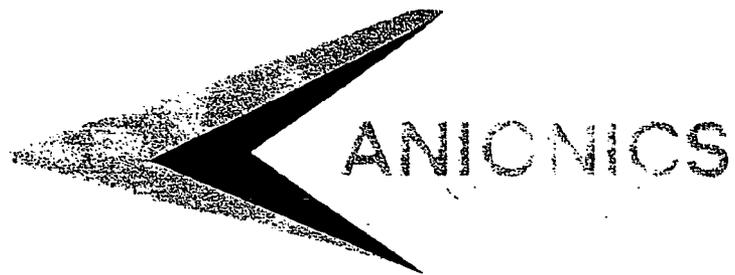


QUALITY

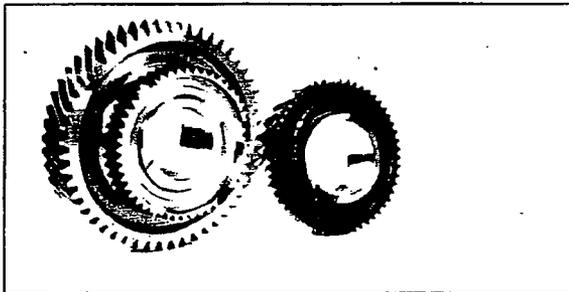
SERVICE

RELIABILITY

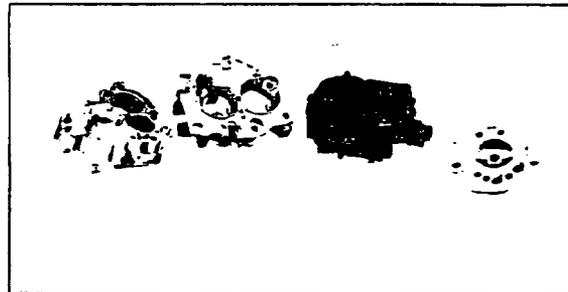


## SPECIALTY PROCESSING

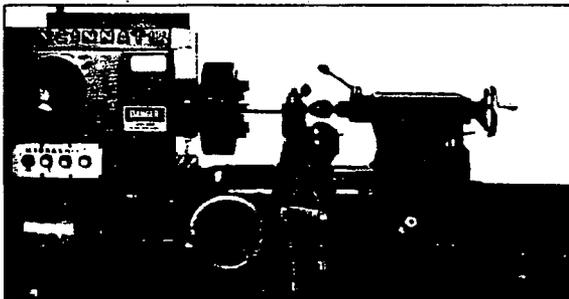
**ELECTRON BEAM  
WELDING**



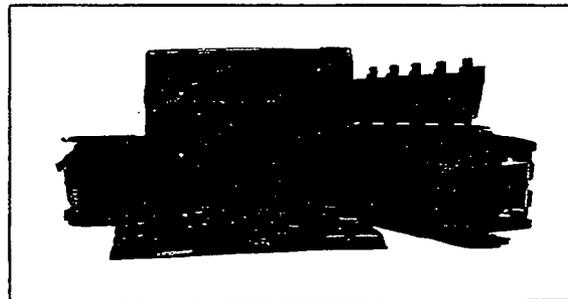
**VACUUM  
IMPREGNATION**



**SPECIAL MACHINING**



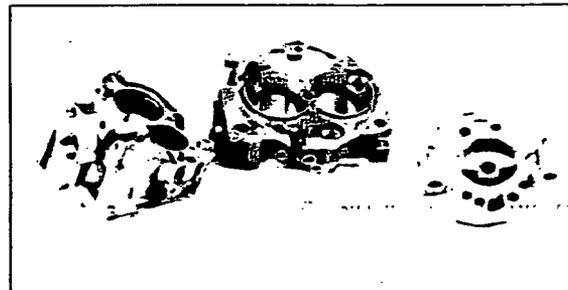
**PLASTIC DUNNAGE  
WASHING**

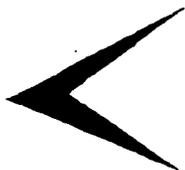


**LIGHT MACHINING &  
ASSEMBLY**



**HAND DEBURR**





OFFERS THE FOLLOWING  
SPECIALTY PROCESSING  
SERVICES:

### **ELECTRON BEAM WELDING**

- HAMILTON STANDARD MODEL EBW 626264  
7.5 KW OUTPUT 150 KV 50 MILLIAMPS  
CHAMBER 5' HIGH x 5' DEEP x 8' LONG
- EXTREMELY LOW HEAT DISTORTION
- NO CONTAMINATION OR OXIDATION SINCE  
WELDING IS CARRIED OUT IN A HARD  
VACUUM
- ABILITY TO JOIN METALS VARYING IN  
THICKNESS FROM THOUSANDTHS OF AN  
INCH TO THREE INCHES
- ABILITY TO WELD MANY DISSIMILAR METAL  
COMBINATIONS RANGING FROM 1%  
CARBON STEELS TO MANY NONFERROUS  
MATERIALS

### **SPECIAL MACHINING**

- MACHINING FACILITIES INCLUDE LATHES,  
MILLS, SURFACE GRINDING AND DRILLING  
EQUIPMENT (SEE FACILITIES LIST)
- WE SPECIALIZE IN LOW VOLUME WITH  
TOLERANCES TO .0002"
- COMPLETE QUALITY AND INSPECTION  
CAPABILITIES (SEE FACILITIES LIST)
- ALL TYPES OF METALS AND MATERIALS
- CERTIFIED U.S. GOVERNMENT/MILITARY  
SUBCONTRACTOR

### **LIGHT MACHINING & ASSEMBLY**

- WE CAN MACHINE AND ASSEMBLE PER  
YOUR SPECIFICATION
- LARGE AND SMALL QUANTITIES
- COMPLETELY FLEXIBLE PROCESSING

### **VACUUM IMPREGNATION**

- CERTIFIED USER OF LOCTITE  
CORPORATION ANAEROBIC RESIN  
PRODUCTS
- SEALS POROSITY IN ALL TYPES OF METAL  
CASTINGS AS WELL AS POWDERED METAL
- ABILITY TO IMPREGNATE CASTINGS  
BEFORE OR AFTER MACHINING
- LARGE AND SMALL BATCH SIZES
- PART SIZE FROM A FRACTION OF A CUBIC  
INCH UP TO A MAXIMUM OF 2.4 CUBIC FEET
- ALSO SEALS ELECTRICAL AND ELECTRONIC  
COMPONENTS, WELDMENTS, FIBERGLASS,  
COMPOSITES AND CERAMICS

### **PLASTIC DUNNAGE WASHING**

- WE SPECIALIZE IN WASHING ALL TYPES AND  
SIZES OF PLASTIC TRAYS, TOTES, SKIDS  
AND DIVIDERS
- HIGH PRESSURE/TEMPERATURE WASH (1500  
PSI/500 DEGREES)
- HIGH PRESSURE RINSE AND AIR BLOWOFF  
WITH BATCH DRYING
- SYSTEM IS COMPLETELY FLEXIBLE TO MEET  
YOUR QUALITY AND QUANTITY  
REQUIREMENTS

### **HAND DEBURR**

- WE SPECIALIZE IN ALL TYPES AND SIZES OF  
CASTINGS AND FORGINGS
- NO JOB IS TOO BIG OR TOO SMALL
- LARGE AND SMALL QUANTITIES



**ANIONICS**  
INCORPORATED

**SPECIALTY PROCESSING**

## **PLASTIC DUNNAGE WASHING**

Over the last few years, many large manufacturing companies have switched from using cardboard dunnage to plastic dunnage for cost and environmental reasons. The costs of cardboard and landfill disposal have risen dramatically. Permanent plastic dunnage has been industry's answer to these increased costs. Molded plastic trays and totes made of high impact, temperature resistant plastics have proven to be nearly indestructible in normal plant use. The longlasting capability of the plastic has led to significant cost reductions in the non-value added function of material handling. In the future, more and more companies will implement plastic dunnage programs as they try to control costs and compete in the world marketplace.

