

BC

BUCKEYE COFFEE ROASTERS

"GET YOUR ROAST ON"



BC COFFEE ROASTER MANUAL 2016

WELCOME TO THE WORLD OF COFFEE ROASTING WITH THE BC LINE OF ROASTERS

THANK YOU FOR INVESTING IN THE BC COMMERCIAL COFFEE ROASTING LINE! YOU HAVE PURCHASED A MACHINE THAT WILL SERVE YOU WELL AND ROAST GREAT COFFEE. TO GET THE MOST OUT OF YOUR INVESTMENT PLEASE READ THIS MANUAL BEFORE SETTING UP AND OPERATING ANY BC EQUIPMENT.

IN ORDER TO GET THE VERY BEST OUT OF YOUR ROASTING MACHINE WE ASK YOU TO FIRST READ THIS MANUAL INCLUDING THE SAFETY PRECAUTIONS AND SIMPLE MAINTENANCE PROCEDURES. THEN BY READING THE SIMPLE "GET STARTED" CHAPTER YOU CAN SEE HOW EASY COFFEE ROASTING CAN BE AND HOW ENJOYABLE THE ELITE IS TO ROAST WITH WHETHER YOU ARE NEW TO COFFEE ROASTING OR A SEASONED ROAST-MASTER. THE SEDONA ELITE HAS THE FEATURES TO MAKE COFFEE ROASTING EASY FOR THE BEGINNER AND A JOY FOR THOSE DEVELOPING THE ART OF THIS CRAFT. SO LETS GET STARTED!

1.



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WARNING: THIS MANUAL IS PROVIDED ONLY FOR GENERAL INFORMATION PURPOSES. IT IS ALWAYS CUSTOMERS RESPONSIBILITY TO CHECK WITH LOCAL AND STATE AGENCIES TO ENSURE ALL SAFETY AND LEGAL REQUIREMENTS ARE FOLLOWED. (PLEASE KEEP A COPY OF THIS MANUAL WITH ROASTER AT ALL TIMES AS A REFERENCE GUIDE.)

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**BUCKEYE COFFEE
ROASTERS**

2.

1. SAFETY ALWAYS- SAFETY FIRST

IMPORTANT: ALWAYS READ ENTIRE MANUAL BEFORE ATTEMPTING ANY WORK OF UNPACKING ROASTER OR SETTING UP EQUIPMENT. FAILURE TO DO SO COULD RESULT IN DAMAGE TO EQUIPMENT NOT COVERED BY WARRANTY AND MORE IMPORTANT COULD RESULT IN SERIOUS INJURY AND/OR DEATH!

CAUTION: THIS MANUAL IS PROVIDED ONLY AS A GUIDELINE AND IS NOT INTENDED TO COVER ALL POTENTIAL SAFETY ISSUES THAT MAY ARRISE IN YOUR AREA. CONSULT WITH LOCAL AUTHORITIES FOR ACTUAL SAFE WORK METHODS IN YOUR FACILITY. WE ARE NOT RESPONSIBLE FOR FAILURE OF ANYONE USING THIS EQUIPMENT WITHOUT SAFE WORKING PROCEDURES.

IMPORTANT: A HIGH QUALITY GOVERNMENT APPROVED FIRE EXTINGUISHER SHOULD ALWAYS BE KEPT NEAR EACH COFFEE ROASTING MACHINE.

1. NEVER RUSH TO GET A JOB DONE. THIS CAN RESULT IN MISTAKES. AND MISTAKES WITH ELECTRIC AND GAS CAN BE FATAL TO YOU AND YOUR EMPLOYEES.
2. NEVER ALLOW AN UNQUALIFIED PERSON TO WORK ON EQUIPMENT OR BE INVOLVED IN ANY PROCESS RELATING TO UNPACKING, INSTALLING OR USING OF EQUIPMENT.
3. **NEVER RUN ROASTER UNATTENDED.** COFFEE IS A COMBUSTIBLE MATERIAL AND CAN EXPLODE AND CAUSE LOSS OF PROPERTY AND LIFE TO ANY NEAR ACCIDENT AREA. ALWAYS RUN EQUIPMENT ONLY BY AUTHORIZED PERSONNEL FULLY TRAINED IN SAFEY PROCEDURES & FIRST AID TRAINING.
4. MACHINE MUST BE PLACED ON LEVEL SURFACE IN HORIZONTAL POSITION. USE A LEVEL TO BALANCE ROASTER PROPERLY.
5. ELECTRIC POWER AT 220V IS VERY DANGEROUS IF NOT PROPERLY SETUP. USE A QUALIFIED CERTIFIED ELECTRICIAN TO SET UP YOUR ELECTRIC CONNECTIONS **BEFORE** ATTEMPTING TO SETUP AND USE ROASTER (SEE SECTION: MAKE SURE YOUR ELECTRIC IS CORRECT)
6. NEVER OPEN UP ROASTING UNIT AT ELECTRICAL BOX OR CONNECTIONS WHILE OPERATING ROASTER. **NEVER OPEN MOTOR GUARD OR TOUCH OR OPEN ELECTRICAL CONNECTIONS WHILE IN USE.** ANY TIME MACHINE IS SERVICED OR MAINTENANCE IS PERFORMED MACHINE MUST BE TURNED



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OFF AND DISCONNECTED FROM POWER SOURCE. IF UNIT IS HARD WIRED SHUT OFF CIRCUIT AT CIRCUIT BREAKER OR CIRCUIT ELECTRIC BOX. **(3)**

7. DO NOT TOUCH SURFACE OF ROASTER WHILE HEATING AS UNIT BECOMES VERY HOT AND INJURY OR BURNS COULD OCCUR. USE PROTECTIVE INSULATED SAFETY GLOVES WHEN OPERATING ROASTER TO AVOID BURNS TO HANDS. KEEP AN APPROVED FIRST AID KIT NEARBY IN CASE OF ACCIDENTS.
8. COFFEE AND CHAFF ARE COMBUSTIBLE MATERIALS. **ALWAYS CHECK TRAY BELOW DRUM AND CHAFF UNIT AFTER EACH ROAST TO KEEP CLEAN FROM POTENTIAL DUST OR CHAFF FIRES.** IF A FIRE OCCURS NEVER OPEN UP DRUM. TURN OFF UNIT AND UNPLUG AND USE APPROVED FIRE EXTINGUISHER ONLY TO PUT OUT FIRE. NEVER USE WATER AS THIS COULD RESULT IN FATAL ELECTRICAL SHOCK AND WILL DAMAGE EQUIPMENT AND VOID WARRANTY.

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9. **NEVER OVER-ROAST COFFEE!** COFFEE IS COMBUSTIBLE MATERIAL AND IF OVER HEATED WILL BURN AND PERHAPS EXPLODE. MACHINE MUST BE SUPERVISED AT ALL TIMES IT IS IN USE AND NEVER SHOULD BEANS BE OVERHEATED OR BURNED. WHILE OUR ROASTERS CAN PRODUCE FRENCH & ITALIAN ROASTS OFTEN WITHIN ONLY 15-30 SECONDS AFTER ACHIEVING THIS DARK ROAST YOU RISK OVERCOOKING BEANS AND RISK DESTROYING ENTIRE BATCH AS WELL AS CREATE A FIRE HAZARD. ONCE COFFEE REACHES DARK FRENCH ROAST MOST THE FLAVOR OF THE COFFEE HAS ALREADY BEEN COOKED OUT OF BEANS AND ONLY THE TASTE OF BURNT BEANS EXISTS. AVOID OVER ROASTING AND BURNING BEANS.

(OILY BEANS ARE OVERCOOKED BEANS. THE CELLAR STRUCTURE OF BEANS ARE DAMAGED WHEN OILY.)

10. DO NOT WEAR LOOSE FITTING CLOTHES WHILE OPERATING MACHINERY. CLOTHING CAN BE CAUGHT BY POWERFUL MOTORS RESULTING IN SERIOUS INJURY. DO NOT PUT FINGERS OR HANDS NEAR ANY MOVING PART OR OPEN ANY PART OF ACCESS DOORS.

11. NEVER ALLOW MACHINE TO COME INTO CONTACT WITH WATER. EVEN WHEN MACHINE IS OFF **DO NOT CLEAN ATTACHED SURFACES WITH WATER OR SPRAY LIQUIDS ON UNIT.** IF COOLING TRAY OR HOPPER NEEDS CLEANED DISCONNECT AND CLEAN AWAY FROM UNIT. NEVER LEAVE ELECTRICAL ATTACHED OR ONE WHEN SERVICING UNIT. DRY ALL PARTS BEFORE REASSEMBLY OF UNIT.

12. NEVER OPERATE MACHINERY WHILE UNDER THE INFLUENCE OF ALCOHOL OR DRUGS OR IF ILL OR EVEN ON PRESCRIPTION MEDICATIONS. DO NOT OPERATE WHILE FATIGUED. USER MUST BE FULLY ALERT WHILE OPERATING MACHINERY.

13. NEVER OVER LOAD MACHINE WITH TOO MUCH COFFEE.



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14.KEEP ALL UNAUTHORIZED PERSONS AND CHILDREN AWAY FROM EQUIPMENT.

**15.NEVER TOUCH HOT EXHAUST PIPES OR CONNECTIONS. ALWAYS USE
APPROVED GLOVES TO PROTECT HANDS. (4)**

**16.NEVER STOP DRUM WHILE HEATING COFFEE. THIS WILL RESULT IN BURNED
PRODUCT AND MAY RESULT IN FIRE HAZARD. IF POWER GOES OFF OR DRUM
STOPS TURN OFF MACHINE IMMEDIATELY AND DO NOT OPEN DRUM AS AIR OR
OXYGEN COULD IGNITE BEANS. IF ABLE MANUALLY ROTATE DRUM UNTIL POWER
RESTORED.**

**17.USE ONE DRY SOFT CLOTH TO CLEAN EXTERIOR OF UNIT WHEN MACHINE IS
OFF AND DISCONNECTED FROM ELECTRIC. NEVER USE WATER OR WET
CHEMICALS WHILE IN USE.**

**18.GAS UNITS: ALWAYS CHECK GAS LINES TO ENSURE NO LEAKS.
USE SOAPY WATER ON GAS LINES (NOT ON MACHINE) BEFORE IGNITING
ROASTER TO MAKE SURE THERE ARE NO LOOSE CONNECTIONS. IF LOOSE
CONNECTIONS OR LEAKS ARE FOUND IMMEDIATELY TURN OFF ALL ELECTRIC
AND CONTACT A SPECIALIST OR CERTIFIED TECHNICIAN TO PERFORM REPAIRS.
GAS CAN BE DEADLY AS IT CAN SUFFOCATE USER IN CONFINED AREAS BY
LEAKAGE AND/OR CAN CAUSE EXPLOSION IF COMING INTO CONTACT WITH A
SPARK OR ELECTRIC CONNECTION.**

**19.DO NOT USE EXTENSION CORDS AND MAKE SURE ALL CORDS ARE NOT
TWISTED, RESTRICTED OR DAMAGED IN ANY WAY PRIOR TO USE.**

**20.IF ANY PROBLEMS ARE FOUND TURN OFF MACHINE DISCONNECT
FROM POWER SOURCE AND CONTACT A CERTIFIED TECHNICIAN TO
PERFORM ALL REPAIRS AND TEST BEFORE USING UNIT. KEEP ALL UNITS
IN GOOD REPAIR. IF REPAIRS OR PART REPLACEMENTS ARE NEEDED DO NOT USE
MACHINE UNTIL UNIT HAS BEEN SAFELY BROUGHT UP TO STANDARDS.**

1. SPECIAL NOTE ON GAS ROASTERS:

**OUR COMMERCIAL GAS ROASTERS REQUIRE GAS PRESSURE OF 8-24 WC OR 4-6 KPA
OR UP TO .867 PSI.**

**A COMMON LPG REGULATOR FOR GAS GRILLS DOES NOT PROVIDE THE PRESSURE
NEEDED FOR OUR ROASTERS. ALSO A HIGH PRESSURE REGULATOR WILL DESTROY
ROASTER AS THESE CAN PUT OUT 1-10 PSI. YOU MUST HAVE A COMMERCIAL MADE
PRO REGULATOR DESIGNED TO PROVIDE A MAXIMUM WC OF 24 (6KPA) OR .867 PSI.**

