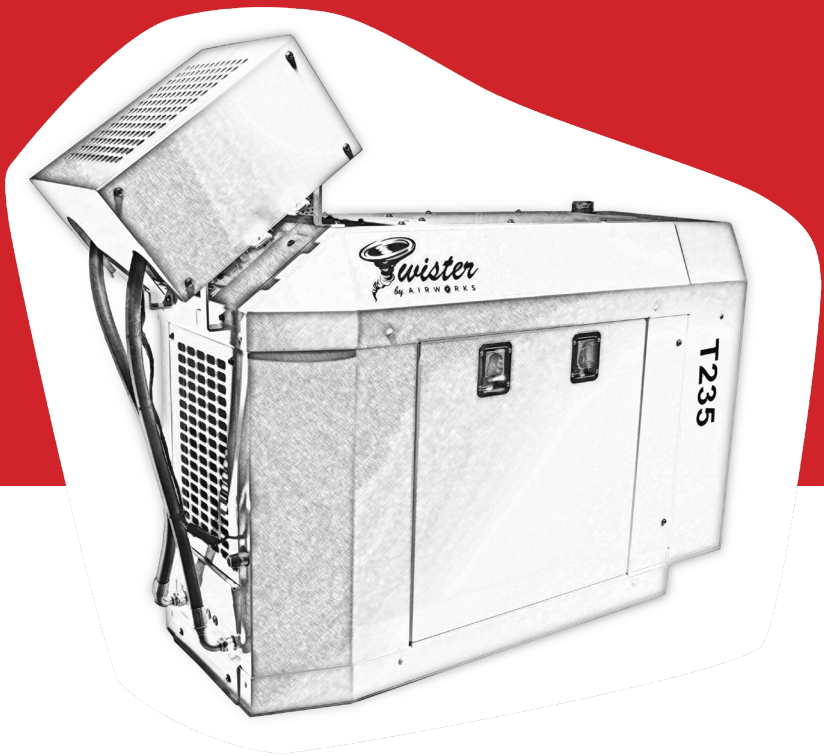
AIRWORKS
COMPRESSORS CORP

Operation Manual

Twister T80-235 EVO



Revised: 07/18/2025

AIRWORKS COMPRESSORS CORP

At Airworks Compressors Corp, we built our company by listening to customers' needs for air compressors that are efficient, cost-effective, and environmentally responsible. Since our founding in 2007, we've pioneered several world firsts, including the compact diesel-powered rotary screw air compressor and the propane-powered air compressor.

Our compressors are trusted in some of the most demanding environments on Earth, from rock blasting deep within the Earth, to the deserts of the South West, to the harsh conditions of Mount Erebus in Antarctica. With a commitment to sustainability and backed by patented technologies like our Aurora instrument air system, we provide innovative, reliable solutions for industrial applications.

Table Of Contents

McMurdo Station, Antarctica

Important Notes

Tier 4 Final Engine
The engine inside of your Twister EVO compressor utilizes a combination of advanced piston design and fuel atomization to burn clean enough to earn Tier 4 Final compliance. It is more efficient, and produces 90% less particulate and NOx than a conventional diesel engine, all with no DEF additive required..

Air Output
Depending on the model, your Twister is capable of outputting between 80 and 235 CFM at 100 PSI, with your unit's model number representing that output (For example, a T235 EVO will output 235 CFM at 100 PSI).

Duty Cycle
Like every Twister, your EVO series unit can operate at a 100% duty cycle.

Integrated Autostart Functionality
Our autostart technology gives you air when you need it, while burning as little fuel as possible. Your compressor's engine will run only when air is needed, and stop when it isn't - eliminating unnecesary idling entirely.

Service Log

Date	Unit Hour Reading	Service Type	Next Service Due

Contact Airworks Compressors Corp.

Browse our website: airworkscompressors.com
Give us a call: 780-454-2263

Safety Precautions

Before Operating the Compressor

Ensure you read and comprehend the operation manual and all related safety materials before operating the air compressor. The installer must ensure that the manual and all safety decals are delivered with the unit upon completion of product installation.

Personal Protective Equipment and Practices

Use Appropriate Safety Gear
Follow safe work practices and wear the appropriate safety equipment when operating air-powered equipment.

Noise Hazard
Wear appropriate hearing protection, such as earplugs or earmuffs, to prevent hearing damage from high noise levels.

Chemical Exposure
Use appropriate personal protective equipment (PPE) when handling lubricants, coolants, or other chemicals. Ensure proper ventilation in the work area.

Operating Precautions

Hot Components
Use caution when handling components during and after operation, as they may be hot.

Avoid Drive System Contact
Do not operate the compressor with panels removed. Avoid contact with the drive system.

Avoid Pressurized Air Contact
Avoid skin contact with pressurized air, as it may cause injury or death. Compressed air contains trace oils that are extremely harmful if inhaled.

Ensure Air Quality
Make sure the air entering the compressor is free of flammable vapors to prevent explosions.

Vaporized Oil Hazard
Be aware that vaporized oil propelled by high-pressure air is a potentially flammable mixture and a respiratory hazard.

Electrical Safety
Ensure all electrical connections are properly insulated and grounded.

Refueling and Fire Safety

Refueling Precautions
Never refuel the unit while it is running or hot. Avoid sparks and flames when refueling. Only refuel in well-ventilated areas.

Combustion Engine
Keep flammable materials away from the unit's engine and exhaust at all times while the unit is running.

Preventing Accidents

Falling Objects
Secure all components and tools properly to prevent them from falling. Wear a hard hat in areas where overhead work is being done.

Slips, Trips, and Falls
Keep the work area clean and free of obstructions. Ensure that hoses and cables are routed safely to avoid tripping hazards.

Moving Parts
Keep hands and clothing away from moving parts. Ensure all guards and covers are in place during operation.

Proper Lifting Techniques
Use proper lifting techniques or mechanical lifting devices when moving heavy components to prevent back injuries.

Depressurizing and Servicing

Do not attempt to service the compressor while it is under pressure. Remove fill caps and filters slowly. Observe that there is no pressure in the system. Residual pressure may still be in the system even when it is turned off.

Installation

Transfer / Preparation

Trace the base size and mount hole locations onto cardboard to create a template. Use this template to drill holes for mounting the compressor in a suitable location. Exercise caution when drilling to avoid obstacles beneath the surface.

Allow for proper fitting and hose/wire routing. Ensure there is adequate space for ventilation and service access.

Mounting the Compressor

Securely fasten the compressor to the service body using locking fasteners. Mount the Twister control panel in an accessible location when applicable.

Air Line Restrictions

Limit the use of 45-degree and 90-degree fittings to prevent loss of air flow. Use at least 3/4" hose/plumbing with the Twister T80/T100 EVO. Twister 150-235 EVO units should use at least 1" plumbing.

Airflow Considerations

When installing the Twister in a confined space, ensure proper airflow direction through the unit. Provide a source of fresh air intake and a vent for warm air exit.

Battery Connection

Use a minimum of 4-gauge welding wire with a 150-amp breaker in line when connecting the battery cables to the Twister. Due to the rubber mounting bases, ground the unit using the supplied ground lead from the Twister to the chassis battery.

Run the battery cable from the Twister quick connector to the truck battery. Install a 150-amp circuit breaker near the battery and size the cable appropriately for the length of the run. Protect the cable from rubbing and damage.

For installation at a distance greater than 12' from battery, heavier cable is recommended.

Startup/Shutdown Procedures

Turning On the Unit

1) Ensure that 'COMPRESSOR' button is turned off.

2) Turn key to the start position to power on the unit.

3) Press 'RUN' to start your Twister's engine.

4) Allow the engine to get to a smooth idle.

5) 'Press the 'COMPRESSOR' button to begin building air.

6) The unit will idle down once maximum pressure is reached. It is now ready for you to use.

IMPORTANT: Do not shut off the engine off while the unit is building pressure. This may damage your compressor.

Shutting Down the Unit

1) Ensure that the compressor is not under load (Currently building air). Deactivate the 'COMPRESSOR' button.

2) Press 'OFF' to turn off the Twister's engine.

3) Turn the key to the center position. The unit is now turned entirely turned off.

Auto Start

Activate this feature by pressing 'AUTO' (This must be performed after step 2 of turning on the unit). This will automatically shut off the engine when max air pressure is reached, and turn on again when more air is needed.

Aux Button

By default, the aux button is left available for the installer to integrate as a control for other systems.

Display Navigation - ENTER/Up/Down

The screen will cycle through a variety of system parameters, such as PSI, temperature, oil pressure. Use the arrows to navigate through this list. To prevent the screen from cycling, you can lock the current view by holding 'ENTER'.

Status Light

Green: Everything is working correctly.
Red: The engine has thrown an error code. This code will be visible on the screen.

Maintenance Guide

To maintain your system and warranty, follow the maintenance schedule using only Airworks genuine replacement parts. Proper air filtration and clean oil are crucial for preventing contamination that can damage roller bearings, gears, and rotors.

Where Can I Service My Compressor?
Our products can typically be serviced or repaired by any reputable small engine repair shop. Small engine repair shops that are familiar with Yanmar products are our first choice. Contact service@airworkscompressors.com for assistance with servicing your unit.

How Can I Purchase Replacement Parts?
While our dealers are able to source replacement parts, you are also able to contact our parts department directly. If you would like to to place an order, please send us an email to parts@airworkscompressors.com.

Every 25 Hours

Check compressor oil (appropriate level is at the bottom of the threads inside of the compressor oil fill), and engine oil levels. Check for loose or rubbing components, leaks, air, and fluid.

Every 100 Hours

Perform 25-hour checks plus:
- Check air filter elements' condition (#1, #11).
- Check fan belt tension (#21).
- Check fuel filter (#15).

Every 250 Hours / Every 6 Months

Perform 100-hour checks plus:
- Change engine oil (6 quarts) and oil filter.
- Change compressor oil (10 quarts), oil filter, and air filter.
- Service engine and compressor air filters.
- Check radiator hoses and clamps.
- Check air intake hose.

Requires:
- *250 Hour EVO Series Service Kit (ATS225S)*

250 Hour EVO Series Service Kit Includes:
- *Compressor Air Filter (#1) (Part Number ATC202)*
- *Compressor Oil Filter (#14) (Part Number ATC103)*
- *Engine Air Filter (#11) (Part Number ATE227)*
- *Engine Oil Filter (#12) (Part Number ATE225)*
- *5 Liters Synthetic Compressor Oil (Part Number ATC005)*
- *5 Liters Synthetic Engine Oil (Part Number ATE021S)*

Every 500 Hours / Every 12 Months

Perform 250-hour checks plus:

- Change compressor coalescing filter (#19).
- Replace fan belt (#21).
- Check radiator hoses and clamps.
- Check air intake lines.
- Replace the fuel filter element (#15).
- Clean the radiator external fins (#18).
- Check valve lash (Located under tappet cover on top of engine).
- Inspect coupler on engine and compressor; replace if required.

Requires:

- *EVO Series 500 Hour Service Kit (Part Number ATS250S)*

500 Hour EVO Series Service Kit Includes:

- *Compressor Air Filter (#1) (Part Number ATC202)*
- *Compressor Oil Filter (#14) (Part Number ATC103)*
- *Engine Air Filter (#11) (Part Number ATE227)*
- *Engine Oil Filter (#12) (Part Number ATE225)*
- *5 Liters Synthetic Compressor Oil (Part Number ATC005)*
- *5 Liters Synthetic Engine Oil (Part Number ATE021S)*
- *Coalescing Filter (#19) (Part Number ATC104)*
- *Fuel Filter (#15) (Part Number ATE207)*

Adjusting The System

Your EVO series Twister has been designed to continuously run tools requiring roughly 90 PSI. In the event that either of these values have drifted, they can be brought back to our spec with some simple adjustments.

