



- Generate disinfection chemicals on-site, on-demand
- Achieve higher efficacy with MIOX technology
- Environmentally friendly at lower cost



TECHNOLOGY LEADER

MIOX has invested more than 18 years in research and development to provide the most cutting edge on-site generation technologies and chemistries. MIOX continues to set high standards by bringing customers innovative products and customized chemistries.

CUSTOMIZED CHEMISTRIES

HYP0	HYPOCHLORITE
M05	HYP0 + PEROXIDE
IA0	ADVANCED OXIDATION
EQUAT	ELECTROLYZED QUAT

LOWEST COST HIGH PERFORMANCE

We are the lowest cost chemistry. Period.

- LOWEST COST VS. BULK CHEMICAL
- IMPROVE EFFICIENCY
- REDUCE OPERATING COSTS

75%
REDUCTION IN
CHEMICAL COSTS

ENVIRONMENTALLY FRIENDLY

80%
REDUCTION IN
CARBON FOOTPRINT

On-site generation reduces chemical transportation to your facility which saves you money while you do your part to save the planet.

ON-SITE CHEMICAL GENERATORS



	RIO ZUNI	AE SERIES	VAULT	RIO	RIO GRANDE
COOLING TOWERS	50 TONS				200,000 GPM
POTABLE WATER	200 PEOPLE				10 MILLION PEOPLE
WASTE WATER	1,000 GALLONS				100 MGD
FOOD & BEVERAGE	1 LINE				10 LINE PLANT
STATIC WATER	10,000 GALLONS				5 MILLION GALLONS
PRODUCED WATER					6 MGD
FRAC/FLOOD WATER					>100 BARRELS/MINUTE
SCALE	1 LB/DAY	FROM 1 → 3,000+LBS/DAY			3,000+ LBS/DAY
CAPACITY	10,000 GALLONS/DAY	FROM 10,000 → 100M+GALLONS/DAY			100,000,000+ GALLONS/DAY

MOBILE SOLUTIONS



BLACKWATER

SKID-MOUNTED SYSTEMS



VAULT

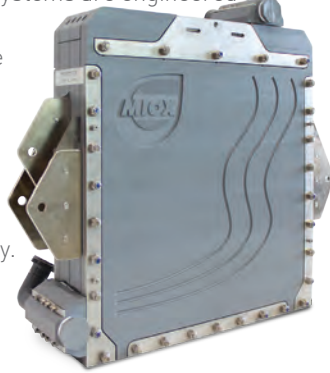


ON-DEMAND CHEMISTRY

MIOX offers two different types of on-site chemical generators. Our sodium hypochlorite (HYPO) systems are engineered to provide the absolute lowest cost and most reliable bleach available on the market. In contrast, our Mixed Oxidant Solution (MOS) systems are engineered for maximum disinfection efficacy through proprietary cell design, control of power and cell geometry.