NATURAL GAS:

**MOST HOMES AND BUSINESSES HAVE RESTRICTED NATURAL GAS PRESSURE
LIMITED TO 7 WC OR 0.253 PSI. THESE ROASTERS REQUIRE 8-24 WC OR UP TO
0,867 PSI OR 6 KPA. IT IS THE RESPONSIBILITY OF BUYER TO FIRST ENSURE BY
FOLLOWING THE ABOVE SAFETY PRECAUTIONS AS WELL AS ALL OTHERS REQUIRED
BY YOUR AREA YOU WILL BE ABLE TO ENJOY YEARS OF QUALITY COFFEE ROASTING
HE CAN USE A NATURAL GAS ROASTER BEFORE BUYING ONE. FAILURE TO DO SO
WILL BE THE SOLE RESPONSIBILITY OF BUYER.**



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TO HELP YOU UNDERSTAND GAS PRESSURE BETTER TAKE NOTE OF THIS CHART:

GAS PRESSURE:

<u>KPA</u>	<u>WA</u>	<u>PSI</u>
<u>1</u>	<u>4</u>	<u>0.14</u>
<u>2</u>	<u>8</u>	<u>0.289</u>
<u>3</u>	<u>12</u>	<u>0.433</u>
<u>4</u>	<u>16</u>	<u>0.578</u>
<u>5</u>	<u>20</u>	<u>0.722</u>
<u>6</u>	<u>24</u>	<u>0.867</u>

**PLEASE NOTE: WHILE YOU CAN ROAST AT 8 WC YOU WILL ACHIEVE FULL ROASTS
AT 16-24 WC**

2. MAKE SURE YOUR ELECTRIC IS CORRECT

ELECTRIC WHEN PROPERLY USED PROVIDES THE CLEANEST FORM OF ENERGY FOR BOTH THE ENVIRONMENT AND THE WORK FORCE. BUT 220V ELECTRIC NOT PROPERLY USED AND RESPECTED CAN RESULT IN SERIOUS INJURY AND EVEN DEATH. THEREFORE FOLLOW THE GUIDES LISTED BELOW AND ALWAYS BE SURE TO HAVE A CERTIFIED ELECTRICAL TECHNICIAN INSTALL AND CHECK YOUR SPECIFICATIONS PRIOR TO SETTING UP AND USING YOUR MACHINERY.

**SPECIAL NOTE: YOUR UNIT WILL ARRIVE WITH A 5-6' POWER CORD.
IT**

**MAY NOT COME WITH A PLUG. PLUGS AND OUTLETS VARY FROM
BUILDING**

**AND LOCATION PLUS MANY CUSTOMERS CHOOSE TO HAVE THEIR
ROASTER HARDWIRED TO FACILITY. THEREFORE CUSTOMER CAN
CHOOSE THEIR OWN TYPE OF PLUG OR CONNECTION UNDER
DIRECTION OF ELECTRICIAN.**

ELECTRICAL SPECIFICATIONS:

**(ALWAYS CHECK THE ELECTRIC PLATE ON EACH MACHINE TO ENSURE
YOU ARE SETTING UP UNIT WITH PROPER SPECS)**

BC ELECTRICAL SPECS:



BUCKEYE COFFEE ROASTERS

All models are sold as 220V 50-60Hz Made for the USA and North America

GAS & LPG MODELS (WATTAGE) ALL ELECTRIC MODELS

BC-300:	140W	N/A
BC-600:	140W	N/A
BC-1300:	180W	4180
BC-2000:	245W	5245
BC-3300:	570W	N/A
BC-6300:	900W	N/A

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VOLTAGE CONVERTERS FOR GAS MODELS:

BECAUSE OF THE LOW WATTAGE OF THE GAS UNITS YOU HAVE THE OPTION OF USING A VOLTAGE CONVERTER WHICH ALLOWS YOU TO RUN UNIT ON 110/120 REGULAR HOUSEHOLD OR BUSINESS CURRENT.

IF CHOOSING TO USE A VOLTAGE TRANSFORMER CHOOSE ONLY A HIGH QUALITY UNIT AND FOLLOW THE INSTRUCTIONS PROVIDED BY MANUFACTURE. WE RECOMMEND THAT IF YOU USE A TRANSFORMER YOU CHOOSE ONE AT LEAST 2-4 TIMES THE WATTAGE POWER OF YOUR ROASTER. THIS WILL PROTECT UNIT FROM ELECTRICAL SURGES. (USER ASSUMES FULL RESPONSIBILITY FOR USE OF A VOLTAGE CONVERTER)

CONNECTING ELECTRIC CORD TO OUTLET:

ROASTERS USE 3 WIRE SYSTEM. COLORS OF WIRES VARY FROM BOTH MAKE AND MODEL AND FROM ELECTRIC TO GAS. ALWAYS LOOK INSIDE ELECTRIC ROOM TO ENSURE THE GROUND WIRE IS PROPERLY CONNECTED AS A GROUND. GENERALLY GREEN OR PART GREEN IS GROUND BUT NOT ALWAYS.

IN MOST CASES A PLUG COMES WITH ALL MODELS

ON A 3 PRONG PLUG BOTH POWER & NEUTRAL ATTACH TO POWER LINES AND GROUND ALWAYS GOES ON GROUND. IF YOU FAIL TO ATTACH GROUND PROPERLY THIS CAN DAMAGE UNIT AND VOID WARRANTY AS WELL AS ONLY PROVIDE 1/2 POWER TO UNIT.(SEE INSTRUCTIONS PROVIDED WITH YOUR ELECTRICAL PLUG FOR CONTACT POINTS)



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**NEVER ATTACH AN EXTENSION CORD AS THIS
COULD CREATE A FIRE HAZARD AND/OR
REDUCE POWER TO ROASTER.**

NEVER CONNECT A ROASTER TO AN OUTLET THAT IS NOT THE CORRECT VOLTAGE (220) AND THE CORRECT AMPERAGE. TO DETERMINE CORRECT AMPERAGE ON ANY APPLIANCE SINCE USA LAW DOES NOT REQUIRE IT'S LISTING SIMPLY DIVIDE THE VOLTAGE OF A PRODUCT INTO THE TOTAL WATTAGE. THIS WILL TELL YOU THE AMPERAGE. THEN YOU MUST USE A CIRCUIT BREAKER OF AT LEAST THE SAME AMPERAGE. WE RECOMMEND ALWAYS USING A 30A BREAKER OR ABOVE FOR ELECTRIC ROASTERS. IT NEVER HURTS TO HAVE A HIGHER VOLTAGE BREAKER BUT CAN DAMAGE WIRING AND EQUIPMENT IF YOUR BREAKER HAS TOO LOW OF AMPERAGE (7)

WE ALWAYS RECOMMEND USING A CIRCUIT BREAKER WITH MORE AMPERAGE THAN NEEDED. GENERALLY A 20A BREAKER WILL WORK WITH MOST OUR LINE OF ROASTERS BUT 30A FOR ALL ELECTRIC MODELS GIVES YOU THE OPTION TO UPGRADE IN THE FUTURE.

3. UNPACKING AND SETTING UP YOUR ROASTER

(WANT ON THE JOB TRAINING? CHECK OUT OUR VIDEO SERIES ON THE TRAINING PAGE OF WEBSITE. A PASSWORD MAY BE REQUIRED. EMAIL US FOR DETAILS)

YOUR ROASTER COMES IN A PLYWOOD CRATE. THESE CRATES ARE VERY HEAVY THE BC-1300 IS OVER 330 LB. AND THE 6300 OVER 1100 LB. SO BE VERY CAREFUL WHEN HANDLING USING THE PROPER TOOLS. USE THE BUDDY SYSTEM IF LIFTING HEAVY ITEMS. PLACE CRATE ON SOLID GROUND AND LOOSEN NAILS OR SCREWS FROM BOTTOM. IN SOME CASES YOU CAN NOW JUST LIFT OFF THE LID. SAVE CRATE IN CASE OF WARRANTY SERVICE REPAIRS. IN SOME CASES IT IS EASIER TO REMOVE EACH SIDE OF CRATE AND TOP ONE SIDE AT A TIME. IN ANY CASE EXERCISE CAUTION NOT TO DAMAGE CONTENTS.

ROASTER ASSEMBLY:

ROASTER HAS BEEN PACKED IN SUCH A WAY AS TO PROTECT IT DURING SHIPMENT. ALL PARTS ARE PROPERLY WRAPPED AND PACKED TIGHT IN CRATE. IN GENERAL YOUR BC ROASTER COMES MOSTLY ASSEMBLED.

PLEASE NOTE: THE NEW 2016 LINE FROM 300-2000 HAVE THE DIRECT-CONNECT CHAFF UNITS SO DON'T NEED THE INFORMATION ON CONNECTING CHAFF



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PARTS TO YOUR ROASTER:

1. MAIN UNIT
2. CHAFF UNIT
3. CHAFF FAN/BLOWER
4. HOPPER
5. FLEXIBLE HOSE
6. USB CORD

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SIMPLE ASSEMBLY





**BUCKEYE COFFEE
ROASTERS**

VIDEOS ON LINE EXPLAIN ASSEMBLY

ATTACH EXHAUST PIPES:

YOU MAY CHOOSE TO USE SOLID STEEL DUCT PIPE, CHIMNEY OR WOOD BURNING STOVE PIPE OR EVEN FLEXIBLE METAL PIPES. (FLEXIBLE PIPE CANNOT BE CLEAN AND MUST BE REPLACED EVERY FEW MONTHS. SO WE HIGHLY RECOMMEND IF YOU ARE INSTALLING ROASTER IN A PERMANENT LOCATION THAT YOU USE SOLID STEEL PIPES. WHENEVER POSSIBLE WE ENCOURAGE THE USE OF DOUBLE- WALLED INSULATED STAINLESS STEEL OR GALVANIZED STEEL PIPES) **(9)**

IF YOU ARE USING YOUR UNIT ON A CART AND CARTING TO DRIVE FOR USE YOU CAN GET BY WITH A PIPE AND CHIMNEY CAP FOR UNIT. THEN USING FLEXIBLE METAL PIPING WILL BE MORE PRACTICAL BUT MUST STILL BE REPLACED EVERY FEW MONTHS AS THESE PIPES DETERIORATE AND CANNOT BE CLEANED. FOR SOLID PIPES WE RECOMMEND YOU BUY A CHIMNEY BRUSH AND HANDLE SO AS TO CLEAN SUET OR CHAFF FROM PIPES EVERY FEW MONTHS AS IT WILL BUILD UP ON WALLS OF PIPES. A WET/ DRY VACUUM CAN BE HELPFUL IN CLEANING CHAFF ALSO.

ATTACH PIPES:

YOUR UNIT MAY OR MAY NOT COME WITH TWO SMALL PIECES OF FLEXIBLE PIPING. THIS PIPE IS SUITABLE ONLY FOR TESTING UNIT AND SHOULD NOT BE USED IN A REGULAR SETUP.

YOU HAVE TWO PIPES COMING OFF ROASTER. ONE FROM COOLING TRAY AND ONE FROM CHAFF UNIT. BOTH NEED PIPED OUT OF BUILDING. YOU CAN CHOOSE TO RUN BOTH PIPES OUTSIDE SEPARATELY OR YOU CAN RUN PIPES TOGETHER AND RUN ONE PIPE OUTSIDE.

PIPE ONE WAY BACKDRAFT DAMPER:

IF RUNNING TWO PIPE INTO ONE YOU **MUST** USE A ONE WAY DAMPER WHERE COOLING TRAY PIPE CONNECTS TO EXHAUST PIPE FROM CHAFF UNIT. IF YOU FAIL TO DO SO SMOKE FROM EXHAUST PIPE WILL BLOW INTO COOLING TRAY AND FILL BUILDING WITH SMOKE AND CHAFF. **SEE PICTURES BELOW**

BACKDRAFT DAMPER

BC

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BY USING A CONNECTOR PIPE AS SEEN HERE YOU CAN ATTACH BOTH EXHAUST VENTS TO ONE PIPE SAVING MONEY ON PIPE AS WELL AS SPACE AND INSTALLATION CHARGES. IF YOU PREFER YOU CAN USE TWO PIPES ATTACHED TO ONE VENT NEAR WALL OR WINDOW.



