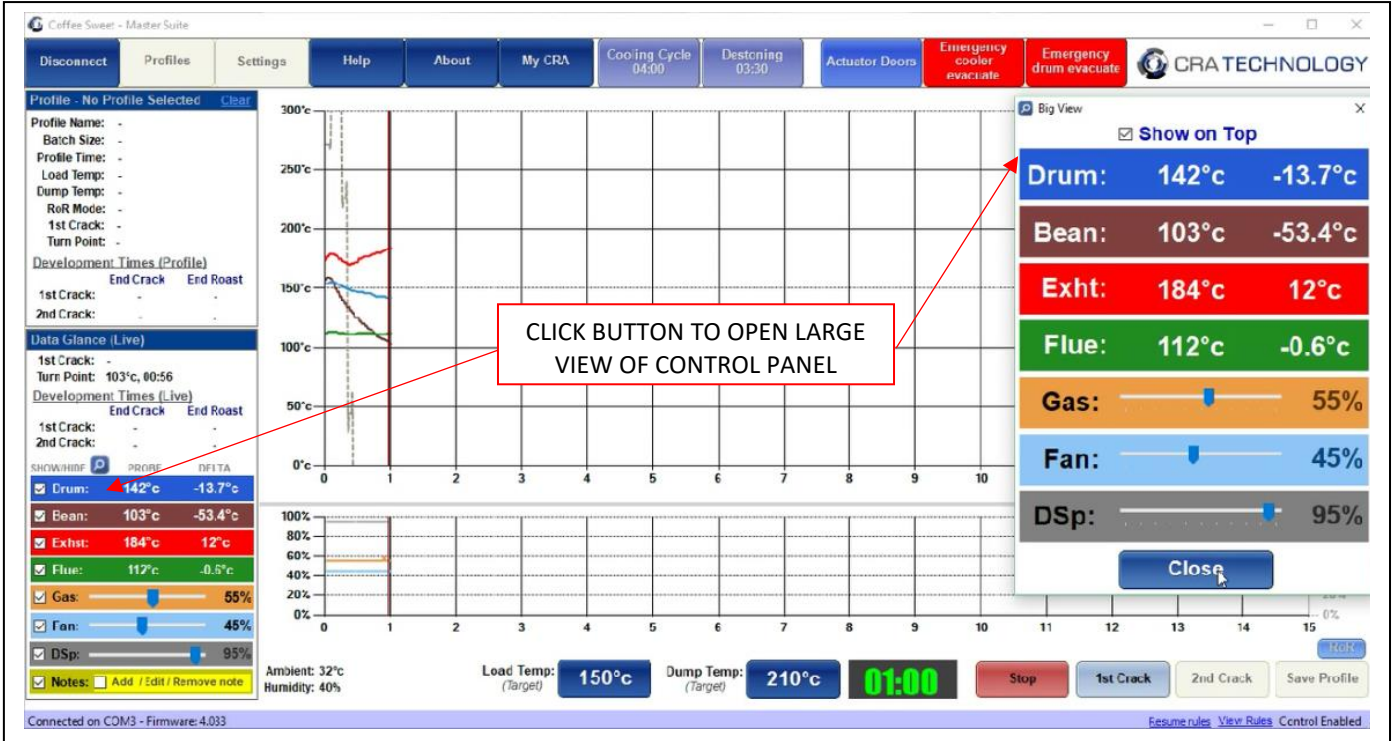


### 6.1.2 LIVE ROAST FEATURES

Coffee Sweet has a number on live roast features to allow the user to better monitor, control and analyse in realtime.

**NOTE: Some of these features are only available in the Pro Sweet licensed version.**

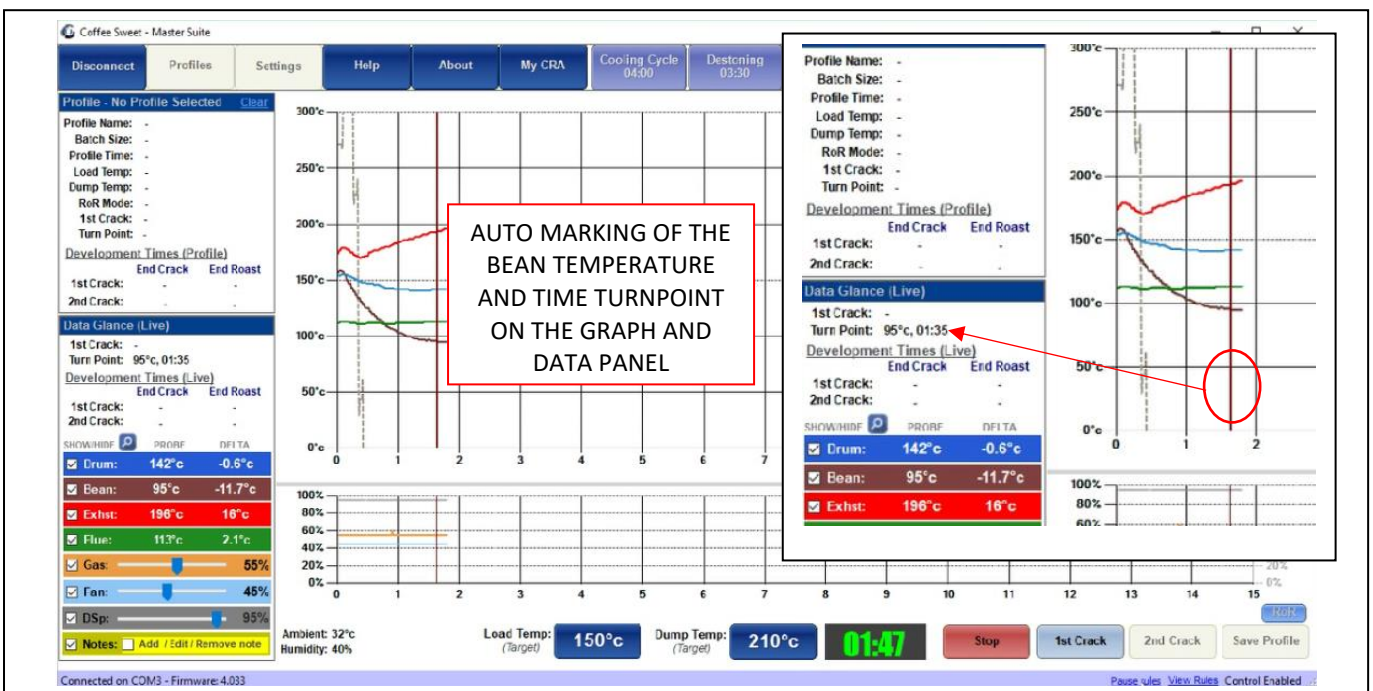
- **EXPANDED ROAST PANEL (PRO SWEET ONLY)**



**CLICK BUTTON TO OPEN LARGE VIEW OF CONTROL PANEL**

Component	Temperature (°C)	Delta (°C)
Drum	142	-13.7
Bean	103	-53.4
Exht	184	12
Flue	112	-0.6
Gas	55%	
Fan	45%	
DSp	95%	

- **TURN POINT BEAN TEMPERATURE (PRO SWEET ONLY)**



**AUTO MARKING OF THE BEAN TEMPERATURE AND TIME TURNPOINT ON THE GRAPH AND DATA PANEL**

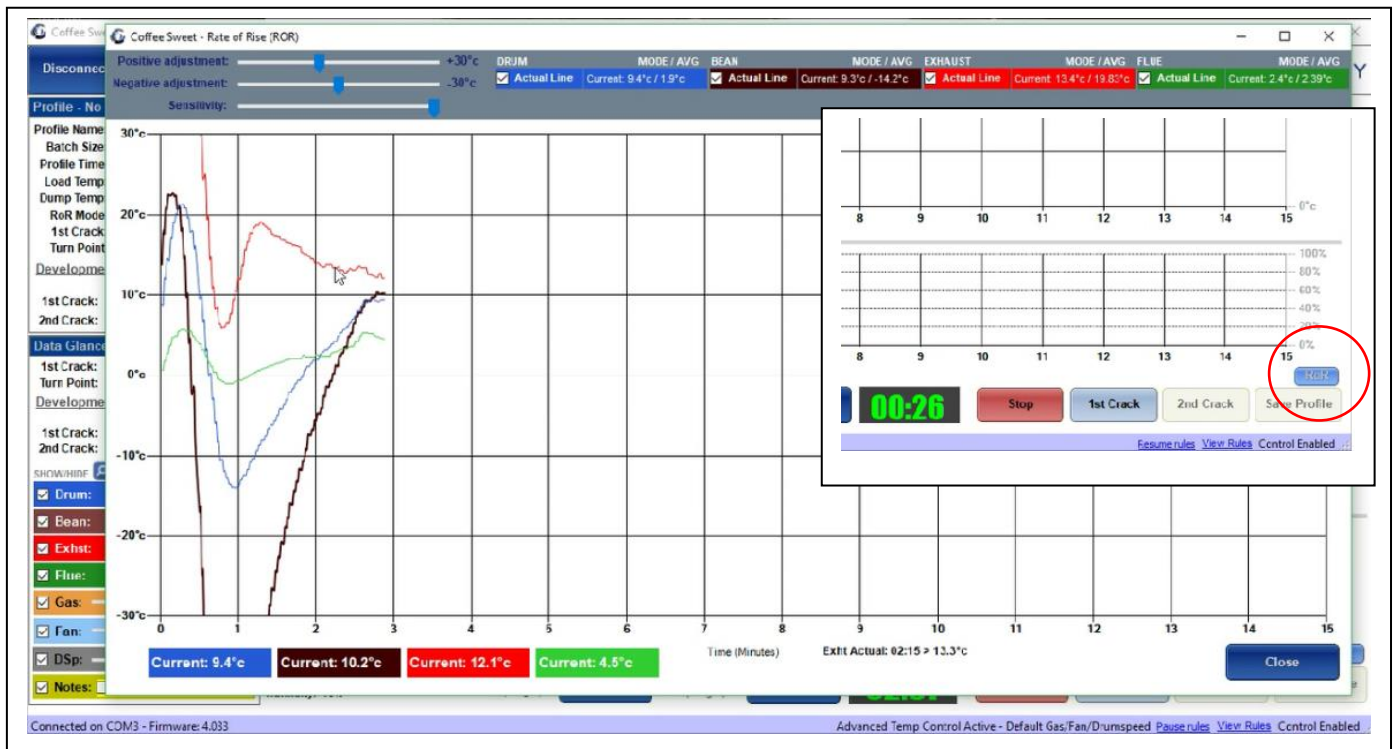
Component	Temperature (°C)	Delta (°C)
Drum	142	-0.6
Bean	95	-11.7
Exht	196	16
Flue	113	2.1
Gas	55%	
Fan	45%	
DSp	95%	

- REALTIME RESIZING OF MAIN GRAPHS (PRO SWEET ONLY)



- ROR DETAIL SCREEN FOR ALL THERMOCOUPLES

Click to reveal detail information and graphing of all thermocouple RoR.



• ADD NOTES TO PROFILES (PRO SWEET ONLY)

**ADD NOTE**

Add/Edit a note at this specific time for this profile.  
You must hit "Save local profile" to save your changes.

Time: 13:56

1st CRACK STOP!

Characters remaining: 186

**Add Note** **Cancel**

**TICK ADD NOTE THEN CLICK ON THE TIME POINT ON THE GRAPH TO ADD A NOTE. NOTES CAN BE SAVED AND UPDATED IN PROFILES**

Profile: No Profile Selected

Profile Name: -  
Batch Size: -  
Profile Time: -  
Load Temp: -  
Dump Temp: -  
RoR Mode: -  
1st Crack: -  
Turn Point: -

Development Times (Profile)

	End Crack	End Roast
1st Crack:	-	-
2nd Crack:	-	-

Data Glance (Live)

1st Crack: 189°C, 12:18  
Turn Point: 83°C, 01:53

Development Times (Live)

	End Crack	End Roast
1st Crack:	15:57%	15:57%
2nd Crack:	-	-

SHOW/HIDE PROBE DELTA

Drum:	211°C	2.9°C
Bean:	204°C	5°C
Exhst:	236°C	1.6°C
Flue:	151°C	1.2°C
Gas:	-	5%
Fan:	-	80%
RPM:	-	95%

Ambient: 35°C  
Humidity: 32%

Notes: Add / Edit / Remove note

Load Temp: (Target) 170°C  
Dump Temp: (Target) 220°C  
14:39  
Stop  
End 1st Crack  
2nd Crack  
Save Profile

Running Manual roast... Rule #3: 183°C - 215°C  
Temp Control: View Rules Control Enabled

• 1<sup>ST</sup> AND 2<sup>ND</sup> CRACK RECORDING

**CLICK TO START RECORDING 1<sup>ST</sup> CRACK PERIOD.**

Profile: No Profile Selected

Profile Name: -  
Batch Size: -  
Profile Time: -  
Load Temp: -  
Dump Temp: -  
RoR Mode: -  
1st Crack: -  
Turn Point: -

Development Times (Profile)

	End Crack	End Roast
1st Crack:	-	-
2nd Crack:	-	-

Data Glance (Live)

1st Crack: 190°C, 10:30  
Turn Point: 95°C, 01:35

Development Times (Live)

	End Crack	End Roast
1st Crack:	12:88% 01:37	12:88% 01:37
2nd Crack:	-	-

SHOW/HIDE PROBE DELTA

Drum:	212°C	2.9°C
Bean:	210°C	10.3°C
Exhst:	237°C	0.4°C
Flue:	148°C	1.9°C
Gas:	-	0%
Fan:	-	80%
DSp:	-	95%

Ambient: 34°C  
Humidity: 37%

Notes: Add / Edit / Remove note

Load Temp: (Target) 150°C  
Dump Temp: (Target) 210°C  
12:29  
Stop  
End 1st Crack  
2nd Crack  
Save Profile

Temp Control paused... Resume rules View Rules Control Enabled

- **BEAN TEMPERATURE BASED RULES FOR GAS,FAN,DRUM CONTROL (PRO SWEET ONLY FOR UNLIMITED RULES AND DRUM SPEED RULES)**

The screenshot shows the 'Coffee Sweet - Master Suite' interface. A 'Temp control rules from Settings' window is open, displaying a table of active rules. The main interface shows a temperature graph, various control sliders (Drum, Bean, Exhst, Flue, Gas, Fan, DSpr), and a status bar at the bottom.

Enabled	From (°)	To (°)	Gas (%)	Fan (%)	Drum Speed (%)	Instances
Yes	165°	175°	30%	60%	90%	0
Yes	176°	185°	25%	70%	95%	0
Yes	186°	210°	10%	80%	95%	0

Currently Running

Update Close

Flue temp: 05:47 > 126°c

Ambient: 34°c Humidity: 38%

Load Temp: 150°c (Target) Dump Temp: 210°c (Target) 09:25

Stop 1st Crack 2nd Crack Save Profile

Rule #2: 176°c - 185°c Pause rules View Rules Control Enabled

Rules can be updated and saved in real-time during roasting.

REFER TO: **5.1.4 ROASTING RULES** ON HOW TO SET AND ADJUST RULES

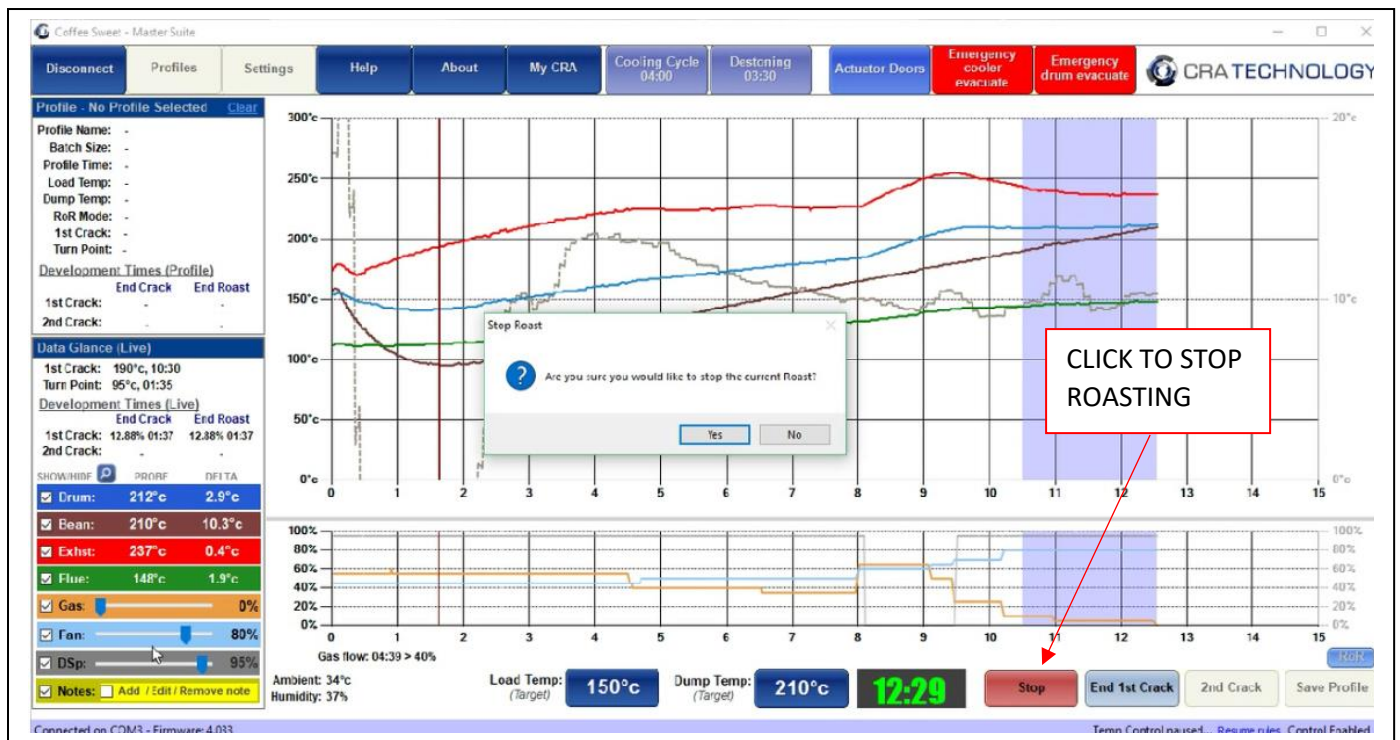
STATUS BAR WILL INDICATE WHICH RULE IS RUNNING AND RULE WILL BE HIGHLIGHTED RED IN WINDOW

**TO ENABLE CONTROL WHEN A RULE IS RUNNING PRESS PAUSE RULES**

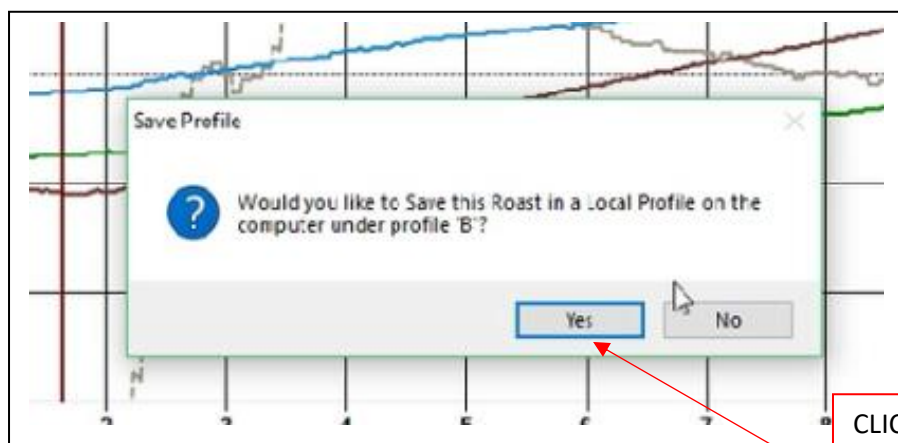
CLICK TO VIEW RULES MENU WHEN ROASTING

This is a close-up of the 'Temp control rules from Settings' window. Red arrows point from the annotations to the 'View Rules' link in the status bar and the '1st Crack' button.