HYP0 HYPOCHLORITE

MOS HYP0 + PEROXIDE



MIOX electrolytic cell capable of producing 200 gal/day HYP0 or 120 gal/day MOS

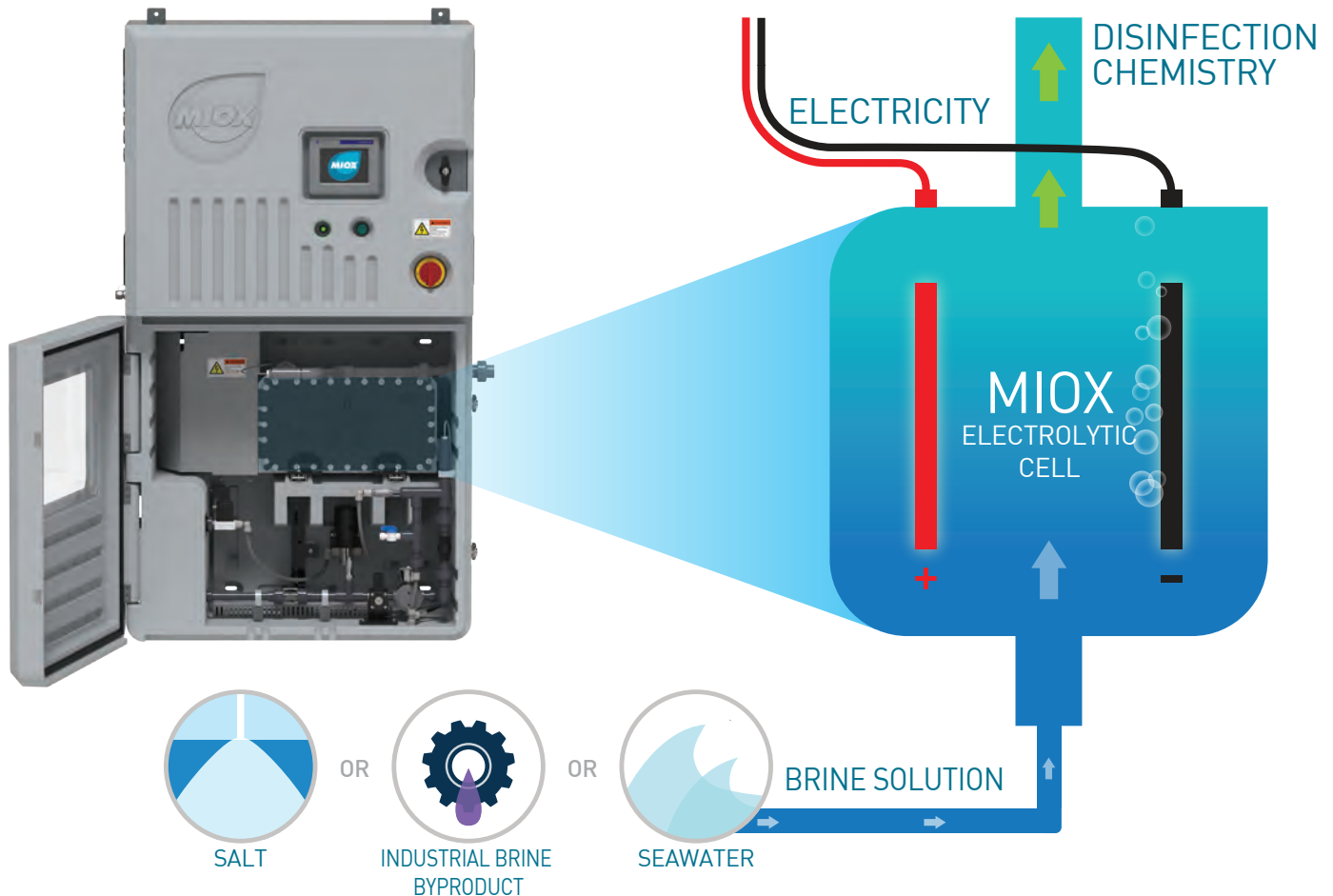
SYSTEM RELIABILITY, BUILT FROM THE START

