

SET UP SHEET FOR THE CrystalBlast Navigator 72

The standard nozzle size for the CrystalBlast Sandcarving line of equipment is 3/32" using 6 cfm @ 35 psi blasting pressure. This will produce the finest film detail using 180 mesh abrasive with the proper film thickness.

If the machine is listed for use with the larger 1/8" nozzle, less blasting pressure will be required to maintain the same film detail.

The larger the nozzle, worn out 3/32" is larger, the more abrasive delivered and the more often you cycle the dust collector cleaning cycle.

The Navigator 72 is standard with 440 sq.ft. dust collector and a 75% machine duty cycle using the 3/32" nozzle, optional automatic dust collector cleaning features are available to help keep the dust collector cfm flowing.



Please read this sheet before operation of the machine. This single sheet will help you to understand proper setup for the machine and any special items making sure the machine operates properly. Use the machine manual for proper adjustment, operation and service of the machine.

After the machine crate has been removed and the machine has been placed in its user location, a forklift using the fork lifting channels will be required to move the machine into user location, allow for placement of the two machine parts consisting of the cabinet with attached dust collector and the abrasive pressure generator..

Make sure you have enough compressed air volume for the blasting pressure you will be using. The 3/32" nozzle inside the Navigator 72 consumes 7 cfm @ 40 psi blasting pressure. Media Blast advises doubling this volume of compressed air to allow for nozzle wear that demands more compressed air volume. Look for a compressor indicating at least 14 cfm delivery at 90-100 psi. Never use the displacement cfm listed on the compressor, this number has zero pressure inside the compressor tank and you will quickly see the cfm number at 90 to 100 psi is less. Unless you maintain 90-100 psi it is possible the machine air controls will not function properly for the standard vibrator cleaning cycle and or the on-off abrasive flow control valve.

Place the main cabinet allowing 8 feet on each side of the unit for part loading and unloading.

- 1. Install an ambient dryer on the machine air inlet or wall if the machine will be use more than one hour per day. The Navigator 72 is designed to be a 75% machine duty cycle using the standard 3/32" sandcarving nozzle. Using a larger nozzle will require cleaning the dust collector more often and produce less part detail unless you lower the blasting pressure. The 75% duty cycle relates to about 6 hours of daily sandcarving, optional automatic cleaning cycles are available to help keep the collector clean.
- 2. Make sure to check any hard line air compressor supply lines for restrictions in the form of undersized plumbing fitting, tee fittings or small undersized air controls that might be located on the compressor. This is very important for larger nozzle use.
- 3. Insure the air is cool, dry and moisture free. If the compressor is marginal in cfm volume or close to the cabinet, the air will transfer to the cabinet hot passing through the air filter/regulator and moisture will be created inside the cabinet, abrasive will then stop flowing. A larger compressor volume equals cooler compressed air and a longer lasting air compressor. 16 to 18 cfm is a good match for the Navigator with its daily usage. This volume increases as the nozzle size increases decreasing daily duty cycle hours.
- 4. The Navigator 72 does not include a main air shut-off valve before the air inlet into the machine pressure generator; Install a lockable main machine shut off valve before the air inlet for machine service.
- 5. Make sure the line pressure into the Navigator does not exceed 125 psi. It is possible to damage some controls with excessive line pressure. Pressure Relief valve, if equipped, will be set at 125 psi.
- 6. All blasting cabinets require a negative pressure inside the cabinet. The Navigator 72 uses a 440 sq.ft. filter cartridge, cyclone separator reclaimer good to 220 mesh and larger, 1100 cfm Radial Pressure Blower with a running cfm of 600 to 700 cfm.
- 7. The compressed air supply line for the Navigator 72 should be 1/2"" ID hose using free flow hose barb fittings. Never use 1/4" yellow spiral hose or quick disconnect fittings on a machine with pneumatic vibrator cleaning cycle.
- 8. The Navigator 72 is a high voltage single power source machine. You have indicated the power voltage input; check the machine serial number tag for required power input to the equipment. This will be a hard-line power input and require blower rotation check after installation.
- 9. Keeping the dust collector clean is key to proper operation of the Navigator 72. If you are using a larger nozzle size (1/8") it will delivery twice as much abrasive in pounds per minute as the standard 3/32" nozzle. This means you want to clean the dust collector more often, twice as often, to maintain proper airflow. Exceeding the machine daily duty cycle and increasing the daily cleaning cycles can increase the machine daily recommended operation.