# MULTIPLE HEARTH FURNACE IMPROVEMENTS

# **PROJECT DATA SHEET**



#### **EXHAUST STACKS AFTER UPGRADE**

One of these incinerators is running. Which one is it?

## **IFCO'S ROLE**

Design phase engineering assistance, equipment supplier, installation, commissioning

#### LOCATION

Eastern US

#### PROJECT DESCRIPTION

IFCO rehabbed and upgraded two of the customer's three furnaces in 1998, when the third furnace was "mothballed." In 2009, it was decided to use the furnaces' off-gasses for electrical power generation. To do this, the third furnace was needed as a "spare." The project was completed in two phases, and included upgrading the third furnace with a new flue gas recirculation system, new burners and controls, and a new EnviroCare VenturiPak scrubber. The scrubbers were also upgraded on the other two furnaces to keep them operating as state-of-the-art systems, and keep them in compliance with the new EPA Section 60, Subpart MMMM regulations. Dampers and new ductwork were also added to incorporate a new power generation plant.

#### **VALUE**

\$3 Million

## **COMPLETED**

2012

	COMPARED TO NEW REGULATIONS FOR $EXISTING$ MHFs								
	Cadmium mg/dscm	CC/CDF, TEQ mg/dscm	CO OD	HCL	Mercury Mg/dscm	NOX ppmdv	Lead mg/dscm	Particulate mg/dscm	SO2 ppmdv
ALLOWABLE LIMITS	0.095	0.032	3800	1.2	0.28	220	0.3	80	26
TEST	0.0011	0.0022	163.35	0.274	0.055	59.09	0.0025	6.31	5.50
IN COMPLIANCE?	✓	✓	✓	~	✓	✓	✓	✓	✓
COMPLIANCE % OF ALLOWABLE	1.2%	0.7%	4.3 %	22.8%	19.7%	26.9%	0.8%	7.9%	21.29