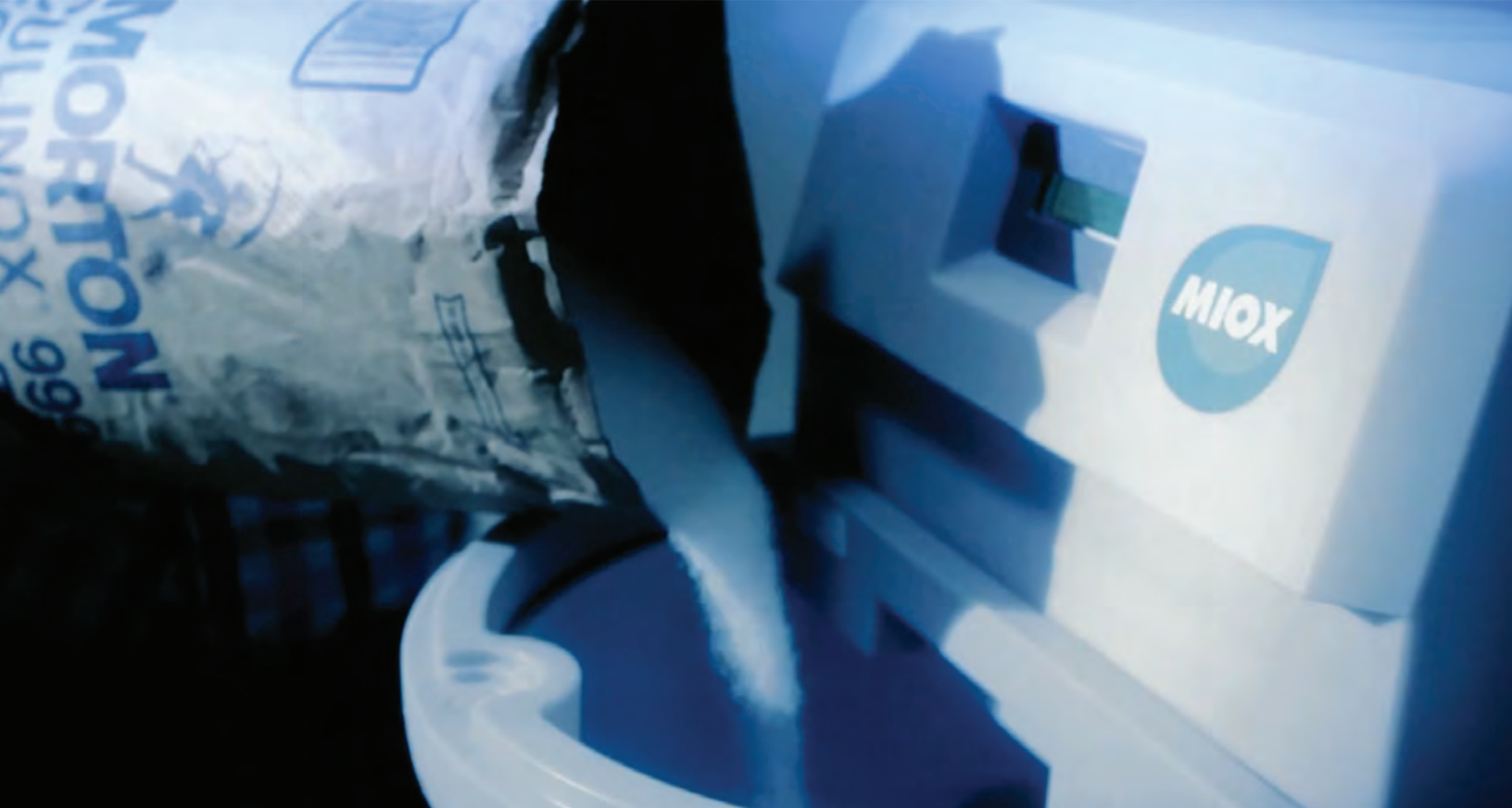
Pretreatment starts with hardness removal and filtration. High grade salt.

- Automated flush cycle – removes impurities
- Automatic self cleaning – patented reverse polarity on electrodes
- Maximum electrode life with proprietary titanium and low current design
- Only moving parts are the solenoids, blower, brine and booster pumps
- Corrosion-resistant HDPE cabinets
- Larger units with Allen Bradley MicroLogix 1200 controls
- Manufacturer warranty and performance guarantee
- Remote monitoring capability
- 20+ years of experience, continuous engineering and R&D

MIOX ELECTROLYSIS PROCESS

The electrolytic cell of a MIOX on-site chemical generator uses salt combined with water and electricity to generate disinfectant at the point of use.





SAFE CHEMISTRY

Utilizing food grade salt, custom salt or waste brine stream and electricity, MIOX on-site chemical generators create advanced disinfectants at the point of use; eliminating the delivery, storage and handling of hazardous chemicals. And, there is no need for Hazmat reporting as MIOX chemistry concentrations support a safe working environment.

WATER DISINFECTION

MIOX chemistries show faster or greater log kill at equal doses on all classes of microorganisms. Including bacteria, viruses and protozoan oocysts.

BIOFILM REMOVAL

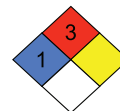
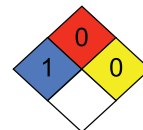
MIOX Mixed Oxidant Solution (MOS) controls biofilm growth and destroys the polysaccharide substrate. The result is fewer DBPs, reduced MIC, less bacterial contamination, reduced disinfection dosage requirements, and higher residuals to prevent recontamination.

NO HAZARDOUS BYPRODUCTS

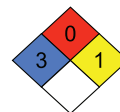
MIOX chemistries reduce and remove hazardous byproducts and contaminants from water. Superior organic material control will eliminate or reduce formations of TTHMs and HAA5.