Adjusting PSI

The pressure switch (#13) can be adjusted to a range of values. This component determines the cut-in and cut-out pressure of your compressor.

Adjusting Engine Speed

The engine speed is maintained by the engine's internal ECU. While this speed can be modified, this process requires that the ECU be reprogrammed by one of our trained technicians.

Troubleshooting Guide

Insufficient Air Volume

Check and correct the following:

- Ensure the compressor oil level is correct.
- Confirm the pressure relief valve (#5) is operational.
- Ensure air filters (#1, #11) are clean.
- Check for any blockages downstream of the compressor (e.g., kinked hose or compromised plumbing).
- Check for a sticking or misadjusted minimum pressure valve (Located below the coalescing filter #19)

Frequent Over-Temperature Shutdowns

Check and correct the following:

- Verify engine and compressor oil levels are correct.
- Check the engine coolant level while the unit is cool.
- Inspect engine and compressor hoses for kinks.
- Check the over-temperature shutdown temperature probes (Located above the pusher fan #7, and behind the coalescing filter #19) for both the engine and compressor.
- Ensure adequate air circulation around the unit and confirm that hot air is not being recirculated into the air intake.
- Make sure oil filters (#12, #14) are not plugged.
- Verify the fan belt (#21) is properly adjusted.
- Clean the radiator (#18) core with caution using compressed air or pressure washer, ensuring not to damage the fins.
- Check for a faulty over-temperature switch on the engine (240°F) or compressor (270°F).
- Look for rapid compressor cycling which might indicate air volume exceeds usage.

Excessive Air Pressure

Check and correct the following:

- Ensure the pressure relief valve (#5) is operating correctly.
- Check for leaks between the air end and the pressure relief valve (#5).
- Confirm the inlet valve (#1) is sealed properly and there is no oil in the compressor air filter inside of it.
- Ensure the pressure switch (#13) is operating correctly.
- Inspect the system pressure line for leaks (from compressor to pressure switch)

Engine Stalls When Compressor Starts

Check and correct the following:

- Ensure the air compressor is not under pressure – allow it to unload.
- Verify the engine speed is adequate. Refer to the 'Adjusting the System' section of the manual.
- Confirm the pressure relief valve (#5) is operating properly.
- Ensure the engine fuel filter (#15) or air filter (#11) is not plugged; replace if necessary.
- Check if the fuel pump (#8) is functioning.
- Verify the compressor switch is off during startup.
- Inspect the positive air shut-off valve (Is attached to #20) (optional – not on all units).

Low Air Pressure

Check and correct the following:

- The maximum air flow may be exceeded. Try running the compressor with a lighter load and observe its operation.
- Verify the engine speed is adequate. Refer to the 'Adjusting the System' section.
- Ensure the pressure relief valve (#5) is operating properly – adjust or replace as required.
- Check for restricted flow due to kinked or collapsed air lines or ice blockages.
- Inspect air lines and fittings for leaks.

Excessive Oil in the Air Produced

Check and correct the following:

- Verify the compressor oil level is correct.
- Ensure the oil scavenging sight glass is clean.
- Inspect the coalescing filter (#19) and replace it if necessary.
- Ensure the shutdown procedure is proper; avoid shutting down under load.

Oil Blows Out of Compressor Air Filter on Shutdown

Check and correct the following:

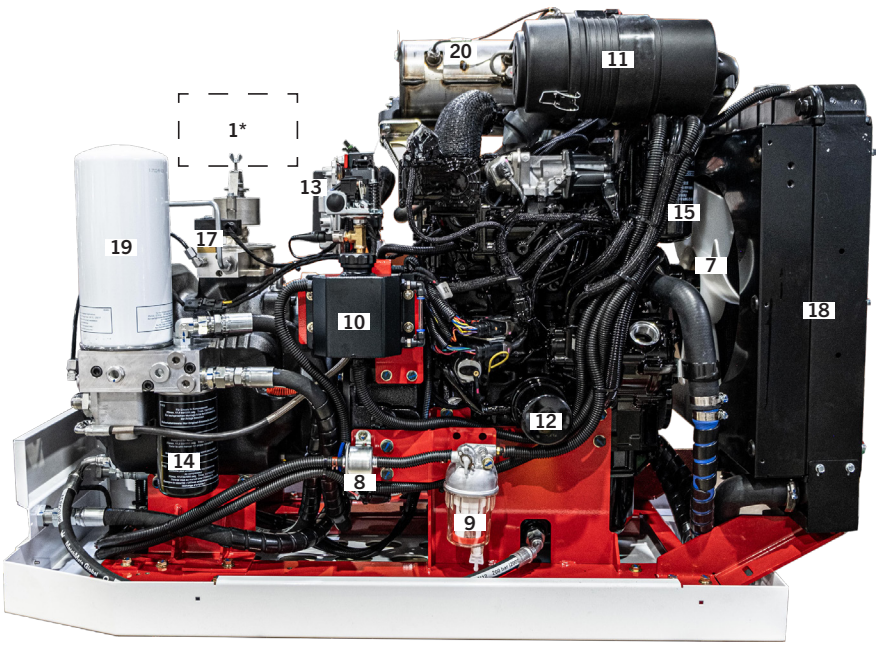
- Ensure the compressor was not building air while shutting down, as this can potentially cause oil to blow out of the air filter (located inside #1 on the Parts Guide).
- Verify the Compressor Air Filter Housing (#1) can seal adequately. Repair or replace as needed.

Diesel Engine Turns But Won't Start

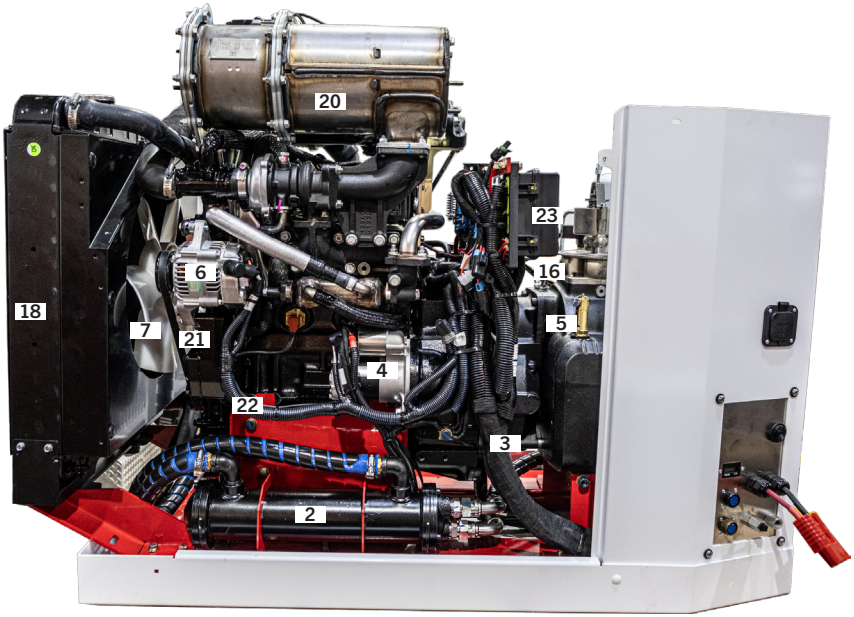
Check and correct the following:

- Ensure there is an adequate fuel supply (minimum 4 psi running).
- Confirm the compressor switch is turned off.
- Ensure the fuel petcock (Located next to #9) is open.
- Test the intake heater (Located below #11).
- Check if the fuel filter (#15) is restricted or if the fuel petcock (Located next to #9) is off; bleed air from the filter housing.
- Inspect the positive air shut-off valve is open and not tripped (Is attached to #20) (optional – not on all units).
- Verify fuel pump (#8) operation and check flow.
- Bleed air from the fuel system through the screw at the top of the filter.

Parts Guide



1. **ATC202** *Housing not pictured
Air Compressor Filter
2. **ATC217**
Heat Exchanger
3. **ATB226**
Main Harness
4. **ATB201**
Starter
5. **ATC109**
Pressure Valve
6. **ATB228**
55 Amp Alternator
7. **ATE180**
Pusher Fan
8. **ATB007**
Fuel Pump
9. **ATE124**
Seperator Assembly
10. **ATE232**
Overflow Reservoir
11. **ATE227**
Engine Air Filter
12. **ATE225**
Engine Oil Filter
13. **ATC006**
Pressure Switch
14. **ATC203**
Compressor Oil Filter
15. **ATE207**
Engine Fuel Filter
16. **ATC226**
Inlet Control
17. **ATC227**
12V Inlet Solenoid
18. **ATE203**
Radiator
19. **ATC204**
Air/Oil Seperator Filter
20. **ATA250**
Exhaust With Flange
21. **ATB202**
Belt
22. **ATE226**
Engine Wiring Harness
23. **ATB153**
5 Pin Relay Holder



How To Purchase Parts:

Parts can be made available by your local distributor, or through us directly. To get in touch with our parts department, send us an email at parts@airworkscompressors.com, or give us a call at 780-454-2263, Ext. 226, to place an order.

Schematics & Drawings:

We maintain a comprehensive archive of our unit drawings and electrical schematics on our website at airworkscompressors.com/manuals. Simply enter your unit's serial number (located on both the control panel, and the metal placard on the compressor's frame).

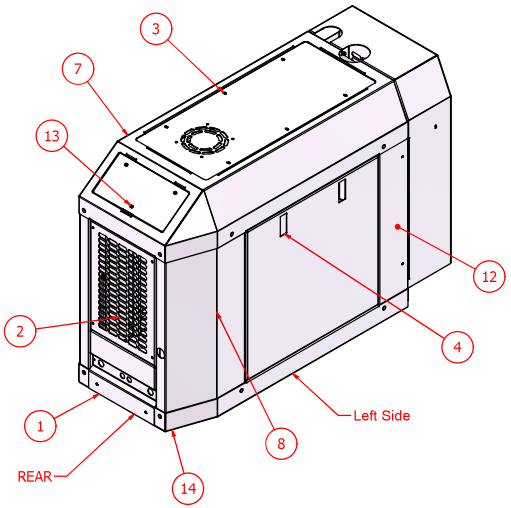
Support:

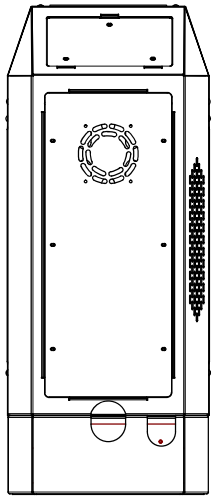
If you require assistance beyond what is contained within this manual, our trained technicians offer exceptional product support for our customers all around the world. Please give us a call at 780.454.2263, or send us an email at customerservice@airworkscompressors.com.