A major characteristic of plastic dunnage often overlooked by material handling planners is that the plastic becomes contaminated with oils, chips and plain dirt after repeated plant use. Do your customers often comment that the quality of your product is excellent but then complain that the parts arrived contaminated from oil or grease from your dunnage? How about in-process dunnage? Would you want your customer to see his or her product being transported through your process on contaminated trays? At best, contaminated dunnage may be costing you money for extra cleaning steps or rework. At worst, you may lose an existing or potential customer because of contamination.

**Anionics** has the answer to your contamination problem. We offer a complete **Plastic Dunnage Washing** service featuring a high volume but flexible washing system designed to meet your toughest cleaning problems. Listed below are some of the advantages we offer:

- **Cost Effective.** The highly automated system gives us a cost advantage over other more labor intensive washing processes. We pass this savings along to you in the form of low unit costs.
- **Quality.** The automated fast rack washing machine provides for a consistent wash every time. Parameters are monitored to ensure that the wash process is in control.
- **Flexibility.** The controls are variable. We can design and implement a washing program to meet your specific needs.
- **Service.** We provide rapid turnaround times so your dunnage inventory is clean and in constant use, not sitting in a warehouse waiting for wash.

Let **Anionics** help you satisfy your final or in-plant customers with clean plastic dunnage washed by our automated process. Give us a call today at **(315) 736-0891**.



## VACUUM IMPREGNATION

Vacuum Impregnation is a process used to seal porosity in many materials and products ranging from aluminum die castings to powder metal and electrical components. The sealant we use in the process is an anaerobic resin developed and manufactured by Loctite Corporation. In the vacuum impregnation process, porous parts are placed inside a vacuum chamber containing the anaerobic resin. As air is pumped from the chamber, the resin is drawn into the porosity in the parts. The anaerobic characteristic causes the resin to cure at room temperature in the absence of air. Some of the major advantages of Vacuum Impregnation using Loctite anaerobic resin are:

- The cured resin resists all types of solvents.
- Capability of operating at temperatures up to 400 degrees Fahrenheit.
- No bleedout of resin since cure is anaerobic rather than heat activated.
- Parts can be impregnated before or after machining or finishing operations.
- Cured sealant is compatible with surface treatments such as plating or painting.
- Sealing of porosity extends tool life in machining operations.
- Cost effective - Saves money since scrap costs are significantly reduced.

Listed below are some of the applications where Vacuum Impregnation using Loctite anaerobic resin has proven beneficial to industry:

- Die Castings (Aluminum, Magnesium, Zinc)
- Plastics & Ceramics
- Forgings, Sand Castings
- Electrical Parts (Housings, Stators)
- Powder Metal
- Electronic Components (Coils, PCB's)

**ANIONICS** has been an authorized Loctite user for nearly 20 years. We offer quality Vacuum Impregnation service at a very competitive cost with rapid turnaround times. Contact us today at **(315) 736-0891**. Let us help you develop and implement cost-effective solutions to your sealing problems.



## ***ELECTRON BEAM WELDING***

### ***SUCCESSFULLY COMPLETED PROJECTS***

- **Steam Turbine Diaphragm**

Material: 410 Stainless Steel to Carbon Steel, 347 Stainless Steel  
Size: 18" To 61" Diameter  
Weight: Up to 1200 Pounds  
Penetration: 1/4" Up to 2"  
Inspection: Radiographic, Ultrasonic, Visual

- **Nuclear Warhead Casings**

Material: Titanium 6AL4V  
Size: 19" Diameter X 24" Long  
Penetration: 1/3" and 5/8"  
Inspection: Radiographic

- **Superconducting Motors & Generator Assemblies**

Material: Tri-metal - Copper, Nickel, Steel  
Size: 12" to 36" Diameter  
Penetration: 1/8" to 7/8"  
Inspection: Ultrasonic, Visual

