

Flowbus creates the splash on the global stage



All the team members in Flowbus serve the requirement from the clients with flexible and prompt action.

power modules incorporating a motor driven pump with an integral hydraulic cylinder. The unit includes Local Open / Close selector switches, Local Position indication, Manifold control piping and various power options with AC or DC supply, Water and dust tight, and also explosion proof. It is available with bus communications via all major protocols, and can be customized to suit the application. The unit has compact piston seals which guide the piston in the power module and absorb side-loads. The EHQ actuator incorporates a specially designed manifold control system producing a very short operating time, typically

required in emergency conditions. It is also very compact, saving piping space. The EHQ can be provided with either symmetrical or canted yoke, producing torque outputs suitable for a wide variety of valve designs. Various ancillaries such as limit switches, solenoid valves, servo valves, poppet solenoid valves etc. are available to ensure perfect valve operation. "Our technical know-how and experience with global valve actuators allows us to successfully and quickly develop new product lines. Launching EPRY-series Actuator is proof of this," explains Mr Park. EPRY-series pneumatic actuators feature a modern scotch yoke mechanism that

The last cover story with Flowbus was published three years ago. High time therefore for Valve World to re-visit the company for an interview with Mr SangHee Park, CEO and Ms Mijung Moon, Global Marketing Team Manager. With many successful projects under its belt, including becoming the exclusive supplier for global industry giants, the company is developing a name for excellence, reliability, and client-oriented philosophies.

"At the last interview in 2007 with Valve World, we assured you that the interview for our next cover story would take place in our new plant," Mr Park begins. True to his word, we are meeting this time in an expansive and sleek new plant that produces various new product lines and an enlarged actuator range fitted with ancillaries, controls and mounting kits, piped and wired ready for installation. "Our idea was to create a world class global manufacturer of valve actuators to pursue markets across the world." Ms Moon also comments that "We are proud of achieving the projects and goals we had in 2007. As the principal Korean manufacturer of Hydraulic & Pneumatic Actuators, Electro Hydraulic Actuators, Manual Overrides, Valve Automation, Fire-Proofing Devices, and Partial Stroke Systems, we will continue to make an impact in the international market." To date, Flowbus Corporation has been

doing a lot of export business to almost every country in the world. They plan to expand their sales to European and South American market as well as the Middle East. It is with demonstrable pride that Mr Park tells us the company has succeeded beyond their expectations and continues to grow much more rapidly than anticipated.

Significant investments

Since its foundation in 2003, the company has operated mainly in unfavorable global market conditions. It has, however, experienced a remarkable increase in international clients. To capitalize on this, Flowbus decided to erect a purpose built new plant in 2009. "It was a challenge to find a suitable new site where we could increase efficiency and quality in production, develop close partnerships with vendors, and ensure price competitiveness. We have been able

to capitalize on our own enlarged R&D and production capacity whilst increasing quality control and on-time-services. The new plant in SiHwa Industrial complex in Kyounggi-do, South Korea operates in conformity with ISO9001:2008, ISO14001:2004, and OHSAS18001:2007 which means that OEM's, engineering companies and end-users can select Flowbus products with confidence.

Constant product development

The unique philosophy of Flowbus as a Korean heavy duty actuator manufacturer, has enabled them to supply numerous new product lines. The EEH series is an Electro-Hydraulic Actuator design and the EHQ series is a fast-acting Hydraulic quarter turn unit. The EEH self-contained Electro hydraulic actuator consists of control, hydraulic and



Front view of new head office and plant in SiHwa Industrial complex in Kyounggi-do, South Korea. They have certified ISO9001:2008, ISO14001:2004, OHSAS18001:2000 by TUV SUD, Germany



Flowbus Scotch Yoke EPA spring returns actuators with automation controls for oil & gas applications

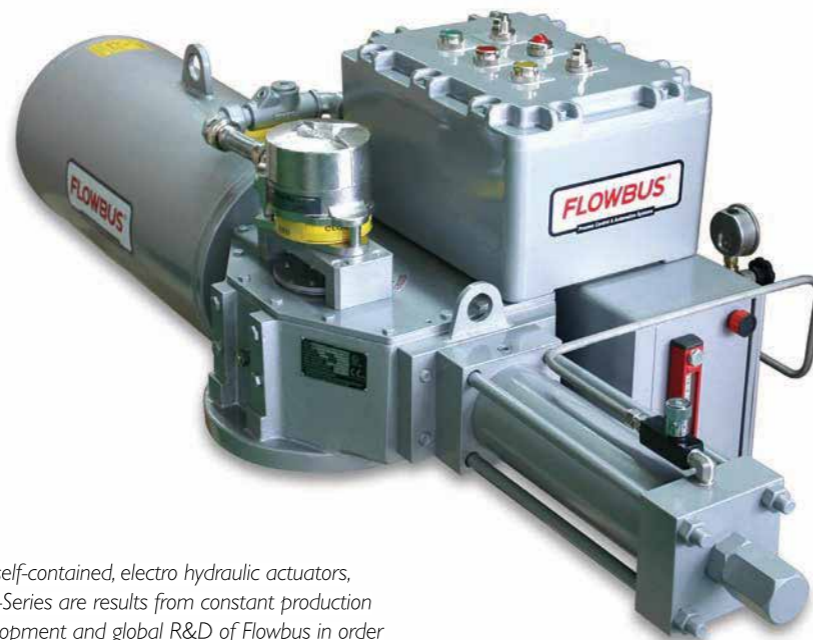
provides high start and end torque output in a very compact package. It also features an extruded aluminum body incorporating an advanced, hard anodizing treatment on the internal and external surfaces. They have less stroke volume than comparable rack and pinion actuators, providing significant reductions in the use of compressed air and are available in both double-acting and spring-return configurations. The EPRY actuator has been designed with an inherently safe spring return unit. The actuator spring rod is connected to both the spring end cover and retainers so that the spring is fully retained during assembly or disassembly. This prevents accidental release of the spring force, and ensures that installation or maintenance can be performed in complete safety.