VERY IMPORTANT:

THERE ARE TWO EXHAUSTS THAT COME OFF ROASTER. THE MAIN EXHAUST IS OFF CHAFF UNIT. A 2ND EXHAUST COMES OFF COOLING TRAY. YOU SHOULD USE TWO EXHAUST PIPES OUT OF BUILDING.

IF YOU DECIDE TO RUN COOLING EXHAUST INTO CHAFF EXHAUST IT MUST HAVE A BACK DRAFT DAMPER AT THE END OF COOLING EXHAUST. IF THE CUSTOMER CHOOSES THIS OPTION IT IS HIS RESPONSIBILITY (NOT OURS) TO HAVE THIS INSTALLED PROPERLY.

FOR PERMANENT INSTALLATION WHERE CUTTING THROUGH A WALL IS REQUIRED:

EXTREME CARE IS REQUIRED WHEN CUTTING INTO ANY COMMERCIAL OR RESIDENTIAL WALL AS EITHER WATER OR ELECTRICAL LINES MAY RUN THROUGH THE AREA YOU PLAN TO VENT. WE RECOMMEND YOU USE A PROFESSIONAL TO INSTALL VENTS THROUGH PERMEANT WALLS AS PERMITS MAY BE REQUIRED IN YOUR STATE OR CITY PLUS DANGERS EXIST IN BLINDLY CUTTING INTO WALL. FOR EXPERIENCED PERSONNEL WE RECOMMEND YOU USE A RECIPROCAL SAW. THIS SAW ALLOWS USER TO CUT DRYWALL WITHOUT CUTTING MUCH BEYOND WALL BOARD SO AS TO AVOID DAMAGE TO INTERIOR FIXTURES. A SIMPLE VIDEO IS FOUND ON OUR WEBSITE ON THE TRAINING PAGE.

VENTS, CHIMNEY CAPS & INSULATION:

CHECK WITH YOUR LOCAL BUILDING CODES TO MAKE SURE YOU FOLLOW LEGAL PROCEDURES FOR YOUR AREA. ALSO ANYTIME A HEATED PIPE COMES INTO CONTACT WITH BUILDING IT MUST BE INSULATED



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WITH APPROVED DUCT INSULATION. SEE LOCAL BUILDING CODES FOR YOUR AREA. SEE



SAMPLE

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CONNECTING AND SECURING ALL PIPES:

A NUMBER OF OPTIONS EXIST TO CONNECT PIPES TO PREVENT SMOKE FROM LEAKING INTO BUILDING. THERE ARE VARIOUS CLAMPS, HEAT TREATED CAULKING AND HEAT RESISTANT DUCT TAPE. MAKE SURE ANY METHOD USED IS APPROVED IN YOUR AREA.



PORTABLE SETUP



BUCKEYE COFFEE ROASTERS

MANY CUSTOMERS USE A PORTABLE SETUP ON SMALLER ROASTERS. YOU CAN USE THIS METHOD BY PUTTING A SMALL ROASTER SUCH AS THE 1.5 ON A CART AND CARTING IT OUTSIDE LIKE A GRILL TO ROAST WITH OR SIMPLY LEAVING IN GARAGE OR BUILDING AND MOVING IT TO ROAST AREA AND THEN USING FLEXIBLE PIPE TO RUN SMOKE OUTSIDE THROUGH A DOOR OR WINDOW. THERE ARE MANY OPTIONS. JUST BE SAFE AND FOLLOW THE CODES ALLOWED IN YOUR AREA.

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**USE A HEAVTY DUTY CART WITH QUALITY
WHEELS**

4. TECHNICAL INFORMATION AND MACHINE PARTS

LISTED BELOW IS GENERAL INFORMATION AND STATS ON BC ROASTERS

ELECTRIC MODELS

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GAS MODELS:

STATS FOR EACH MODEL:

**SEE BROCHURE FOR UPDATED STATS ON THE NEW DIRECT-CONNECT
MODELS:**

BC 600



BUCKEYE COFFEE ROASTERS

Gas Type

II. Description of Product Appearance



【 TECHNICAL DATA 】

(ROASTER CAPACITY): **200G-600G (7 OZ.-21 OZ.)**

(HEATING METHOD): LPG(Y)、 GAS(R)、 N-GAS(T)

(14)

(ELECTRIC POWER ON GAS UNIT): 220V~240V 50/60HZ 145W
(MOTOR): 40W / 15W (FAN): 45W/ 45W

(ROASTING TIME): APPROXIMATELY 12-15 MINUTES
(ROASTING BARREL ROTATE SPEED): 83 R.P.M

(COOLING MIXING TANK SPINDLE SPEED): 25 R.P.M

(TYPE):HALF HOT AIR REGULATION

(EXHAUST DIAMETER): 2*76MM (EXHAUST AIR PIPE FOR ROASTING HOT AIR AND COOLING



BUCKEYE COFFEE ROASTERS

SYSTEM) (GAS CONSUMPTION): GAS BURNER PRESSURE 2 KPA, 0.03M3/H

SIZE:(L x W x H) 780 x480 x750 MM (INCHES: 31 L x 19 W x 30 H)

(MACHINE SIZE):58KG (128 LB)

(PACKING SIZE):(L x W x H)900x650x880MM (CRATE: 36"x 26"x 35")

(PACKING WEIGHT): 80KG (176 LB)

BC 1300

【TECHNICAL PARAMETERS】 BC-1300 electrical gas coffee bean roaster Capacity **200g-1300g / batch. (7 oz. to 2.86 lb.)**

Semi-gas direct with hot air regulation

Baking time: 12 minutes for light city , 15minutes for city Roaster

size(L*W*H) 900mm*750mm*980mm

SIZE INCHES: (35.4 L x 29.52 W x 38.58 H)

Dust Cyclone collector: 340*450x780mm

Host Parameters: 220V 50/60Hz 90w & 15w

Fans of cooler & regulator 120W*2

Electric heater power 700w*5 elements / 3500w

GAS UNIT: Gas Consumption 0.25Kg/Hr

N.W 90Kg(roaster)+18kg(cyclone) ROASTER WEIGHT: 198 lb. CHAFF UNIT WEIGHT: 39.6 lb.

G.W 150kg

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BC 2000

【Technical parameters】

Capacity 600g-2000g / batch. **(21 oz. to 4.4 lb. roasts)**



BUCKEYE COFFEE ROASTERS

Semi-gas direct with hot air regulation

Baking time 12 minutes for light city , 15minutes for city

**Roaster size(L*W*H) 980mm*820mm*980mm SIZE IN INCHES:
(38.58 L x 32.3 Wx 38.58H) High efficient and easy to clean Chaff
Dust Cyclone collector 340*450x1100mm**

Host Parameters 220V 50/60Hz 90w & 50w

**Fans of cooler & regulator 150W*2 Electric heater power 750w*6 pcs./
4500w Gas Consumption 0.3Kg/Hr**

N.W 100Kg(roaster) 220 lb. 18kg(cyclone) 39.6 lb.

G.W 170kg

BC 3300

【TECHNICAL PARAMETERS】 MODEL BC-3300

Capacity 500g-3300g / batch.

**Baking mode Semi-gas direct with hot air regulation Baking time 12 minutes
for light city , 15minutes for city Roaster size(L*W*H)**

1200mm*900mm*1150mm

Size Inches: (L*W*H) 47.24 x 35.43 x 45.27

Dust Cyclone collector 400*400x980mm

Host Parameters 220V 50/60Hz 200w

Fans of cooler & regulator 170W+200w

Gas Consumption 0.5Kg/Hr

N.W 150kg * 330.6 lb. G.W Shipping: 220kg *485 lb.

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BC 7000 CM

【Technical parameters】 Capacity 2000g-6300g / batch.

**Baking mode Semi-gas direct with hot air regulation Baking time 12 minutes for light
city , 15minutes for city**



BUCKEYE COFFEE ROASTERS

Roaster size(L*W*H) 1530mm*980mm*1700mm Dust Cyclone collector
450*450x1500mm

Host & Mixing motor 110-220V 50/60Hz 200w & 200w

Fans of cooling & regulator 110-220V 50/60Hz 375w & 745w Heating source by Only
gas Gas Consumption 0.8Kg/Hr

N.W 350Kg(roaster)+40kg(cyclone) G.W500kg

[SEE BROCHURE FOR THE BC-7, 14 & 18 POUNDER details](#)

5.GETTING STARTED:

SIMPLE STEPS TO ROASTING COFFEE

**SO NOW THAT WE HAVE REVIEWED THE SETUP AND PARTS
OF YOUR NEW ROASTER IT'S TIME FOR A TEST DRIVE: SEE
ON-LINE VIDEOS**

1. MAKE SURE ALL POWER LINES ARE PROPERLY CONNECTED
2. IF USING A GAS UNIT MAKE SURE ALL PIPELINES AND FITTINGS ARE
SECURE AND THERE ARE NO LEAKS **(ALL KNOBS AND BUTTONS
SHOULD BE IN OFF POSITION)**
3. TURN ON POWER SWITCH: ROASTER DRUM WILL START TURNING AND
TIMER AND TEMPERATURE GAUGES WILL LIGHT UP AND RUN
THROUGH THEIR START-UP CYCLE. **(IF ROASTER IS EQUIPT WITH
A VARIABLE SPEED DRUM YOU WILL NEED TO TURN ON
DRUM TO ABOUT 50 RPM)** IF USING A GAS/ PROPANE UNIT MAKE
SURE GAS LINES FROM TANK TO REGULATOR ARE ON AND LINE TO
ROASTER IS OPEN. **(17)**
4. TURN ON ROASTING SWITCH: IN ELECTRIC MODELS THIS WILL
POWER ON THE HEAT ELEMENTS. FOR THE GAS UNIT THE SELF-
IGNITOR WILL TURN ON LIGHTING BURNERS. MAKE SURE GAS VALVE
ON ROASTER IS OPENED UP NO
MORE THAN 1/4 TURN PART WAY. **IMPORTANT:NEVER OPEN
VALVE UP ALL WAY WHEN STARTING AS DAMAGE WILL
OCCUR TO PRESSURE METER!**



BUCKEYE COFFEE ROASTERS

5. ON ELECTRIC MODELS TURN FIRE REGULATION KNOB UP TO 100%. MAKE SURE AIR VOLUME ADJUSTING KNOB IS OFF. ALSO MAKE SURE HOPPER LOADING SLIDE IS CLOSED. THIS ALLOWS DRUM TO HEAT UP FASTER. ON GAS UNIT ADJUST FLAME AT GAS VALVE TO DESIRED HEAT.

6. **PREHEAT.** (YOU CAN ADJUST PREHEAT TIMES TO YOUR LIKING. WE RECOMMEND YOU STAY WITHIN THE RANGE OF 320F-370F (160C TO 187C) THIS WILL TAKE ABOUT 15 MINUTES TO HEAT UP THE FIRST TIME USED. AMBIENT TEMPERATURE IN SHOP WILL EFFECT HEATING TIME AS WELL AS ROAST. ONCE TEMPERATURE REACHES DESIRED PREHEAT TEMPERATURE ALARM WILL SOUND FOR 10 SECONDS.

7. **DROP BEANS FROM HOPPER.** WE RECOMMEND YOU USE THE MINIMUM AMOUNTS ALLOWED PER ROASTER UNTIL YOU GET FAMILIAR WITH ROASTER. (500 GRAMS ON THE SEDONA 3200 & 100 GRAMS ON THE 700) TEMPERATURE WILL RAPIDLY DROP WHEN BEANS ARE FIRST RELEASED INTO DRUM AND WILL SLOWLY START HEATING UP. CLOSE HOPPER SLIDE. **START TIMER**

8. WHILE WE RECOMMEND THE FOLLOWING TEMPERATURES AS A GENERAL GUIDE FOR ROASTS IN STAINLESS STEEL DRUMS: *LIGHT ROAST 425-440F *MEDIUM: 440-450F *DARK: 450-465F (* THESE ARE JUST GENERAL GUIDELINES-AMBIENT TEMPERATURES AND OTHER FACTORS EFFECT ACTUAL ROAST TIMES)

9. AFTER BEANS HAVE BEEN DROPPED INTO DRUM CLOSE LOADING SLIDE TO AVOID HEAT LOSS. AFTER A 1-2 MOMENTS BEAN TEMPERATURE WILL BEGIN TO RISE. WATCH AND TIME THE PACE OF TEMPERATURE RISING. WHILE YOU ALWAYS WANT TEMPERATURE TO INCREASE YOU DO NOT WANT THIS TO HAPPEN TOO FAST. TO DO SO CAN EITHER CAUSE OUTSIDES OF BEAN TO OVER ROAST AND/OR EFFECT TASTE. ON THE OTHER HAND YOU DO NOT WANT BEAN TEMPERATURE TO DROP ONCE IT HAS STARTED ROASTING AS THIS (18)

COULD CAUSE BEANS TO LOOSE TASTE. A STEADY INCREASE IS ALWAYS BEST. SEE NOTES ON AIR FLOW AS A GENERAL GUIDE.