- **Diaphragm Coupling Assemblies**

Material: 4140  
Size: 6" to 40"  
Penetration: 1/4" to 1"  
Inspection: Radiographic, Ultrasonic, Visual

- **Vibration & Fatigue Test Fixture For Space Environment Testing**

Material: 6061 Aluminum  
Size: Envelope 20" X 36"  
Penetration: 1/2", 1" and 2"  
Inspection: Visual



## **ELECTRON BEAM WELDING**

### **SUCCESSFULLY COMPLETED PROJECTS**

- Automotive Transmission Gears

Material: Steel  
Size: 7 1/2" Diameter  
Penetration: 1/4" Up to 3/8"  
Inspection: Radiographic, Ultrasonic, Visual

- Lever Arm Assemblies

Material: 4140 Cast  
Size: 1" Diameter  
Penetration: .050" to .070"  
Inspection: Visual

- Leaf Contact Assemblies

Material: Bi-Metal, Copper, Nickel  
Size: 6" W X 2" D X 3' L  
Penetration: .880"  
Inspection: Visual, Continuity Test

- Contact Plates

Material: Bi-Metal, Copper, Nickel  
Size: 8" W X 3" D X 24" Long  
Penetration: 1"  
Inspection: Visual

- Steel Drive Shafts

Material: Steel  
Size: 1 1/2" Diameter  
Penetration: .050"  
Inspection: Visual



## **ELECTRON BEAM WELDING**

Electron Beam Welding is used to join metals varying in thickness from a few thousandths of an inch to three inches, to weld many dissimilar metal combinations and to join normally unweldable metals ranging from 1% carbon steels to many non-ferrous materials. Welding is carried out under a hard vacuum so that no contamination of the welded material or oxidation of the part occurs. This advantage coupled with the high welding speed and precise control of heat input results in weld joints generally as strong as the base material. Distortion during welding is minimal so that the weld may often be used to assemble a finished product without subsequent machining. Listed below are some of the many different metals joined by Electron Beam Welding:

Aluminum Alloy	Incoloy	Nickel
Beryllium	Inconel	Silver
Carbon Steel	Invar	Stainless Steel
Columbium	Kovar	Titanium
Copper	Low Carbon Steel	Titanium Alloy
Gold	Magnesium	Tool Steel
Hastelloy	Molybdenum	Tungsten
Haynes Stellite	Monel	Zirconium

Our large vacuum chamber (5' High X 5' Deep X 8' Long) can handle a wide array of part sizes and weights. Our Hamilton Standard EB Welder uses 7.5 KW and is capable of penetrating up to three inches deep. The following fixtures are available to position parts for welding:

- Rotary Fixture:** This variable speed fixture is used for welds in either the vertical or horizontal planes. It can be adjusted for welds up to 30 degrees.
- 12 Position Rotary Fixture:** This twelve spindle fixture has the capability for welds in the vertical and horizontal planes, for angular adjustments and each position can be indexed. Speed is variable.
- Regular Table:** This variable speed fixture consists of a 30 inch square table for linear welds. The other fixtures are mounted on this basic table. Table movement is externally controlled.

We have the capability to custom design and build fixtures and adaptors for your specific application. Whether your application is for Research and Development, Prototypes or Production, we at **Anionics** are ready to satisfy your welding needs. Please give us a call today at **(315) 736-0891**.

