

TELEDYNE HASTINGS

APPLICATION NOTES

INSTRUMENTS

GOAL: Precision Control of Gases in Heat-treating Oven

SOLUTION: Teledyne Hastings Instruments HFC-203
Mass Flow Controller



A leading heat-treating oven manufacturer needed to ensure the proper atmosphere in its ovens through the precision control and mixing of specialty gases. The company selected Teledyne Hastings Mass Flow Controller, the Model HFC-203, to do the job. Not only did the product provide the necessary precision control of gases, but it also offered this manufacturer several features that proved critical to an overall successful operation. First, the company was able to configure the control valve to remain open in the event of a power

or control-signal loss, a key safety consideration. Second, the company was able to size the control valve orifice to precisely control two different gases with distinct gas densities. This was accomplished without disrupting the flawless operation of the control valves.

As a result of the Model HFC-203's outstanding performance and flexibility, the company was able to automate dual gas controls via a program logic controller. Automation of the heat-treating furnace, in general, was improved as well. The company also chose Teledyne Hastings for a solution that went beyond product. The company received excellent service through Teledyne Hastings's local representative Adelphi, Inc. as well as ongoing access to Teledyne Hastings exceptional factory technical support.