ON-DEMAND CHEMISTRY

Produce the disinfectant you need, when and where you need it, with only salt, water and electricity. Designed to consistently handle peak demand for daily operations.



HAND SANITIZER



GLUTARALDEHYDE



SODIUM HYPOCHLORITE



OZONE



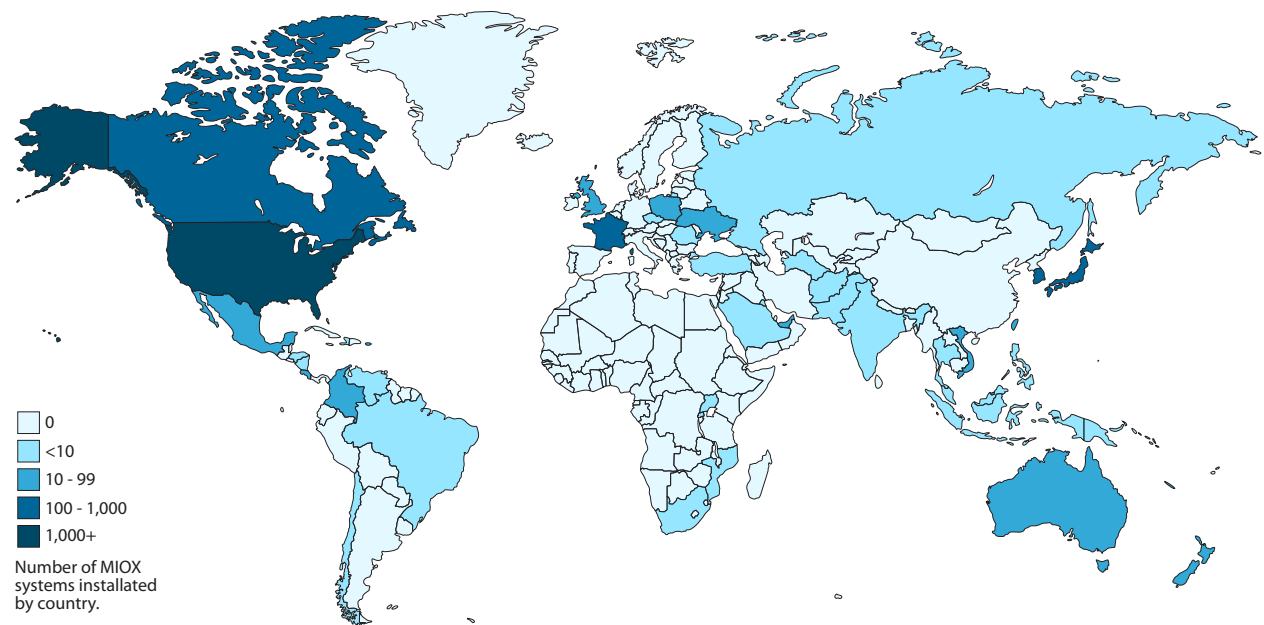
CHLORINE DIOXIDE

MIOX HISTORY

2,500+ INSTALLATIONS IN OVER 50 COUNTRIES

MIOX Mixed Oxidant Solution (MOS) was discovered by scientists at Los Alamos National Laboratory in 1982; the first patent for MIOX electrolytic technology was issued in 1988; the first field unit was installed in 1992; the company MIOX Corporation was incorporated in 1994; and the technology was developed for the US Army under a Defense Advanced Research Project Agency (DARPA) grant and commercialized in 2003 under a US Navy Small Business Innovation Research (SBIR) grant. Today MIOX holds 55 patents on electrolytic expertise with thousands of equipment installations in over 50 countries.

MIOX is part of Johnson Matthey's Water Technologies business within its New Businesses Division. www.matthey.com



CUSTOM TECHNOLOGY DEVELOPMENT

MIOX invests deeply in intellectual property and regularly partners with new industries to develop solutions that meet very unique disinfection needs. MIOX also protects several trade secrets focused on electrolytic chemistry, electrolytic cell design and control, electrolysis know-how, and on-site generation design. Most notably, in the past year MIOX has patented several novel electrolytic chemistries which have an enormous potential for making the world a better place by completely changing the way people approach disinfection.



Johnson Matthey