### 6.1.3.1 STOPPING AND SAVING A MANUAL ROAST – GEN 1

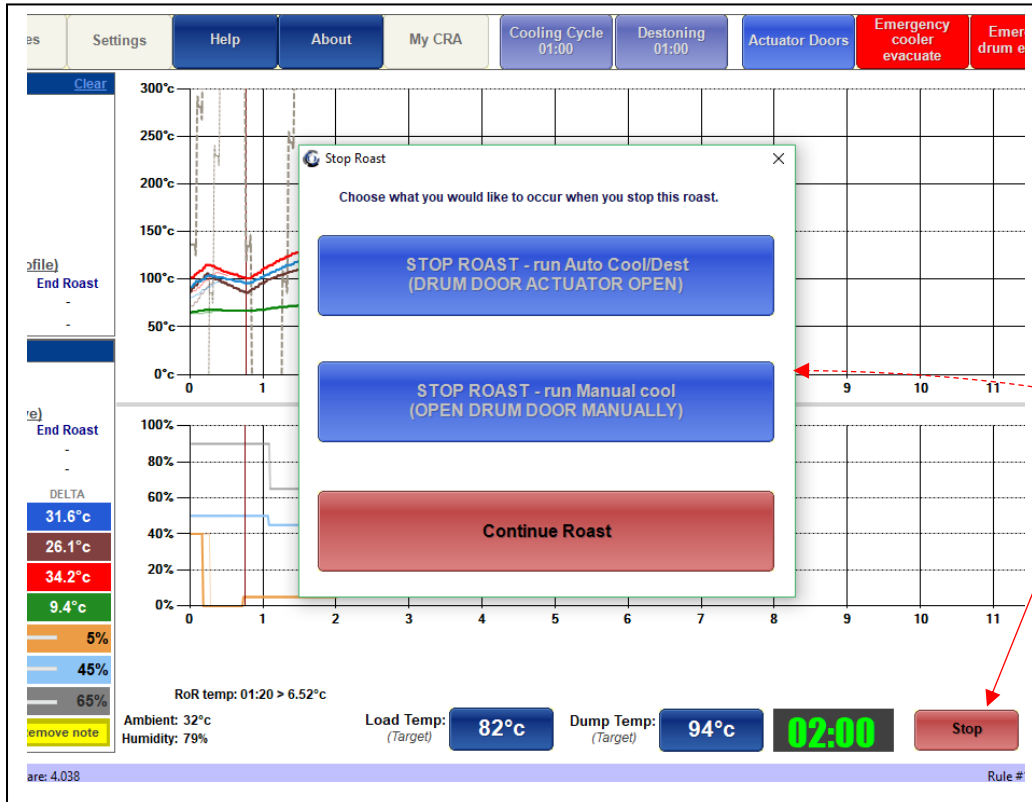


After clicking “STOP” you will be asked to confirm you want to stop the roast. If you click “NO” the prompt box will close and roasting will continue. If you click “YES” the roast will stop for the DATALOGGER and GEN 1 VERSIONS and you will be prompted whether you wish to save the profile.

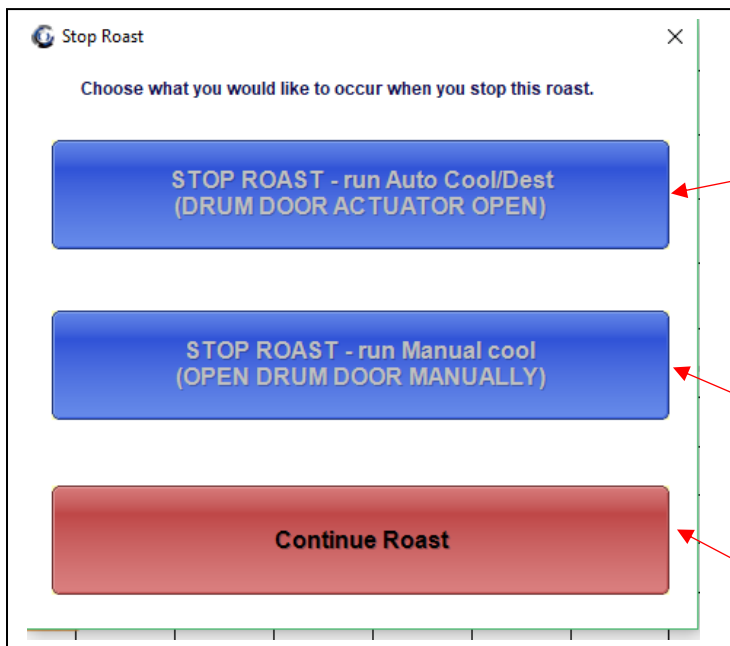


### 6.1.3.1 STOPPING AND SAVING A MANUAL ROAST – GEN 2 PHANTOM

PHANTOM GEN 2 CONTROLLERS have 2 options for ending a roast due to some systems having automation for dumping, cooling and destoning and others running manually. If you are mostly running the cooling process manually it is recommended to disable drum door actuator and operate the drum door manually by hand.



CLICK "STOP" TO OPEN PROMPT BOX WITH OPTIONS FOR STOPPING THE ROAST



### 2 OPTIONS FOR ENDING A ROAST

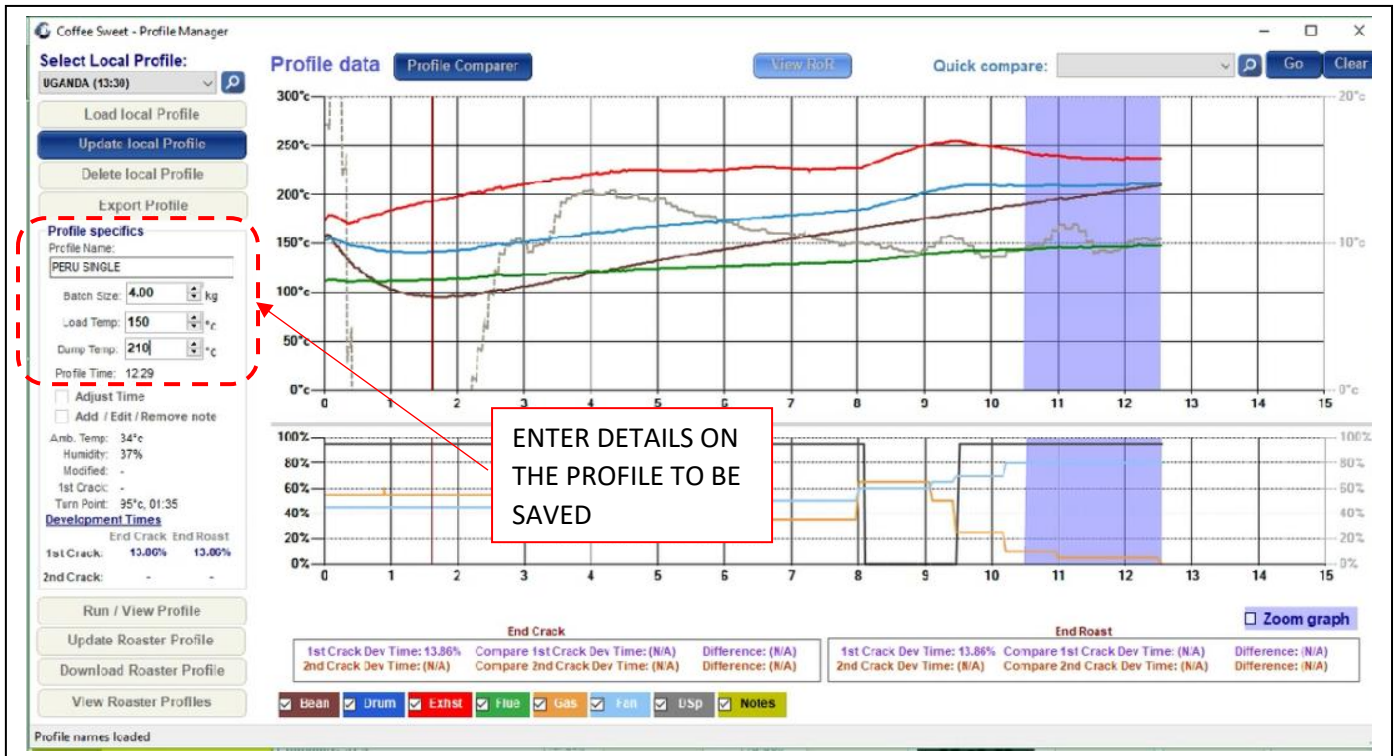
**STOPS ROAST – OPENS DRUM DOOR ACTUATOR – RUNS AUTO COOLING/DESTONING PROCESS – THEN PROMPTED TO SAVE**

**STOPS ROAST – DRUM DOOR MUST BE OPENED MANUALLY BY HAND AND COOLING STARTED MANUALLY (OR ACTUATOR OVERRIDE FOR AUTO DOOR IF ENABLED) – THEN PROMPTED TO SAVE**

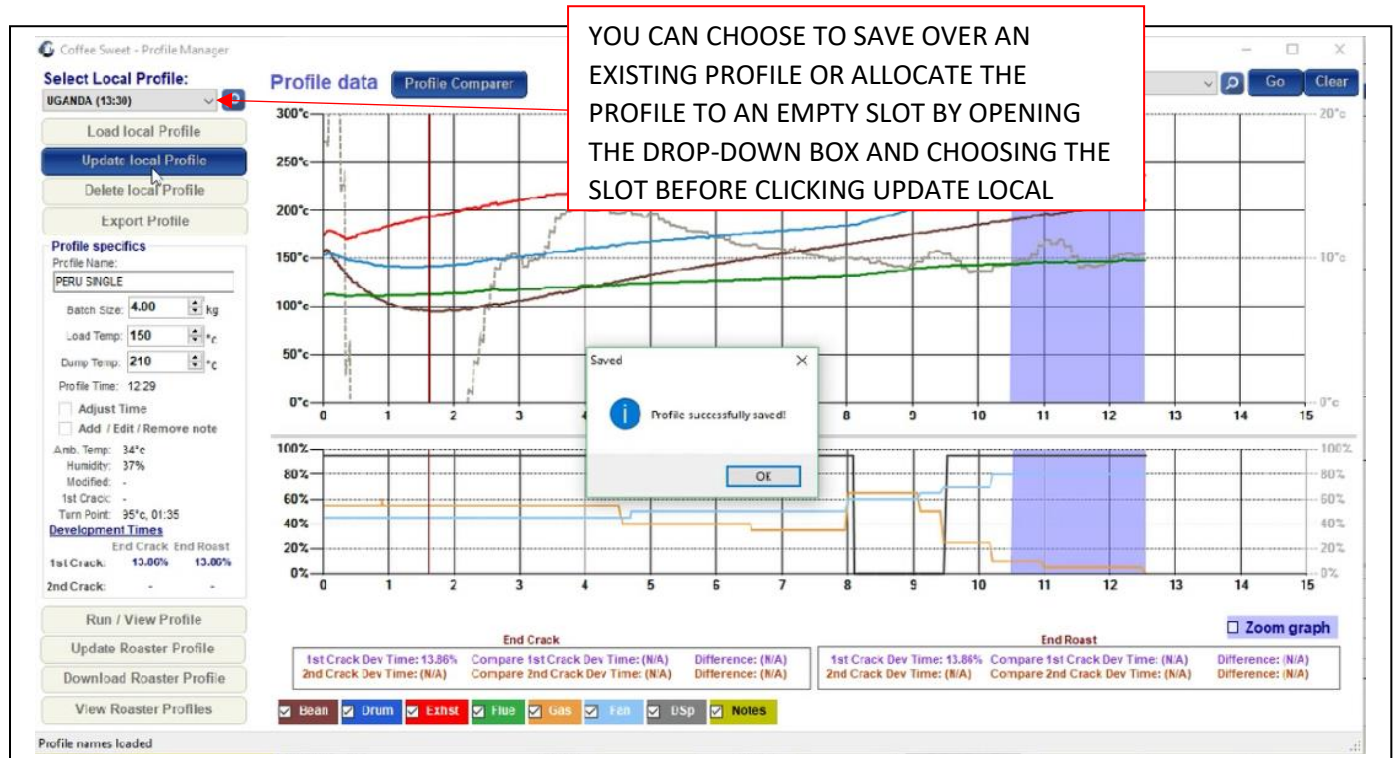
**CONTINUE ROASTING WITHOUT STOPPING – RETURNS TO ROASTING SCREEN**

### 6.1.4 SAVING THE PROFILE

After finishing a manual roast and choosing the save the profile you will be directed to the PROFILES area.



To SAVE your changes click **“UPDATE LOCAL PROFILE”** which means to save the profile on the PC.



You are also prompted for GEN1 and GEN2 Controllers if you wish to save the profile also to the PCB Controllers memory. You only need to do this if you wish to use the **SAVED PROFILE AUTO ROASTING AS A COPY** mode for roasting. Refer to section XXXX for more information on this roasting mode.

The screenshot shows the 'Profile Manager' interface with a 'Profile data' graph. A dialog box titled 'Run or View profile' is open, asking: 'Would you like to send this Profile update to the Roaster? Note: This may several minutes to complete.' The dialog has 'Yes' and 'No' buttons. A red box highlights the 'No' button with the text: 'CLICK NO IF NOT GOING TO BE USING PCB PROFILE MEMORY'. The background graph shows temperature curves for different profiles over time, with a blue shaded region indicating a specific time range.

### 6.1.5 LOADING THE PROFILE

To load the profile you can select it from the drop down menu then click **LOAD LOCAL PROFILE**

This screenshot shows the 'Select Local Profile' dropdown menu in the 'Profile Manager' interface. The menu is open, displaying a list of profiles including 'PERU SINGLE (12:29)', 'PRISM BLEND (16:14)', 'MARK GROGAN CAFE BLEND', 'NIC 10KG TEST (14:15)', 'COLUMBIAN CAPSULE (16:11)', 'TEST 3 COSTA ESPRESSO (1- Training 0th May (14:27))', 'CLASSIC BLACK CAPSULE L SPECIALTY GOLD 2ND (14:37)', 'PERJ ORGANIC (13:14)', 'LB BLEND - MIKALOT (14:22)', and 'LB MIXALOT 2 (14:44)'. The 'PERU SINGLE (12:29)' profile is selected. The 'Load local Profile' button is highlighted with a red arrow pointing to it.

This screenshot shows the 'Profile Manager' interface after the profile has been loaded. The 'Load local Profile' button is highlighted with a red arrow. The 'Profile data' graph shows the temperature curves for the selected profile. The 'Profile specifics' section shows the profile name 'PERU SINGLE' and various parameters like Batch Size (4.00 kg), Load Temp (150 °C), and Dump Temp (210 °C). The 'Run / View Profile' button is also visible.

You can also load a profile through the **ADVANCED PROFILE SEARCH** function:

**CLICK TO OPEN SEARCH FUNCTION**

#	Cup score	Profile name	Time	Batch size	Load temp	Dump temp	Modified
1	0/10	UGANDA	02:31	10kg	175°C	206°C	23-Jan-18
2	0/10	PERU SINGLE	12:29	4.00kg	150°C	210°C	27-Jan-18
3	0/10	PRISM BLEND	16:14	5kg	170°C	157°C	21-Sep-17
4	0/10	MARK GROGAN CAFE BLEND	15:12	15kg	180°C	211°C	17-Mar-16
5	0/10	Mark Grogan Cafe Blend	13:23	15kg	180°C	211°C	04-Oct-17
6	0/10	vsdbv	00:58	120.5kg	35°C	40°C	27-Jan-18
7	0/10	NIC 10KG TEST	14:15	10kg	160°C	209°C	23-Jul-16
8	0/10	COLUMBIAN CAPSULE	16:11	12kg	170°C	195°C	22-Oct-15
9	0/10	TEST 3 COSTA ESPRESSO	14:10	5kg	140°C	206°C	29-Sep-17
10	0/10	Training 6th May	14:27	15kg	36°C	210°C	08-Sep-16
11	0/10	CLASSIC BLACK CAPSULE LB	15:21	15kg	180°C	214°C	26-Jul-16
12	0/10	SPECIALTY GOLD 2ND	14:37	0kg	100°C	214°C	18-Jul-17
13	0/10	PERU ORGANIC	13:14	7kg	175°C	209°C	08-Aug-17
14	0/10	LB BLEND - MIXALOT	14:22	16kg	185°C	207°C	26-Sep-17
15	0/10	LB MIXALOT 2	14:44	16kg	180°C	207°C	28-Sep-17
16	0/10	BRAZIL NAT	13:16	4kg	150°C	209°C	27-Jan-18
43	0/10	Nicaragua1 1.2 23%	08:16	1kg	160°C	190°C	23-Jan-18

This function allows you to see more detail on the profiles and search for specific profiles easier with various filters.

**CLICK TO LOAD PROFILE**

#	Cup score	Profile name	Time	Batch size	Load temp	Dump temp	Modified
2	0/10	PERU SINGLE	12:29	4.00kg	150°C	210°C	27-Jan-18
16	0/10	BRAZIL NAT	13:16	4kg	150°C	209°C	27-Jan-18

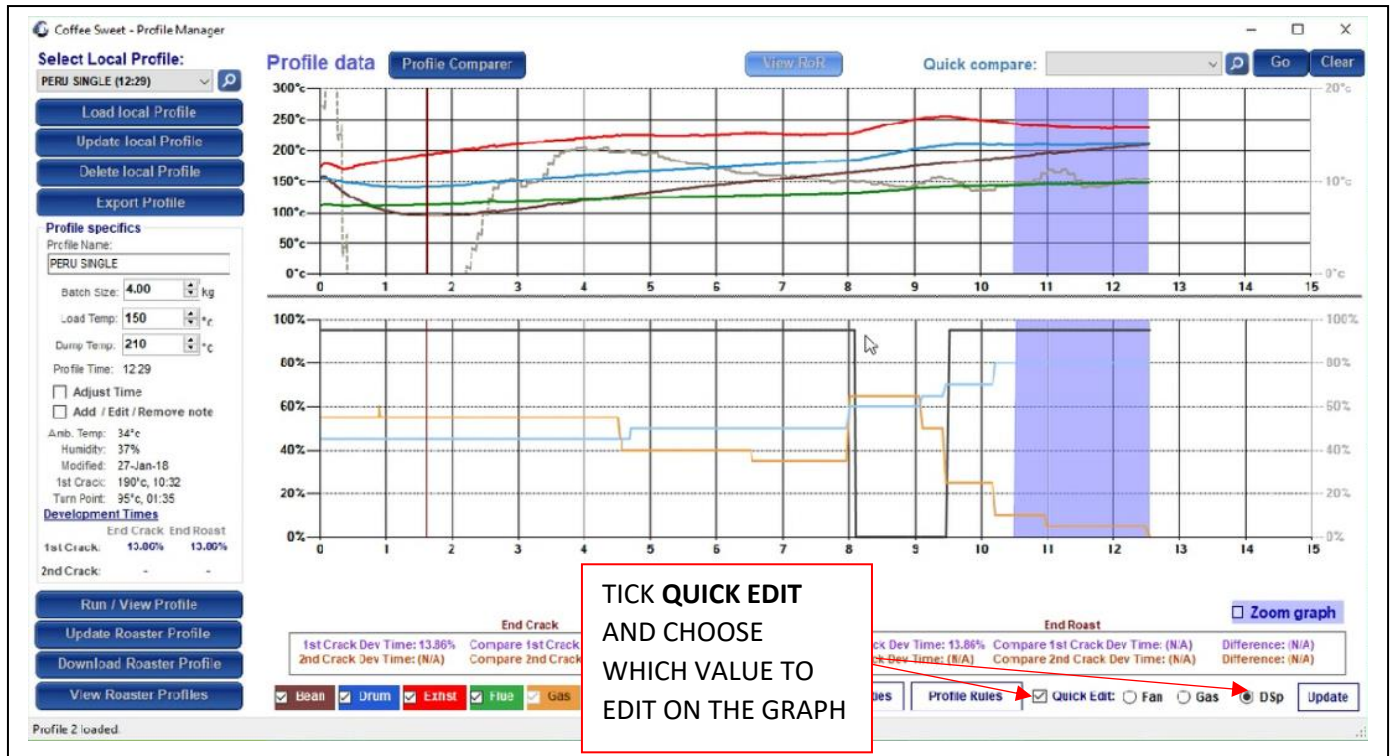
**SEARCH PROFILES BY:**

- NAME
- CUP SCORE
- ROAST TIME RANGE
- LOAD TEMP RANGE
- DUMP TEMP RANGE
- MODIFICATION DATE RANGE

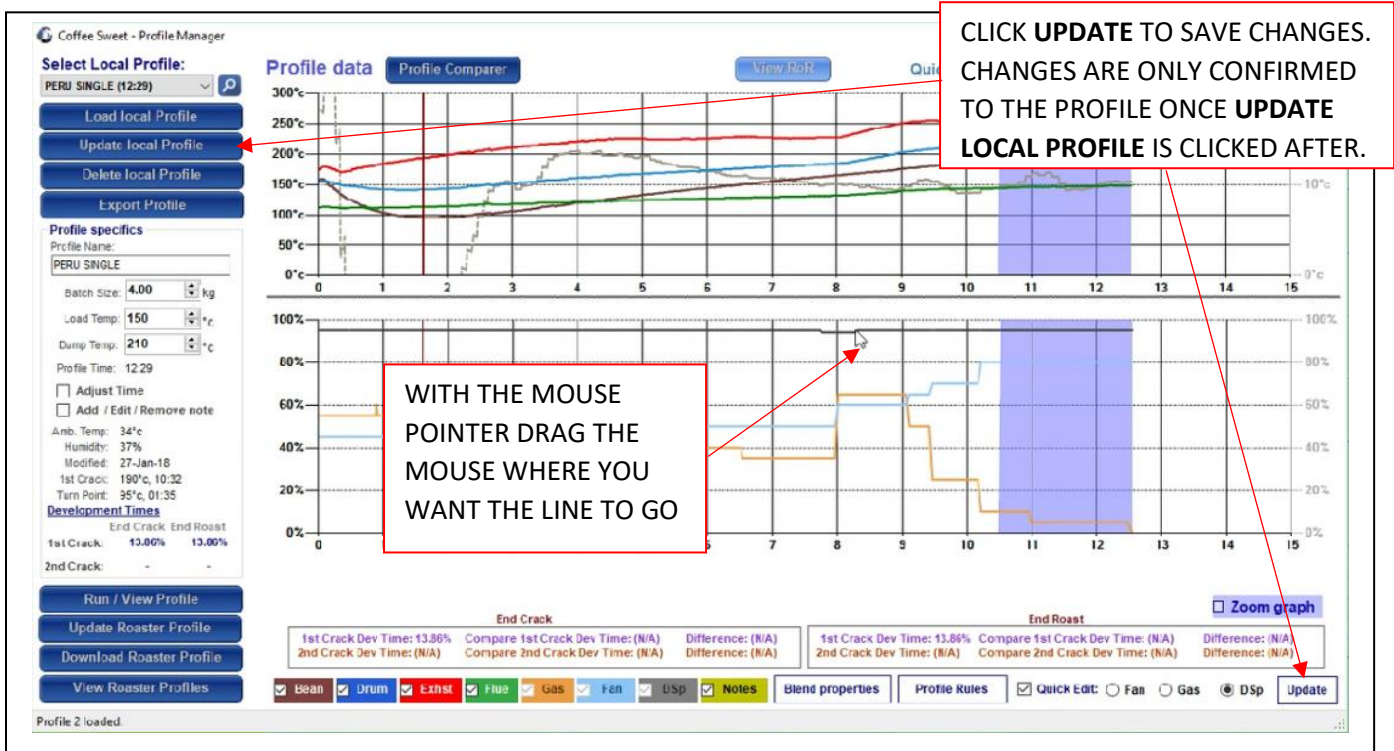
## SAVED PROFILE EDITING FEATURES

### 6.1.6 EDIT GAS, FAN, DRUM SPEED (Drum Speed on in PRO SWEET)

The gas, fan and drum speed graphs can be edited in a saved profile



In this example the drum speed graph is being edited.



