



Digital positioners even for Zone 22

Reliable control valve solutions even in dusty reconstituting processes

For many years, the Amandus Kahl company, located in Reinbek near Hamburg, has been taking advantage of the benefits of digital positioners in conjunction with sliding gate valves. Kahl develops, designs and builds machines, plant and turnkey production facilities for the preparation, conditioning, reconstituting, drying and shipping of feedstuffs, pet food, timber waste, as well as in recycling, sewage treatment and scrap tyre recycling. Through constant on-going development and process optimisation, these reconstituting processes are also proving successful currently in creating a demand for the manufacture of highly innovative products, such as

- biomass,
- renewable raw materials, as well as
- in the chemicals sector.

Feedstuffs and pet food in particular bring into play nutritional and practical factors, energy consumption, quality and shelf life since their conversion involves heat treatment and, for most processed products, a forming operation such as expanding, extruding and pelletising on key processing machines. Drying is needed depending on the application for the raw product or end product. In the thermal and hydrothermal processes, the forming and drying, temperature and moisture parameters of the bulk materials are specified as set point values. Control valves for steam input, operating in a temperature measurement control loop or for feed water control operating in a moisture control loop, facilitate for the automatic metering of these media in a continuous flow of bulk material. In the drying process, the valve controlling the dosing of the heat supply from a heat exchanger is connected to the online moisture measurement in a control loop. The control valves used in these systems are predominantly sliding gate valves with digital 8049 positioners from Schubert & Salzer.

Since the 8049 positioner is also offered in a version suitable for an Ex Zone 22, no extra cost is incurred in having this additional safety benefit. These 8049 digital positioners also offer the distinct advantage that they only consume compressed air when the valve is actually performing positioning tasks. In harsh operating conditions, the standard positioner in its IP65 safety level version has already come out on top. In addition, the 8049 positioner is



also approved for Zone 22 ATEX. Kahl uses these features in its pelletising and drying equipment which is often required to run in dusty, harsh environments. One interesting example of such plant is for the pelletising of wood pellets in the booming market for energy sources, which is designed for a throughput of up to 8 tonnes of pellet per hour.

Contact:

Schubert & Salzer Control Systems GmbH

Bunsenstr. 38, 85053 Ingolstadt

Tel: +49 (0) 841 96 54-0 · Fax: +49 (0) 841 96 54-590

info.cs@schubert-salzer.com | www.schubert-salzer.com



The very compact sliding gate valve offers outstanding advantages in handling. Just one man is needed to maintain the functioning element, even with very short setup times. The perforated discs sliding against each other form the main throttling element in sliding gate valves



Drying plant in the Eberswalde pelletising plant for recyclable wood materials