CASE STUDY
INDUSTRY: **POWER INDUSTRY**

CUSTOMER: Environmental Engineering Company*

LOCATION: Charlotte, North Carolina, USA

BACKGROUND: Armstrong International's customer is a global engineering firm intent on providing solutions to reduce harmful emissions from coal and gas fired power plants. One of their product offerings is a skid package used in direct injection selective catalytic reduction (SCR) systems. This product skid introduces a reagent into flue gas to allow greater control over NOx emissions. In fact, NOx emissions can be reduced by 30% to 50% through use of the customer's technology.

SCOPE OF WORK: Armstrong International's VERIS Flow Measurement Group supplied a quantity of 108 VERIS Verabar® flow elements to be installed in 3" (7.62 cm) diameter pipe within the customer's Ammonia Injection Grid (AIG) packages. The Verabars® were used to tune and balance the ammonia injection process and helped ensure even distribution of ammoniated flue gas to the Heat Recovery Steam Generator. The Verabars® were required to be robust enough to withstand potentially abrasive particulate and long exposure to hot flue gas.

BENEFITS: The VERIS Verabar® was selected as a replacement for the customer's legacy flow measurement system. In the past, a contractor-built custom designed flow element had been used with poor results. The old meter was an ad hoc Averaging Pitot Traverse that could not produce enough differential pressure for accurate measurement. The inadequate device was also coupled with an expensive price tag. The Verabar® was presented as an alternative with much better accuracy, a lower price point, and a lower installation cost. Overall, it was a clear advantage in terms of manufacturing quality, performance, warranty, and price. The Verabar® has been named the design standard on the customer's AIG packages.

*Armstrong International respects this customer's wishes to remain anonymous.