10. **BEAN PROGRESSION:** LISTED BELOW ARE SOME CHANGES THAT TAKE PLACE AS YOUR BEANS BEGIN TO HEAT UP AND ROAST. IT IS VITAL THAT YOU MONITOR ENTIRE PROCESS AND TAKE NOTE OF THE VARIOUS TIMES AND CHANGES. WE RECOMMEND YOU KEEP A LOG OF YOUR ROASTS. IN EFFECT YOU ARE KEEPING A HAND WRITTEN



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PROFILE THAT WILL PROVE USEFUL WHEN CUPPING YOUR COFFEE AND REPEATING ROASTS. EVEN IF YOUR UNIT COMES WITH A COMPUTERIZED PROFILING SYSTEM THESE NOTES MAY PROVE INVALUABLE IN PERFECTING FUTURE ROASTS. HERE IS A REFERENCE OF ROASTING TIME:

LIGHT ROASTING: 12-13 MINUTES

MEDIUM ROASTING: 12-15 MINUTES

DEEP ROASTING: 13-16 MINUTES



COFFEE ROASTING BEAN CHART: (19)

COFFEE ROASTING BEAN CHART:

- 1.GREEN COFFEE- ONLY BUY QUALITY RAW ARABICA BEANS FROM TRUSTED SUPPLIERS
- 2.BEANS BEGIN TO PALE AFTER ROASTED FOR SEVERAL MINUTES
- 3.EARLY YELLOW- YOU WILL BEGIN TO SMELL GRAIN ROASTING SCENT IN AIR



BUCKEYE COFFEE ROASTERS

4. YELLOW-TAN

5. LIGHT BROWN

6. BROWN

7. 1ST CRACK STARTS (SEE BEAN HAS EXPANDED IN SIZE)

8. FIRST CRACK DONE- SOME COFFEES PRODUCE LOUD CRACKS FOR A MINUTE OR LONGER WHILE OTHERS ARE RELATIVELY SOFT QUIET AND YOU MUST LISTEN CLOSE TO HEAR. ANY TIME AFTER FIRST CRACK YOU MAY CHOOSE TO END ROAST. GENERALLY YOUR SUPPLIER WILL INFORM YOU WHAT IS THE 'SWEET SPOT' FOR ENDING ROAST. FROM THIS POINT ON YOU CAN TAKE SAMPLES OF ROAST FROM SAMPLE SPOON EVERY 30 SECONDS OR SO TO CUP LATER FOR TESTING.

9. CITY ROAST

10. CITY PLUS

11. FULL CITY

12. FULL CITY PLUS AND 2ND CRACK: (AROUND THIS TIME SECOND CRACK MAY BEGIN. SOME BEANS BEGIN 2ND CRACK RIGHT AFTER FIRST CRACK ENDS AND YOU CAN NOT EVEN TELL THAT SECOND CRACK HAS BEGUN. OTHERS START 2ND CRACK WITHIN ABOUT 3 MINUTES

(AFTER FIRST CRACK BEGINS. 2ND CRACK IS VERY LIGHT AND QUIET YOU MAY NOT HEAR MUCH CRACK OR ANY AT ALL)

13. VIENNA- LIGHT FRENCH (THESE CHANGES NOW TAKE PLACE VERY QUICKLY PERHAPS IN 15-30 SECONDS)

14. FULL FRENCH (ALMOST COMPLETELY BURNT. IF YOU DONT PULL NOW YOU WILL SOON BE THROWING ENTIRE BATCH AWAY. REMEMBER: BEANS STILL ROAST A BIT WHILE IN

COOLING TRAY. IT IS ALWAYS BEST TO PULL BEANS AND END ROAST JUST AHEAD OF DESIRED ROAST)

15. CHARCOAL=DEAD

16. CALL THE FIRE DEPARTMENT YOU ARE READY TO IGNITE!!!

(20)

CONTROL BEAN HEATING: (TEMPERATURE SHOULD ALWAYS RISE AFTER BOTTOMING OUT. NEVER ALLOW TEMPERATURE TO BEGIN DROPPING WHILE ROASTING)

DURING THE ROASTING PROCESS YOU WILL WANT TO USE THE FOLLOW METHODS TO CONTROL HEATING PROCESS: AFTER BEANS BEGIN HEATING IN DRUM AND



**BUCKEYE COFFEE
ROASTERS**

TEMPERATURE BEGINS TO RISE YOU WILL WANT TO TURN DOWN THE TEMPERATURE FROM THE HIGH SETTING YOU HAD IT ON DURING PREHEAT. DURING THE FIRST SEVERAL MINUTES WHILE BEANS ARE ROASTING AND SLOWING TURNING LIGHT YELLOW TO TAN THE MOISTURE OR WATER INSIDE BEANS ARE EVAPORATING. YOU DO NOT WANT THIS TO HAPPEN TOO FAST BUT AT A STEADY PACE. YOU CAN CONTROL THIS PACE BY TURNING DOWN THE GAS ON A GAS UNIT OR THE TEMPERATURE BY ADJUSTING THE FIRE REGULATION CONTROL ON CONTROL PANEL. YOU WILL ALSO BE ABLE TO CONTROL THE PACE OF ROAST BY ADJUSTING THE AIR FLOW (AIR VOLUME ADJUSTING KNOB) THIS ALLOWS AIR TO BLOW THROUGH DRUM PROVIDING ANOTHER SOURCE OF HEAT BUT ALSO ALLOWING HEAT TO BE CONTROLLED. THERE IS NO EXACT SCIENCE ON WHEN AND HOW MUCH AIR FLOW TO ALLOW AT ANY GIVEN TIME BUT KEEP IN MIND: TOO MUCH AIR FLOW WILL DRY OUT BEANS TOO SOON AND EFFECT TASTE FOR THE WORSE. ALSO KEEP IN MIND AFTER FIRST CRACK INCREASED AIR FLOW WILL HELP REMOVE SMOKE AND CHAFF FROM BEANS AND DRUM.

NOTES ON AIR FLOW WHILE ROASTING:

LISTED BELOW ARE SOME NOTES AND OPINIONS ON AIR FLOW DURING ROASTING OF COFFEE BEING PROVIDED AS A GENERAL GUIDE. AS MENTIONED ABOVE THERE IS NO EXACT SCIENCE WITH REGARD TO AIR FLOW AND IT IS PART OF THE ART AND CRAFT DEVELOPED OVER TIME BY EACH ROAST-MASTER. BUT HERE ARE SOME GUIDELINES TO GET YOU STARTED:

TYPICAL AIRFLOW FOR ELECTRIC IR ROASTER:

25% DRYING

50% FOR RAMP 75% DEVELOPMENT

GAS: OPEN FLAME:

25% THROUGH MOST OF DRYING AND RAMP THEN 80% AS APPROACHES FIRST CRACK

IN OPEN FLAME GAS ROASTER AIR FLOW IS HELPFUL TRANSFERRING HEAT TO BEAN AND CONTROLLING TEMPERATURE. HIGHER AIRFLOW MEANS FINER CONTROL WITH THE GAS DIAL.

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DURING DEVELOPMENT HIGH AIRFLOW CONTROLS AND CLEARS SMOKE AND CHAFF. THERE APPEARS TO DISAGREEMENT ABOUT THE DETRIMENT TO ROAST FROM SMOKE KEPT IN THE DRUM.

WHICH SEEMS TO CONFIRM:

THERE IS NO RIGHT AIRFLOW FOR THE CLASSIC DRUM ROASTER.



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ROASTERS**

WHAT IS CLEAR: THE MORE YOU INCREASE AIR FLOW THE MORE YOU WILL NEED TO INCREASE HEAT TO MAINTAIN OR INCREASE TEMPERATURE. YOU DO NOT EVER WANT TEMPERATURE TO DROP DURING DEVELOPMENT BUT ALSO YOU DON'T WANT TO ROAST TOO FAST EITHER.

ONE THING IS CERTAINLY CLEAR: COFFEE ROASTING MACHINES THAT OFFER AUTOMATED AIRFLOW DEFEAT THE PURPOSE AND DEFEAT THE ARTISTIC PURPOSE TO ROASTING COFFEE.

EACH ARTISAN SHOULD NOT LIMIT THEMSELVES TO A SET RECIPE TO AIR FLOW. DEVELOP YOUR OWN STYLES AND BASIC PROFILES BUT NEVER STOP BEING CREATIVE.

ANOTHER THING IS CLEAR: TOO LITTLE OR TOO MUCH AIR FLOW IS NOT A GOOD

THING. THIS IS THE BIG ADVANTAGE OF DRUM ROASTERS VS. FLUID. FLUID ROASTERS BLAST BEANS WITH TOO MUCH HOT AIR AND TOO HIGH TEMPERATURES THROUGH ENTIRE ROAST...

FIRST CRACK: EACH CROP OF COFFEE HAS IT'S OWN CHARACTERISTICS AND 'PERSONALITY'. SOME COFFEES BEGIN FIRST CRACK AT 350F (AROUND 175C) OTHERS DON'T START UNTIL AROUND 400F (205C) BUT GENERALLY YOU WILL HEAR THE FIRST CRACK IF FANS ARE NOT BLOWING TOO MUCH. DIFFERENT COFFEES PRODUCE DIFFERENT AMOUNTS OF CRACK. SOME ARE VERY LOUD AND SOUND LIKE POPCORN POPPING AWAY. OTHERS ARE MORE LIKE RICE CRISPY'S WITH A LIGHT 'SNAP, CRACKLE & POP'. DECAFFEINATED COFFEES OFTEN PRODUCE VERY LITTLE CRACK AS THE PROCESS OF EXTRACTING CAFFEINE FROM BEAN CHANGES IT QUITE A BIT.

(ALSO DECAFFEINATED GENERALLY ROASTS SEVERAL MINUTES SHORTER THAN REGULAR BEANS)

ANY TIME AFTER FIRST CRACK BEGINS THE COFFEE MAY BE DROPPED INTO COOLING TRAY. WE RECOMMEND AS SOON AS FIRST CRACK BEGINS TO TAKE SAMPLES EVERY 15-30 SECONDS WITH SAMPLE SPOON AND MARK FOR TASTE TESTING LATER. KEEPING GOOD NOTES WILL RESULT IN FINDING TO BEST TASTE FOR EACH VARIETY YOU ROAST AND IN CREATING THE BEST PROFILES FOR THAT CROP. **(22)**

FRENCH ROAST

WE KNOW WITH THE ADVENT OF COMPANIES LIKE STARBUCKS (OFTEN CALLED 'CHARBUCKS' AMONG MASTER-ROASTERS) THAT MANY HAVE DEVELOPED A TASTE FOR DARK ROASTED AND 'BURNT' COFFEES. BUT REALLY ONCE COFFEE PASSES FULL CITY PLUS AND 2ND CRACK YOU ARE NO LONGER TASTING THE FLAVOR OF THE ROASTED



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ROASTERS**

BEANS BUT RATHER THE TASTE OF THE ROAST ITSELF. WE LIKE THE ILLUSTRATION OF TOAST. YOU CAN TOAST ALL TYPES OF BREAD AND GET WONDERFUL FLAVORS IN EACH VARIETY. BUT THERE COMES A POINT WHERE YOU BURN BREAD SO MUCH BY OVER-TOASTING THAT ALL BREAD BEGINS TO TASTE THE SAME= BURNT...