Silver bullet for clients

"Flowbus are a complete solution provider; providing not only an actuator, but a complete tailor-made solution," says Mr Park. "We have forged a big reputation in a short time and many clients already easily recognize us by our logo. We have made the extraordinary move of designing and producing heavy duty actuators instead of the more usual route of producing commodity products first. From basic ancillaries such as solenoids, through to ESD systems and partial stroke systems, the

Flowbus team is able to utilize long-term valve and actuator experience to provide a total solution to our clients." Notwithstanding the global economic recession, Flowbus has been successfully winning international projects in various industries including oil and gas, refinery, petrochemical, chemical, water treatment, marine and steel. This success has raised the profile of the company as a global player. "We not only sell the product but we

work with customers on the applications technology that goes with it. This means the customer can come to us and look for a solution instead of only a component to operate a valve. We would define Flowbus as a proven and reliable supplier." One of Flowbus' key benefits is fast response and on-time delivery. Mr Park explains, "If a client has a tight schedule, we use our flexible manufacturing model to finish the work on time. This capability means our



The self-contained, electro hydraulic actuators, EEH-Series are results from constant production development and global R&D of Flowbus in order to fulfill market needs.



EPRY-series pneumatic actuator features modern scotch yoke mechanism with extruded aluminum body material for compact and lightweight.



Quality and credibility of products are the top-priority for Flowbus. They are testing Heavy Duty Hydraulic actuator of EH-Series.

clients tend to stay with us in the long term. We have honest and open relationships with international clients from a variety of fields such as oil & gas, oil refinery (gasoline, diesel, kerosene, bunker-C), chemical (polyethylene, polypropylene, monomer, solvent), marine (FPSO, LNG, Drilling Rigs, and environment applications). We are very flexible and client oriented. Whenever we receive feedback from a client, we act on their suggestions and incorporate them. All our developments, be they improvements to existing

technology or a completely new technology are all led by the voice of our customers. We think there are two kinds of quality; product quality and service quality. Flowbus take both types very seriously and strive to deliver on both.

Global ambitions

Flowbus has been preparing for some time to capitalize on the potential of the international market. "Being a global corporation doesn't only mean setting

the goal of expanding business abroad. It means accumulating knowledge and experience in local markets and local clients. We then move forward towards a long-term relationship and partnership with clients from different countries to fulfill their requirement perfectly. Furthermore, we have made a lot of effort to develop new products, including gas over oil actuators and sub-sea actuators to satisfy global demand. In the coming years efforts to strengthen our position in key markets will be made. With Korea's diligent, hard working spirit, we will see a lot of expansion possibilities for our own product quality, service and after-sales service all over the world. There are plenty of opportunities for future growth and opening new automation & service centers abroad." Mr Park concludes.

Facts & Figures

Name:	Flowbus Corporation
Founded:	2003
Headquarters:	Kyonggi-do, South Korea
Key Markets:	Oil & gas, petrochemical, chemical, desalination, marine, steel, refinery, energy, and environment plants throughout the world
Products:	Pneumatic actuators, hydraulic actuators, electro-hydraulic actuators, manual overrides, control systems, and accessories

Current product range

The current product range includes:

- EPR series pneumatic rack and pinion aluminium actuators which are compact and high power with a hard anodized exterior protection.
- EPA series pneumatic compact scotch yoke heavy duty actuators which have ISO5211 mounting pads and Namur accessory pads on both upper and lower faces. This allows clockwise and anti-clockwise rotating valves to be accommodated by simply turning the EPA actuator over.
- EPT series pneumatic heavy duty scotch yoke actuators which incorporate the latest technology for long life and high torque output for large valves. Spring return designs feature a fully welded spring chamber for safety.
- EH series heavy duty hydraulic actuators suitable for up to 210bar supply and based on the tried and tested EPT design.
- FB series declutchable gear override units for low torque applications. For higher torques, Flowbus actuators can be fitted with jack-screw or hydraulic hand-pump overrides.

All Flowbus actuators are CE marked and ATEX approved as well as being SIL certified to IEC61508 for Emergency Shutdown application