### 6.1.7 ADJUST PROFILE TIME

You can adjust a saved profiles time. This feature is useful when the saved profile end time is after the actual profile time because the profile was not stopped immediately when dumping and there are dags at the end of the roast.

**Adjust Profile Time**

Are you sure you would like to reduce the profile time?  
Please note: This feature cannot be undone.

Old time: 16:14  
New time: 15:15

Adjust Time

TICK "ADJUST TIME" THEN CLICK THE MOUSE POINTER ON THE TIME ON THE GRAPH YOU WANT TO FINISH TH PROFILE AT

**NOTE:** Once these changes are confirmed they are permanent.

**Profile Time:** 15:01

Adjust Time

GRAPH AND PROFILE TIMES IS UPDATED AFTER CONFIRMING CHANGES

### 6.1.8 ADD NOTES (PRO SWEET ONLY)

Notes can be added to saved profiles graphs using this feature.

**Profile data** Profile Comparer View RoR Quick compare: Go Clear

**Select Local Profile:** BRAZIL NAT (13:16)

Load local Profile Update local Profile Delete local Profile Export Profile

**Profile specifics**  
 Profile Name: BRAZIL NAT  
 Batch Size: 4.00 kg  
 Load Temp: 150 °C  
 Dump Temp: 209 °C  
 Profile Time: 13:16  
 Adjust Time  
 Add / Edit / Remove note  
 Amb. Temp: 37 °C  
 Humidity: 34%  
 Modified: 27-Jan-18  
 1st Crack: 190 °C, 10:20  
 Turn Point: 97 °C, 01:04

**Add Note**  
 Add/Edit a note at this specific time for this profile. You must hit "Save local profile" to save your changes.  
 Time: 04:10  
 YELLOW START  
 Characters remaining: 188  
 Add Note Cancel

**ENTER NOTE THEN CLICK "ADD NOTE" TO PLACE ON THE GRAPH**

**TICK "ADD NOTE" THEN CLICK ON THE AREA ON THE GRAPH YOU WANT TO ADD THE NOTE**

End Crack: 20.53% Compare 1st Crack Dev Time: (N/A) Difference: (N/A) Compare 2nd Crack Dev Time: (N/A) Difference: (N/A)  
 End Roast: 1st Crack Dev Time: 20.53% Compare 1st Crack Dev Time: (N/A) Difference: (N/A) 2nd Crack Dev Time: (N/A) Compare 2nd Crack Dev Time: (N/A) Difference: (N/A)

Exhst Flue Gas Fan DSP Notes Blend properties Profile Rules Quick Edit: Fan Gas DSP Update

Profile 16 loaded.

**TIP: Remember to Update Local Profile if wanting to save notes to the profile.**

**Profile data** Profile Comparer View RoR Quick compare: Go Clear

**Select Local Profile:** BRAZIL NAT (13:16)

Load local Profile Update local Profile Delete local Profile Export Profile

**Profile specifics**  
 Profile Name: BRAZIL NAT  
 Batch Size: 4.00 kg  
 Load Temp: 150 °C  
 Dump Temp: 209 °C  
 Profile Time: 13:16  
 Adjust Time  
 Add / Edit / Remove note  
 Amb. Temp: 37 °C  
 Humidity: 34%  
 Modified: 27-Jan-18  
 1st Crack: 190 °C, 10:20  
 Turn Point: 97 °C, 01:04

**Development Times**  
 End Crack: 20.53% End Roast: 20.53%  
 1st Crack: 190 °C, 10:20  
 2nd Crack: -

**NOTE IS PLACED ON THE GRAPH**

End Crack: 20.53% Compare 1st Crack Dev Time: (N/A) Difference: (N/A) Compare 2nd Crack Dev Time: (N/A) Difference: (N/A)  
 End Roast: 1st Crack Dev Time: 20.53% Compare 1st Crack Dev Time: (N/A) Difference: (N/A) 2nd Crack Dev Time: (N/A) Compare 2nd Crack Dev Time: (N/A) Difference: (N/A)

Note: 12:52  
 Bean Drum Exhst Flue Gas Fan DSP Notes Blend properties Profile Rules Quick Edit: Fan Gas DSP Update

Profile 16 loaded.

## 6.1.9 BLEND PROPERTIES

### 6.1.9.1 BLEND ORIGINS (PRO SWEET ONLY)

**Blend Properties**

Blend Origins | Cupping

Coffee #	Blend %	KGs	Country	Estate	Variety	Harvest Date	Certificates	Process	Scr
COFFEE 1	50	2	BRAZIL	SANTOS	RED BOURBON	NOV	NA	NATURAL	16
COFFEE 2	50	2	PERU	NORTE	TYPICA	JUL	FTO	WASHED	17
COFFEE 3									
COFFEE 4									
COFFEE 5									
COFFEE 6									
COFFEE 7									
COFFEE 8									
COFFEE 9									
COFFEE 10									

End weight: 5.85 kg  
 Weight loss %: 16.43 %  
 Weight loss kg: 1.15 kg

Colour: 53 Agtron  
 Blend Cup score: 85

Update Close

Bean Drum Sp Notes Blend properties Profile Rules Quick Edit: Fan Gas DSp Update

### 6.1.9.2 CUPPING

**Blend Properties**

Blend Origins | Cupping

**Cup Profiles**

- Acidity: 8
- After Taste: 9
- Clean Cup: 8
- Head: 8
- Fragrance: 9
- Sweetness: 9
- Aroma: 8
- Balance: 8
- Body: 10
- Flavour: 8

Notes: FULL BODIED WITH NOTES OF CARAMEL, RED BERRY. CLEAN WITH MEDIUM ACIDITY.

Update Close

**Total Score: 85**

## SAVED PROFILE ANALYTICAL FEATURES

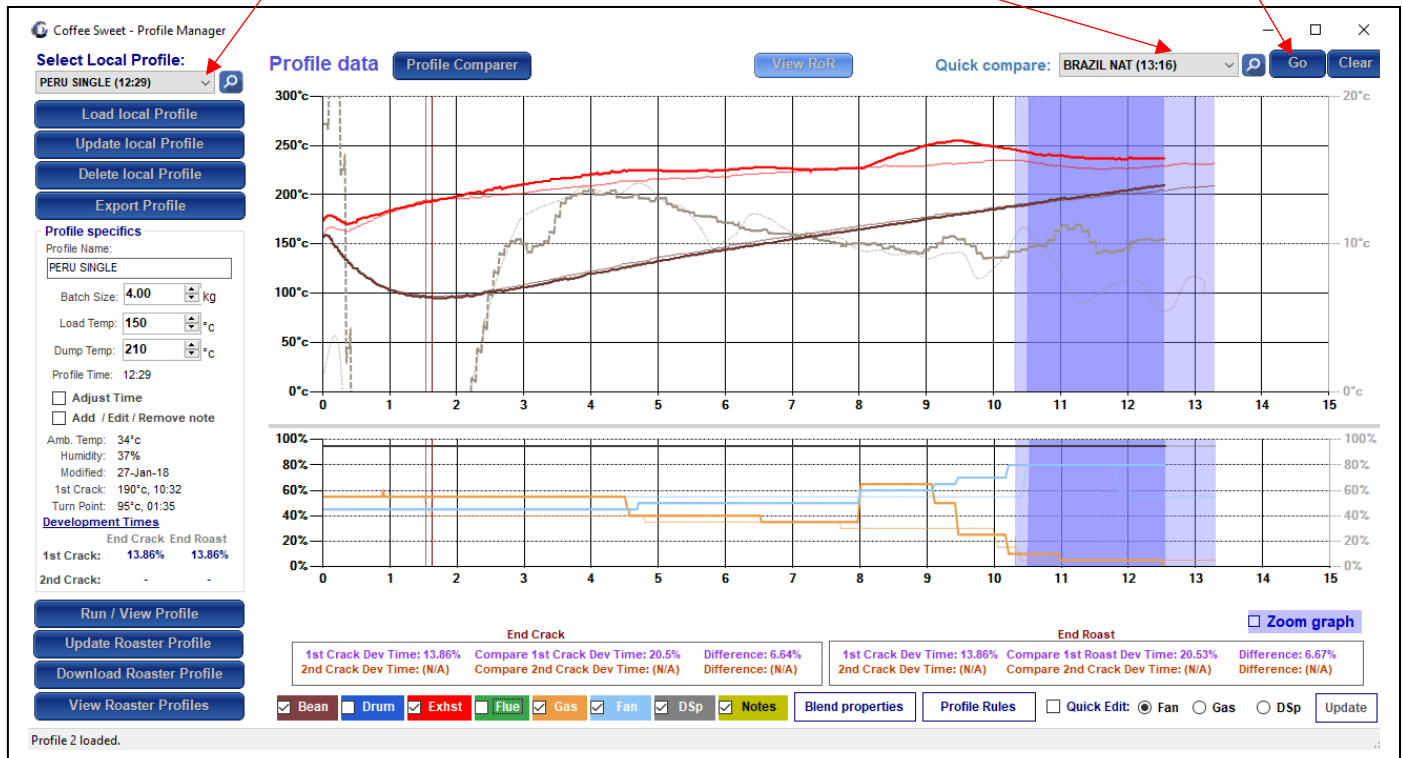
### 6.1.10 QUICK COMPARE PROFILE

This feature allows 2 profiles to be compared with each other.

SELECT  
FOREGROUND  
PROFILEC

SELECT  
BACKGROUND  
PROFILE

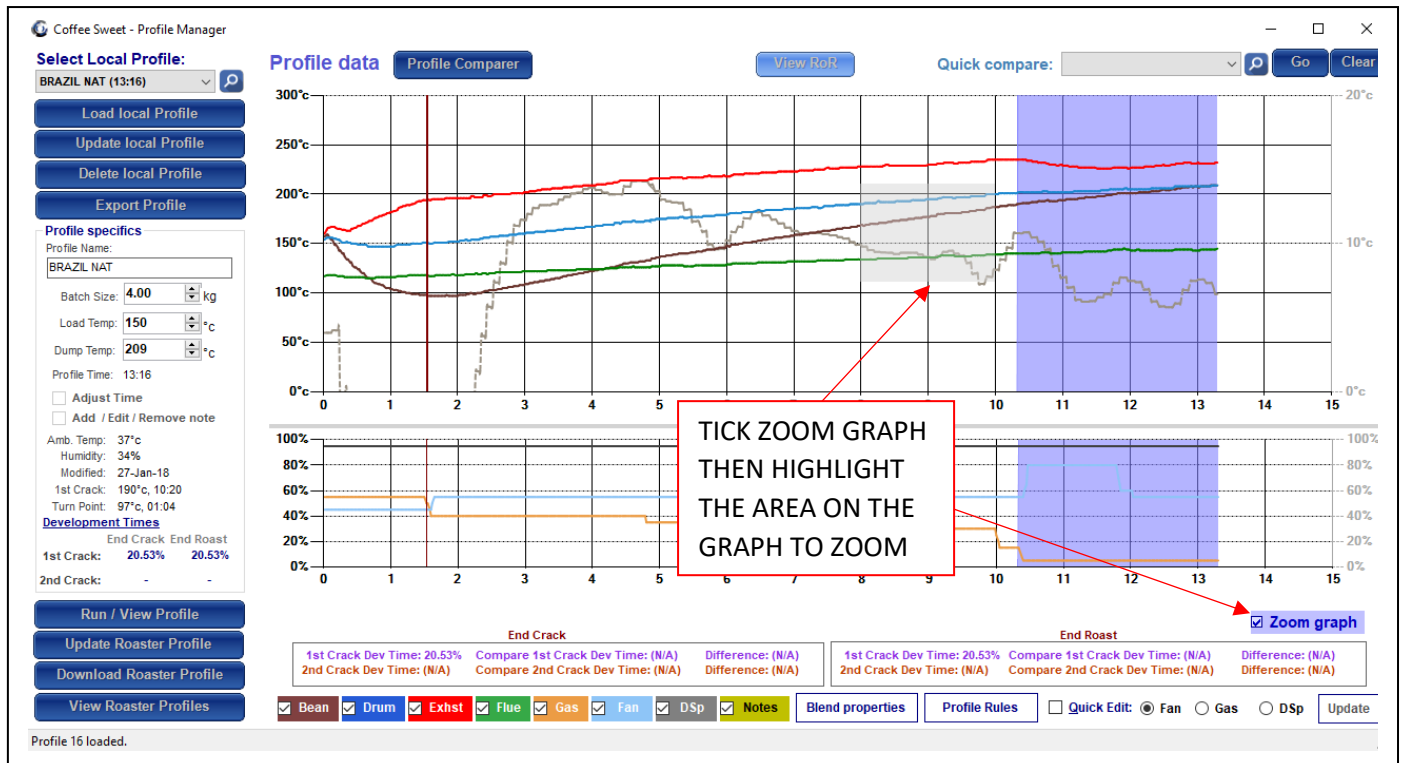
CLICK "GO"  
TO COMPARE  
ON GRAPHS



TIP: Use the hide/show graph lines to make visual comparisons easier.

### 6.1.11 ZOOM GRAPH (PRO SWEET ONLY)

This feature allows the user to ZOOM in on graph areas.



TICK ZOOM GRAPH THEN HIGHLIGHT THE AREA ON THE GRAPH TO ZOOM

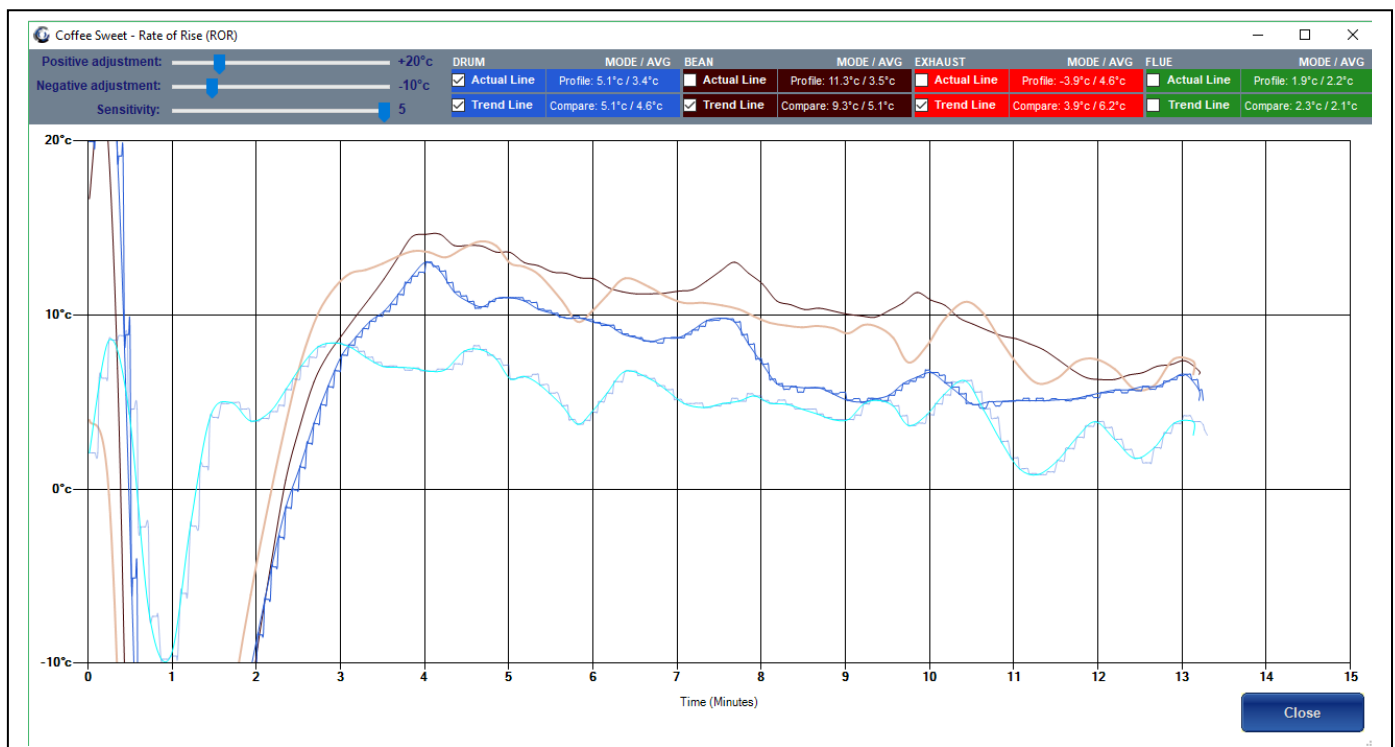
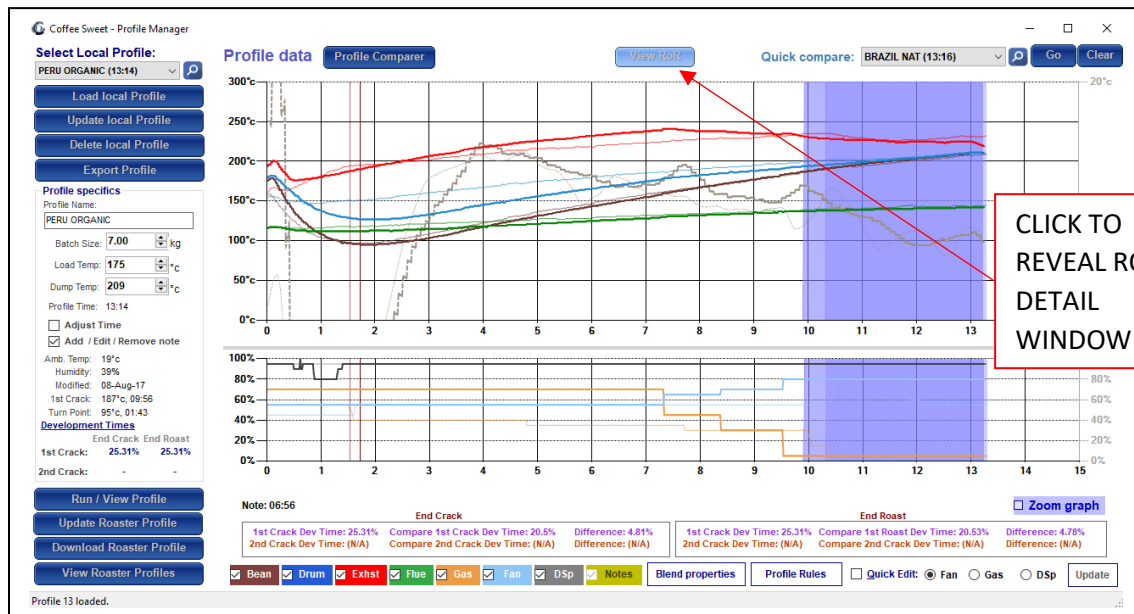
AREA IS ZOOMED IN. UNTICK ZOOM GRAPH TO RETURN TO NORMAL

### 6.1.12 ROR DETAIL FOR ALL THERMOCOUPLES

This feature allows the user to view and compare the RoR for all thermocouples. You can view the main loaded profile as well as compare against another profile. Also displayed are statistical values such as:

- **AVERAGE ROR:** The average of all the ROR values.
- **MODE ROR:** The most occurring ROR value during the profile. This is usually a good indication of the drying out phase ROR and can be used as a comparison between profiles for comparing consistency.