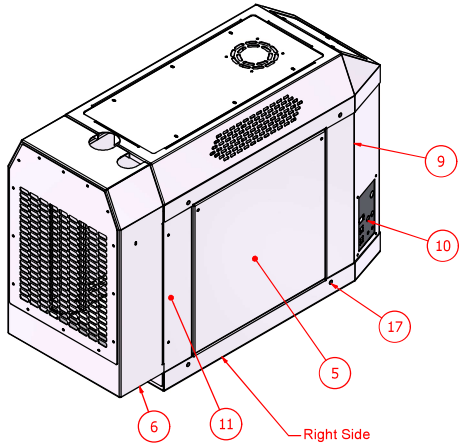
Airworks Compressors Corp.
Edmonton, Alberta
780.454.2263

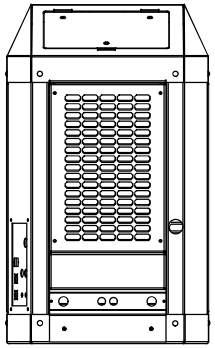
airworkscompressors.com

Parts List / Assembly			
Item #	QTY	PART #	DESCRIPTION
1	1	ATA204_1	Bulkhead Bottom, Valve Bracket, Evo
2	1	ATA204_2	Bulkhead Top, Valve Bracket, Evo
3	1	ATA219	Top Panel, Evo
4	1	ATA214	Side Panel (Door), Evo
5	1	ATA212	Side Panel (Door no handles), Evo
6	1	ATA221	Assembly, Rad Cover, Evo
7	1	ATA228	Weldment, Crown, Evo
8	1	ATA224	Rear corner panel - Left side, Evo
9	1	ATA226_1	Rear corner panel - Right side, Evo
10	1	ATA226_2	Face Plate, Rear corner panel - Right side, Evo
11	1	ATA248	Front corner panel - Right side, Evo
12	1	ATA245	Front corner panel - Left side, Evo
13	1	ATA220	Rear Top Access Panel, Evo
14	1	ATA211	Weldment, Base Pan, Evo
15	1	ATA253	Bracket, Rad Shroud, Upper
16	1	ATA254	Bracket, Rad Shroud - Lower

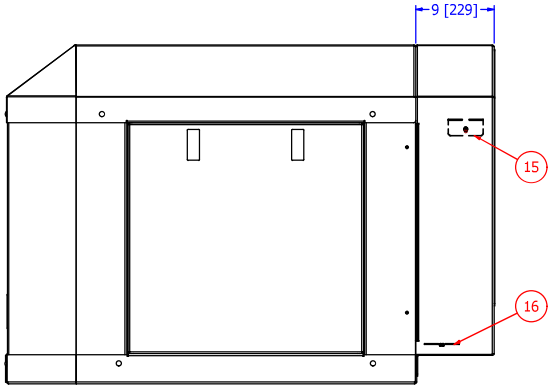




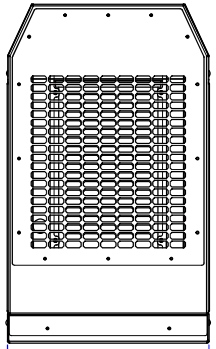




REAR



LEFT SIDE



FRONT

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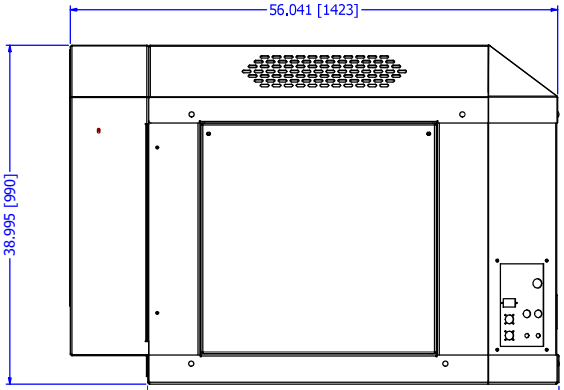
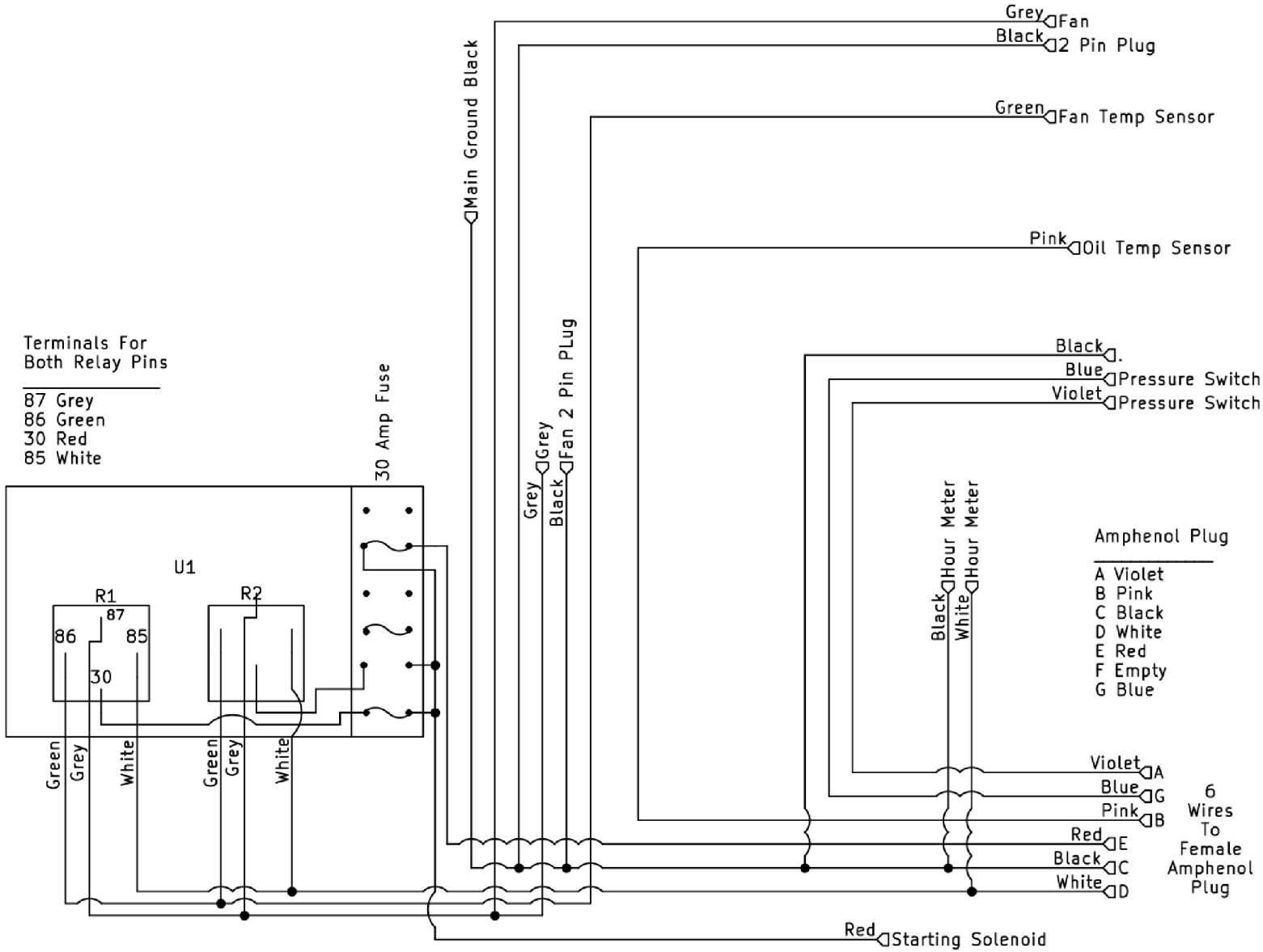


RIGHT SIDE

47.288 [1201]

		PART #	ATA_Evo	REV:10
Tolerances: Holes: +/- 1/32" Over 1/4" Material" +/- 1/8" Up to 1/4" Material" +/- 1/16"	DIM: Inches [mm]	DRAWING #		
		DESCRIPTION	Assembly, Evo Enclosure	
Welding Procedure Reg. #: WP-2167.2		WEIGHT	N/A	
		FINISH	Powdercoat Gloss White	
	Date: 1/24/2018	1st Scale: 0.07 : 1	Size: B	PAGE#: 1



AIRWORKS COMPRESSORS CORP

TITLE:

EVO HARNESS

SIZE	DWG. NO.	REV
A	ATB226-U1-P187-01	1

SHEET 1 OF 1

Fig. Twister T100-T235 EVO Engine

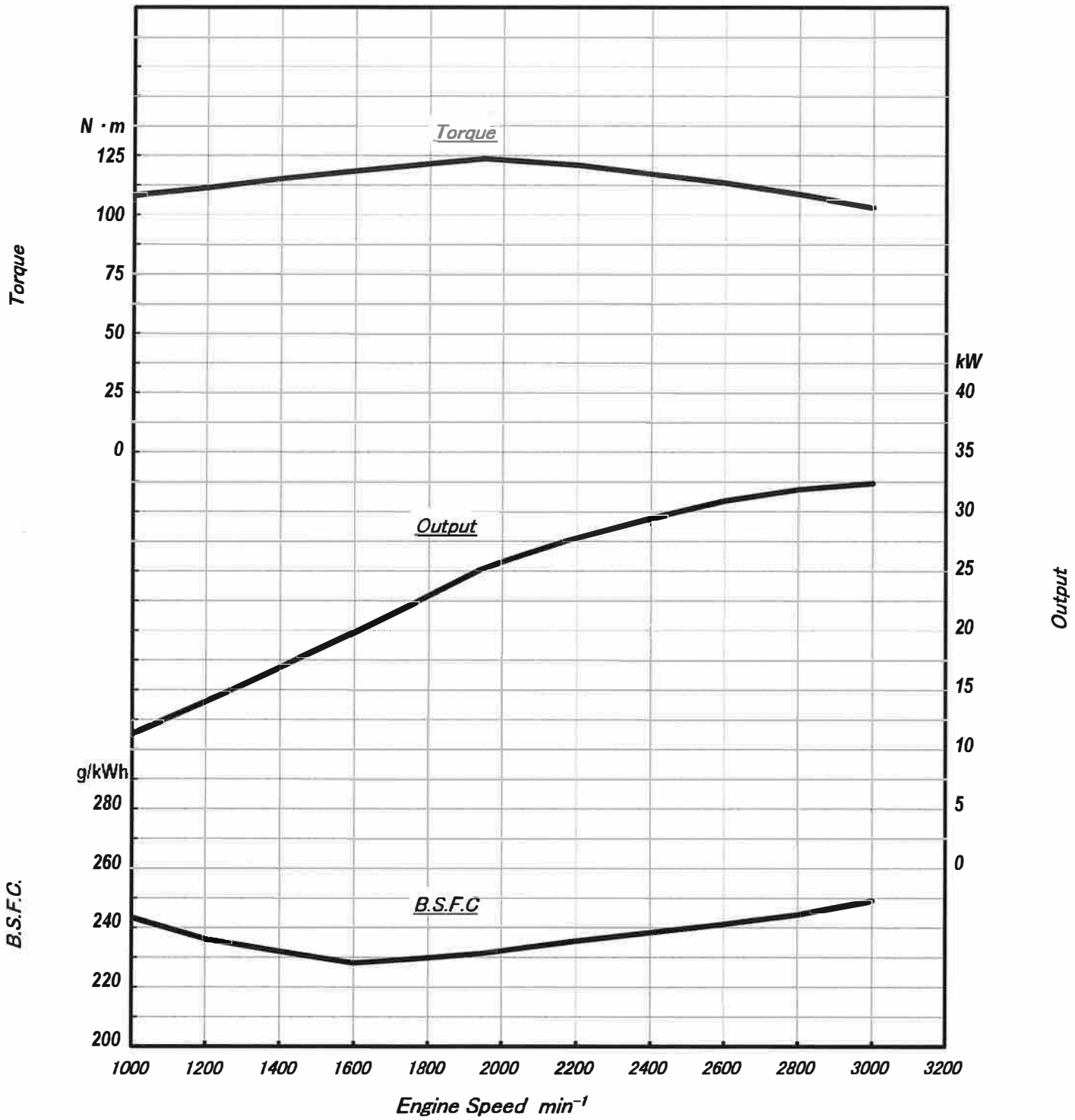
Yanmar 3TNV86CT

Displacement : 1,568cc

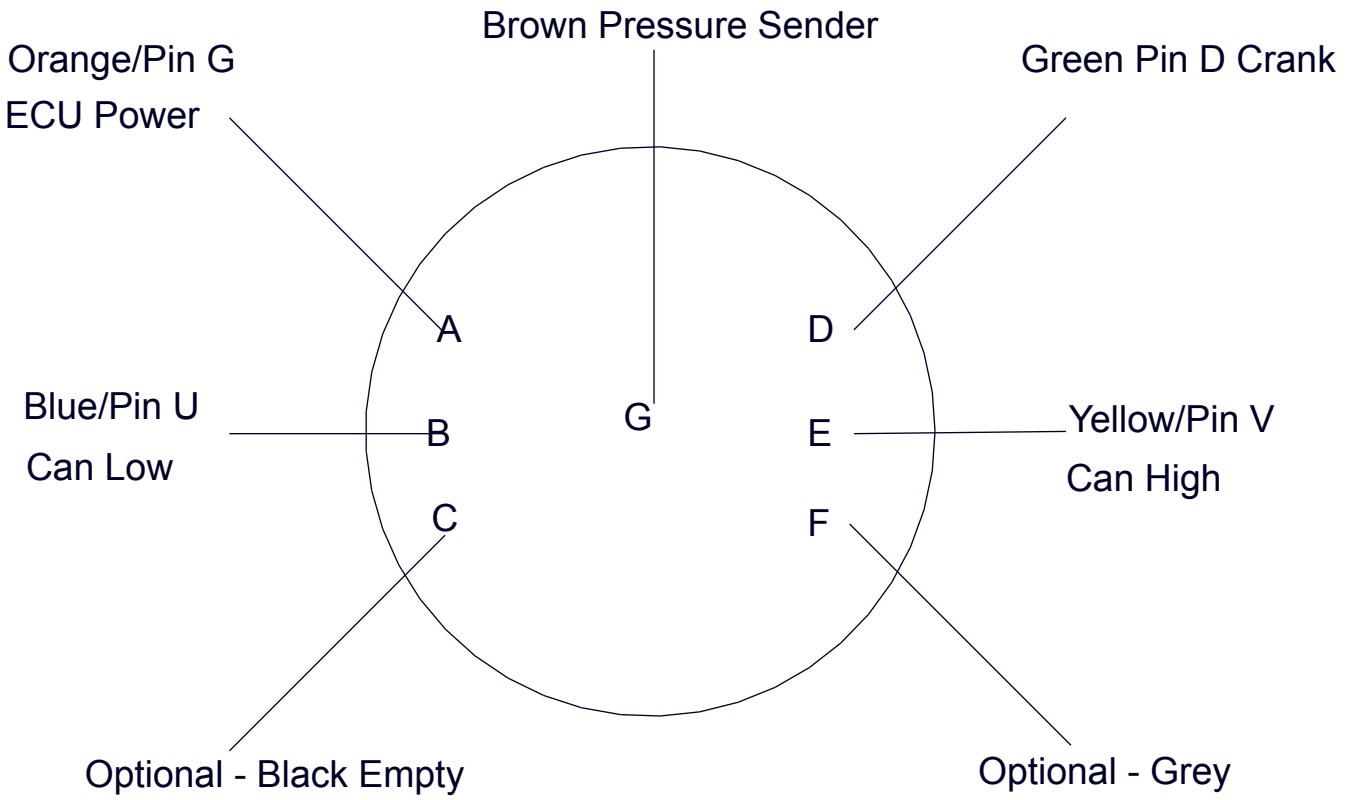
Rated power

Gross:32.4 kW / 3000 min-1

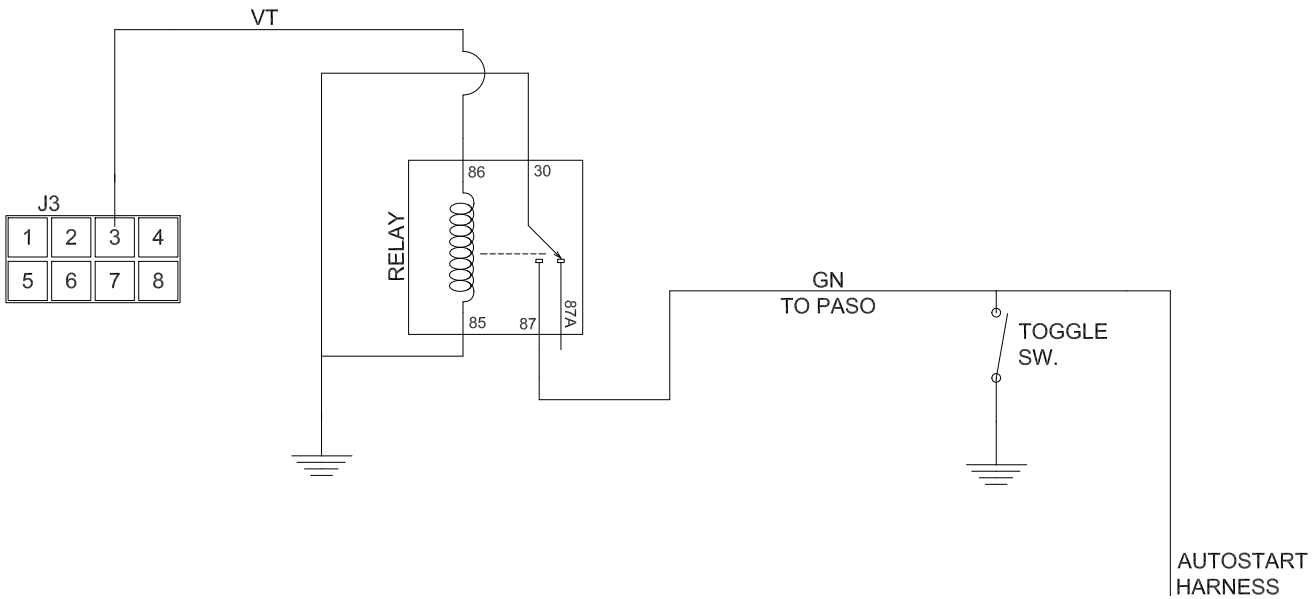
		Crank pulley	-
		Fan pulley	-
CW fan	none	φ-	-



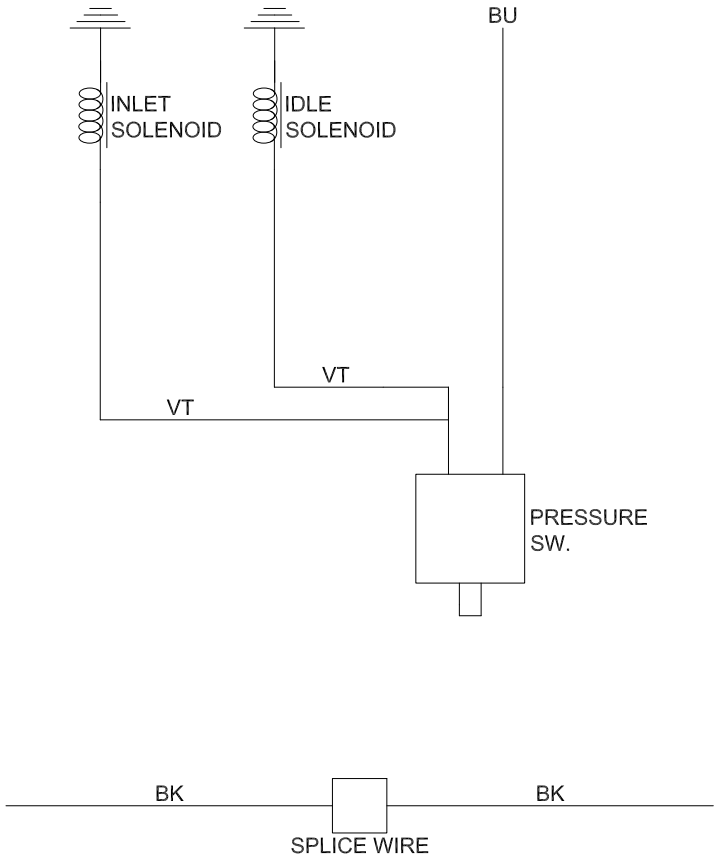
EVO AUTOSTART PLUG

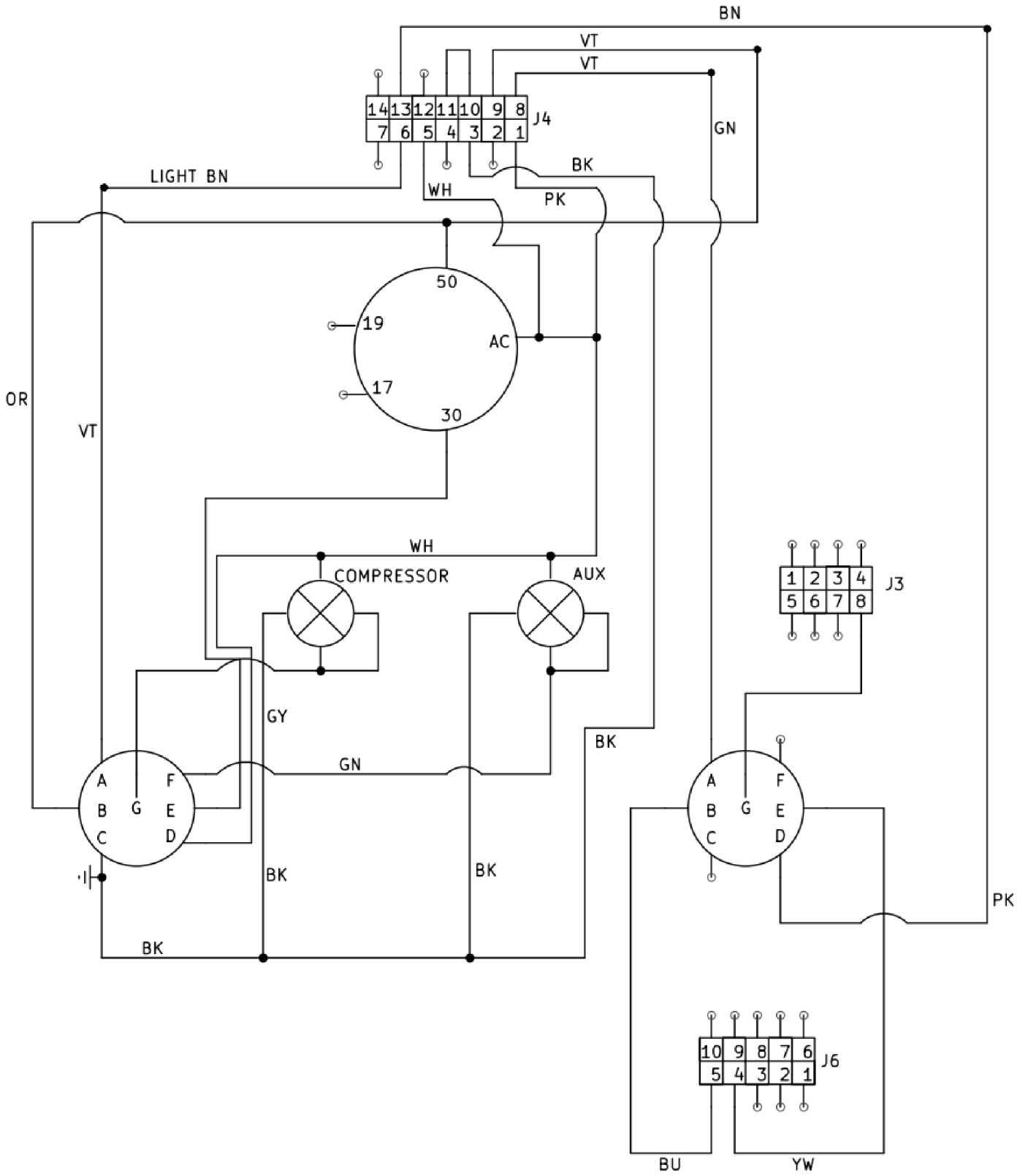


TWISTER
AUTOSTART PASO RELAY



TWISTER
PRESSURE SWITCH UPDATE
WIRE POSITIONS





AIRWORKS COMPRESSORS CORP

TITLE:

EVO CONTROLLER DIAGRAM

SIZE	DWG. NO.	REV
A	AOAS215-U1-S220-01	1

SHEET 1 OF 1

AIRWORKS COMPRESSORS CORP

- A division of Airworks Compressors and Mobile Equipment Corp -

GENERATOR

OPERATION MANUAL

AWG-B6K-D6K

REVISED 05/18

Serial Number_____

AIRWORKS COMPRESSORS CORP.
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WWW.AIRWORKSCOMPRESSORS.COM

SAFETY FIRST

While safety is built into every generator, imprudent operation, negligent maintenance or carelessness can contribute to present serious hazards to life and limb. Gasoline and other fuels always present a hazard of possible explosion or fire.