**QUALITY**

**SERVICE**

**RELIABILITY**

**INSPECTION  
EQUIPMENT**

- 18" X 24" GRANITE SURFACE PLATE  
FEDERAL GGG-P-463, GRADE A
- FOWLER 12" HEIGHT TRANSFER  
MICROMETER
- VERNIERS AND MICROMETERS:  
HEIGHT GAGE, HELIOS 20.5"  
HEIGHT GAGE, B & S 12"  
DIAL INDICATOR, FEDERAL .0001  
DIAL INDICATOR, FOWLER .0001  
DIAL INDICATOR, B & S .0001  
DIAL INDICATOR, FOWLER .0005  
DIAL MICROMETER, MITUTOYO .0001  
1" MICROMETER, MITUTOYO .0001  
1" MICROMETER, FOWLER .0001  
2" MICROMETER, FOWLER .0001  
3" - 4" MICROMETER, LUFKIN .0001  
4" - 5" MICROMETER, B & S .001  
5" - 8" MICROMETER, B & S .001  
12" HEIGHT MICROMETER, FOWLER  
6" DIAL CALIPER, STARRETT .001  
6" CALIPER, CRAFTSMAN .001  
13" CALIPER, HELIOS .001  
1" DIAL DEPTH GAGE, STARRETT .001  
TELESCOPING GAGE, STARRETT  
5/16" - 6"

- SURFACE PLATE, GRANETETT 18" X 24"
- GAGE BLOCKS, HULTGREN .10025" - 4"  
(84 PCS)
- GAGE BLOCKS, HULTGREN .010" - .090"  
(28 PCS)
- V-BLOCKS, FOWLER 90 X 70 X 125

**LABORATORY  
EQUIPMENT**

- OHAUS BALANCE
- LABORATORY OVEN, GAB-HEET
- CONSTANT TEMPERATURE BATH

**BUILDING**

- 5000 SQ. FT PROCESSING AREA
- 700 SQ. FT. ENGINEERING/QUALITY AREA
- 700 SQ. FT. ADMINISTRATION AREA



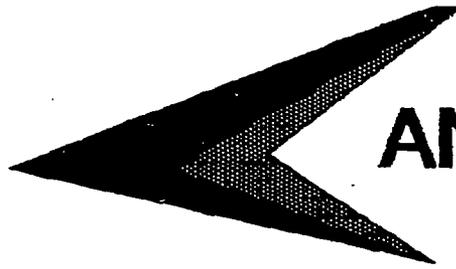
**SPECIALTY PROCESSING**

ONEIDA COUNTY INDUSTRIAL  
PARK  
P.O. BOX V  
ORISKANY, N.Y. 13424  
PHONE (315) 736-0891

**QUALITY**

**SERVICE**

**RELIABILITY**



**ANIONICS**  
INCORPORATED

**SPECIALTY PROCESSING**

**FACILITIES  
LIST**

**ELECTRON BEAM  
WELDING**

- HAMILTON STANDARD 7.5 KW WORK CHAMBER 5' HIGH X 5' DEEP X 8' LONG, MODEL 625284

**SPECIAL MACHINING**

- 18" CINCINNATI LATHE
- 13" SHELDON LATHE
- HARDINGE CHUCKER MODEL HC
- KONDIA VERTICAL MILLS (2) MACHINES
- KEMP SMITH HAND MILLS
- 6" X 18" SURFACE GRINDER
- BURGMASER DRILLING EQUIPMENT MODEL 0B
- DOALL 14" BAND SAW
- PEERLESS POWER HACKSAW

**VACUUM  
IMPREGNATION**

- LOCTITE VACUUM IMPREGNATION SYSTEM, MODEL 2412
- LOCTITE VACUUM IMPREGNATION SYSTEM, MODEL 3618V
- LOCTITE VACUUM IMPREGNATION SYSTEM, MODEL 3830V

**PLASTIC DUNNAGE  
WASHING**

- CUSTOM DESIGNED TRAY WASHER CAN HANDLE TRAYS TO 21" X 26"
- CUSTOM DESIGNED TOTE, TUB AND LARGE TRAY WASHER CAN HANDLE UNITS TO 54" X 86"
- CUSTOM DESIGNED DRYING FACILITY
- FURY II PRESSURE WASHER, 1200 PSI 250 DEGREES FAHRENHEIT

*QUALITY*

*SERVICE*

*RELIABILITY*



*SPECIALTY PROCESSING*

WE ARE PLEASED TO ANNOUNCE THAT WE NOW  
HAVE FULL FAX CAPABILITY AT OUR MAIN OFFICE  
AND PLANT IN ORISKANY, N.Y. THE NUMBER IS:

**FAX (315) 736-1804**

THIS MACHINE IS CAPABLE OF RECEIVING 24 HOURS  
A DAY. PLEASE FEEL FREE TO USE THIS ADDITIONAL  
SERVICE PROVIDED BY **ANIONICS, INC.**

**ONEIDA COUNTY  
INDUSTRIAL PARK  
300 HANGAR ROAD  
ORISKANY, N.Y. 13424  
(315) 736-0891**

AT **ANIONICS** COMPLETE CUSTOMER  
INCORPORATED.

SATISFACTION IS OUR GOAL. OUR WORKING MANAGEMENT IS CONSTANTLY STRIVING TO SATISFY YOUR SPECIALTY PROCESSING NEEDS. WE STRESS CONTINUOUS IMPROVEMENT IN ALL FACETS OF OUR BUSINESS. LET OUR PROCESSING TEAM PROVIDE YOU WITH:

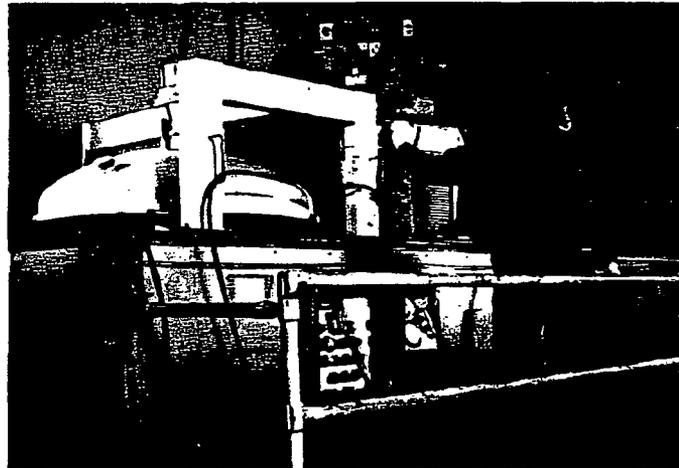
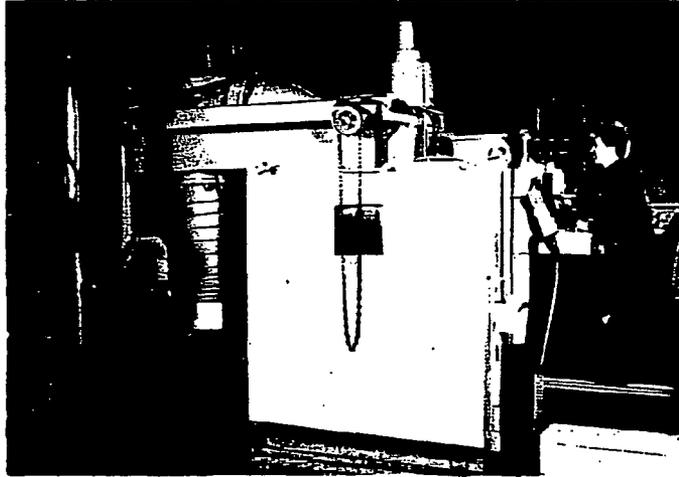
- TOTAL QUALITY: PROCESS CONTROL PLANS DESIGNED TO MEET YOUR SPECIFIC APPLICATION
- SERVICE: WE WORK WITH YOU TO DEVELOP AND IMPLEMENT SOLUTIONS TO YOUR PROCESSING PROBLEMS
- RELIABILITY: RAPID TURNAROUND TIMES TO MEET YOUR DELIVERY REQUIREMENTS
- COMPETITIVE COST



QUALITY

SERVICE

RELIABILITY



*SPECIALTY PROCESSING*

ONEIDA COUNTY  
INDUSTRIAL PARK  
P.O. BOX V  
ORISKANY, NY 13424  
PHONE (315) 736-0891