Trend lines and smoothing can be applied in area.




### 6.1.13 GENERATE REPORTS

A detailed report can be generated of the profile and exported in **PDF, EXCEL** and **WORD**

Roast Report

Created: 27-Jan-18 5:27:50 PM


**CRA TECHNOLOGY**

#### Profile Details

Modified: 27-Jan-18  
 Prof #: 13  
 Name: SMOOTH BLEND  
 Batch Size: 7kg  
 Prof time: 13:14  
 Ambients: 19°C, 39%

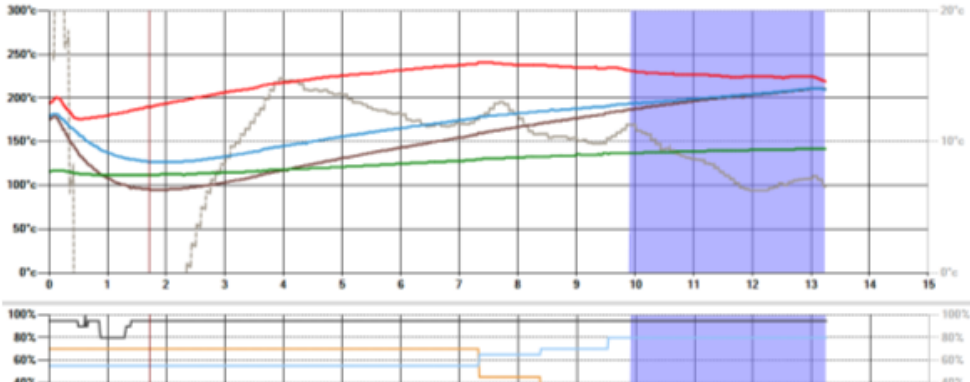
#### Roast Details

Load Temp: 175°C  
 Dump Temp: 209°C  
 Turnpoint: 95°C, 01:43  
 1st Crack: 187°C, 09:58  
 RoR Mode: 0.3°C  
 RoR Avg: 3.5°C

#### Crack Details

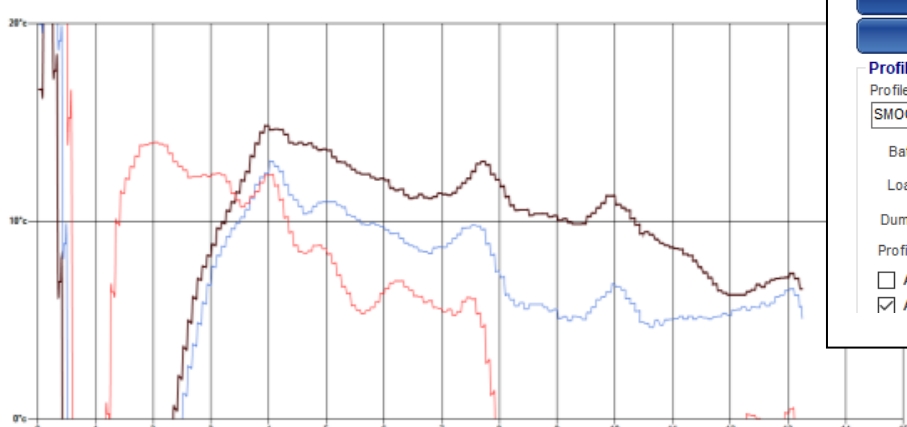
1st Crack Start: 187°C  
 1st Crack End: 210°C  
 DT End Crack: 25.31%  
 Duration: 03:19  
 DT End roast: 25.31%  
 Duration: 03:19

2nd Crack Start: N/A  
 2nd Crack End: N/A  
 DT End Crack:  
 Duration: 03:19  
 DT End roast: N/A  
 Duration: 03:19



Bean
Drum
Exhst
Flue
Gas
Fan
RPM
Notes

#### RoR Detail



Bean
Drum
Exhst
Flue

CLICK "EXPORT PROFILE" TO GENERATE A ROAST REPORT

Coffee Sweet - Profile Manager

**Select Local Profile:**

SMOOTH BLEND (13:14) 🔍

Load local Profile
Update local Profile
Delete local Profile
Export Profile

---

**Profile specifics**

Profile Name:

Batch Size:  kg

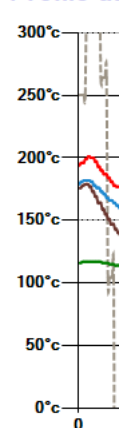
Load Temp:  °C

Dump Temp:  °C

Profile Time: 13:14

Adjust Time

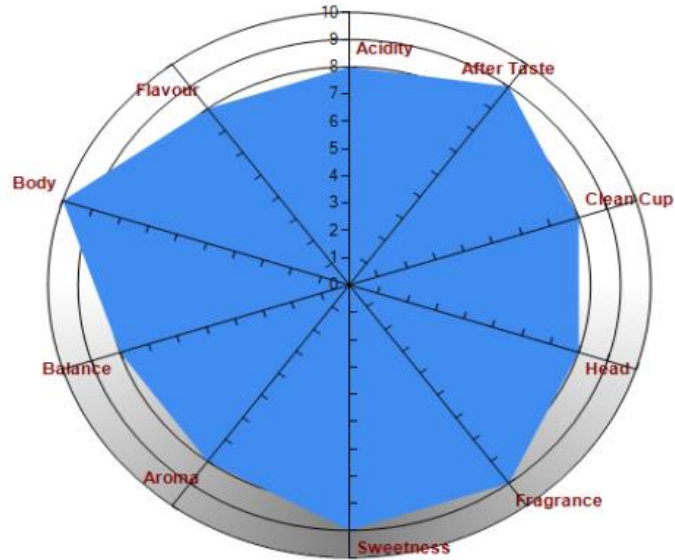
Add / Edit / Remove note



### Cup Profile

**Cup Notes:**

FULL BODIED WITH NOTES OF CARAMEL, RED BERRY. CLEAN WITH MEDIUM ACIDITY.



**Total Score: 85**

Coffee #	Blend %	KGs	Country	Estate	Variety	Harvest Date	Certification	Process	Screen Size	Moisture %	Density	Broker cup score	Roaster cup score
Coffee 1	50	2	BRAZIL	SANTOS	RED BOURBON	NOV	NA	NATURAL	16	10.5	HIGH	81	80
Coffee 2	50	2	PERU	NORTE	TYPICA	JUL	FTO	WASHED	17	10.2	HIGH	84	84
Coffee 3													
Coffee 4													
Coffee 5													
Coffee 6													
Coffee 7													
Coffee 8													
Coffee 9													
Coffee 10													

End weight: 5.85

Colour: 53 Agtron

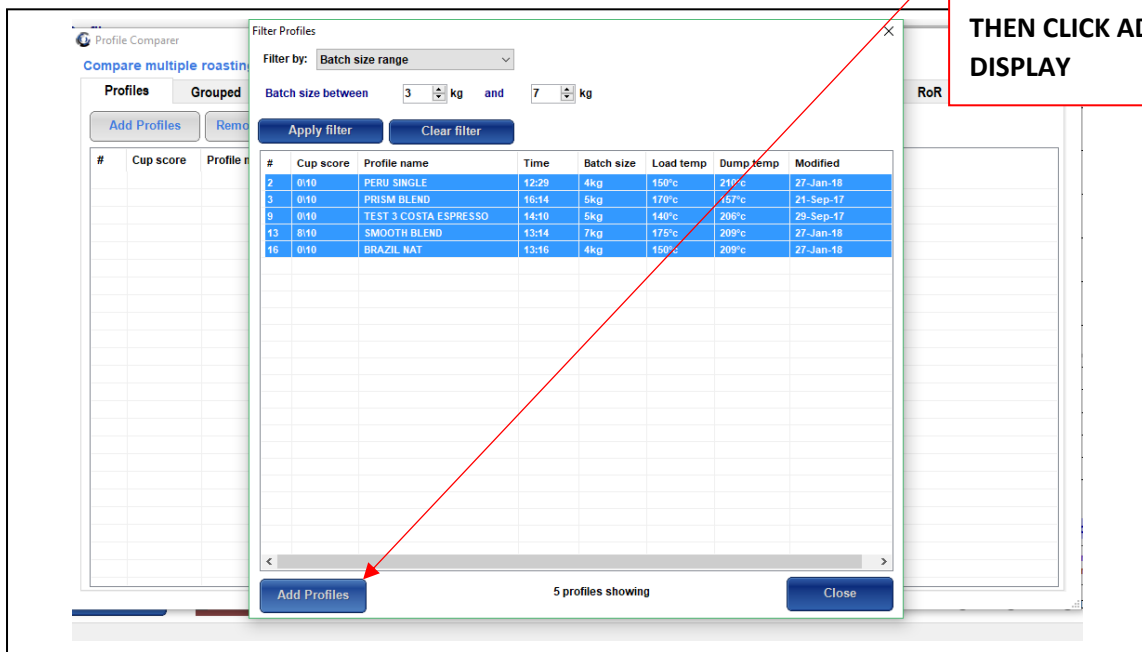
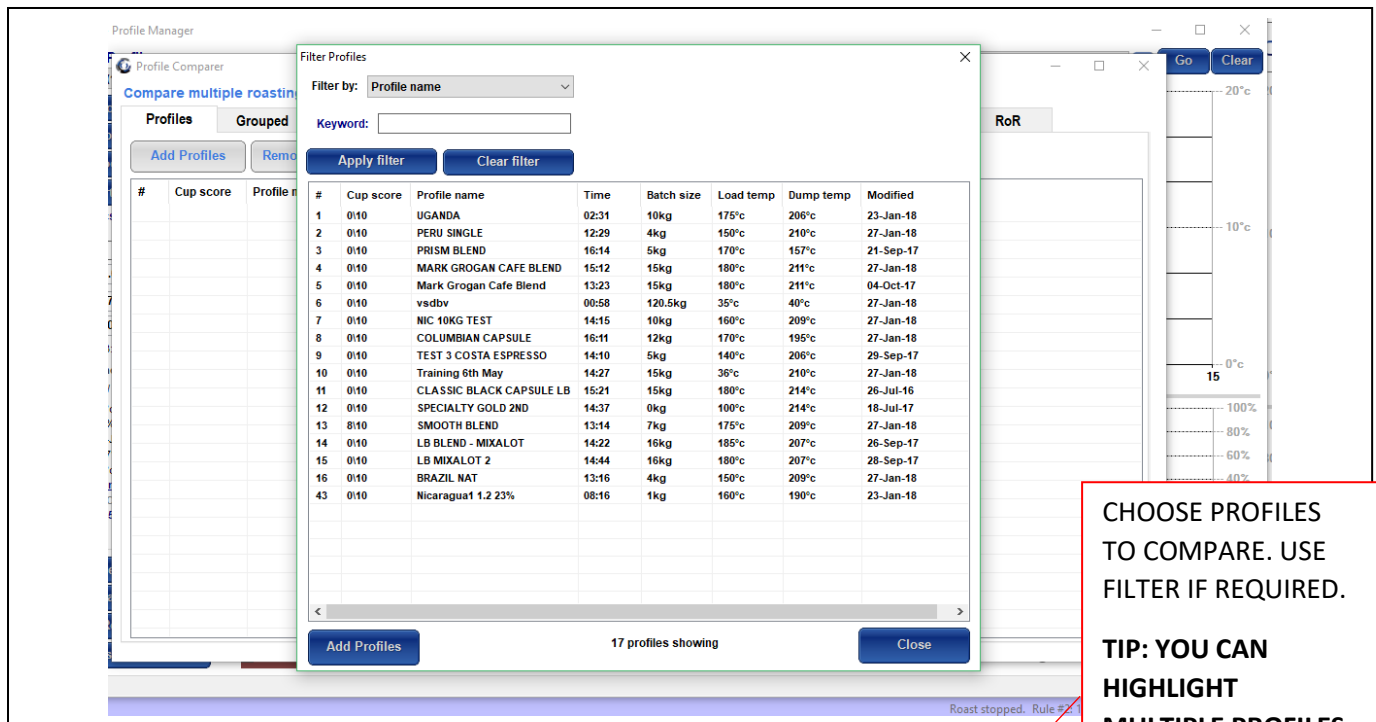
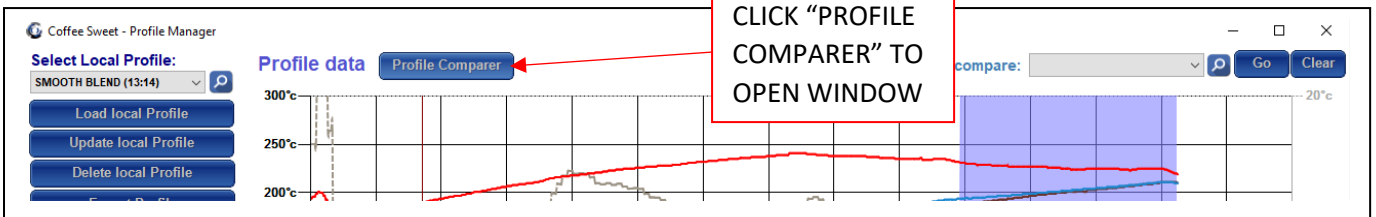
Weight Loss %: 16.4285714285714 %

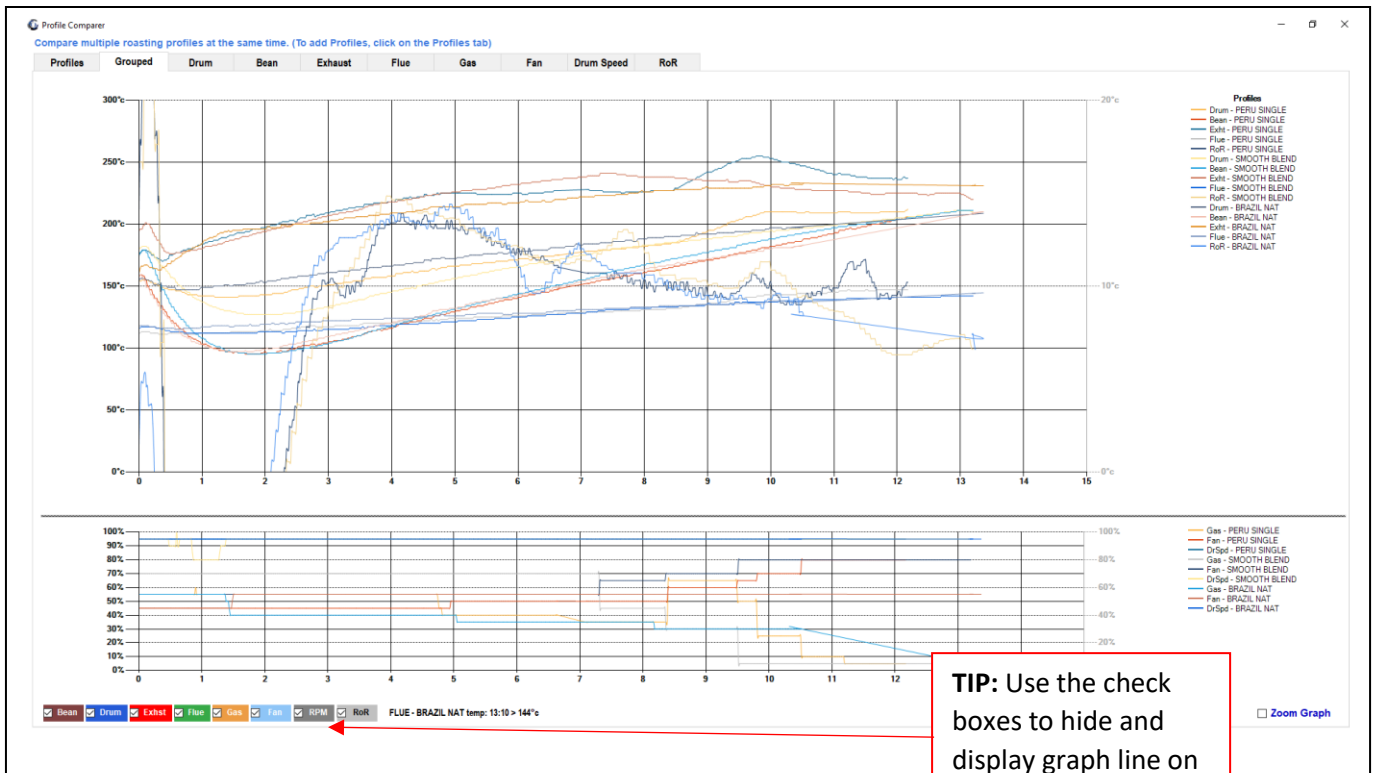
Weight Loss kg: 1.15 kg

Blend cup score: 85

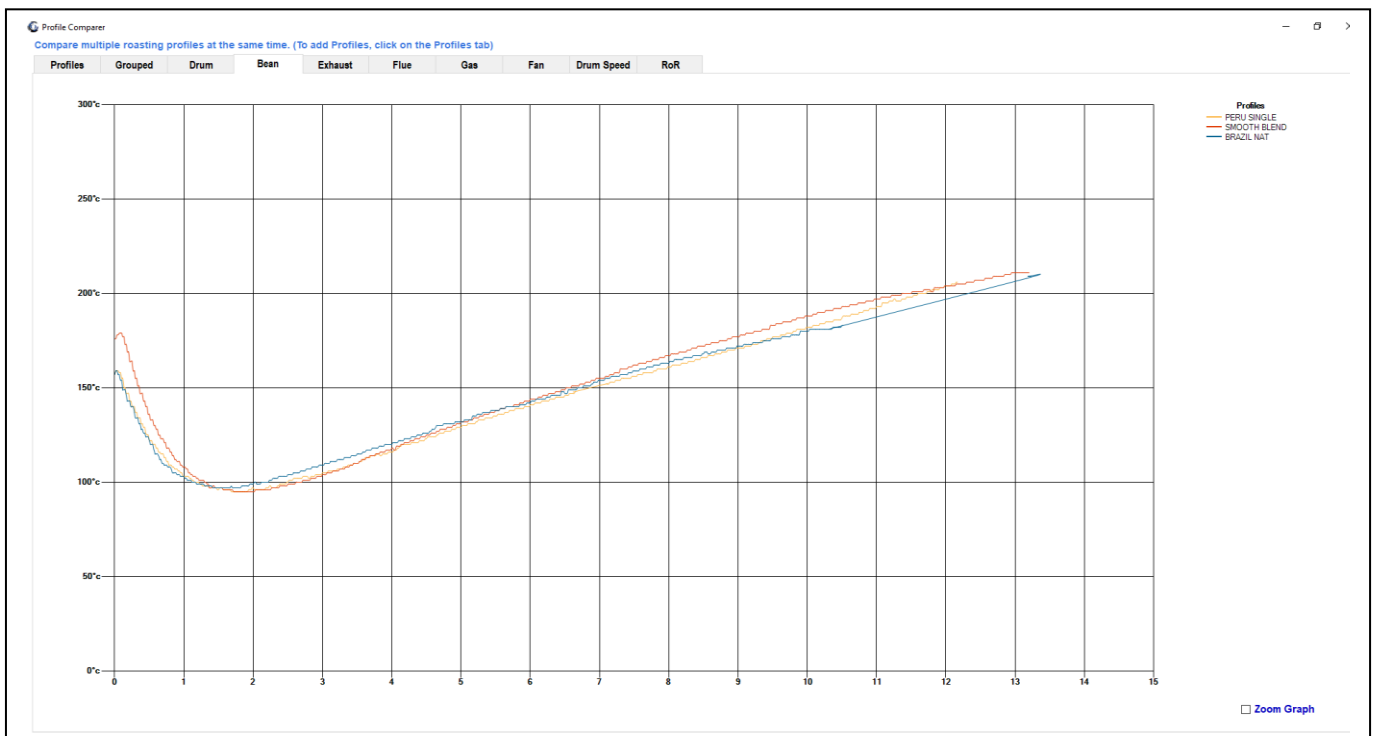
### 6.1.14 PROFILE COMPARER - MULTIPLES (PRO SWEET ONLY)

This feature allows the user to compare the graphs of many profiles against each other. Up to 50 at a time can be compared.





Use the TABS to compare various individual graph functions such as below example isolated for BEAN TEMPERATURE.