- Keep fuel container out of reach of children.
- Keep a fire extinguisher nearby. Know its proper use. Consult your local fire department for correct extinguisher type.
- Store fuel only in approved containers and I a well ventilated area. Exhaust fumes are poisonous if inhaled.
- Be sure the generator is well ventilated on all four sides.
- Provide adequate ventilation for the prime mover if it is a gasoline or diesel engine. The output power voltage present in this equipment can cause a fatal electric shock. This equipment must be operated by a responsible adult.
- Do not allow anyone to operate the generator without proper instructions.
- Guard against electric shock.
- Avoid contact with live terminals or receptacles.
- Do not operate this unit in rain or snow.
- Use only 3 prong grounded receptacles and extension cords.
- This unit must be properly grounded.
- On construction sites a customer supplied GFCI (Ground Fault Circuit interrupter) should be utilized to protect the 120 volt AC receptacles.
- When utilizing a lead acid battery starting battery on electric start models, extreme care must be taken when handling or servicing the battery.
- Lead acid batteries emit a colorless explosive hydrogen gas when being charged.
- Battery acid will cause severe burns and eye damage. Use extreme care when handling or servicing the battery. Hot engine parts and the output of the generator could cause serious injury to the operator. The operator must use caution and remain alert when using this unit.
- Do not smoke while servicing battery, an open flame can cause an explosion.
- Do not disconnect battery cables on electric start models from the battery or engine while the unit is cranking or operating. Sparks may cause an explosion.
- Only operate in a well ventilated area.
- All pulleys, belts, etc. Should be provided with safety guards.
- Keep all safety guards and power shields in position and tightly secured.
- When working on or around this unit do not wear neckties or loose shirts, jackets or sleeves that may become caught in moving parts. Only a qualified technician should perform repairs on this equipment.
- Do not work on this equipment while fatigued, under the influence of alcohol or drugs.
- Use extreme caution when working on electrical components. High output voltage from this equipment can cause injury or death.

- When working on this equipment avoid hot mufflers, exhaust manifolds and engine parts which can cause severe burns. Installing and wiring a home standby generator is not a do it yourself project. Consult a qualified licensed electrician or contractor.
- This installation must comply with all national state providence and local codes. Do not connect a generator to a home building except through an approved disconnect switch.
- When working around engines use noise suppression equipment and wear protective devices as necessary. Excessive noise is not only tiring, but continual exposure can lead to loss of hearing.
- Keep you neighbours in mind when noise level is high. Keep generator and surrounding areas clean.
- Remove oily rags and other material that create potential fire hazard. Consult the local fire department.
- Extinguishers rated ABC by the NFPA are appropriate for all applications. Consult the local fire department.
- Keep Extinguisher properly maintained and be familiar with its proper care. The manufacturer recommends that all service including the installation or replacement of service parts be performed only by a qualified electrical service person. Use only factory approved repair parts.
- Do not operate this unit in an enclosed compartment such as found in recreational vehicles or inside box trucks with only the rear open door. All warranties are voided if the unit is operated in any of the previously mentioned enclosures. Operate only outside in a well ventilated area.

VISUAL INSPECTION

Visually inspect the unit before the initial start. Check for loose or missing parts and damages that may have occurred in shipment. If freight damages have occurred, contact the freight company.

PRINCIPLE OF OPERATION

On models AB and AR the generator stator in addition to the main phase out put winding has an auxiliary phase winding that is connected to a capacitor(s). The resultant current flow creates an alternating armature reaction that can be considered the combination of two rotating fields. One field is in the direction of the generator rotation at the same speed. The other is in the opposite direction and inducing in the rotor field winding an electromagnetic field double the rated frequency. By connecting a diode in series with the rotor field winding the current is rectified and the necessary excitation obtained. The voltage regulation at load is ensured by the field build-up generated by the armature reactance and rotating field windings.

SAFETY PRECAUTIONS

Before operating the generator set, read the owner's manual and become familiar with it and your equipment. Safe and efficient operation can be achieved only if the equipment is properly operated and maintained. Many accidents are caused by failure to follow fundamental rules and precautions.

The following symbols found throughout this manual alert you to potentially dangerous conditions to the operator, service personal or the equipment.

DANGER This symbol warns of immediate hazards, which if not avoided, will result in severe personal injury or death.

WARNING This symbol refers to a hazard or unsafe practice, which if not avoided, could result in severe personal injury or death.

CAUTION This symbol refers to a hazard or unsafe practice, which if not avoided, might result in minor or moderate injury or product or property damage.

Before attempting to operate this product read and understand the operator's manual!

Starting procedure for Twister unit:

1. Compressor, generator and welder switches are in the off position (if equipped).
2. Turn key switch counter clockwise (left) to activate intake heater, hold for a minimum of 20 seconds and a maximum of 45 seconds (varies with outside temperature).
3. Turn key fully clockwise to crank position and hold till engine starts (maximum 20 seconds), release key when engine starts.
    (a) Repeat steps 2 and 3 if engine does not start. If it fails to start after 3 attempts see operation manual trouble shooting guide.
4. Allow engine to idle until operating temperature is reached.
5. Engage required function compressor, generator, welder or any combination of these (if equipped).

Twister is now ready to operate.

Shutdown procedure:

1. Ensure compressor, generator or welder (if equipped) is not under load before shutting down.
2. Switch compressor, generator and welder (if equipped) master switches to off position.
3. Allow twister to idle for 1 minute.
4. Turn key switch to off (center) position.

Safety note: Remove key before performing any maintenance on unit to prevent accidental starting. Do not operate with covers removed.

For technical support call: 780-454-2263

ADJUSTING VOLTAGE

All AB and AR units are inherently regulated. By maintaining at least 3600 RPM input speed on these units the proper voltage of 120/240 volts and frequency (60Hz.) will be delivered by the generator. Lowering the shaft speed of the generator will decrease the voltage and increasing the shaft speed will increase the voltage and frequency (60 Hz.).

DANGER

All gasoline and diesel engines emit carbon monoxide which can kill. Only operate any engine with all four sides of the engine completely open and away from walls, enclosures, compartments, ect. Complete fresh air is required. **DO NOT OPERATE** an engine inside a home/building/recreational vehicle compartment, garage or near open windows of a home or building.

DANGER

All generators MUST be grounded according to your local electrical code (or CSA in Canada). External grounding terminals are provided. All generators are internally grounded but an external ground is required by the customer.

ELECTRIC MOTOR CHART
Approximate current requirements

HORSE-POWER	RUNNING WATTS	STARTING WATTS			
		UNIVERSAL MOTOR (sm. appliance)	INDUCTION MOTOR	CAPACITOR MOTOR	SPLIT PHASE MOTOR
1/6	275	400	600	850	1200
1/4	400	500	850	1050	1700
1/3	450	600	950	1350	1950
1/2	600	750	1300	1800	2600
3/4	850	1000	1900	2600	X
1	1000	1250	2300	3000	X
1 1/2	1600	1750	3200	4200	X
2	2000	2350	3900	5100	X
3	3000	X	5200	6800	X
5	4800	X	7500	9800	X

NOTE: *For pumps, air compressors, air conditioners, inverters add at least 25% to starting current.*

EXTENSION CORD CHART

CONTINUOUS LOAD (use either Amps or Watts below)			MINIMUM GAUGE (AWG)		
	WATTS				
AMPS	@120 volts	@240 volts	0-50 feet	50-100 feet	100-150 feet
2	240	480	22	20	18
3	360	720	22	18	16
4	480	960	20	16	16
5	600	1200	18	16	14
6	720	1440	18	16	14
8	960	1920	16	14	12
10	1200	2400	16	12	12
12	1440	2880	16	12	10
14	1680	3660	14	12	10
16	1920	3840	14	10	10
18	2160	4320	14	10	8
20	2400	4800	12	10	8
22	2640	5280	12	10	8
25	3000	6000	12	10	6
30	3600	7200	10	8	6
35	4200	8400	10	8	4
40	4800	9600	8	6	2
50	6000	12000	6	4	2
60	7200	14400	4	2	

THE FORMULA FOR WATAGE IS VOLTS X AMPERAGE = WATTAGE
EXAMPLE 120 X 10 = 1200

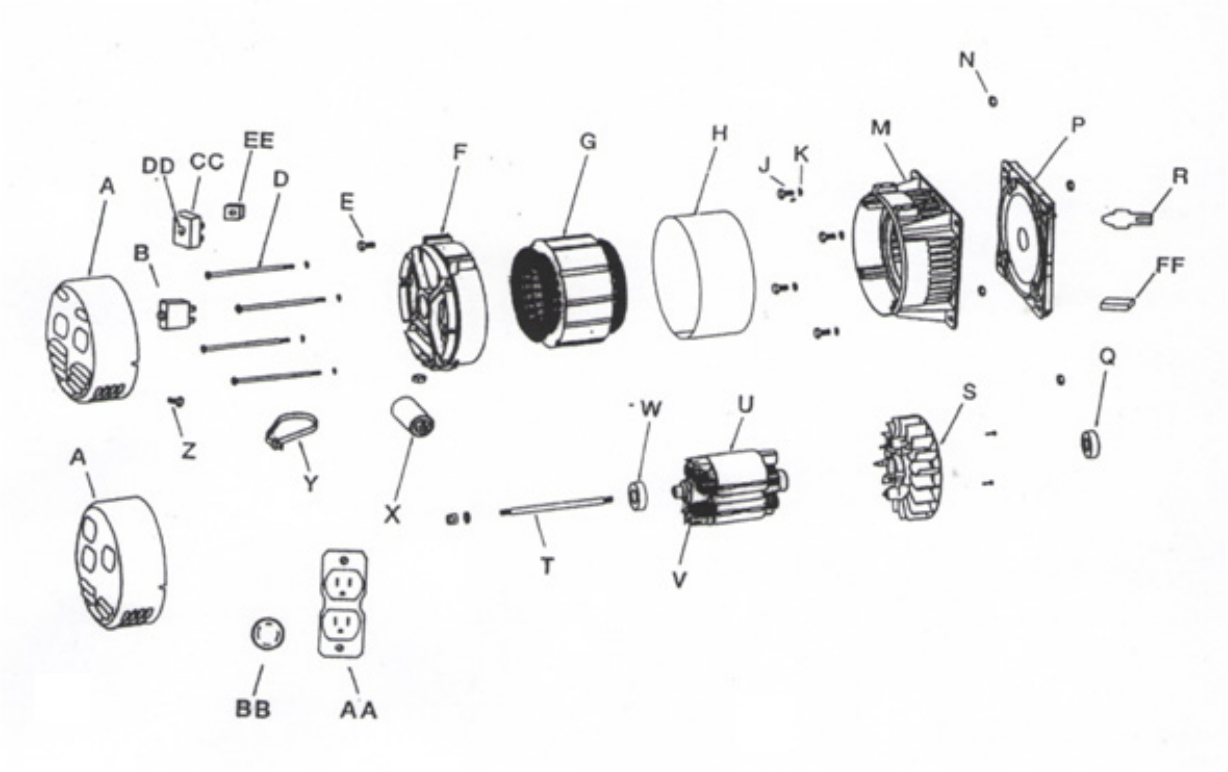
APPROXIMATE POWER
Requirements for Equipment

	WATTAGE REQUIREMENT	
	Starting	Running
Battery charger, 10 amps	-	200
Compressor (see motor charts) -3/4 HP	1900	850
-1 HP	2500	1100
-2 HP	3600	1800
-3 HP	4800	2400
Drill -1/4"	400	300
-3/8"	650	475
-1/2"	900	750
-1"	1250	1000
Welder 100 amps DC	-	3600
Floodlight	--	1000
Grain cleaner, 1/4 HP	1000	650
Grain elevator, 3/4 HP	3000	1400
Grinders (by motor size)		
Heater radiant portable	--	1300
Heater portable liquid fuel -50,000 btu	675	225
-100,000 btu	1260	420
-150,000 btu	1875	625
Impact wrench -1/2"	750	600
-3/4"	900	750
-1"	1400	1200
Milk cooler	1800	1100
Mixer, 3 ½ cubic feet	2300	1000
Motors-		
Belt sander	2600	1200
Disc sander	2600	1200
Orbital sander	2600	1200
Chain saw	3400	1200
6" circular saw	2200	950
7 ¼" circular saw	2600	1200
8 ½" circular saw	3000	1500
10" circular saw	3900	2000
Jig saw	400	300
Cutoff saw	3500	2500
Screwdriver	800	550
Soldering iron or gun	-	150
Sump pump	1300	400
Water pump submersible -3000 gph	1750	500
-5000 gph	2500	650
-10000 gph	3750	1000
-15000 gph	5000	1500
Water pump non submersible -3000 gph	2250	600
-5000 gph	2850	750
-10000 gph	4100	1100
-15000 gph	5250	1600

AIRWORKS COMPRESSORS & MOBILE EQUIPMENT CORP.

