# PIONEERING FABRICATOR IN THE USA CHAMPIONS GREENCUT® PLASMA ARC FLUID FOR UNPARALLELED EFFICIENCY

# GREENCUT® ISN'T JUST A PRODUCT: IT'S A GAME-CHANGER. ENSURING EFFICIENCY. SAFETY. AND COST SAVINGS.

# **About Oregon Iron Works:**

Established as a leading structural fabricator, Oregon Iron Works is renowned for its innovative approaches in the industry. Their large CNC plasma cutting system at their Vancouver, WA facility is evidence of their commitment to top-tier manufacturing solutions.

# The Challenge:

Plasma water tables, while efficient, pose a significant challenge in terms of maintenance. Without proper care, corrosion and bacteria formation are inevitable. Additionally, the wastewater disposal from these tables has historically been both environmentally taxing and financially burdensome. Especially in regions where water disposal regulations come with substantial costs, managing these tables becomes even more daunting.

# The Experiment:

In a move to combat these challenges, Oregon Iron Works integrated the GreenCut Plasma Arc Water Table Fluid into their system in 2007. This was a part of their initiative to not only address maintenance concerns but also eliminate the pressing issue of wastewater disposal. The approach combined the company's advanced filtration and circulation system with the efficiency of LubeCorp's GreenCut Plasma.

# The Outcome with GreenCut® Plasma Arc Water Table Fluid:

The results of this integration surpassed expectations. For over eight consecutive years, despite an operation schedule spanning 1 to 2 shifts across five days a week, **Oregon Iron Works eliminated the need for wastewater disposal from their plasma table entirely.** With the power of GreenCut Plasma, they successfully addressed corrosion, bacteria, and foam, showcasing a sustainable and cost-effective approach to CNC plasma cutting systems.





# ELIMINATE WASTE WATER DISPOSAL WITH GREENCUT PLASMA

1

# **CNC Plasma Cutting System with Water Table**



2

### **GreenCut Plasma**

- · Prevents corrosion, bacteria, foam, hot-spotting
- Provides excellent lubrication
- · Mix 20:1 with tap water
- SAFE & Non-toxic



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### Circulation

- · Use pump appropriate to the table size
- · Have 1 inlet and multiple outlets along sides of the table
- · Adjust flow to circulate the table 1x per 2 hours



4

# **Filtration**

- · Use filter housing of appropriate size
- · Use single or 2-stage filtration
  - 1 bag@25 microns; & to achieve best results 1 bag@5 microns
- Change filter bag as needed typically 1x per week or once pressure differential of 15 psi is reached
- Wooden slats generate more charcoal and filters require more frequent changes. Plastic slats are recommended to reduce filter replacement frequency



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### pH Maintenance

- Use regular pH strips—make sure they are not past the expiry date
- Check pH 1x or 2x per week to make sure it is between 9 10
- Adjust pH to 9 10 with fresh GreenCut Plasma Water will evaporate quickly from your table; keep adding water to keep appropriate level; add GreenCut Plasma when pH below 9