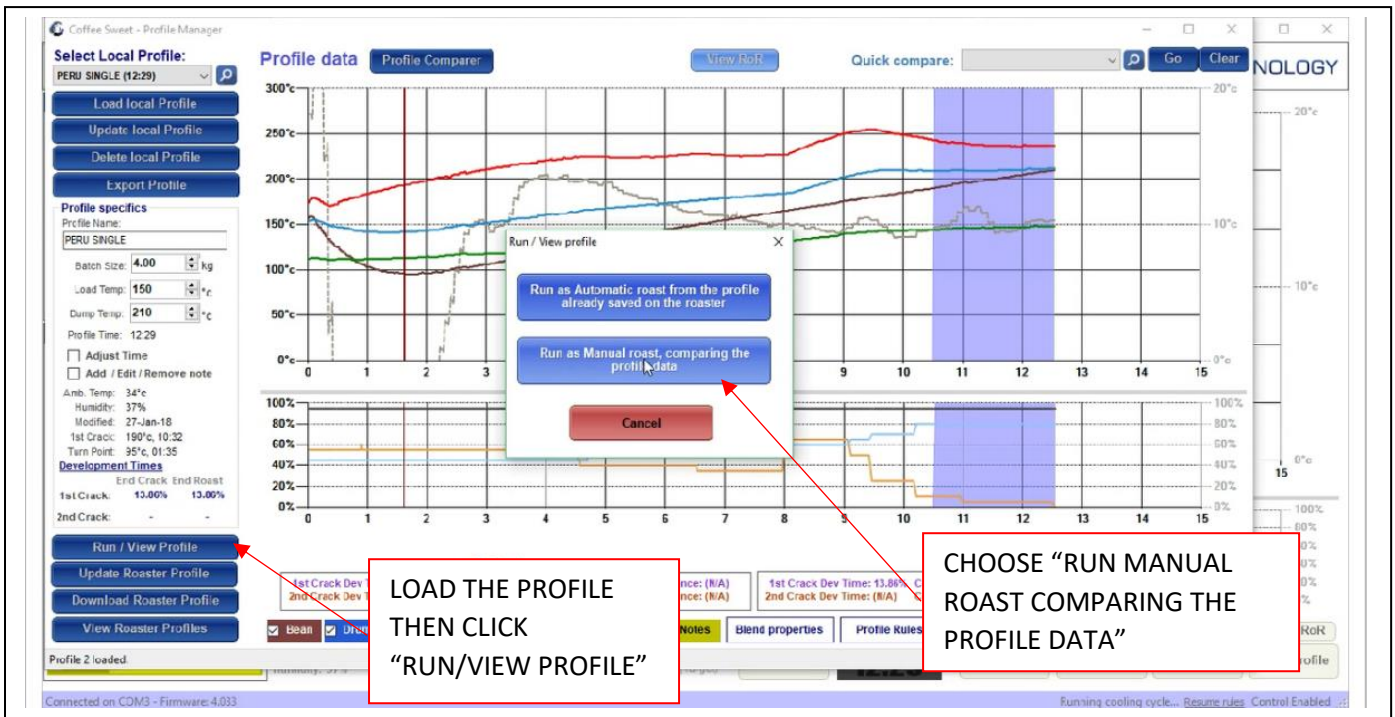


## 6.2 MANUAL ROASTING WITH SAVED PROFILE AS BACKGROUND

A saved profile can be loaded as a background to roast a manual profile. Various levels of automation can be added to this function by using TEMPERATURE BASED RULES either saved individually to the profile or default rules from the SETTING MENU.

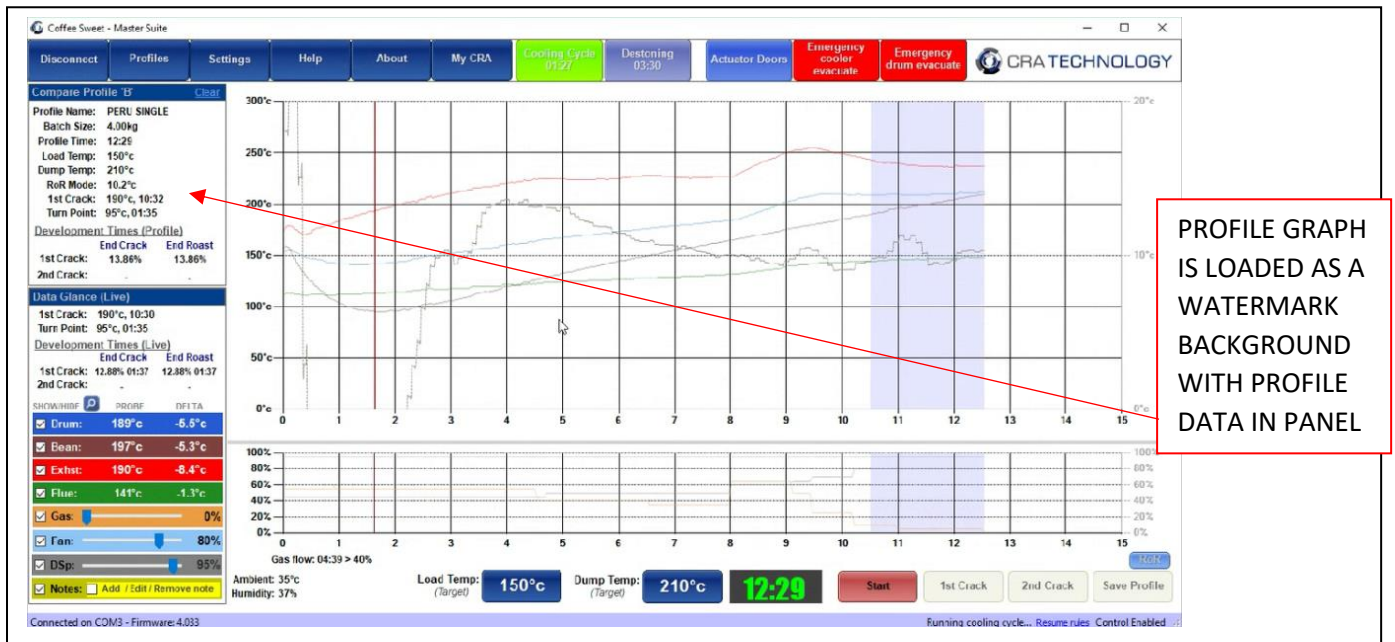
### 6.2.1 OPTION WITH SETTINGS MENU BEAN TEMPERATURE BASED RULES

This function allows the user to load a saved profile as a background then apply values for gas, fan, drum and load temperature from the SETTINGS menu. If rules are enabled and added in the SETTINGS MENU then these will apply to the roast.



**LOAD THE PROFILE THEN CLICK "RUN/VIEW PROFILE"**

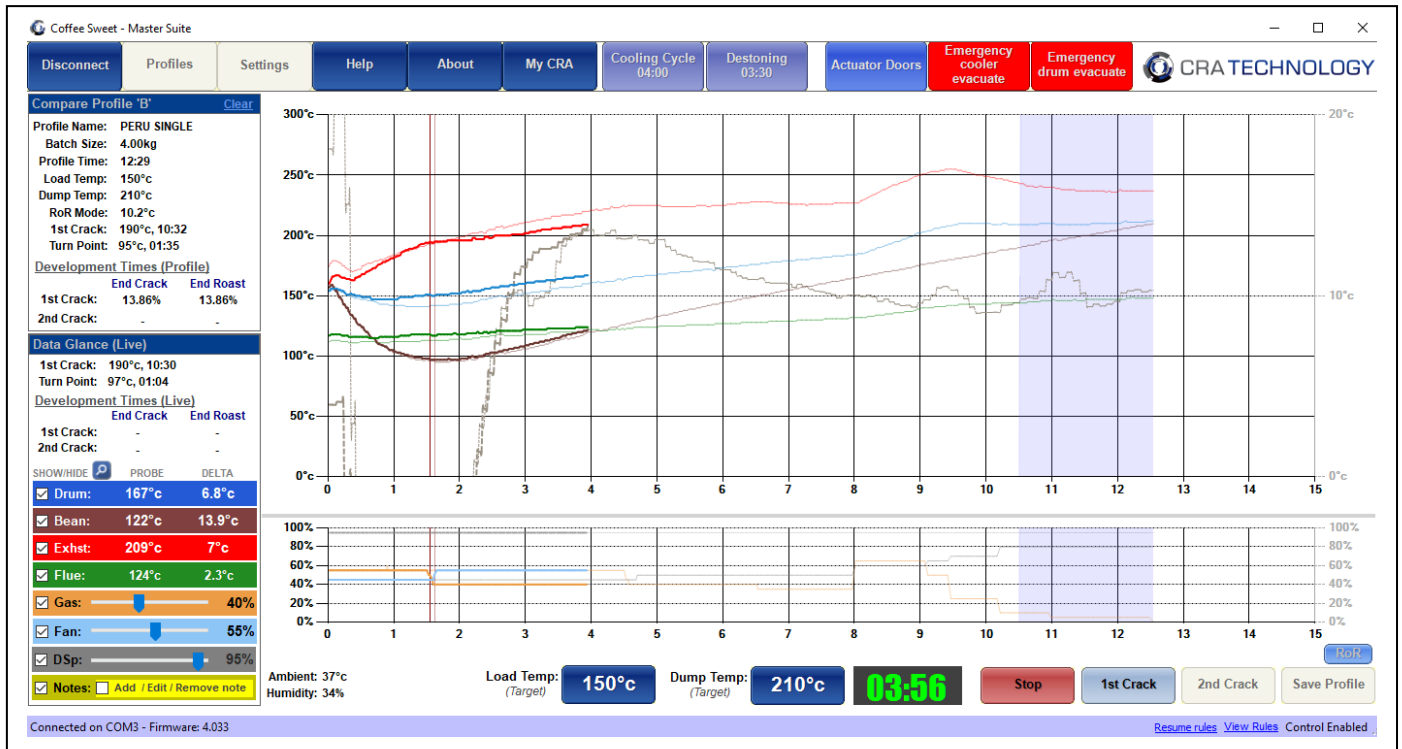
**CHOOSE "RUN MANUAL ROAST COMPARING THE PROFILE DATA"**



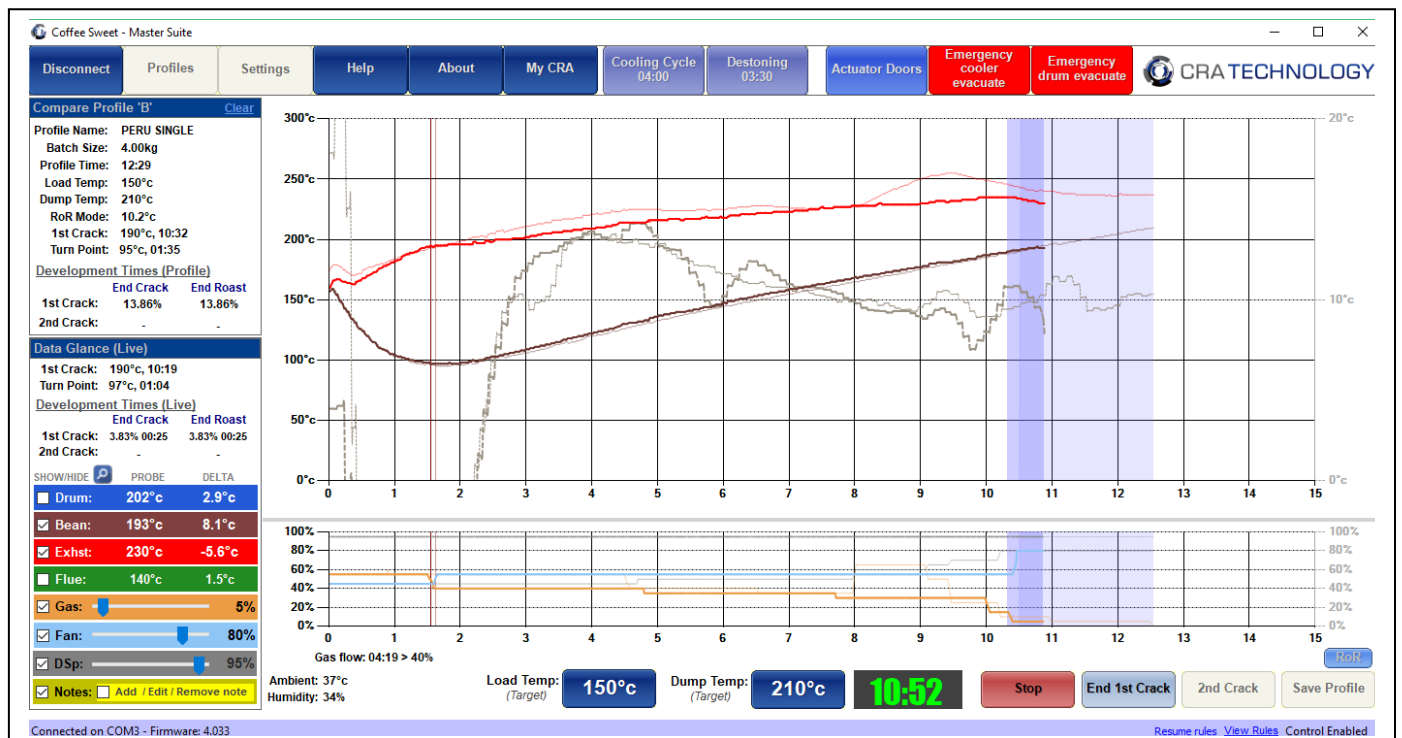
**PROFILE GRAPH IS LOADED AS A WATERMARK BACKGROUND WITH PROFILE DATA IN PANEL**

If you start a roast without applying values from the setting menu the profile will go off the saved profiles Load Temperature and starting gas, fan and drum values.

If you want to use different values than the saved profile as well as rules from the SETTINGS MENU then click on the SETTINGS menu and adjust the starting values and rules then hit APPLY.



When you start roasting the values of the LIVE ROAST will be compared to the SAVED PROFILE.



If you applied rules from the SETTING MENU then the rules that will run during the profile will be the default ones from the SETTING MENU and are not saved to the profile.

**Compare Profile 'P'**

Profile Name: BRAZIL NAT  
 Batch Size: 4kg  
 Profile Time: 13:16  
 Load Temp: 150°C  
 Dump Temp: 209°C  
 RoR Mode: 9.3°C  
 1st Crack: 190°C, 10:20  
 Turn Point: 97°C, 01:04

**Development Times (Profile)**

	End Crack	End Roast
1st Crack:	20.53%	20.53%
2nd Crack:	-	-

**Data Glance (Live)**

1st Crack: -  
 Turn Point: 155°C, 00:00

**Development Times (Live)**

	End Crack	End Roast
1st Crack:	-	-
2nd Crack:	-	-

**SHOW/HIDE** PROBE DELTA

- Drum: 158°C 13.1°C
- Bean: 159°C 17.2°C
- Exhst: 176°C 34.2°C
- Flue: 110°C 2°C
- Gas: 55%
- Fan: 45%
- DSp: 95%

**Temp control rules from Settings**

Temperature control  
 Preset fan and gas values based on the Bean temperature during a Manual Roast.  
 Note: Untick the rule you wish to edit. Active rules cannot be modified.

Enable Temperature control  
 Delay before applying settings: 30 Seconds

Enabled	From (°)	To (°)	Gas (%)	Fan (%)	Drum Speed (%)	Instances
Yes	165°C	175°C	30%	60%	90%	0
Yes	176°C	185°C	25%	70%	95%	0
Yes	186°C	210°C	10%	80%	95%	0

**RULES LOADED FROM THE SETTING MENU**

You can stop and save the new roast as per normal procedure or if you choose not to save you can run the profile again using the same setting without having to load the profile again.

**Compare Profile 'B'**

Profile Name: PERU SINGLE  
 Batch Size: 4.00kg  
 Profile Time: 12:29  
 Load Temp: 150°C  
 Dump Temp: 210°C  
 RoR Mode: 10.2°C  
 1st Crack: 190°C, 10:32  
 Turn Point: 95°C, 01:35

**Development Times (Profile)**

	End Crack	End Roast
1st Crack:	13.86%	13.86%
2nd Crack:	-	-

**Data Glance (Live)**

1st Crack: 190°C, 10:19  
 Turn Point: 97°C, 01:04

**Development Times (Live)**

	End Crack	End Roast
1st Crack:	15.80% 02:05	15.80% 02:05
2nd Crack:	-	-

**SHOW/HIDE** PROBE DELTA

- Drum: 208°C 3.7°C
- Bean: 208°C 7.2°C
- Exhst: 231°C 4.4°C
- Flue: 144°C 1.2°C
- Gas: 5%
- Fan: 55%
- DSp: 95%

**Stop Roast**

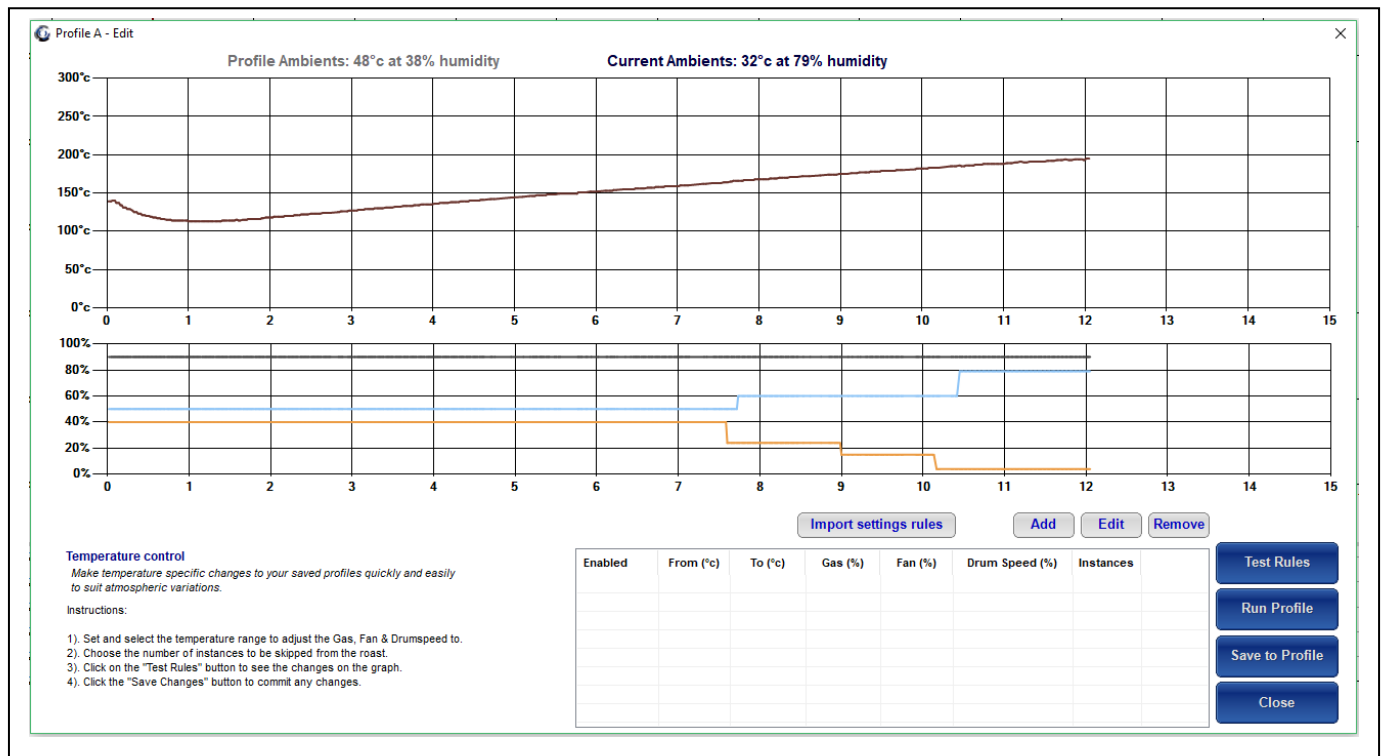
Are you sure you would like to stop the current Roast?

**Stop** **End 1st Crack** **2nd Crack** **Save Profile**

### 6.2.2 OPTION WITH PROFILE SPECIFIC BEAN TEMPERATURE BASED RULES

The most common way of roasting using saved profiles is to create BEAN TEMPERATURE rules that are specific to that profile. This method allows individual rules to be run for each profile. Rules can be updated and saved in real-time to the profile during roasting.