TWISTER

PARTS EXPLOSION - B6K GENERATOR



A	COVER
B	CIRCUIT BREAKER 20A
C	8/32 X 1/2 PHILLIPS SCREW
D	STATOR BOLT
E	GROUND SCREW
F	BEARING BRACKET
G	STATOR
H	COVER (STATOR)
I	WASHER
J	NUT
K	FANBRACKET
M	SCREW
N	WASHER
P	PTO BRACKET
Q	BALL BEARING 52MM
R	SHAFT EXTENSION
S	FAN
T	ROTOR SCREW
U	ROTOR
V	DIODE WITH SUPRESSOR
W	BALL BEARING 40MM
X	CAPACITOR 20MF
Y	TY RAP
Z	5/16 SQUARE NUT
AA	DUPLEX RECEPTACLE 125V
BB	TYL RECEPTACLE 20A
CC	DELAY TIMER
DD	SCREW
EE	NUT
FF	KEY

#4031

12/11

ORDERING PARTS

For parts or services; contact Airworks Compressor Corp. for the name of the nearest authorized service provider. To avoid error and delay in filling your parts order, please furnish all information requested and always refer to the nameplate on the unit by giving the model and serial number. Do not order by reference number or group number if possible, always use the part number. State definite shipping instructions. Any claims for loss or damage to your unit in transit must be promptly filed against the transportation company making the delivery at the time of the delivery. Shipments are complete unless the packing list indicates items are back ordered.

FOR SERVICE OR PARTS CONTACT:
AIRWORKS COMPRESSORS CORP
14503-115 Ave
EDMONTON, ALBERTA
T5M-3B8
PH: 780-454-2263
FAX: 780-452-9969
WEB SITE: www.airworkscompressors.com

ONE YEAR LIMITED WARRANTY

This warranty extends to the original purchase order only. The generator sold is warranted to the original purchase for a period of one (1) year from the original purchase date. Airworks Compressors Corp. warrants the generator sold to be free from defects in material and workmanship if properly installed, serviced and operated within the nameplate rating under normal conditions according to the manufacturer's written instructions.

DISCLAIMERS

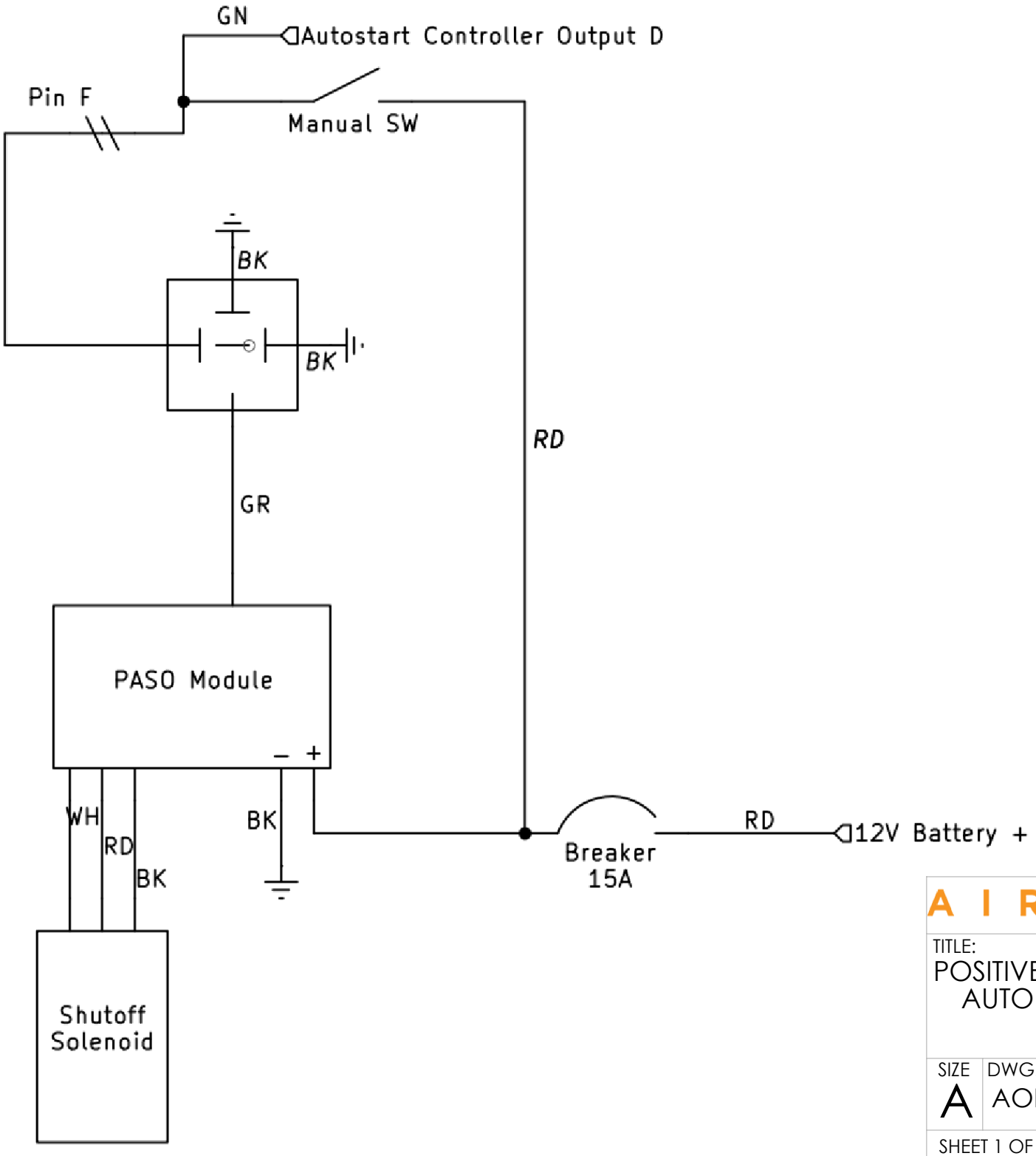
This warranty does not apply to any items which must be repaired or replaced due to normal wear, which have been subject to misuse, negligence, accident or which have been repaired, altered by others outside of the manufacturer's factory unless authorized in writing by Airworks Compressors Corp. Under no circumstances will Airworks Compressors Corp. be liable for any consequential damage or expense of any kind, including loss of profits not the fitness of the product for any specific application or particular purpose.
Specifications, procedures, dimensions, policy and liability may change without notice.

PERFORMANCE

Airworks Compressors Corp's obligation under this warranty is limited to correcting without further charge, any part or parts which shall be returned transportation charges prepaid, and which upon examination shall disclose to Airworks Compressors Corp satisfaction to have been originally defective. Other than transportation charges, no charge will be made for such repair, adjustments and or replacements. This remedy is expressly in lieu of all other remedies, and is the purchaser's sole and exclusive remedy hereunder.

For technical assistance:

Email: info@airworkscompressors.com or service@aircorkscompressors.com
Phone: 1-780-454-2263
Toll Free: 1-877-454-2263