OUR POINT IS THAT SO MANY TYPES OF COFFEES PRODUCE SO MANY WONDERFUL TASTES AT VARIOUS LEVELS OF ROASTING WHY WOULD YOU WANT IT ALL TO END UP TASTING THE SAME NO MATTER WHAT VARIETY? BUT THE CHOICE IS ALWAYS YOURS...

(AND YOUR CUSTOMERS) SO JUST BE CAREFUL WHEN LETTING ROAST GET SO DARK AS YOU ARE ONLY MOMENTS AWAY FROM CALLING THE FIRE DEPARTMENT AND DESTROYING YOUR ROASTER (VOIDING WARRANTY) AND SETTING YOUR PLACE ON FIRE.

6.DEVELOPING THE CRAFT

BOOKS UPON BOOKS ARE WRITTEN ON THIS SUBJECT AND EVEN MORE BOOKS ARE YET TO BE WRITTEN. THE POINT IS: MANY PEOPLE HAVE SPENT AN ENTIRE LIFETIME ROASTING AND PERFECTING SKILLS IN COFFEE ROASTING. THIS IS TRULY AN ARTISANS CRAFT. SO WHETHER YOU ARE ROASTING COFFE AS A HOBBY, STARTING A NEW BUSINESS OR EXPANDING AN ALREADY SUCCESSFUL BUSINESS PEOPLE THAT ARE TRULY PASSIONATE ABOUT COFFEE ARE GIVERS AND SHARERS. THIS IS NOT A CRAFT MEANT TO BE A LOST ART. IT IS A SKILL DEVELOPED TO BE SHARED. THERE IS PLENTY OF ROOM IN THIS WORLD FOR MORE COFFEE ROASTERS AND COFFEE ROASTING COMPANIES. SO SHARE YOU IDEAS AND LISTEN TO NEW IDEAS AND CONCEPTS. THERE IS MUCH TO BE SAID ABOUT THE WISE PROVERB:

“THERE IS MORE HAPPINESS IN GIVING THAN IN RECEIVING”

THAT IS CERTAINLY TRUE WHEN IT COMES TO SHARING A GREAT CUP OF FRESH ROASTED COFFEE AMONG PEOPLE THAT LOVE THE CRAFT. SO LISTEN AND SHARE.

LISTED BELOW ARE SOME SOURCES THAT WE ENJOY LEARNING FROM:

THE BLUE BOTTLE CRAFT OF COFFEE: GROWING, ROASTING, AND DRINKING, WITH RECIPES BOOK BY JAMES FREEMAN

THE COFFEE ROASTER’S COMPANION BY SCOTT RAO THE PROFESSIONAL BARISTA’S
(23)

HANDBOOK BY SCOTT RAO

WEBSITES:

[HTTP://WWW.COFFEEFORUMS.COM](http://www.coffeeforums.com)

[HTTP://WWW.SWEETMARIAS.COM/](http://www.sweetmarias.com/)



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WWW.BUCKEYECOFFEE.COM

[HTTP://WWW.HOME-BARISTA.COM](http://WWW.HOME-BARISTA.COM)

[HTTP://WWW.COFFEEGEEK.COM/FORUMS/](http://WWW.COFFEEGEEK.COM/FORUMS/)

**PLUS MANY MORE. TYPE COFFEE ROASTING FORUMS IN SEARCH ENGINE
PLUS LOOK UP VIDEOS ON THE SUBJECT AT WWW.YOUTUBE.COM**

**EMAIL US WITH ANY QUESTIONS, CONCERNS AND IDEAS. WE BELIEVE ALL
NEW IDEAS ARE WORTH A TRY! DON'T LET ANYONE DISCOURAGE YOU FROM
NEW IDEAS. SOME WILL WORK OTHERS WILL NOT. BUT IF WE DON'T TRY
NOTHING NEW WILL HAPPEN. WE ARE EXCITED TO HAVE YOU AMONG THE
COFFEE ROASTERS OF THE WORLD AND EAGERLY LOOK FORWARD TO YOUR
IDEAS AND SUGGESTIONS!**

LET'S TALK COFFEE!

7. MAINTAIN YOUR MACHINE



**AN OPTIONAL
MAINTENANCE CAN BE
SETUP OR PURCHASED
FOR MAINTAINING YOUR
MACHINE**

24

**THE BC MACHINES ARE MADE TO WORK FOR EXTENDED PERIODS OF TIME
WITH MINIMAL MAINTENANCE. **THIS DOES NOT MEAN NO
MAINTENANCE IS REQUIRED. DAILY MAINTENANCE IS ESSENTIAL!****

The life of your machine depends on you!

**95-99% percent of all problems we get are due to customers not maintaining machine.
coffee roasters use extreme heat with gas and electric or all electric. Coffee roasting
produces massive amounts of smoke and chaff. If the air flow with smoke & moisture from**



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coffee is not properly channeled out of building or chaff into chaff units damage will occur. Because chaff is like dust its debris can go all over parts of roaster internally and externally.

Therefore it must be monitored closely during each roast and every day!

CLEANING DURING AND AFTER EACH ROAST AS WELL AS DAILY MAINTENANCE:

- 1. PROPER AIR FLOW: CHAFF AND SMOKE AND COFFEE MOISTURE MUST BE PULLED FROM DRUM. TO DO THIS FAN MOTORS ARE USED. THE FAN MUST BE KEPT CLEAR AS WELL AS ALL PIPES. CHECK FAN VENTING AND MESH AFTER EACH COUPLE ROASTS.**

1. CLEAN CHAFF EACH DAY OR AFTER EVERY ROAST: EVERY 2-3 ROASTS OR MORE OFTEN IF COFFEE PRODUCES EXCESSIVE CHAFF. CLEAN CHAFF FROM:
A: CHAFF UNIT B: DEBRIS TRAY IN OR UNDER BURNER ROOM (THIS IS VITAL AFTER EACH ROAST. ESPECIALLY ELECTRIC MODELS THAT HAVE PERFORATED DRUMS AND DROP MORE DEBRIS AND CHAFF INTO BURNER ROOM DURING ROAST) C. CHAFF AREA UNDER COOLING TRAY: YOU MAY HAVE A DOOR THAT POPS OPEN TO CLEAN CHAFF OR ON SMALL MACHINES YOU MAY SIMPLY LIFT COOLING TRAY AND CLEAN- ALSO CLEAN VENTING GOING TO FAN SO IT DOES NOT CLOG.

2. CLEAN FAN VENTING DAILY WITH A VACUUM OR SOFT BRUSH: SOME CUSTOMERS ARE FORGETTING THIS MOST IMPORTANT AREA. YOU MUST LIFT FAN OFF CHAFF UNIT IF ATTACKED AND CLEAN VENT UNDER FAN. FAILURE TO DO SO WILL RESULT IN REDUCED AIR FLOW WHICH CAN CREATE MANY OTHER PROBLEMS. SEE EXTREME PICTURES BELOW WHERE VENT WAS NOT CLEANED FOR WEEKS. IF YOU ROAST 8 HOURS A DAY THEN CLEAN THIS DAILY WITH A FAN OR SOFT BRUSH: WHILE OPEN CHECK AND CLEAN WALLS OF CHAFF UNIT. IF VENT HOLES IN CHAFF UNIT GET CLOGGED CHAFF UNIT WILL NOT WORK PROPERLY. (SEE EXTREME PICTURES BELOW)

3. USE PERMANENT PIPES: SOME UNITS COME EQUIPPED WITH TEMPORARY FLEXIBLE PIPING. THESE PIPES ARE JUST FOR INITIAL SETUP AND TEST OF YOUR ROASTER. YOU NEED TO USE PERMANENT PIPING AND SET IT UP SO A PIPE BRUSH CAN BE RAN THROUGH IT SEMI- MONTHLY OR MORE OFTEN TO CLEAN AVOID BUILDUP OF FIRE **(25)**

BC

BUCKEYE COFFEE ROASTERS



EXAMPLES OF EQUIPMENT RUINED BY NOT CLEANING FAN, VENTING & CHAFF UNIT

2. Debris will fall onto burners so you should check and clean often: this may need performed monthly or more often. Always check burners visually during each roast.



3. PERMANANT PIPES NEED CLEANED WITH A PIPE BRUSH:



Roasting coffee produces much chaff that will be sent mostly to chaff unit. but some will fall into Residue Collection & Heater room compartment. use brushes or a wet/dry vacuum to remove chaff after every few roasts. if your coffee beans produce excessive chaff you may need to clean more frequently.

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BUCKEYE COFFEE ROASTERS

DAILY MAINTENANCE

1. WIPE DOWN ENTIRE MACHINE WITH A DRY MICRO FIBER CLOTH



VI. Cleaning and maintenance of roaster



 Coffee bean roasting process will fall a few silver skin in drawer, just out of the drawer, pour out the silver skin.

There will be much silver skin in silver skin collecting barrel, just open the hinge to clean it.

Below the cooling coil will residues a little silver skin or broken beans, you can simply open the hinge for interior cleaning.

2. CHECK AND EMPTY CHAFF UNIT AFTER 1-3 ROASTS AND CHECK DEBRIS DRAWER AFTER EACH ROAST: CLEAN FAN TOO!

3. AT THE END OF EVERY DAY LET MACHINE COOL DOWN THE CLEAN ENTIRE ROASTER. UNPLUG POWER MAKE SURE GAS LINE IS CLOSED. THEN WIPE DOWN ENTIRE MACHINE WITH MICRO FIBER TOWEL. IF NEEDED MOISTEN TOWEL WITH NEUTRAL CLEANER THEN WIPE CLEAN. **NEVER PLUG IN OR TURN ON MACHINE WITH WET OR DAMP PARTS OR EXTERIOR.** (27)

AS SEEN ABOVE:



BUCKEYE COFFEE ROASTERS

(1) IN BOTH GAS AND ELECTRIC MODELS SOME DEBRIS WILL FALL FROM OPENINGS IN SIDES OF DRUM TO THE DEBRIS DRAWER. THE ELECTRIC MODEL WILL HAVE MOVE DEBRIS DUE TO HAVING A PERFORATED DRAWER. THIS SHOULD BE EMPTIED BETWEEN ROASTS.

(2) IN THE BOTTOM OF CYCLONE OR CHAFF UNIT IS A DOOR TO COLLECT AND MOVE CHAFF BETWEEN ROASTS. AFTER EVERY 2-4 ROASTS WHEN BLOWER IS NOT ON YOU CAN REMOVE CHAFF WITH A VACUUM OR BRUSH

(3) DOOR BELOW COOLING BIN SHOULD BE CHECKED AND EMPTIED AT THE END OF EACH DAY. SOME CHAFF AND DEBRIS WILL BE SUCKED INTO THIS ROOM DURING COOLING PROCESS.



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MONTHLY MAINTENANCE

**LUBRICATE DRUM BEARING:
LIFT OPEN DRUM PROTECTION
COVER. OPEN BEARING LUBE
CAP AND LUBRICATE WITH
GREASE GUN. *TOOL KITS SOLD
BY BUCKEYE COFFEE HAVE
TOOLS AND MICRO FIBER AND GREASE GUN.**





BUCKEYE COFFEE ROASTERS



ON EACH SIDE OF ROASTER ARE SEVERAL BOLTS HOLDING STAINLESS STEEL HOUSING ONTO UNIT.

REMOVE ALL BOLTS AND TAKE HOUSING OFF UNIT. BETWEEN DRUM AND ELECTRIC ROOM YOU WILL SEE A BEARING THAT NEEDS GREASED MONTHLY.

Also Lube front bearing with a few drops grease monthly!

(There is no bearing cap on front bearing)

Remove bearing great cap. Using approved grease gun refill monthly.

BE SURE TO KEEP MACHINE CLEAN DAILY AND COMPLETELY CLEAN ALL EXTERIOR WEEKLY AND INSIDES OF CHAFF & DEBRIS CONTAINERS ON A REGULAR BASIS.