In this window you can add rules to the profile

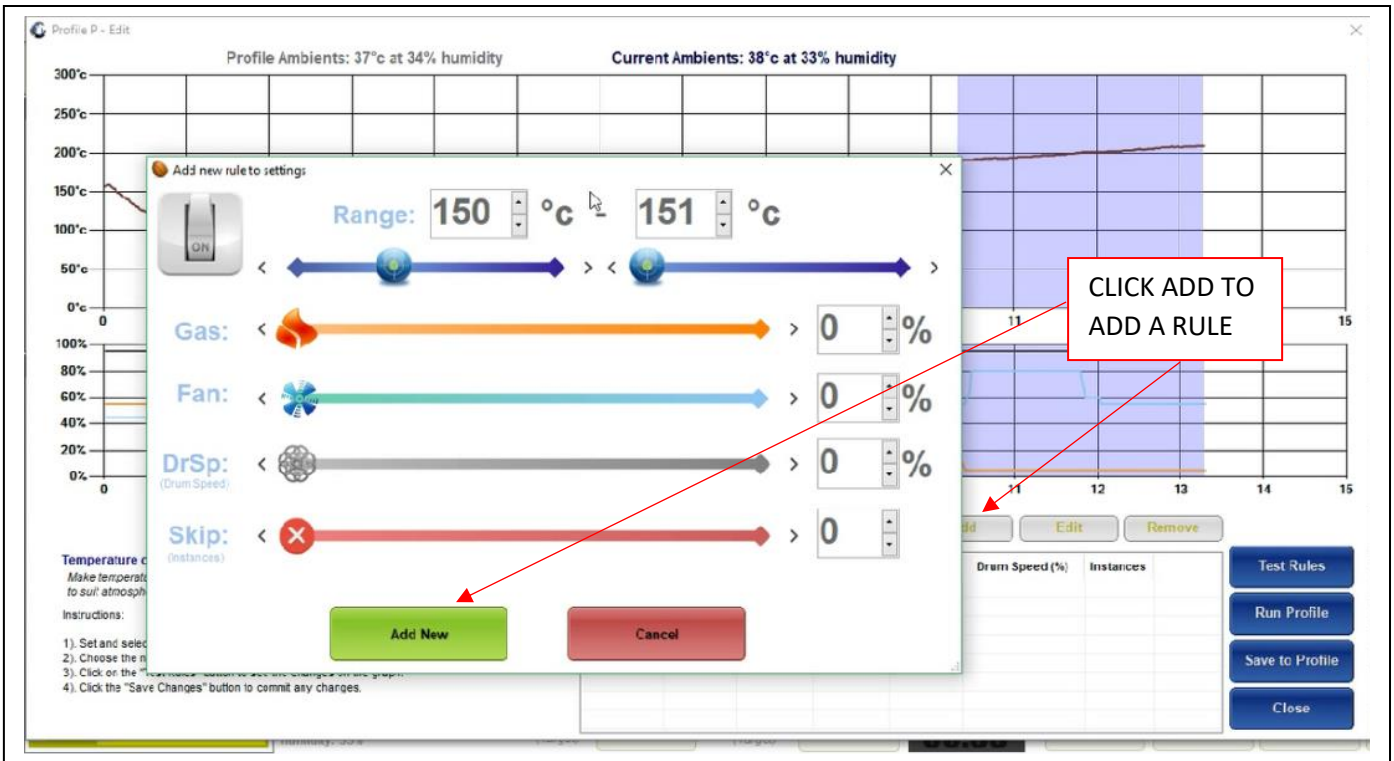


**Temperature control**  
 Make temperature specific changes to your saved profiles quickly and easily to suit atmospheric variations.

Instructions:

- 1) Set and select the temperature range to adjust the Gas, Fan & Drumspeed to.
- 2) Choose the number of instances to be skipped from the roast.
- 3) Click on the "Test Rules" button to see the changes on the graph.
- 4) Click the "Save Changes" button to commit any changes.

Enabled	From (°c)	To (°c)	Gas (%)	Fan (%)	Drum Speed (%)	Instances



Profile P - Edit

Profile Ambients: 37°C at 34% humidity      Current Ambients: 38°C at 33% humidity

Temperature control

Make temperature specific changes to your saved profiles quickly and easily to suit atmospheric variations.

Instructions:

1. Set and select the temperature range to adjust the Gas, Fan & Drumspeed to.
2. Choose the number of instances to be skipped from the roast.
3. Click on the "Test Rules" button to see the changes on the graph.
4. Click the "Save Changes" button to commit any changes.

Range: 150 °C to 151 °C

Gas: 0 %

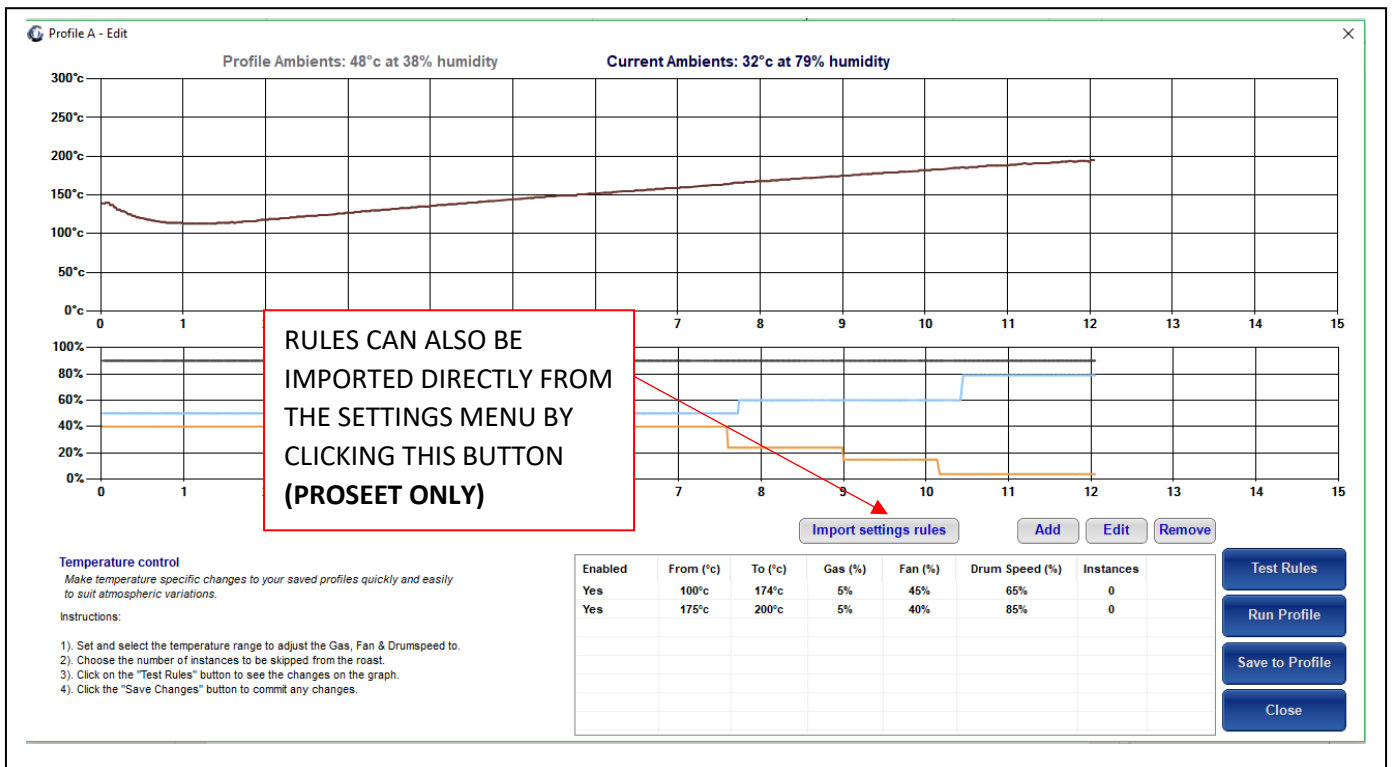
Fan: 0 %

DrSp: (Drum Speed) 0 %

Skip: (Instances) 0

Buttons: Add New, Cancel, Add, Edit, Remove, Test Rules, Run Profile, Save to Profile, Close

Example of 2 rules added to a SAVED PROFILE



Profile A - Edit

Profile Ambients: 48°C at 38% humidity      Current Ambients: 32°C at 79% humidity

Temperature control

Make temperature specific changes to your saved profiles quickly and easily to suit atmospheric variations.

Instructions:

1. Set and select the temperature range to adjust the Gas, Fan & Drumspeed to.
2. Choose the number of instances to be skipped from the roast.
3. Click on the "Test Rules" button to see the changes on the graph.
4. Click the "Save Changes" button to commit any changes.

Buttons: Import settings rules, Add, Edit, Remove, Test Rules, Run Profile, Save to Profile, Close

Enabled	From (°C)	To (°C)	Gas (%)	Fan (%)	Drum Speed (%)	Instances
Yes	100°C	174°C	5%	45%	65%	0
Yes	175°C	200°C	5%	40%	85%	0

You can test the rules on the graph by clicking “TEST RULES”.



Profile P - Edit

Profile Ambients: 37°C at 34% humidity      Current Ambients: 38°C at 33% humidity

Temperature control  
Make temperature specific changes to your saved profiles quickly and easily to suit a

Instructions

- 1). Set a
- 2). Choos
- 3). Click
- 4). Click t

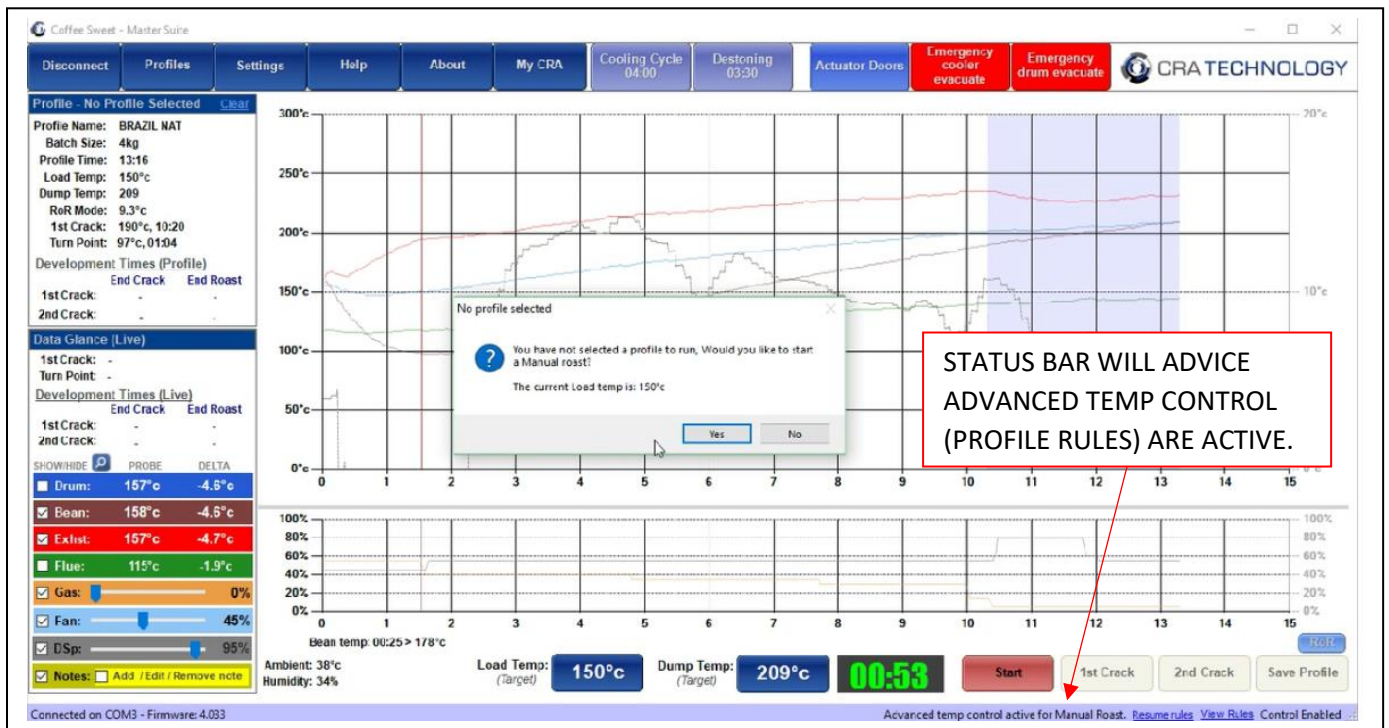
CHOOSE RUN OR SAVE TO PROFILE TO ENSURE RULE IS SAVED

Enabled	From (°C)	To (°C)	Gas (%)	Fan (%)	Drum Speed (%)	Instances
Yes	150°C	165°C	40%	60%	95%	1
Yes	166°C	180°C	25%	45%	95%	0

Buttons: Add, Edit, Remove, Test Rules, Run Profile, Save to Profile, Close

**TIP:** If you notice the rule is starting too early in the profile during the time soon after loading the beans you can and in a SKIP instance. In the above example the first rule is using 1 skip so that the rule does not action at the start of the profile.

The default DELAY TIME set in the setting menu will also apply. A delay time of 30-60secs will usually prevent rules running too early.



Coffee Sweet - Master Suite

Disconnect Profiles Settings Help About My CRA Cooling Cycle 04:00 Destoning 03:30 Actuator Doors Emergency cooler evacuate Emergency drum evacuate CRA TECHNOLOGY

Profile: No Profile Selected

Profile Name: BRAZIL NAT  
Batch Size: 4kg  
Profile Time: 13:16  
Load Temp: 150°C  
Dump Temp: 209  
RoR Mode: 9.3°C  
1st Crack: 190°C, 10:20  
Turn Point: 97°C, 01:04

Development Times (Profile)

1st Crack	End Crack	End Roast
-	-	-

Development Times (Live)

1st Crack	End Crack	End Roast
-	-	-

SHOWHIDE PROBE DELTA

- Drum: 157°C -4.5°C
- Bean: 158°C -4.6°C
- Exhst: 167°C -4.7°C
- Flue: 115°C -1.9°C
- Gas: 0%
- Fan: 45%
- D Sp: 95%

Notes: Add / Edit / Remove note

Ambient: 38°C Humidity: 34%

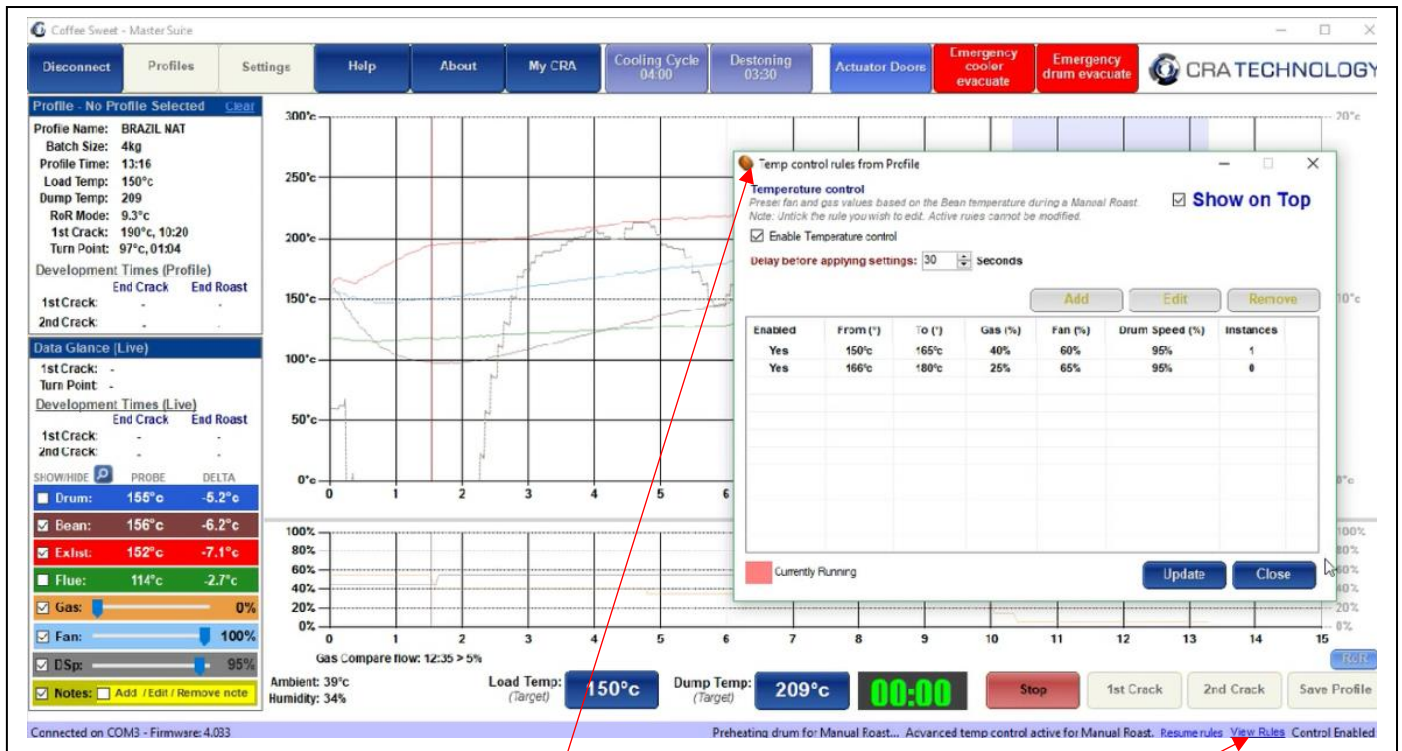
Load Temp: (Target) 150°C      Dump Temp: (Target) 209°C      00:53

Buttons: Start, 1st Crack, 2nd Crack, Save Profile

Status Bar: Advanced temp control active for Manual Roast. Resume rules View Rules Control Enabled

STATUS BAR WILL ADVISE ADVANCED TEMP CONTROL (PROFILE RULES) ARE ACTIVE.

Start the profile and the starting settings for gas, FAN, DRUM SPEED, LOAD TEMPERATURE and RULES will be active from the saved profile.



The screenshot displays the 'Coffee Sweet - Master Suite' interface. On the left, a profile for 'BRAZIL NAT' is shown with details like 'Batch Size: 4kg', 'Load Temp: 150°C', and 'Dump Temp: 209'. The main area features a temperature graph and a 'Data Glance' table. A dialog box titled 'Temp control rules from Profile' is open, showing a table of active rules and an 'Update' button. A red box highlights the 'View Rules' button at the bottom right of the interface.

Enabled	From (°)	To (°)	Gas (%)	Fan (%)	Drum Speed (%)	Instances
Yes	150°	165°	40%	60%	95%	1
Yes	166°	180°	25%	65%	95%	0

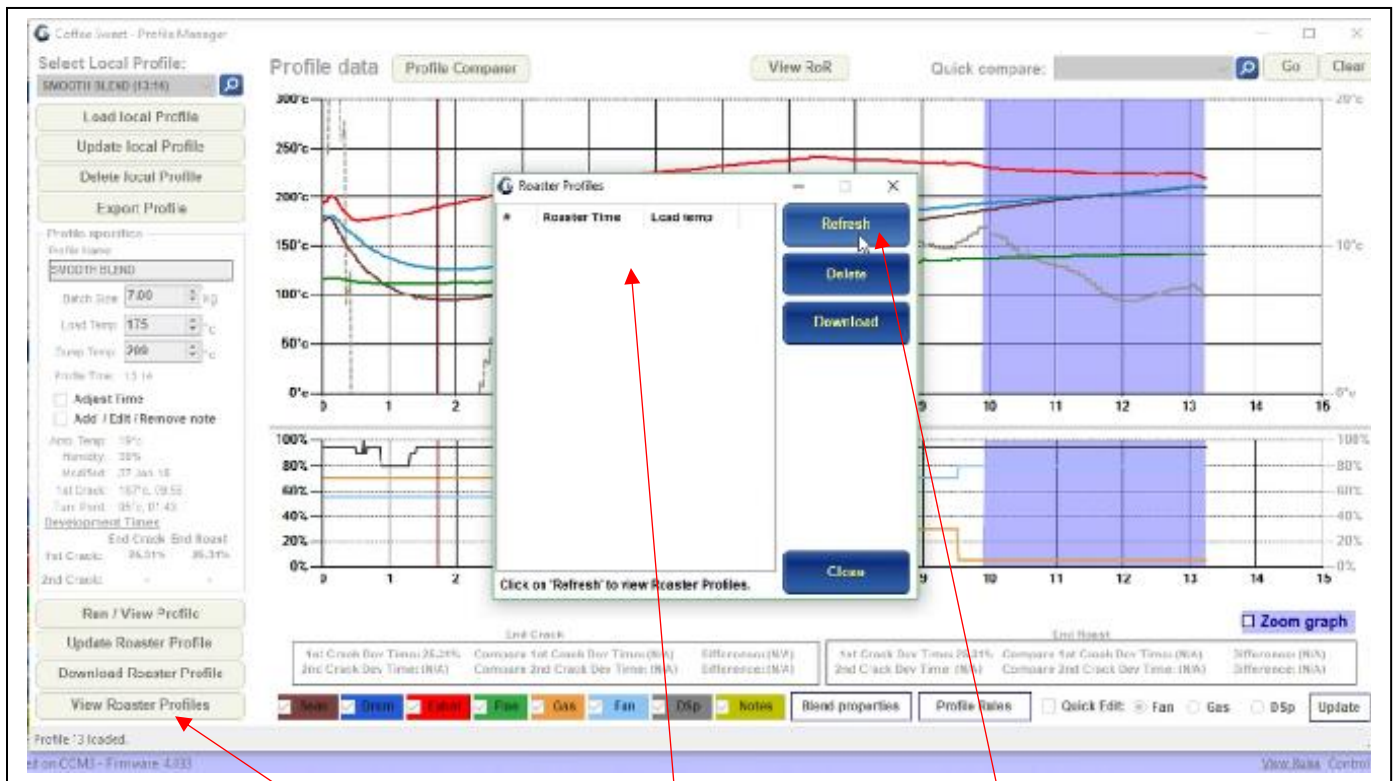
VIEW RULES WILL REVEAL PROFILE RULES. YOU CAN AUPDATE AND SAVE THESE CHANGES TO THE SAVED PROFILE IN REALTIME

### 6.3 SAVED PROFILE AUTO ROASTING AS A COPY (DOES NOT APPLY TO DATALOGGER)

The function allows the user to roast a saved profile as a copy of the GAS, FAN, DRUM SPEED changes based on the exact same time as is the profile.