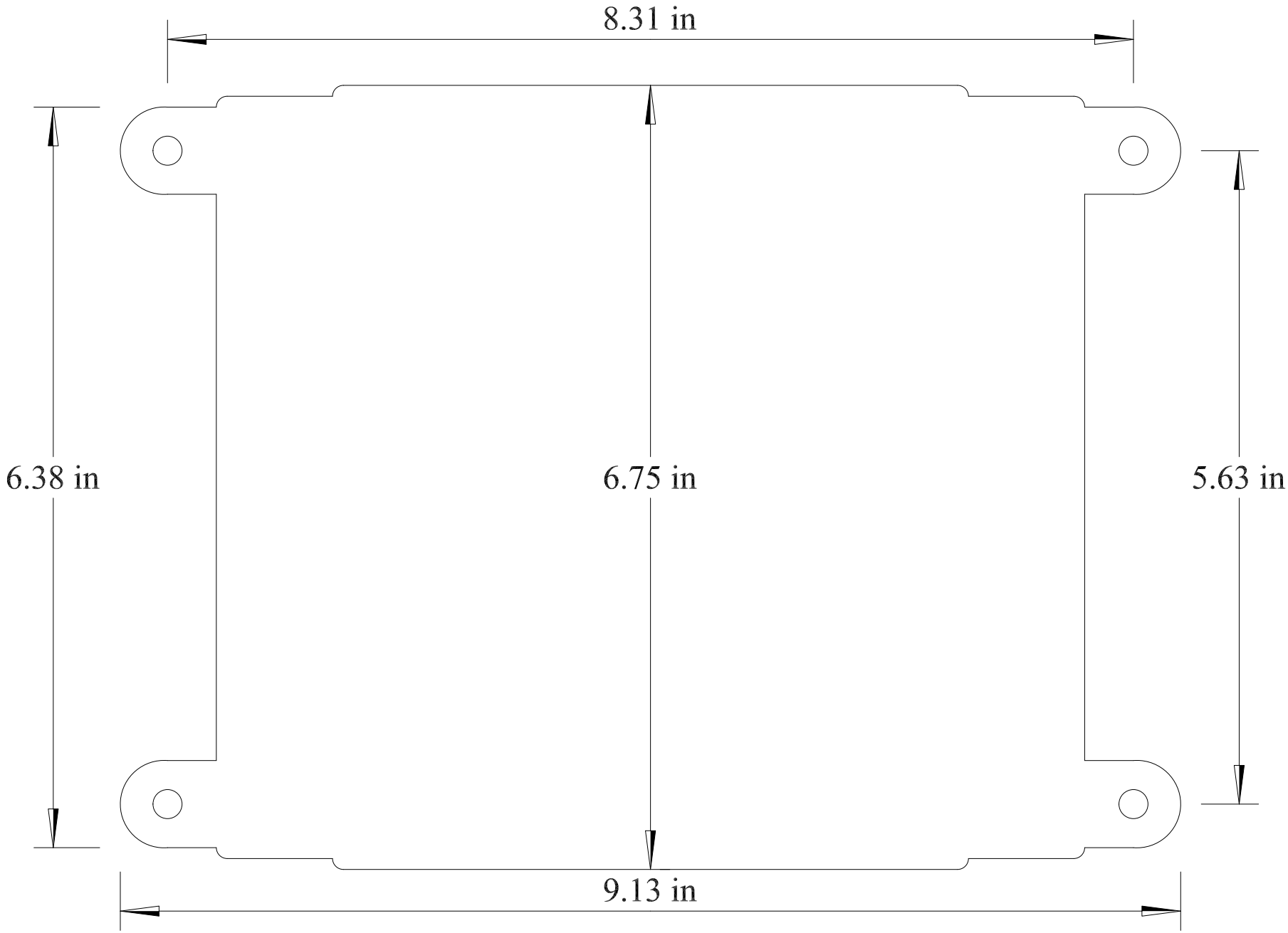
AIRWORKS COMPRESSORS CORP

TITLE:
POSITIVE AIR SHUTOFF WITH AUTO START CONTROL

SIZE	DWG. NO.	REV
A	AOPA01-U1-S065-01	2

SHEET 1 OF 1

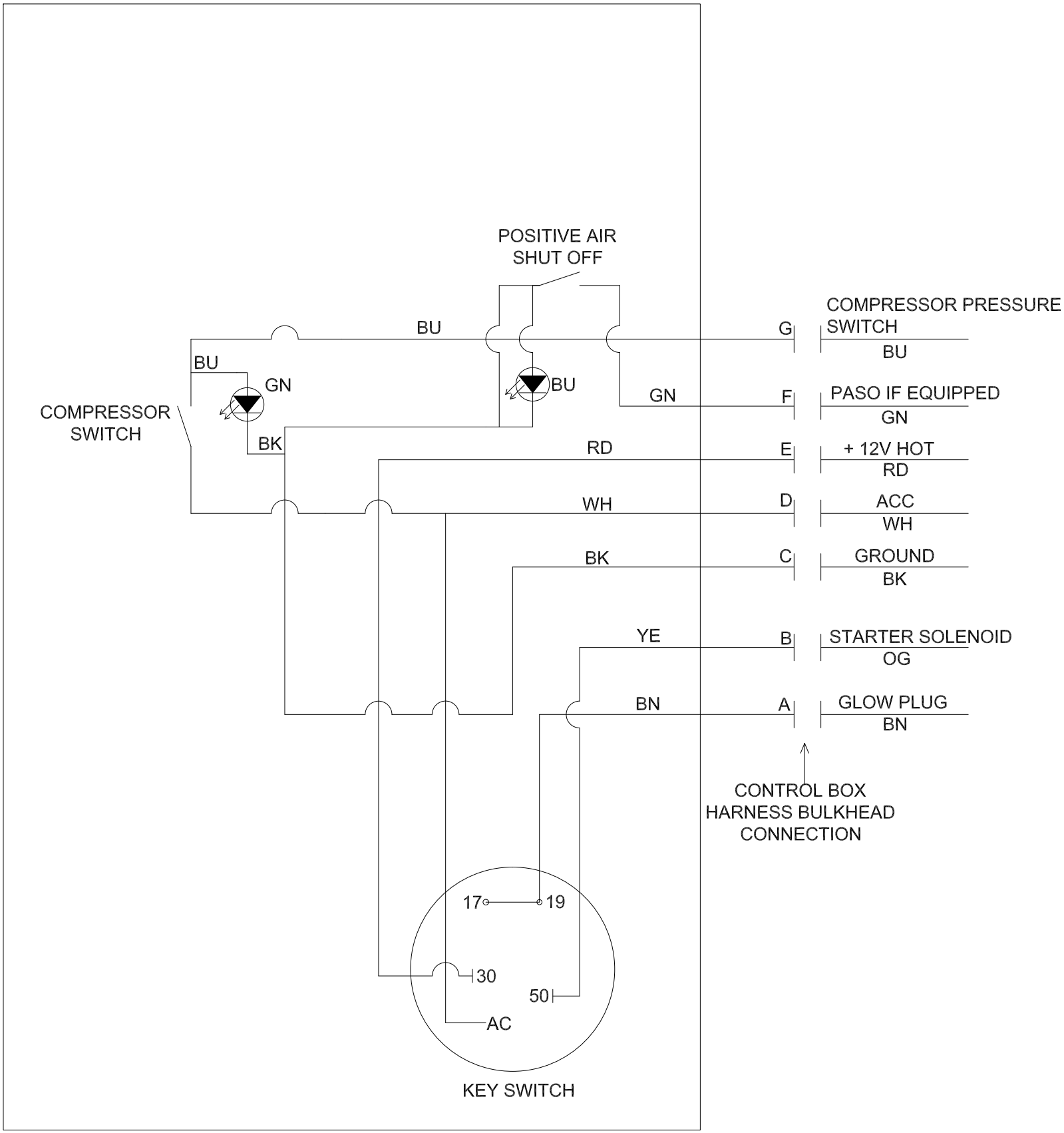
TWISTER
AUTOSTART CONTROL PANEL
MOUNTING TEMPLATE - ALL DIESEL UNITS



#4801-01

01/17

TWISTER - ALL DIESEL UNITS
CONTROL BOX DIAGRAM WITH PASO



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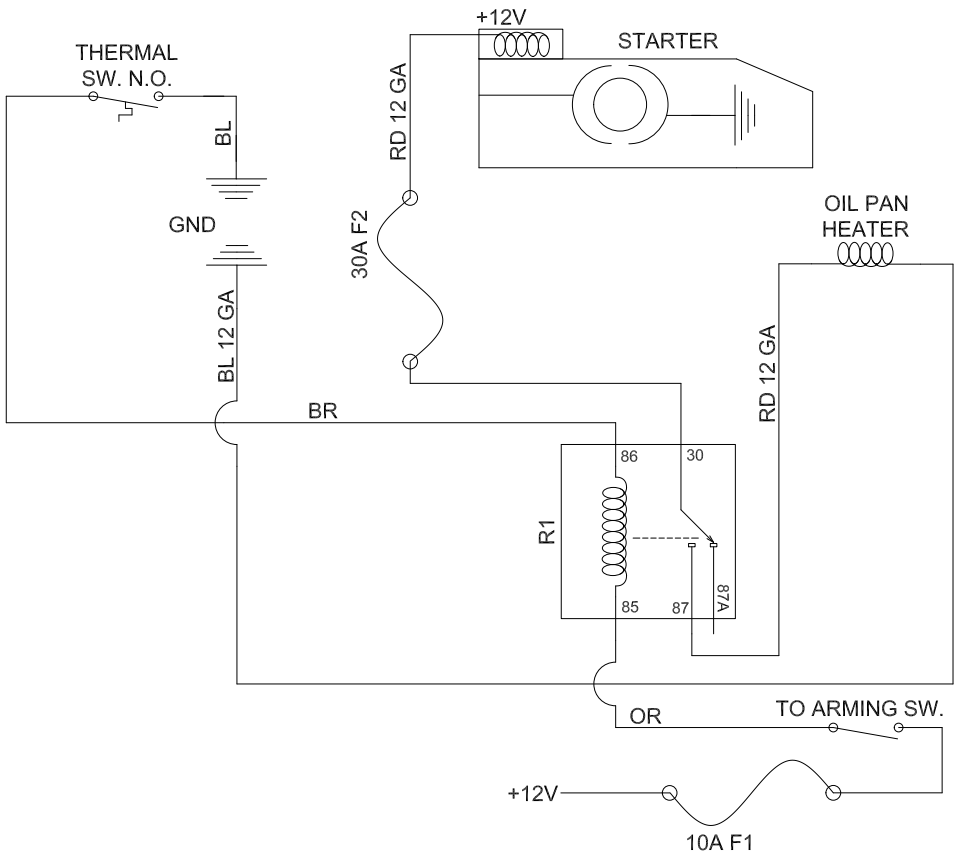
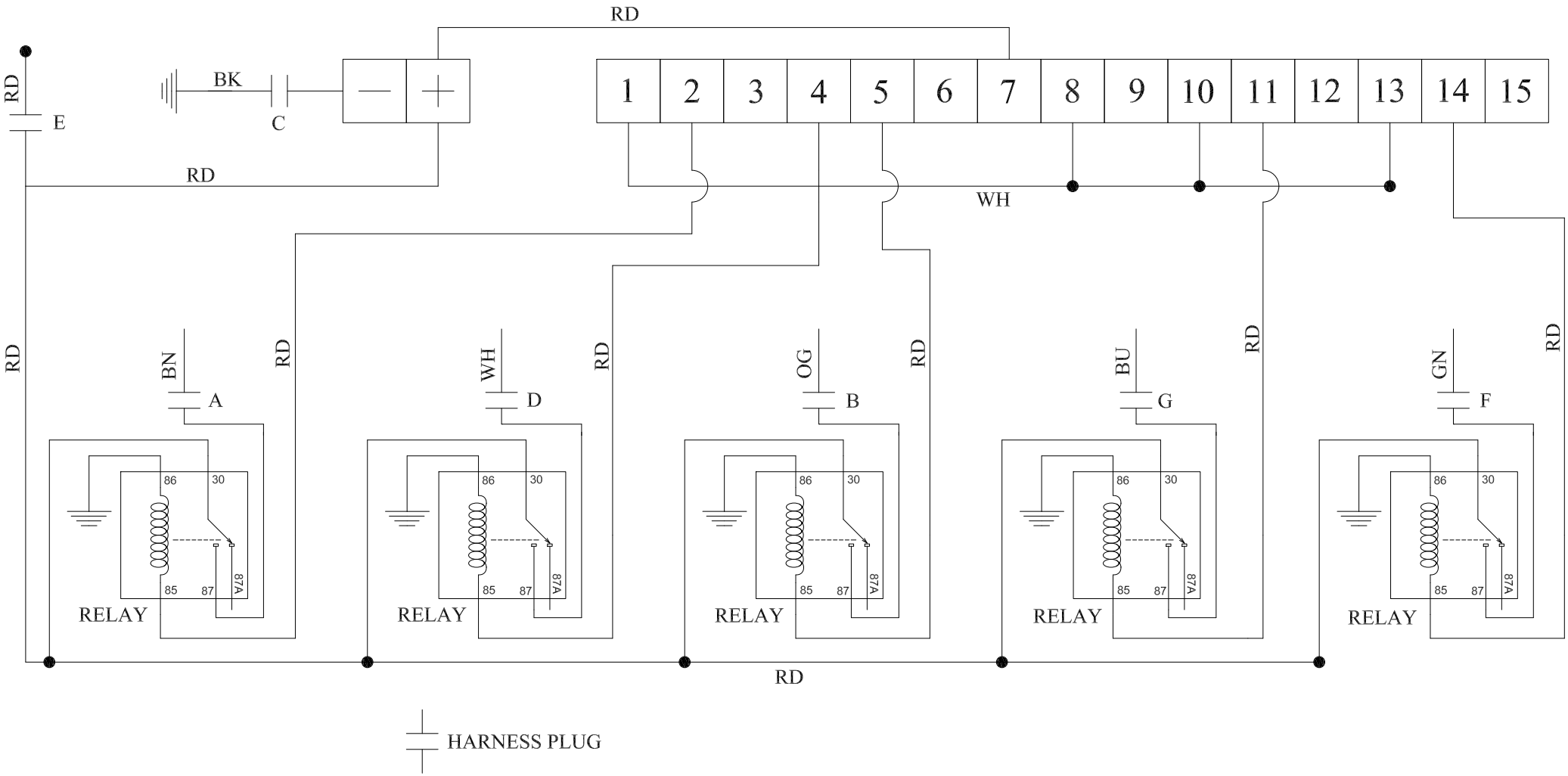
04/14