**BUCKEYE COFFEE
ROASTERS**

8. WARRANTY INFORMATION

YOUR COMMERCIAL COFFEE ROASTER HAS BEEN BUILT UNDER STRICT QUALITY CONTROL MEASURES AND SHOULD ARRIVE IN THE BEST OF CONDITION FOR YEARS OF QUALITY ROASTING. IT HAS BEEN THOROUGHLY TESTED BOTH AT THE FACTORY AS WELL AS BY BUCKEYE COFFEE WHEN ARRIVING AT OUR ARIZONA FACILITY. BUT AS WITH ALL ELECTRONIC EQUIPMENT THERE IS THE CHANCE THAT AFTER RECEIVED AN ELECTRONIC COMPONENT COULD FAIL IN TIME. SO ALL NEW COFFEE ROASTERS PURCHASED BY BUCKEYE COFFEE ARE PROTECTED WITH THE MANUFACTURE PARTS WARRANTY OF ONE YEAR. THIS WARRANTY REMAINS IN EFFECT FROM THE DAY OF DELIVERY BY OUR TRANSIT COMPANIES OR THE DAY PICKED UP BY CUSTOMER OR THEIR CONTRACTED SHIPPING PROVIDER. THIS PARTS WARRANTY WILL REMAIN VALID FOR ORIGINAL PURCHASING COMPANY AND WARRANTY IS NONTRANSFERABLE. FURTHER IF NEGLECT IN MAINTENANCE OR DAMAGE CAUSED BY IMPROPER USE IS DETECTED OR DAMAGE DUE TO OVER-ROASTING AND OR FIRE SHOULD OCCUR THIS WARRANTY BECOMES VOID. ADDITIONAL WARRANTY AND SERVICE IS PROVIDED THROUGH BUCKEYE COFFEE AND ALL SERVICE CLAIMS MUST BE SUBMITTED DIRECTLY TO THEM TO HANDLE CLAIM. ADDITIONAL WARRANTY BEYOND THE ONE YEAR PARTS REPLACEMENT WARRANTY ARE LISTED BELOW:

NOTE: IF MACHINE IS MODIFIED IN ANY WAY THIS VOIDS WARRANTY

ONE FULL YEAR PARTS REPLACEMENT WARRANTY ON ALL PARTS NOT DAMAGED DUE TO NEGLECT OR MISUSE OF PRODUCT. ONE YEAR IN-HOUSE SERVICE ON UNIT. BUYER IS RESPONSIBLE FOR RETURN SHIPPING COSTS FOR IN-HOUSE SERVICE AND WARRANTY REPAIRS. ONE YEAR PHONE AND INTERNET CONSULTATION OF REPAIRS. MOST MINOR ISSUES CAN BE FIXED WITH A PHONE CALL. OTHER FEATURES MAY APPLY BASED ON YOUR STATE OR LOCATION. SEE CONTRACT FOR FURTHER DETAILS. IF SERVICE IS REQUIRED FIRST EMAIL US AT: info@buckeyecoffee.com AND CALL NUMBER BELOW. 623.332.13609.

PARTS EXCEPTION: UNLESS YOU PURCHASE AND USE A MARSHALL 1912/197 5.9 KPA LOW PRESSURE REGULATOR THERE IS NO REPLACEMENT WARRANTY ON KPA GAS VALVES. US ONLY LOW PRESSURE REGULATORS WITH A MAXIMUM KPA OF 5.9

AFTER THE WARRANTY- SERVICE AND PARTS

BUCKEYE COFFEE ROASTERS ARE BUILT WITH PARTS AVAILABLE BY ELECTRIC SHOPS ALL OVER THE WORLD AND IN THE EVENT OF A PART FAILURE AFTER WARRANTY PARTS CAN GENERALLY BE FOUND LOCALLY OR OVER THE INTERNET AND CAN BE SERVICED BY MOST ELECTRICAL APPLIANCE SERVICE COMPANIES AT A RELATIVELY LOW COST. ALSO MOST PARTS CAN BE REPLACED EASILY BY A DIY HANDY PERSON. YOU CAN ALSO EMAIL US OR CHECK OUT OUR WEBSITE FOR SIMPLE PARTS REPAIR TIPS AS WELL AS VIDEOS POSTED ON YOUTUBE FROM TIME TO TIME. WE ALSO OFFER AN IN-HOUSE SERVICE (30)



BUCKEYE COFFEE ROASTERS

REPAIR PROGRAM AFTER WARRANTY FOR THOSE THAT WISH TO SEND ROASTER IN FOR AFTER WARRANTY REPAIRS. CALL US FOR DETAILS.

10 YEAR PARTS STOCK GUARANTEE

WE TRY TO KEEP ALL PARTS IN STOCK FOR WARRANTY WORK AS WELL STOCK ON HAND SO THERE WILL BE NO DELAY AS WE WAIT FOR PAGE 23 REPLACEMENT PARTS FROM CHINA. ALL IN WARRANTY CUSTOMERS RECEIVE PRIORITY ON ALL IN STOCK PARTS BUT WE DO GUARANTEE WE WILL STOCK REPLACEMENT PARTS ON HAND FOR ANY REPAIRS FOR 10 YEARS ON THE MODEL YOU PURCHASE. IN SOME CASES WE OFFER TO BUY BACK OR TRADE IN OLDER ROASTERS ON A NEW MODEL IF YOU FEEL COST TO SERVICE MAY BE TOO HIGH COMPARED TO REPLACEMENT OF MACHINE. CALL OR EMAIL FOR DETAILS IF CONSIDERING TRADING IN YOUR UNIT FOR A PRICE QUOTE.

EMAIL US FOR THE LATEST PARTS PRICE LIST AFTER WARRANTY EXPIRES IF YOU NEED NEW PARTS. PRICES ARE SUBJECT TO CHANGE WITHOUT NOTICE BUT WE DO GUARANTEE LOWEST PRICES TO PREVIOUS CUSTOMERS.

10. TROUBLE SHOOTING & ADJUSTMENTS



ELECTRONIC BOARD SAMPLE

(31)



**BUCKEYE COFFEE
ROASTERS**

POWER CORD: ON ALL GAS MODELS WE SHALL LEAVE THE INTERNATIONAL PLUG ON UNIT AS YOU WILL GET A VOLTAGE CONVERTER THAT YOU CAN PLUG INTO TO RUN UNIT OFF 110V IN USA AND CANADA.



ELECTRIC MODELS: ELECTRIC MODELS USE SUCH HIGH WATTAGE THAT YOU CANNOT RUN UNITS ON 110 WITH A CONVERTER SO WE SHALL EITHER INSTALL A 3 PRONG NORTH AMERICAN APPROVE 220V 20A PLUG OR LEAVE WIRE BARE FOR YOU TO HAVE A CERTIFIED TECHNICIAN HARDWIRE TO YOUR FACILITY.

GREEN WIRE OR PARTIAL GREEN WIRE IS GENERALLY GROUND. BUT ALWAYS CHECK INTERIOR ELECTRIC ROOM TO CONFIRM GROUND WIRE. HAVE ELECTRICIAN WIRE ACCORDINGLY.

PROPERLY HOOK UP YOUR NG GAS & LPG LINE:

IF YOU HAVE ORDERED A NATURAL GAS UNIT YOU WILL NEED A CERTIFIED APPROVED TECHNICIAN TO INSTALL A GOVERNMENT APPROVED NG REGULATOR YOU MUST PURCHASE AT YOUR OWN EXPENCE. YOU WILL NEED GAS REGULATED UP TO 2.8 KPA.

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BUCKEYE COFFEE ROASTERS

IF YOU PURCHASED AN LPG GAS MODEL YOU WILL NEED A LOW PRESSURE ADJUSTABLE LPG REGULATOR. YOU CAN PURCHASE A MODEL USED IN GAS GRILLS BUT KPA PRESSURE WILL ONLY REACH 2.5 TO 3. TO GET FULL USE OF YOUR ROASTER YOU MUST BUY A PROFESSIONAL 5.9 MAX KPA REGULATOR SUCH AS THE MARSHALL 1912/197 SET TO KPA 5.9. WE RECOMMEND IF YOU ARE DOING A PERMANENT INSTALL THAT YOU RUN A PERMANENT GAS LINE WITH A PROPER REGULATOR.

THERE IS NO WARRANTY ON KPA GAS VALVE UNLESS YOU PURCHASE A MARSHALL 1912/197 REGULATOR FROM US. ALWAYS USE LPG TAPE AND JOINT COMPOUND WHERE NEEDED AT CONNECTORS.



INEXPENSIVE TEMPORARY REGULATOR



USE YELLOW LPG TAPE AT CONNECTOERS

Gas Type

BUCKEYE ARIZONA ROASTING COMPANY

V. Operating panel and features introductions



1.Hot air temperature: Display the temperature of hot air.
2.Bean temperature: Display the temperature of beans inside the drum.
3.Timer: Display the heating time.
4.Hot air adjust: Change the hot air fan speed to adjust the hot air.
5.Power: Press the button to turn the power.
6.Heating: Press the button to turn on the gas and auto-ignition combustion, before pressing the button must confirm the gas valve open in a smaller location. Otherwise extensive flow will damage the gas pressure gauge. The maximum pressure is limited within 5KPa.
7.Timing: Press the button.start time:press again.pause time.
8.Cooling: Press the button, the cooling fan start exhaust.
9.Mixing: Press the button,mixing motor will drive the mixing blade begin to rotate.

Buckeye Roasting Company

CONTROL PANELS:

BY KNOWING HOW TO OPERATE YOUR UNIT PROPERLY YOU WILL AVOID MANY POTENTIAL PROBLEMS. ALWAYS READ ALL INSTRUCTIONS ON MACHINE OPERATION AND SAFETY FIRST

info@buckeyecoffee.com



BUCKEYE COFFEE ROASTERS

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KNOW YOUR UNITS OPERATION:

ELECTRIC CONTROL PANEL:



V. Operating panel and features introduction



- 1.Hot air temperature: Display the temperature of hot air.
- 2.Bean temperature: Display the temperature of beans inside the drum.
- 3.Timer: Display the heating time.
- 4.Hot air adjust: Change the hot air fan speed to adjust the hot air.
- 5.Heating adjust: Change heating power of the heating rods to adjust heating temperature.
- 6.Power: Press the button to turn the power.
- 7.Heating: Press the button, the heating rods can be heated by electricity.
- 8.Timing: Press the button,start time;press again,pause time.
- 9.Cooling: Press the button, the cooling fan start exhaust.
- 10.Mixing: Press the button,mixing motor will drive the mixing blade begin to rotate.



ALWAYS BE SURE ALL CONTROLS ARE IN OFF POSISTION AND KNOBS TURNED DOWN BEFORE TURNING MACHINE ON. TURN ALL CONTROLS OFF WHEN POWERING DOWN MACHINE. UNPLUG UNIT WHEN NOT IN USE.