The changed to the control values are done time based so regardless of the bean temperature the software will change the control values based on the same times they were done in the saved profile.

This function works best when there are minimal changes to environment and bean variables, so times are consistent. It is recommended to use the TEMPPERATURE BASED RULES automation where variables are changing as the control values are adjusted based on Bean Temperature which is a more consistent value from roast to roast.



LOAD THE PROFILE YOU WANT TO RUN THEN CLICK "VIEW ROASTER PROFILE" TO CHECK THAT THE PROFILE IS SAVED AND SYNCED ON THE ROASTER MEMORY.

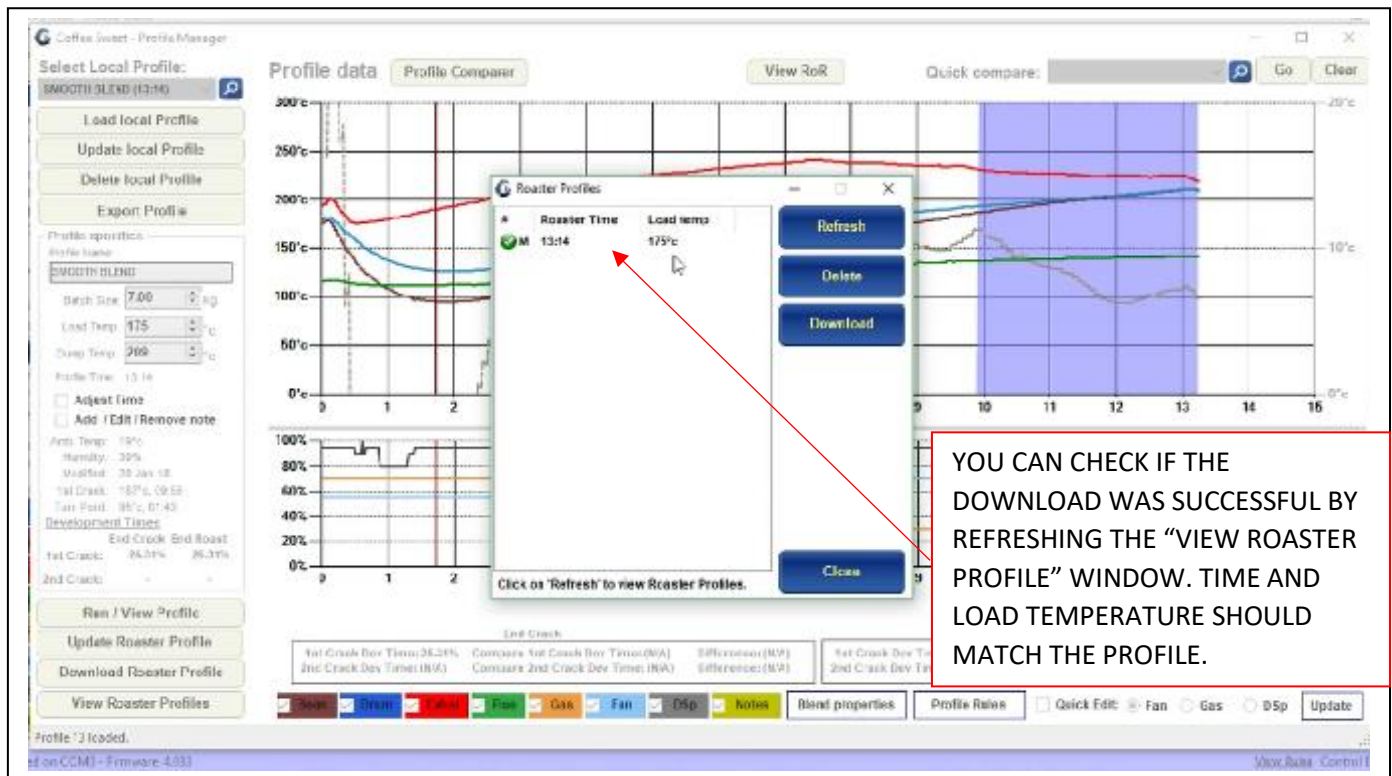
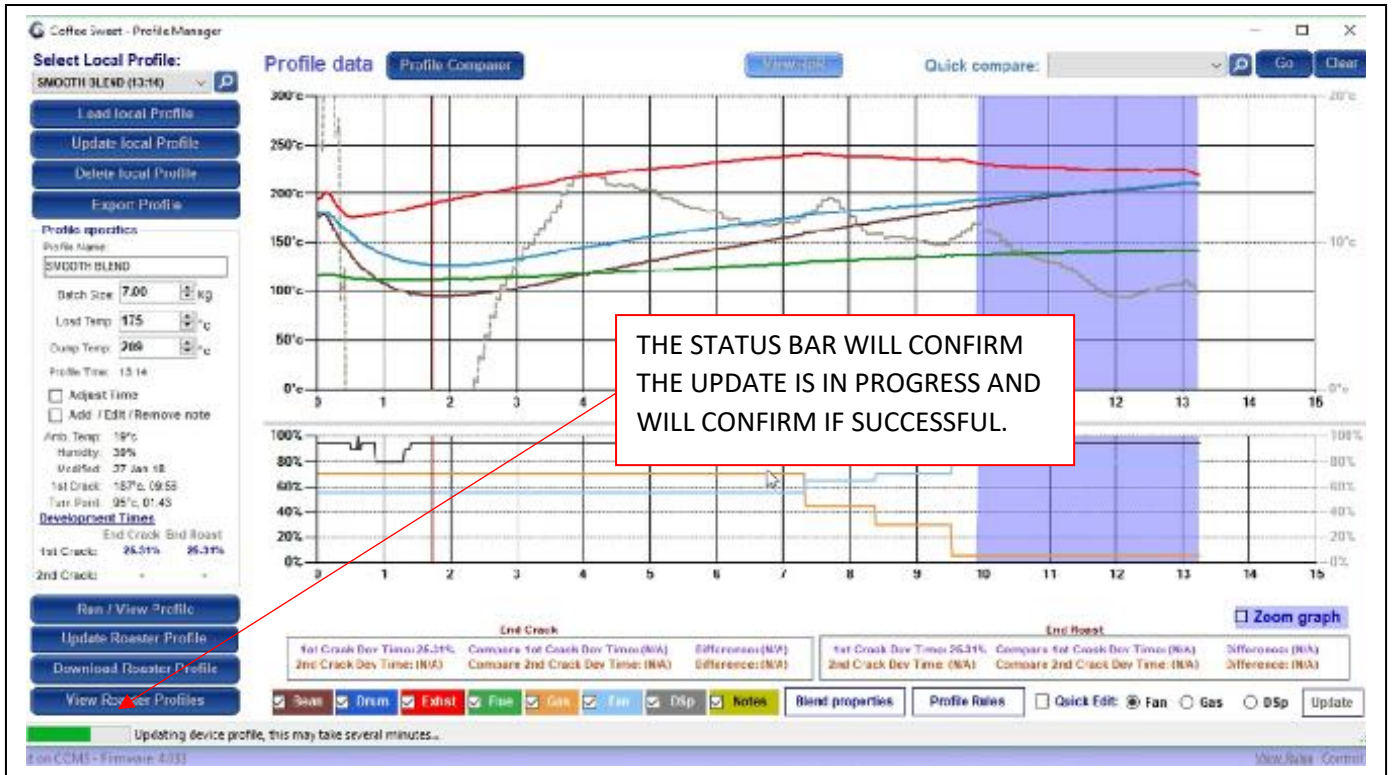
CLICK REFRESH TO POLL THE ROASTER FOR THE PROFILES THAT ARE SAVED INTO THE PCB MEMORY

IN THIS INSTANCE THERE ARE NO SAVED PROFILES ON THE ROASTER PCB MEMORY SO THE PROFILE NEEDS TO BE DOWNLOADED FROM THE PC TO THE ROASTER IN ORDER TO RUN THE AUTOROAST FUNCTION

**THERE ARE 2 WAYS TO DOWNLOAD THE PROFILE FROM THE COMPUTER TO THE ROASTERS MEMORY**

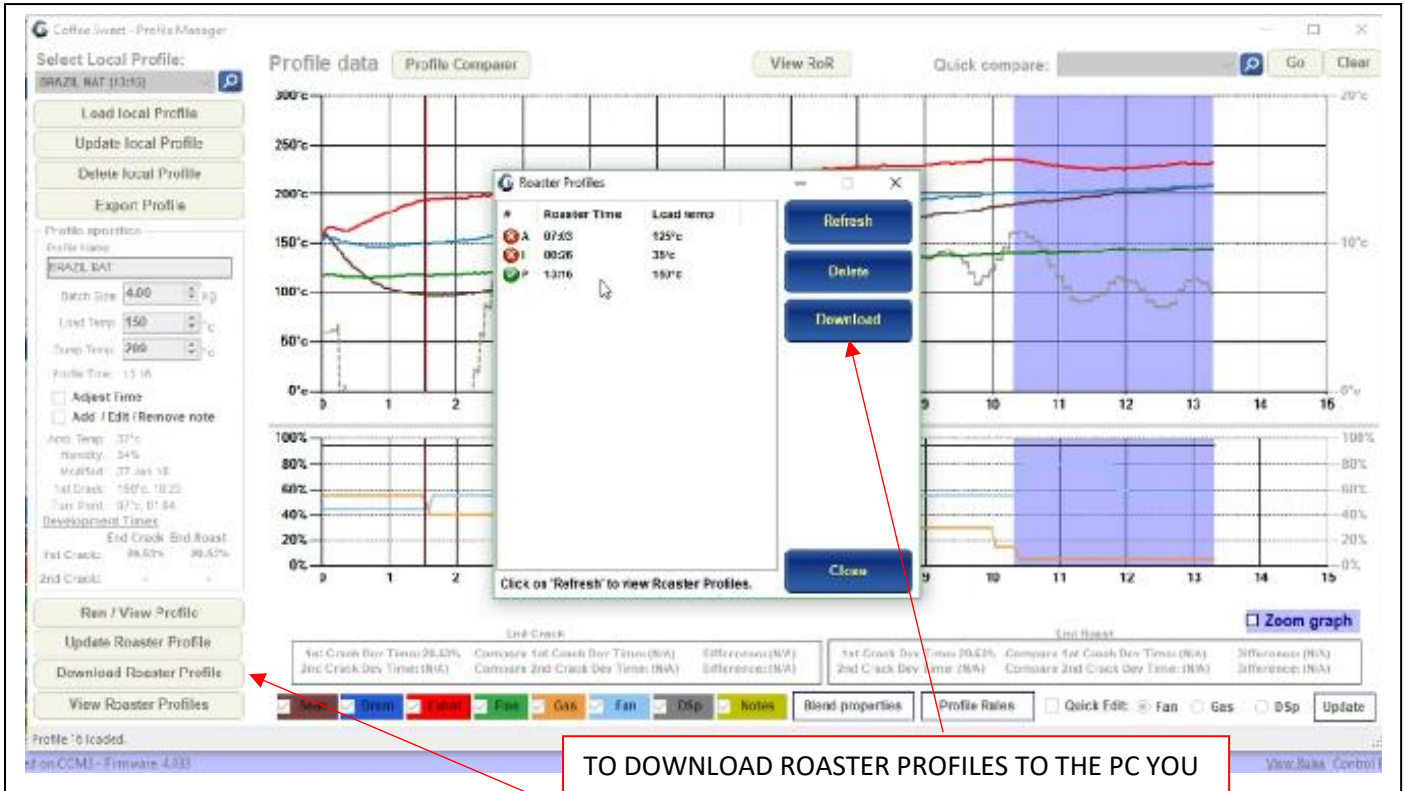
1. UPDATE LOCAL PROFILE
2. UPDATE ROASTRE PROFILE

**YOU ARE PROMPTED TO UPDATE THE PROFILE TO THE ROASTER – CLICK YES TO BEGIN DOWNLOAD**



Roaster Profiles with a green tick mean they are synched with a PC Profile. If a Roaster Profile is displayed with a red cross this means the Roaster Profile data is not Synched with the corresponding PC Profile. In this instance if you run the AUTOROAST function the Roaster controller will override the computer values and changes will not correspond to the graph changes.

It is strongly advised that you check and synch roaster profiles before roasting if required.



Profile data Profile Comparer View RoR Quick compare: Go Clear

Roaster Profiles

Roaster Time	Load temp
A 07:05	125°C
F 00:26	35°C
P 13:16	150°C

Buttons: Refresh, Delete, Download, Close

Click on 'Refresh' to view Roaster Profiles.

Buttons: Run / View Profile, Update Roaster Profile, Download Roaster Profile, View Roaster Profiles

Buttons: Refresh, Update, Fine, GAA, Fan, DSP, notes, Blend properties, Profile Rules, Quick Edit: Fan, Gas, DSp, Update

TO DOWNLOAD ROASTER PROFILES TO THE PC YOU CAN CLICK THE FOLLOWING BUTTONS.

REMEMBER TO SAVE YOUR CHANGES AFTERWARDS BY CLICKING "UPDATE LOCAL PROFILE"

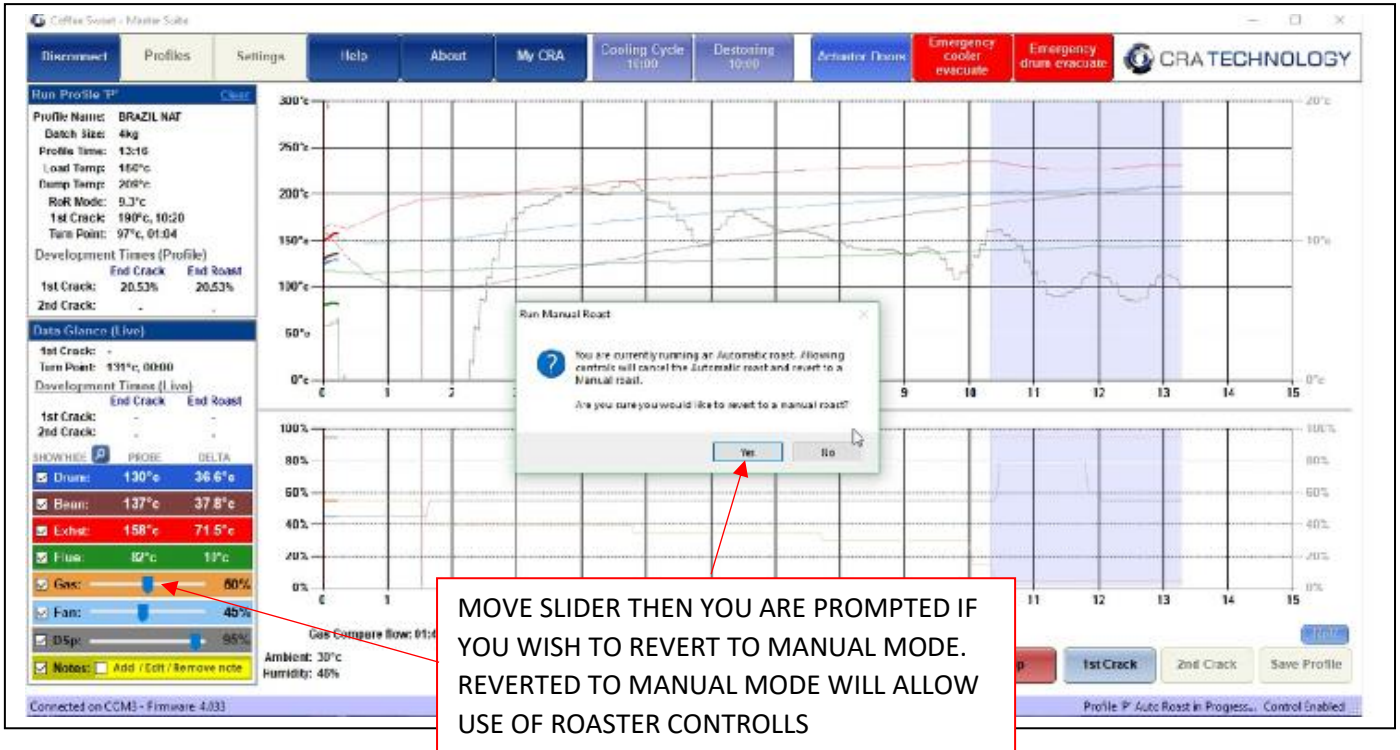
You can also "DOWNLOAD ROASTER PROFILES" from the roaster to the PC for updating.

**NOTE: The roaster does not save details such as 1<sup>st</sup> Crack, Notes etc so when you download from the roaster to the PC the profile will not contain these values.**

Follow the below steps to start an AUTOROAST:

During AUTOROAST mode you can not make realtime manual changes to the profile until you “REVERT TO MANUAL MODE”.

**Note: Once you revert to Manual Mode you can't go back to AUTO MODE.**



The screenshot shows the CRA Technology software interface. On the left, there is a 'Data Glance (Live)' section with various parameters:
 

PROBE	DELTA
Drum: 130°C	36.6°C
Bean: 137°C	37.8°C
Choke: 158°C	71.5°C
Flue: 102°C	11°C
Gas: 80%	
Fan: 45%	
DSp: 95%	

 A red box highlights the 'Gas' slider, which is currently set to 80%. A red arrow points from this slider to the 'Yes' button in the 'Run Manual Roast' dialog box. The dialog box contains the following text:
 

Run Manual Roast

You are currently running an Automatic roast. Flipping controls will cancel the Automatic roast and revert to a Manual roast.

Are you sure you would like to revert to a manual roast?

Yes No

 The background shows a temperature graph with a blue shaded area indicating the current roast phase. At the bottom, there are buttons for '1st Crack', '2nd Crack', and 'Save Profile'. A status bar at the bottom right indicates 'Profile P Auto Roast in Progress... Control Enabled'.

MOVE SLIDER THEN YOU ARE PROMPTED IF YOU WISH TO REVERT TO MANUAL MODE. REVERTED TO MANUAL MODE WILL ALLOW USE OF ROASTER CONTROLS

**TIP:** Reverting to Manual Mode will also allow access to TEMPERATURE BASED RULES. If no rules are saved in the profile then “**SETTINGS RULES**” will load or if rules are saved in the profile then the “**PROFILE RULES**” will load.