TWISTER - ALL UNITS
12V OIL PAN HEATER



TWISTER
ASSEMBLY RELAYS - RADIO REMOTE



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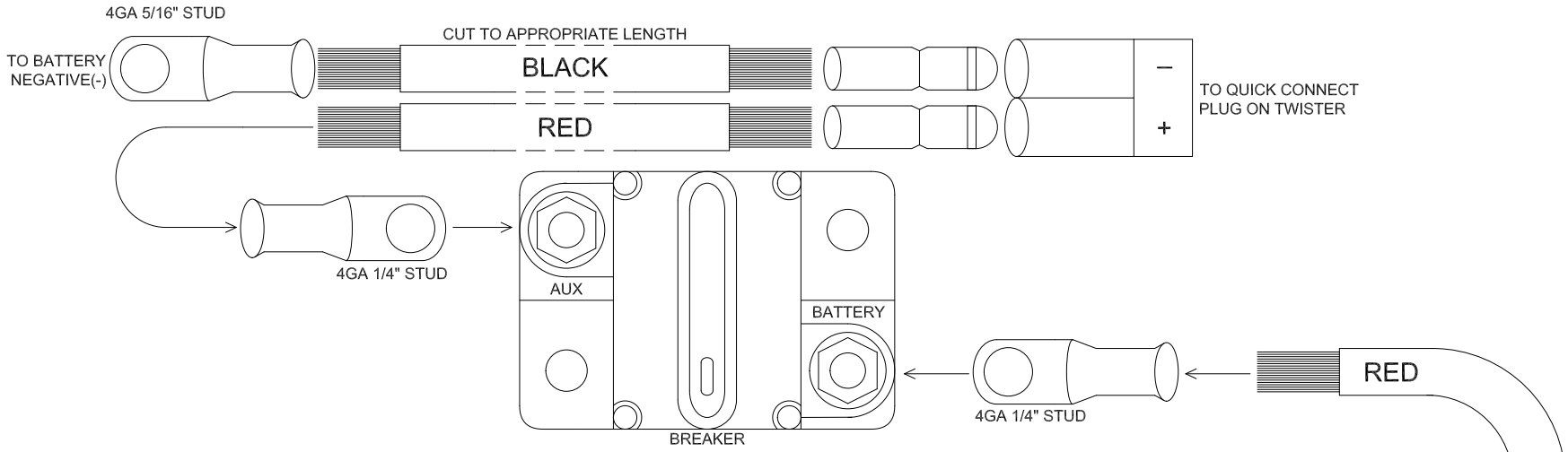
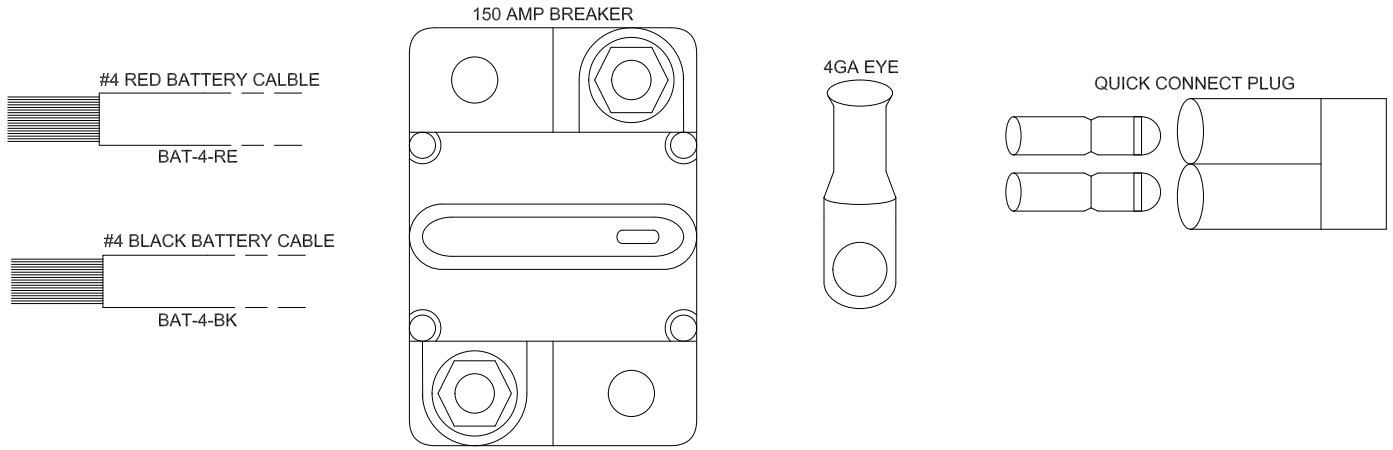
04/14

TWISTER
ELECTRICAL TIE-IN KIT



CABLES NOT INCLUDED
ORDER AS REQUIRED

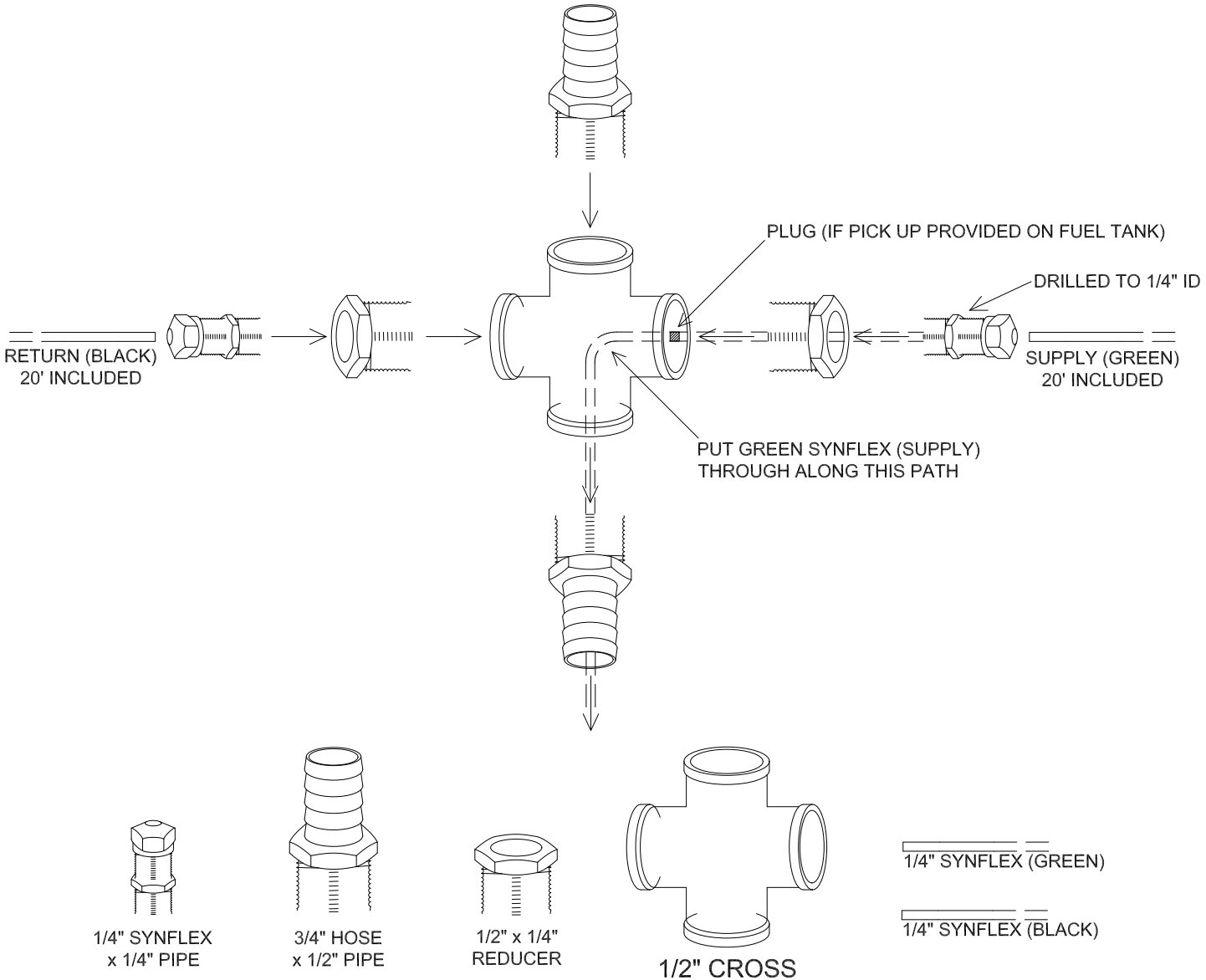


CRIMP AND SOLDER ALL CONNECTIONS

#4032-01

04/14

TWISTER
FUEL TIE-IN KIT



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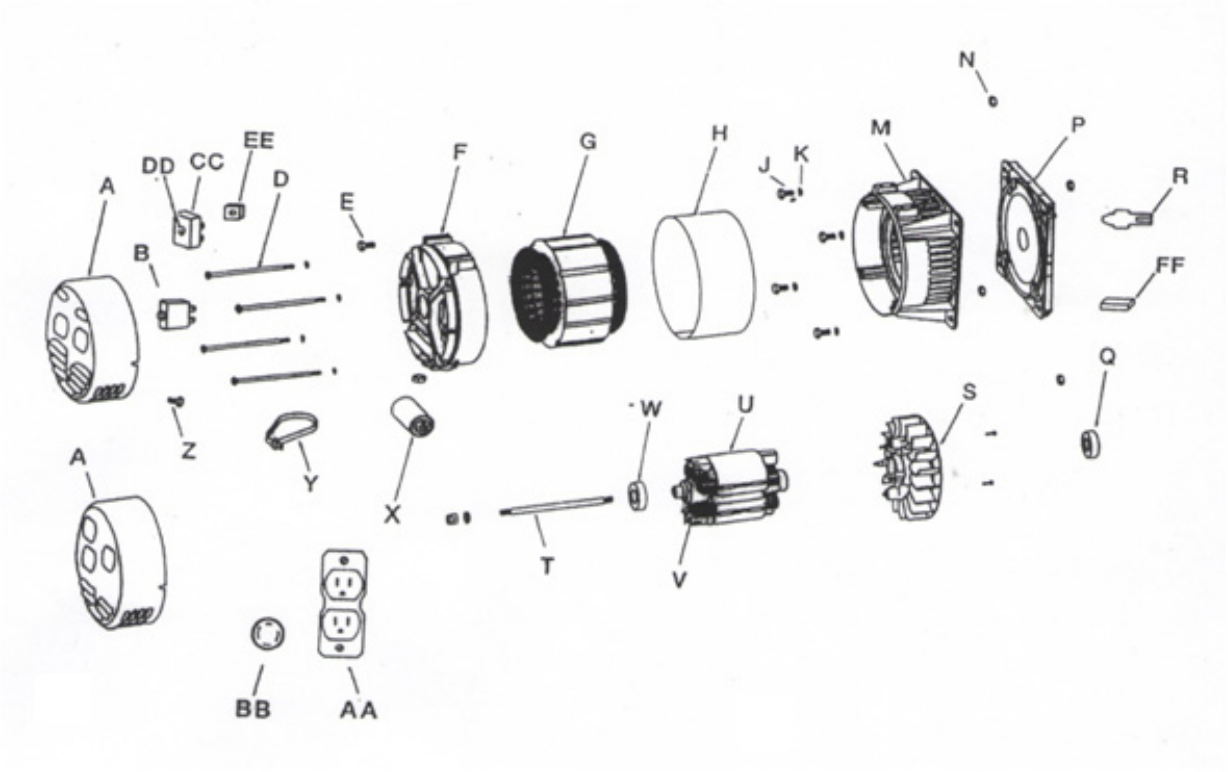
04/14

AIRWORKS COMPRESSORS & MOBILE EQUIPMENT CORP.

TWISTER

PARTS EXPLOSION - B6K GENERATOR



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T	ROTOR SCREW
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W	BALL BEARING 40MM
X	CAPACITOR 20MF
Y	TY RAP
Z	5/16 SQUARE NUT
AA	DUPLEX RECEPTACLE 125V
BB	TYL RECEPTACLE 20A
CC	DELAY TIMER
DD	SCREW
EE	NUT
FF	KEY

#4031

12/11