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PROPER INSTALATION WILL RESULT IN SMOOTH OPERATION



- AN EXHAUST PIPE SHOULD BE RUN OFF TWO LOCATIONS ON ROASTER.**
- (1) AS SEEN IN ILLUSTRATION EXHAUST PIPE RUNS FROM UNIT TO SIDE PIPE ON CHAFF UNIT THEN IS PIPED OUTDOORS**
 - (2) NOT SEEN HERE THERE MUST BE A PIPE RUN OFF OF COOLING TRAY BLOWER TO OUTSIDE. YOU CAN CHOOSE TO RUN 2 PIPES SEPERATE OUTSIDE OR JOIN PIPES TOGETHER TO RUN OUTSIDE.**
- CRITICAL: IF JOINING 2 PIPES TO ONE EXHAUST YOU MUST**



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**USE A ONE WAY DAMPER (BACKDRAFT DAMPER) OR ELSE
SMOKE WILL BE PUSHED FROM CHAFF UNIT BACK INTO (36)
(3) COOLING TRAY AND BUILDING. SEE PICTURES BELOW TO AVOID THIS
PROBLEM:**



**WHEN JOINING 2 PIPES INTO ONE EXHAUST PIPE YOU MUST USE
A BACKDRAFT DAMPER**

TROUBLE SHOOTING FIXES:

FAILURE	CAUSES: REASON	REMEDIES OR SOLUTIONS
UNIT WILL NOT POWER ON.	<ol style="list-style-type: none">1. not plugged in2. internal circuit breaker off3. Check internal fuse	<ol style="list-style-type: none">1. plug in. check all connections2. unplug unit. Open electric room and turn circuit breaker on.3. replace fuse
COOLING FAN OR HOT AIR ADJUSTMENT FAN WILL NOT TURN ON	Not properly connected	be sure each blower is connected to proper plug in back of unit and tightened
SMOKE IS COMING INTO BUILDING	<ol style="list-style-type: none">1. Improper setup2. Improper or unsecure piping	<ol style="list-style-type: none">1. Connect pipes to correct components or points2. use a backdraft damper if connecting 2 pipes to one exhaust



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BEANS ARE FALLING INTO DEBRIS DRAWER	<ol style="list-style-type: none">1. drum needs aligned2. some debris will fall through perforated electric drums	<ol style="list-style-type: none">1. UNPLUG unit after cooled down and re-align drum so 3 mm of space exists between front wall & drum.
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TROUBLE SHOOTING CONTINUED:

GAS UNIT WILL NOT IGNITE	<ol style="list-style-type: none">1. Gas is not on at all controls2. ignitor is not buzzing allowing machine to ignite3. wrong gas being used4. KPA pressure is too low	<ol style="list-style-type: none">1. Check all connections. carefully turn up tank and regulator while machine lines are off then when igniting turn gas control up slowly2. ignitor may be damaged. contact supplier3. make sure NG gas roaster is used with NG gas and LPG with LGP gas.4. MAKE SURE KPA pressure stays between 1-4
KPA PRESSURE VALVE CONTROL STOPPED WORKING AND IS STUCK ON HIGH NUMBER	You have damaged KPA gas pressure valve by not following proper usage instructions	You must purchase and install a new KPA pressure velve. It is dangerous to use unit without proper knowledge of gas pressure
DRUM MAKES A LOUD NOISE WHEN HEATED UP	Drum is out of alignment.	Turn off machine. Allow to cool. UNPLUG UNIT. realign drum as outlined in manual
BEANS ARE BEING SUCKED INTO CHAFF UNIT	<ol style="list-style-type: none">1. roasting a batch too small2. Roasting a batch too large3. Too much Hot air flow4. Machine exhaust pipe is connected to or near an exhaust fan	<ol style="list-style-type: none">1.& 2. Roast within the range reccomended by the manufacture3. Turn down hot air flow4. turn off all fans not connected to roaster during roast
ELECTRIC UNIT TURNS ON BUT BARELY HEATS UP AFTER 15 MINUTES	Improper connection of plug	Make sure the GROUND WIRE IS PROPERLY CONNECTED TO THE GOUND ON PLUG



BUCKEYE COFFEE ROASTERS

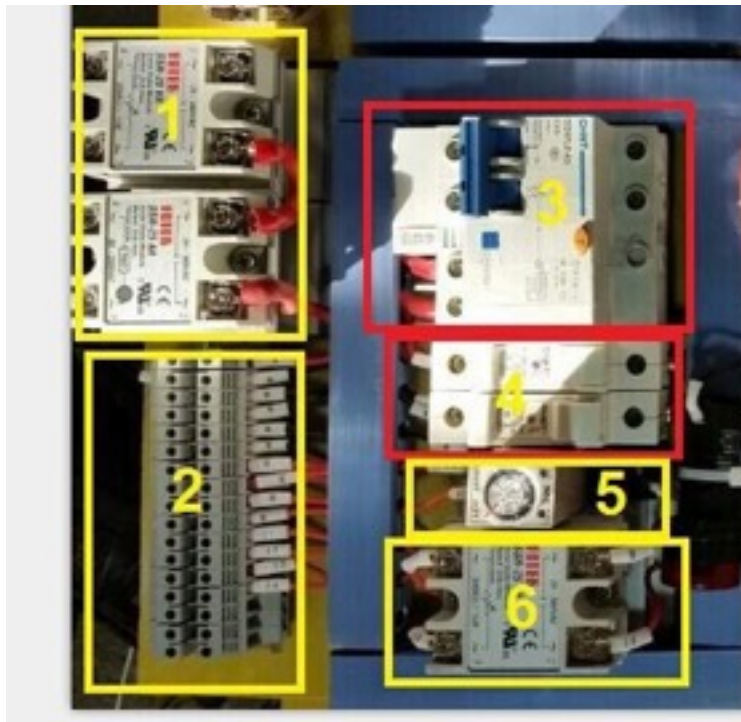
**NO MATTER WHAT I DO UNIT
WILL NOT POWER ON**

Possible short or damage to unit

UNPLUG UNIT. CONTACT
MANUFACTURE OR COMPANY
THAT SOLD UNIT OR A
CERTIFIED ELECTRICIAN IF
NO LONGER UNDER
WARRANTY

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SAMPLE ELECTRIC PANEL



1.SOLID-STATE RELAY 2.UK TERMINALS

3.BUILT-IN CIRCUIT BREAKER* (IF MACHINE WILL NOT
POWER ON PLEASE UNPLUG UNIT & OPEN ELECTRIC
ROOM AND FLIP ON BREAKER. A SMALL TRIP
BUTTON MAY NEED PUSHED TO TRIP ON BEAKER)**

4.FUSE HOLDER 5.TIME RELAY



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6.SOLID-STATE RELAY

EQUIPMENT READJUSTMENTS:

WHEN YOU FIRST RECEIVE YOUR ROASTER AND UNPACK IT SOME ITEMS MAY HAVE BEEN JARRED DURING TRANSIT. ALSO FROM TIME TO TIME AFTER REPEATED USE MINOR ADJUSTMENTS MAY BE NEEDED TO EQUIPMENT TO KEEP ALL PARTS IN LINE AND WORKING AT OPTIMUM CONDITION. THIS SECTION WILL DISCUSS SOME COMMON ADJUSTMENTS THAT MAY BE NEEDED WHEN FIRST RECEIVING UNIT AND AFTER USE:**COOLING TRAY ARM READJUSTMENTS: (39)**

WHEN ROASTER FIRST ARRIVES YOU MAY NEED TO MAKE ADJUSTMENTS TO COOLING TRAY ARMS (COOLING BIN AGITATOR)

WHEN TURNING ON COOLING MIXING BUTTON YOUR COOLING ARMS WILL BEGIN TURNING INSIDE TRAY. IF ARMS RUB OR SQUEAK THEN A MINOR ADJUSTMENT MAY BE NEEDED TO ADJUST ARMS. GENERALLY JUST A SLIGHT ADJUSTMENT MADE BY LOOSING ARMS WITH THE ALLEN WRENCH HEX KEY AND PULLING ARMS AWAY JUST SLIGHTLY FROM TRAY SO EXCESSIVE PRESSURE IS NOT ON ARM PUSHING AGAINST TRAY BOTTOM WILL FIX PROBLEM.

ALIGNMENT OF ROASTING DRUM:

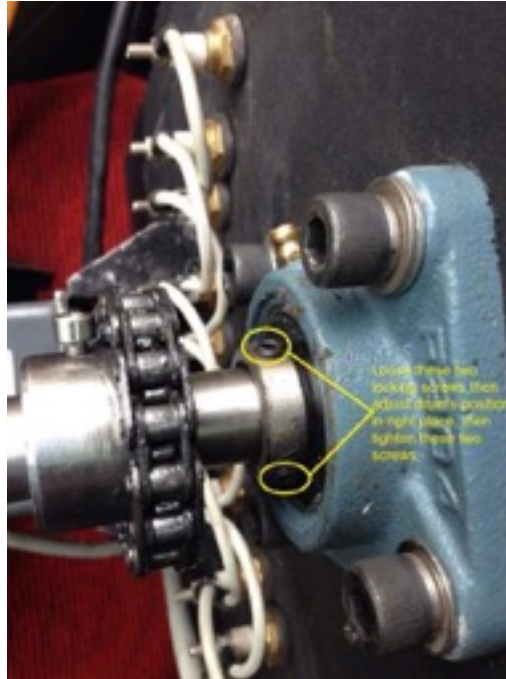
IF DURING TRANSIT DRUM BECOMES SLIGHTLY DISPLACED OR OUT OF LINE THIS COULD LEAVE A SLIGHT OPENING BETWEEN OPENING IN DRUM AND BEARING CAUSING SOME BEANS TO FALL FROM DRUM TO INSIDE RESIDUE COLLECTION AREA (HEATING ROOM).

REMOVE DRUM HOUSING, IF THE GAP BETWEEN FRONT DOOR AND DRUM IS OVER 3MM, THEN YOU CAN PUSH THE DRUM AHEAD, BUT REMEMBER THE GAP IS AT 3MM THEN THIS IS FINE. IF IT'S TOO TIGHT, THERE WILL BE LOUD NOISE PRODUCED. CONVERSELY IF THE GAP TOO LARGE, THE BEANS WILL FALL FROM DRUM ONTO HEATING ROOM.

TO CORRECT THIS PROBLEM YOU WILL NEED TO REMOVE DRUM HOUSING THEN LOOSEN THE TWO LOCKING SCREWS, ADJUST POSITION OF DRUM AND TIGHTEN SCREWS BACK INTO PLACE A 3MM GAP IS ACCEPTABLE AND ALLOWS DRUM TO TURN. BEFORE PUTTING HOUSING BACK ONTO UNIT YOU MAY WISH TO GIVE UNIT A HEAT TEST TO MAKE SURE IT IS PROPERLY ALIGNED.

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GAS BURNERS NOT HEATING FAST:



**CLEAN HEADS AND CHECK INJECTORS TO SEE IF CLOGGED
AND CLEAN. KEEP UNIT CLEAN INSIDE AND OUT. (40)**



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GENERALLY IF YOU RUN INTO A PROBLEM A SIMPLE FIX CAN BE HAD. PLEASE FOLLOW THE GUIDELINES LISTED IN THIS MANUAL TO AVOID ANY PROBLEMS AND IF A PROBLEM SHOULD ARISE FIRST CHECK THE TROUBLE SHOOTING CHART BEFORE CONTACTING US. IF YOU ARE UNABLE TO RESOLVE PROBLEM AFTER CONSULTING THE TROUBLE SHOOTING GUIDE BELOW DO NOT ATTEMPT TO WORK ON ROASTER BY YOURSELF AS THIS COULD VOID WARRANTY. UNPLUG UNIT FROM POWER SOURCE AND SHUT OFF GAS LINE IF APPLICABLE THEN CONTACT US VIA EMAIL TEXT OR PHONE CALL. YOU MAY ALSO WISH TO CHECK OUR WEBSITE FOR FURTHER INSTRUCTIONS AND DETAILS.

MORE DETAILS ABOUT YOUR ROASTER:

ARTISAN SOFTWARE:

(IF YOUR ROASTER CAME WITH A DATA LOGGER OR FIDGET OR YOU PLAN TO ADD A FIDGET TO THE BASIC MODEL HERE IS WHERE YOU GET THE FREE ARTISAN SOFTWARE:

ARTISAN SOFTWARE UPDATES AND EMAIL SUPPORT:

Copy and paste this link for the latest software updates:

ARTISAN SOFTWARE:

Latest releases: <https://github.com/MAKOMOMO/artisan/releases/latest> ARTISAN

EMAIL SUPPORT:

Email support:

<https://lists.mokelbu.de/listinfo/artisan-user>

<mailto:artisan-user@lists.einfachkaffee.de>

If you need a setup guide for artisan with your plus model email us for a pdf copy



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ELECTRICAL CERTIFICATIONS:
CE, RoHS, ISOP001

SETTING ALARM:

Generally alarm is not setup on the BC but if you wish to set it for either your preheat temp or maximum temp you may.

(be very careful because if you change other settings your roaster may not work)

SETTING THE ALARM ON YOUR OMRON CONTROL:
SOME LIKE TO SET ALARM FOR PREHEAT TIME. OUR ARIZONA MODELS ARE GENERALLY SET TO 400F SO YOU KNOW TO DROP BEANS BY THAT TEMP BUT YOU CAN CHANGE IT TO ANY TIME YOU WANT. HERE'S HOW:





The Second: Press this button and release it immediately again.
It Displays as follows:



The third step: Please third time press this button in same way as above.
It displays:

BC

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All Done!

P.S. If you want to turn off the Alaming function, you can set the temperature at 999F according to above method, it will never produce a sound.