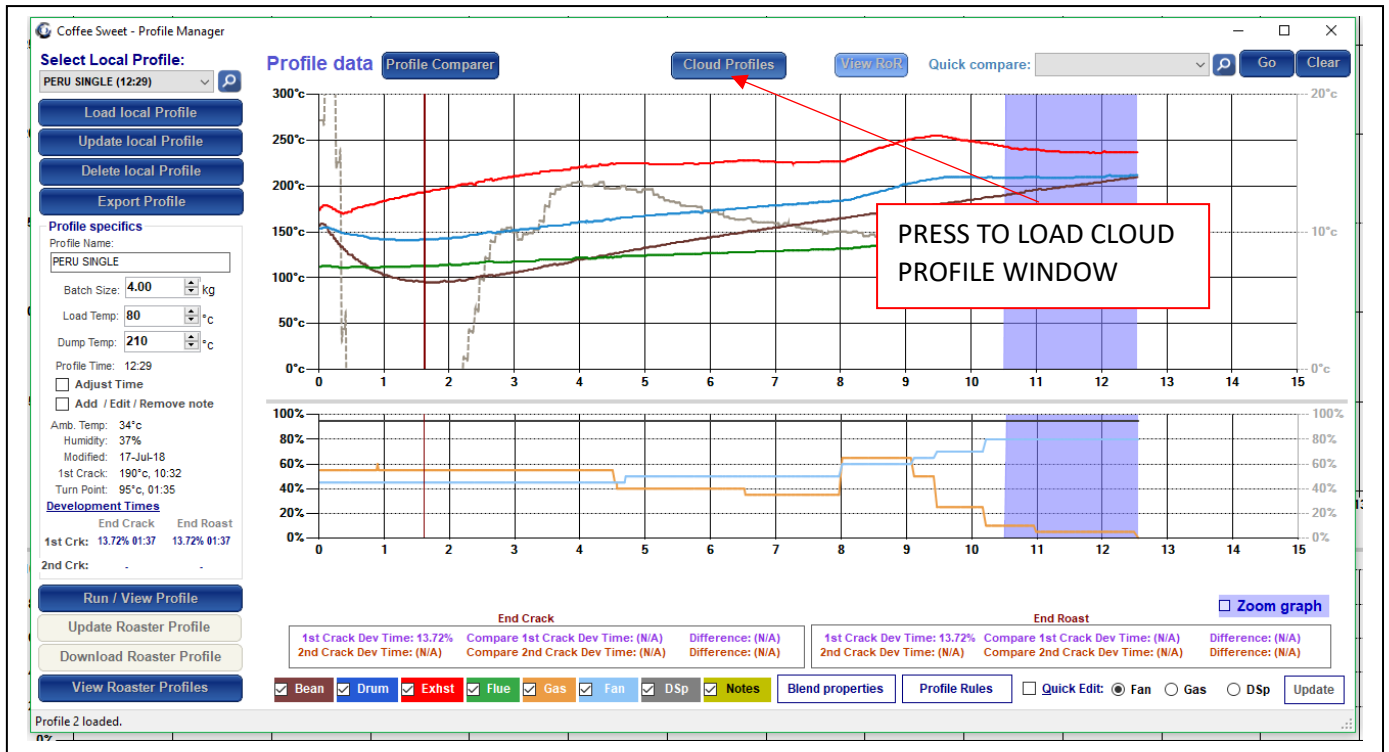
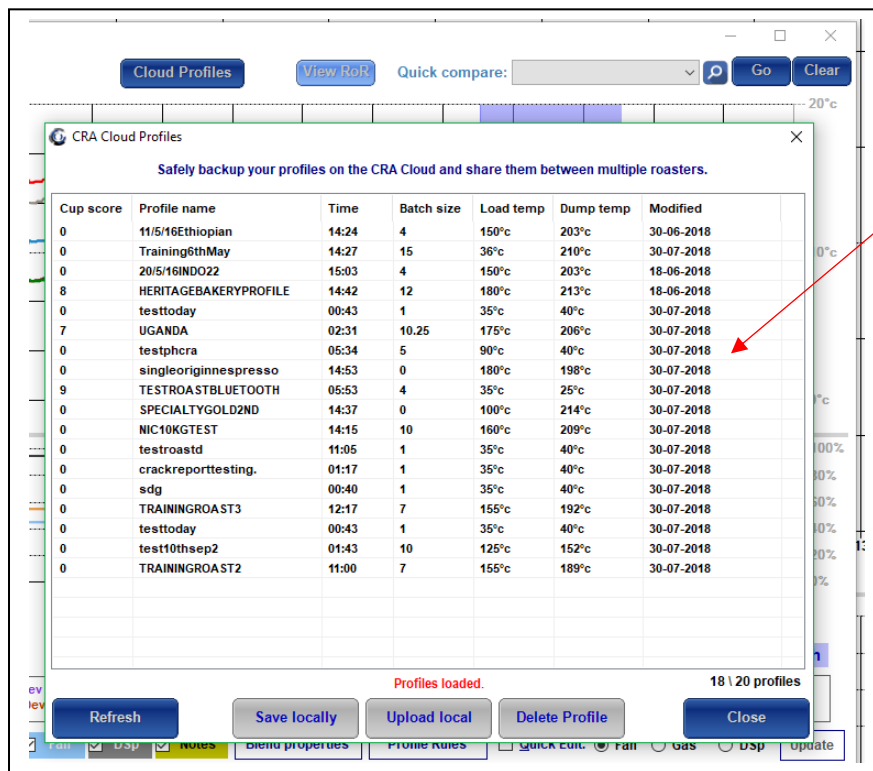
Stop the roast as per normal procedure.

**NOTE:** If you have reverted to manual mode you will need to reload the profile again to run the auto mode.

**NOTE:** You cannot update profiles in AUTO MODE or when switching from AUTO to MANUAL modes

## 7.0 CLOUD PROFILE BACKUP (PROSWEET feature)

Users with ProSweet upgrade have the option to save profiles to the Cloud for extra backup and protection of their roasting profile. Up to **100 PROFILES** can be stored on the CLOUD Database

**CRA Cloud Profiles**

Safely backup your profiles on the CRA Cloud and share them between multiple roasters.

Cup score	Profile name	Time	Batch size	Load temp	Dump temp	Modified
0	11/5/16Ethiopian	14:24	4	150°C	203°C	30-06-2018
0	Training6thMay	14:27	15	36°C	210°C	30-07-2018
0	20/5/16INDO22	15:03	4	150°C	203°C	18-06-2018
8	HERITAGEBAKERYPROFILE	14:42	12	180°C	213°C	18-06-2018
0	testtoday	00:43	1	35°C	40°C	30-07-2018
7	UGANDA	02:31	10.25	175°C	206°C	30-07-2018
0	testphera	05:34	5	90°C	40°C	30-07-2018
0	singleoriginnespresso	14:53	0	180°C	198°C	30-07-2018
9	TESTROASTBLUETOOTH	05:53	4	35°C	25°C	30-07-2018
0	SPECIALTYGOLD2ND	14:37	0	100°C	214°C	30-07-2018
0	NIC10KTEST	14:15	10	160°C	209°C	30-07-2018
0	testroastd	11:05	1	35°C	40°C	30-07-2018
0	crackreporttesting.	01:17	1	35°C	40°C	30-07-2018
0	sdg	00:40	1	35°C	40°C	30-07-2018
0	TRAININGROAST3	12:17	7	155°C	192°C	30-07-2018
0	testtoday	00:43	1	35°C	40°C	30-07-2018
0	test10thsep2	01:43	10	125°C	152°C	30-07-2018
0	TRAININGROAST2	11:00	7	155°C	189°C	30-07-2018

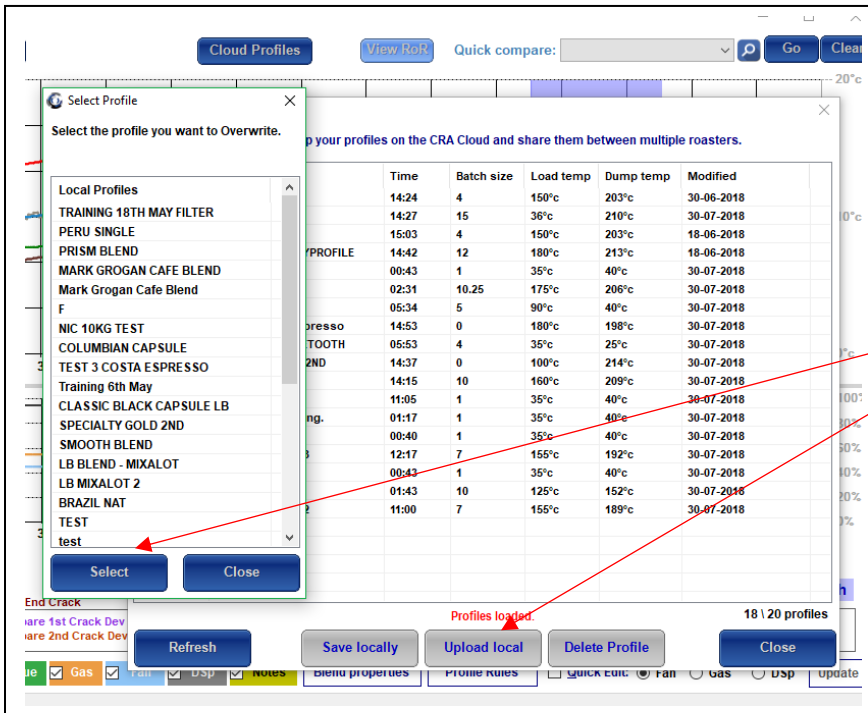
Buttons: Refresh, Save locally, Upload local, Delete Profile, Close

Profiles loaded. 18 \ 20 profiles

## 7.1 MANAGING LOAD PROFILES

Profiles can be saved to the Cloud from Coffee Sweet and they can also be downloaded from the Cloud into Coffee Sweet.

### 7.1.1 Uploading Profiles to the Cloud



Cloud Profiles | View RoR | Quick compare: [dropdown] | Go | Clear

Select Profile

Select the profile you want to Overwrite.

Safely backup your profiles on the CRA Cloud and share them between multiple roasters.

Time	Batch size	Load temp	Dump temp	Modified
14:24	4	150°C	203°C	30-06-2018
14:27	15	36°C	210°C	30-07-2018
15:03	4	150°C	203°C	18-06-2018
14:42	12	180°C	213°C	18-06-2018
00:43	1	35°C	40°C	30-07-2018
02:31	10.25	175°C	206°C	30-07-2018
05:34	5	90°C	40°C	30-07-2018
14:53	0	180°C	198°C	30-07-2018
05:53	4	35°C	25°C	30-07-2018
14:37	0	100°C	214°C	30-07-2018
14:15	10	160°C	209°C	30-07-2018
11:05	1	35°C	40°C	30-07-2018
01:17	1	35°C	40°C	30-07-2018
00:40	1	35°C	40°C	30-07-2018
12:17	7	155°C	192°C	30-07-2018
00:43	1	35°C	40°C	30-07-2018
01:43	10	125°C	152°C	30-07-2018
11:00	7	155°C	189°C	30-07-2018

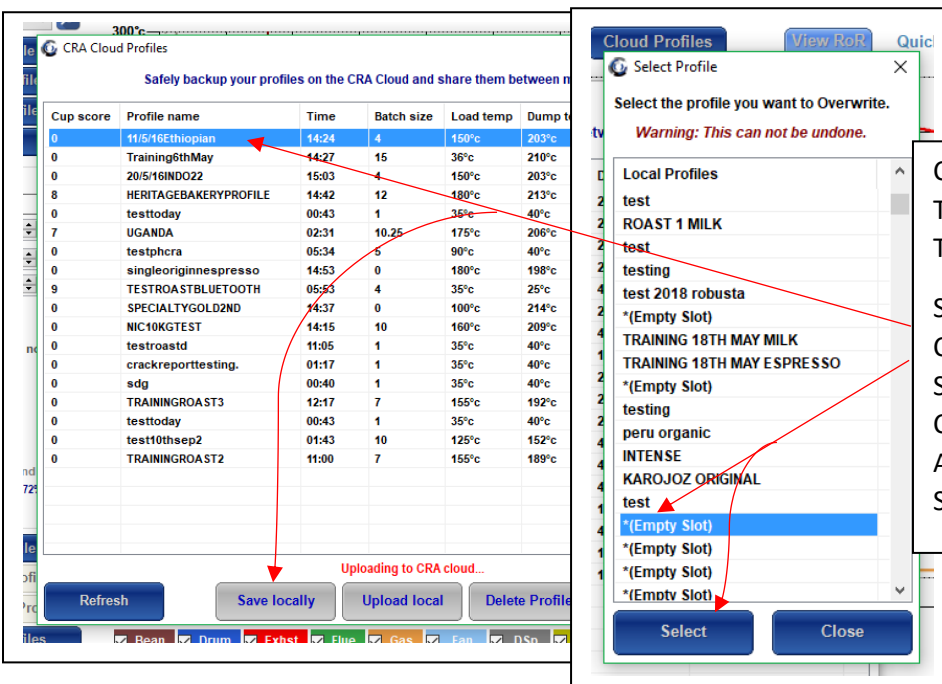
Profiles loaded. 18 | 20 profiles

Refresh | Save locally | Upload local | Delete Profile | Close

PRESS "UPLOAD LOCAL" TO CHOOSE FROM PROFILES SAVED ON THE COMPUTER TO UPLOAD TO THE CLOUD LOCATION.

SELECT PROFILE TO UPLOAD FROM THE LIST. PROFILE WILL THEN UPLOAD TO THE CLOUD LOCATION

### 7.1.2 Downloading Profiles from the Cloud



CRA Cloud Profiles

Safely backup your profiles on the CRA Cloud and share them between multiple roasters.

Cup score	Profile name	Time	Batch size	Load temp	Dump temp
0	11/15/16Ethiopian	14:24	4	150°C	203°C
0	Training6thMay	14:27	15	36°C	210°C
0	20/15/16INDO22	15:03	4	150°C	203°C
8	HERITAGEBAKERYPROFILE	14:42	12	180°C	213°C
0	testtoday	00:43	1	35°C	40°C
7	UGANDA	02:31	10.25	175°C	206°C
0	testphcra	05:34	5	90°C	40°C
0	singleoriginnespresso	14:53	0	180°C	198°C
9	TESTROASTBLUETOOTH	05:53	4	35°C	25°C
0	SPECIALTYGOLD2ND	14:37	0	100°C	214°C
0	NIC10KGTEST	14:15	10	160°C	209°C
0	testroastd	11:05	1	35°C	40°C
0	crackreporttesting.	01:17	1	35°C	40°C
0	sdg	00:40	1	35°C	40°C
0	TRAININGROAST3	12:17	7	155°C	192°C
0	testtoday	00:43	1	35°C	40°C
0	test10thsep2	01:43	10	125°C	152°C
0	TRAININGROAST2	11:00	7	155°C	189°C

Uploading to CRA cloud...

Refresh | Save locally | Upload local | Delete Profile

Select Profile

Select the profile you want to Overwrite.

Warning: This can not be undone.

Local Profiles

- test
- ROAST 1 MILK
- test
- testing
- test 2018 robusta
- \*(Empty Slot)
- TRAINING 18TH MAY MILK
- TRAINING 18TH MAY ESPRESSO
- \*(Empty Slot)
- testing
- peru organic
- INTENSE
- KAROJOZ ORIGINAL
- test
- \*(Empty Slot)
- \*(Empty Slot)
- \*(Empty Slot)
- \*(Empty Slot)

Select | Close

CHOOSE THE PROFILE YOU WANT TO SAVE FROM THE CLOUD TO THE COMPUTERS LOCATION.

SELECT THE LOCATION IN THE COMPUTERS PROFILE LIST TO SAVE THE PROFILE TO. NOTE: YOU CAN SAVE OVER THE TOP OF ANOTHER PROFILE OR CHOSE TO SAVE IT TO AN EMPTY SLOT.

## 8.0 TROUBLE SHOOTING

Coffee Sweet will automatically look for updates from the Coffee Roasters Australia server and download automatically providing you will all the latest updates as they happen. You must be connected online to receive updates

PROBLEMS	SOLUTIONS
<p><b>SOFTWARE WILL NOT CONNECT TO ROASTER</b></p> <ul style="list-style-type: none"> <li>COMMON CAUSE IS SOFTWARE DRIVER IS NOT INSTALLED PROPERLY OR ELECTROMAGNETIC INTERFERENCE FROM THE ROASTER TO THE COMPUTER.</li> <li>ALSO SOME ISSUES WITH CERTAIN PC COMM PORTS.</li> <li>INTERFERENCE WITH THE USB PANEL MOUNT CONNECTOR</li> <li>VIRUS PROTECTION IS BLOCKING COFFEE SWEET FILES FROM DOWNLOADING OR RUNNING</li> </ul>	<ul style="list-style-type: none"> <li>ENSURE ROASTER IS ON AND PILOT IS LIT.</li> <li>CHECK USB CABLE IS SECURELY PLUGED IN AT PC AND ALSO IN THE CONTROL BOX OF THE ROASTER.</li> <li>ENSURE USB CABLE IS HIGH QUALITY SHIELDED AND FERRITE CORES ARE ATTACHED AS PER INSTRUCTIONS.</li> <li>TRY CONNECTING TO A DIFFERENT USB PORT ON THE PC.</li> <li>SOFTWARE HAS BEEN TESTED ON WINDOWS 7 AND 8. EARLIER VERSION MAY EXPERIENCE DIFFICULTIES.</li> <li>ENSURE THAT WHEN THE SOFTWARE WAS INSTALLED THAT THE DRIVER WAS ALSO INSTALLED. YOU CAN MANUALLY RUN THE DRIVER INSTALLATION FROM THE COFFEE SWEET FOLDER IN YOUR C:DRIVE. CONNECTION WILL NOT WORK WITHOUT THE CORRECT DRIVER INSTALLED.</li> <li>TRY CONNECTING DIRECTLY FROM THE PCB BOX TO THE PC WITH THE USB CABLE. IF THIS WORK THEN LIKELY ISSUE WITH THE USB PANEL MOUNT ADAPTER AND MAY REQUIRE IT TO BE NON GROUNDED TO THE ROASTER.</li> <li>UNINSTAL COFFEE SWEET THEN REINSTAL WITHOUT THE VIRUS PROTECTION ON. ADD COFFEE SWEET AS AN EXCEPTION TO THE VIRUS PROTECTION SOFTWARE SO IT DOES NOT BLOCK FILES FROM RUNNING.</li> </ul>
<p><b>USB/SERIAL PORT CONNECTION IS DISCONNECTED DURING ROAST</b></p> <ul style="list-style-type: none"> <li>COMMON CAUSE IS ELECTROMAGNETIC INTERFERENCE FROM THE ROASTER TO THE COMPUTER.</li> </ul>	<ul style="list-style-type: none"> <li>CHECK USB/SERIAL CABLE IS SECURELY PLUGED IN AT PC AND ALSO IN THE CONTROL BOX OF THE ROASTER.</li> <li>ENSURE USB CABLE IS HIGH QUALITY SHIELDED AND FERRITE CORES ARE ATTACHED AS PER INSTRUCTIONS.</li> <li>REPLACE CABLE</li> </ul>
<p><b>PCB SCREEN DROPS OUT INTERMITTANTLY</b></p> <ul style="list-style-type: none"> <li>COMMON CAUSE IS ELECTROMAGNETIC INTERFERENCE OR LOOSE CONNECTION.</li> </ul>	<ul style="list-style-type: none"> <li>CHECK RIBBON CABLE CONNECTION TO PCB AND ALSO AT BACK OF SCREEN.</li> <li>ENSURE RIBBON CABLE IS AWAY FROM CONTACTORS AND RELAYS IN THE CONTROL CABINET.</li> <li>A FERRITE CORE ON THE 10V OUTPUT ON THE FAN VARIABLE SPEED DRIVE WILL SOMETIMES HELP.</li> <li>CHECK SCREWS ATTACHING THE DISPLAY PANEL TO THE ROASTER ARE NOT IN CONTACT WITH THE LCD AND ALSO CHECK THE LCD IS NOT IN CONTACT OR TOUCHING WITH THE CONTROL PANEL.</li> </ul>
<p><b>GAS AND FAN CONTROLS ON THE DISPLAY PANEL GO BACKWARDS WHEN TURNED CLOCKWISE</b></p> <ul style="list-style-type: none"> <li>COMMON CAUSE IS INTERFERENCE OR LENGTH OF RIBBON CABLE</li> </ul>	<ul style="list-style-type: none"> <li>GO TO "SETTINGS" MENU ON THE DISPLAY PANEL ON THE ROASTER. YOU CAN INVERT THE KNOB CONTROL HERE TO REVERSE THE DIRECTION OF THE GAS AND FAN CONTROL.</li> <li>ENSURE RIBBON CABLE IS AWAY FROM CONTACTORS AND RELAYS IN THE CONTROL CABINET.</li> <li>A FERRITE CORE ON THE 10V OUTPUT ON THE FAN VARIABLE SPEED DRIVE WILL SOMETIMES HELP.</li> </ul>
<p><b>GAS AND FAN CONTROLS ON THE DISPLAY PANEL JUMP AROUND INCONSISTENTLY AND ARE NOT SMOOTH</b></p> <ul style="list-style-type: none"> <li>COMMON CAUSE IS INTERFERENCE</li> <li>DAMAGE TO POTENTIOMETER</li> </ul>	<ul style="list-style-type: none"> <li>ENSURE RIBBON CABLE IS AWAY FROM CONTACTORS AND RELAYS IN THE CONTROL CABINET.</li> <li>CERTAIN FREQUENCIES WILL LIKELY BE AFFECTED MORE ON THE KNOB CONTROL BY THE POSITION IT IS IN. YOU CAN WORK WITH THE INTERFERENCE BY SELECTING A POSITION ON THE KNOB WHERE THERE IS NO INTERFERENCE AND THE USE THE COFFEE SWEET SOFTWARE FOR CONTROL.</li> <li>REPLACE POTENTIOMETER</li> </ul>
<p><b>COFFEE SWEET SOFTWARE FREEZES ON PC</b></p> <ul style="list-style-type: none"> <li>COMMON CAUSE IS A PC ISSUE OR ELECTROMAGNETIC</li> </ul>	<ul style="list-style-type: none"> <li>CHECK USB CABLE IS SECURELY PLUGED IN AT PC AND ALSO IN THE CONTROL BOX OF THE ROASTER.</li> <li>ENSURE USB CABLE IS HIGH QUALITY SHIELDED AND FERRITE CORES ARE ATTACHED AS PER INSTRUCTIONS.</li> <li>UNPLUG USB CABLE THEN CLOSE THE SOFTWARE. PLUG USB CABLE BACK IN AND RESTART.</li> </ul>

INTERFERENCE FROM THE ROASTER.

- ROASTER PILOT HAS DROPPED OUT
- VIRUS PROTECTION ISSUES
- PC DRIVER ISSUE

- CHECK FOR PC ISSUES RELATED TO VIRUS PROTECTION SOFTWARE AND ENSURE ALL RELEVANT WINDOWS PATCHES OR SERVICE PACKS ARE LOADED
- CHECK ROASTER PILOT FLAME