The fifth step: Please Press the second button (circled one) and release it immediately to finish the setting.
It displays as beginning



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GENERAL DRAWINGS OF A ROASTER:

**(IN THE FUTURE WE MAY PROVIDE DRAWINGS OR SCHEMATICS TO
CUSTOMERS IF NEEDED TO GET PERMITS FOR USAGE)**

EXAMPLES OF PERMANENT SETUP:

**THE BEST WAY TO SET UP ROASTERS ARE TO USE TWO SEPARATE
EXHAUST PIPE EXITING BUILDING. WE RECOMMEND DOUBLE WALL 4'
PIPING BUT YOU CAN ALSO USE STAINLESS STEEL DUCT PIPING
PROVIDED IT IS PROPERLY SEALED TO PREVENT SMOKE FROM LEAKING
AND A TAKE-OGG PIPE ALLOWS CLEANING. PIPES SHOULD BE ATTACHED
WITH CLAMPS, FOIL HEAT SEAL TAPE (NOT DUCT TAPE) AND SILICON
SEALANT.**

NOTE:

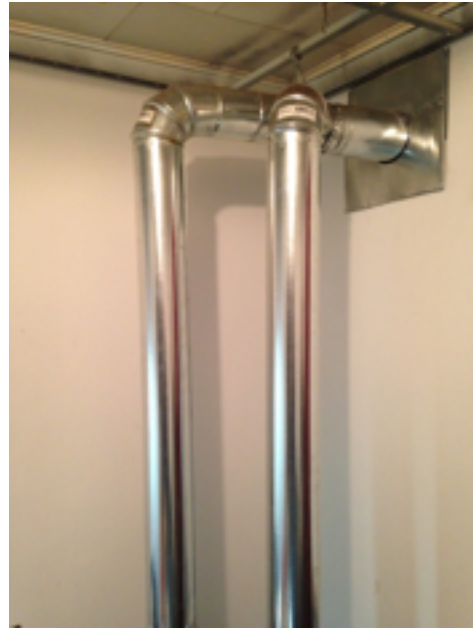
**JUST BECAUSE YOU HIRE AN HVAC OR PLUMBER DO NOT EXPECT HIM
TO DO IT RIGHT. WE HAVE SEEN SO MANY POOR JOBS DONE BY 'SO
CALLED' PROFESSIONALS YOU WOULD NOT BELIEVE IT!**

SEE SOME GOOD AND BAD EXAMPLES BELOW:

**THIS IS A GOOD EXAMPLE OF NOT TAKING ANY RISKS AND
TAKING TWO PIPES OUT BUILDING. NOTICE THE STEEL PLATE
AGAINST WALL. ANYTIME YOU TAKE HOT PIPES THROUGH A WALL OR
CEILING INSULATE THEM (45)**

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**ANOTHER PROFESSIONAL JOB
DONE RIGHT!**

**2 SEPARATE PIPES GOING OUT
BUILDING. REMEMBER TO
ALLOW PIPE OFF CHAFF UNIT
TO BE REMOVED BOTH TO
CLEAN PIPE AND LIFT FAN
OFF CHAFF UNIT TO CLEAN
UNDER CHAFF VENTING**

**(THIS MODEL IS THE SEDONA
BUT ALL MODELS NEED
CLEANING UNDER FAN TO
PREVENT LOSS OF AIRFLOW)
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BAD EXAMPLES:

SAD TO SAY THESE BAD EXAMPLE WERE DONE BY 'PROFESSIONALS'

MANY CUT CORNERS:

SOME DID NOT USE CLAMPS- JUST TAPE.

OTHERS USED CHEAP PIPES AND ELBOWS THAT SMOKE POURED OUT OF

SOME WOULD PUT A 4" PIPE OVER A 3" PIPE AND SIMPLY PUT A FEW

SCREWS INTO IT RATHER THAN BUY A 3" TO 4" ADAPTER

**MANY THAT RAN TWO PIPES INTO ONE DID NOT USE A BACKDRAFT
DAMPER.**

**IF YOU HIRE A PROFESSIONAL BE SURE THEY HAVE EXPERIENCE IN THE INSTALLATION OF
WOOD AND PELLET STOVES.**

**LET THEM KNOW THAT COFFEE ROASTING PUTS OFF MORE SMOKE PER POUND THAN WOOD
AND MUCH MORE CHAFF AND DEBRIS**

AND

WATCH THEM LIKE A HAWK AS THEY INSTALL!

TEST MACHINE 2-3 TIMES BEFORE THEY LEAVE!

DO NOT CALL US TO FIX IT IF THEY DO IT WRONG-CALL THEM!

WHAT DO YOU SEE WRONG HERE?

- 1. NO CLAMPS USED**
- 2. POOR QUALITY ELBOWS THAT LEAK**
- 3. NO BACKDRAFT DAMPER**
- 4. YOU CANT SEE IT BUT BIGGER PIPES ARE ATTACHED OVER SMALLER
PIPES AND JUST SCREWED TO ATTACH.**

**THIS PROFESSIONAL JOB SHUT DOWN THE WHOLE BUSINESS AS IT
FILLED BUILDING WITH SMOKE... SAD**

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WHAT ABOUT THIS JOB? FIRST OF ALL NO BACKDRAFT DAMPER USED BUT EVEN AFTER ONE WAS PUT ON THE SMOKE STILL FOUND IT'S WAY TO THE COOLING TRAY...

WHY? THE MAIN PIPE IS AWAKES THE PIPE COMING OFF CHAFF UNIT WHERE 99% OF THE SMOKE EXITS. IT SHOULD BE A STRAIGHT PIPE OUT OF BUILDING. IN THIS CASE IT IS A SIDE PIPE THAT DEAD ENDS INT TO THE MAIN PIPE (COOLING TRAY PIPE)



IT WOULD BE BETTER TO HAVE ONE PIPE FOR CHAFF AND NONE FOR COOLING TRAY THEN THIS METHOD. REMEMBER: ONLY ABOUT 10-20 SECONDS OF SMOKE COMES OUT OF DRUM INTO COOLING TRAY FOR THE FIRST 30 SECONDS DOOR IS OPENED. THEREFORE SMOKE ONLY GOES OUT OF COOLING TRAY ABOUT 10-30 SECONDS DURING ENTIRE ROAST.

DIY SETUP OF EXHAUST PIPES

MANY CUSTOMERS CHOOSE TO DO THEIR OWN EXHAUST SETUP AND THIS IS FINE PROVIDING YOU USE THE RIGHT PIPES AND SETUP AND SEAL PROPERLY. HERE ARE SOME PIPE SUPPLIERS:

Here is some companies for exhaust pipe:

<http://www.novaflex.com/productcart/pc/viewcategories.asp?idCategory=61>

This company may offer the best options:

<http://www.ducting.com/ambient-air/hvac-air-ducts/SS-Flex-800.html>

Here is another nice source:

<http://www.olympiachimney.com>

<http://www.dalsinmfg.com>

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IF YOU HAVE AN ISSUE FOLLOW THESE STEPS FIRST:

1. CHECK MANUAL
2. CHECK OUR EDUCATION PAGE ON OUR SITE
3. GOOGLE IT
4. IF YOU CANT FIND ANSWER EMAIL US. WE ARE HUMAN AND NOT AWAKE 24 HOURS A DAY. WE ARE HAPPY TO HELP YOU DURING NORMAL BUSINESS HOURS IN BETWEEN MEETINGS. BUT WE CANNOT INSTANTLY ANSWER EVERY QUESTION. 95% OF THE CALLS WE GET WE CAN TAKE YOU TO A PAGE IN THIS MANUAL OR A VIDEO ON OUR TRAINING PAGE TO RESOLVE. WE ARE HERE TO HELP YOU SUCCEED BUT WE HAVE A LIFE TOO AND WILL TAKE YOUR EMAILS VERY SERIOUS AND RESPOND WITHIN 24 HOURS.
5. IF YOU HAVE NOT RECEIVED A REPLY AFTER 24 HOURS FEEL FREE TO TEXT OR CALL. TEXTS CAN USUALLY BE HANDLED FASTER THAN CALLS AS IF WE ARE IN MEETINGS WE WILL NOT BE ABLE TO ANSWER CALLS.

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TIMER: (THIS IS NOT THE EXACT TIMER AS ON THE BC MODELS BUT THE SETUP IS ABOUT THE SAME)

IT APPEARS SOME ARE RESETTING TIMER TO 0.00 AND CAN'T TURN IT ON. THE 4 LOWER BUTTONS ON MOST TIMERS ARE TO SET TIMER. IF YOU HAVE IT SET FOR 0 IT WILL TURN ON AND OFF IN 0 SECONDS. TO AVOID HAVING TIMER GO OFF I SET MINE TO 90.00 OR 99.99 MINUTES. THAT WAY IT WILL NEVER RUN OUT OF TIME UNLESS YOU FAIL TO RESET IT. TIMER IS TURNED ON AND OFF WITH CONTROL PANEL BUTTON BUT IS RESET WITH THE LITTLE LOWER BUTTON ON LEFT SIDE.



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Important Gas Pressure Notice:

Important notice to all customers and prospective customers choosing to buy gas roasters and commercial gas appliances:

All gas appliances are both very efficient tools of the trade but also must be installed professionally by certified technicians. Natural gas (NG) and liquid propane gas (LPG) are great fuels for cooking and roasting. But improperly used can be fatal. It is therefore vital all persons considering buying equipment using natural gas or LPG understand its proper usage and limitations. It is the full responsibility of the consumer or customer to educate himself on the proper use and safety requirements of using any gas product.

GAS PRESSURE:

BEFORE purchasing a gas appliance it is the buyers responsibility to be sure they are permitted to install and operate a gas appliance at their facility. They must also be educated as to the gas pressure required to run a commercial coffee roaster at their location.

GAS ROASTERS REQUIRE A CONSISTENT CONSTANT GAS PRESSURE OF 20-24 WC.

NATURAL GAS (NG)

Natural gas settings in a standard residential home are set at about 7 WC. This is not sufficient pressure to run a coffee roaster at even 1/2 power. Therefore it is the consumers responsibility to ensure in advance that the gas pressure setting at his or her location can be adjusted by a technician to a setting of 20-24 WC.

See article below for gas pressure: http://inspectapedia.com/plumbing/Gas_Pressures.php#NaturalGas

LIQUID PROPANE GAS (LPG)

LPG or commonly called propane in the USA comes out of the tank at a very high pressure (typical ranges are 10-100 PSI) this pressure is far too high to run any appliance safely and therefore must be adjusted using approved regulators.

(10 to 100 PSI = WC of 276 to 2767)

To determine WC see link below:



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[http://www.convertunits.com/from/psi/to/water+column+\[inch\]](http://www.convertunits.com/from/psi/to/water+column+[inch])

USING A STANDARD HOME GRILL REGULATOR:

Home LPG gas grill regulators cut the gas pressure down to 11 WC which is too low to run most commercial coffee roasters. Therefore a professional low pressure regulator is needed to roast at pressures up to 24 WC. Find the nearest professional LPG equipment supplier in your area for details.

GAS LINES:

It is vital that all gas lines be free of leaks. Have all natural gas lines professionally installed by a certified technician Licences and approved in your locality.

LPG:

Use only professionally crimped gas lines and always check for leaks using the soapy water test before lighting any appliance.

**IF YOU HAVE ANY FURTHER PROBLEMS THAT CANNOT BE RESOLVED
CHECK OUR WEBSITE FOR HELP AND CONTACT YOUR SALES
REPRESENTATIVE. WE WANT TO DO ALL WE CAN TO GET YOU UP AND
RUNNING AS QUICKLY AS POSSIBLE. (49)**

**AGAIN WE WANT TO THANK YOU FOR LETTING OUR COMPANY HAVE
A PART IN THE SUCCESS OF YOUR BUSINESS AND IN THE JOY OF
DEVELOPING THE CRAFT OF COFFEE ROASTING. COFFEE ROASTING
AND MICRO-ROASTERS ARE QUICKLY BECOMING THE PREFERRED
CHOICE OF COFFEE DRINKERS THE WORLD OVER AS MANY PEOPLE
ARE JUST NOW GETTING TO TASTE WHAT TRULY FRESH ROASTED
COFFEE IS ALL ABOUT. IF WE CAN BE OF FURTHER HELP IN
GETTING YOUR COMPANY OFF THE GROUND WHILE SAVING YOU
TIME AND MONEY THROUGHOUT THE ENTIRE PROCESS WE ARE
HERE TO SERVE.**

info@buckeyecoffee.com

DISTRIBUTOR INFORMATION:

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