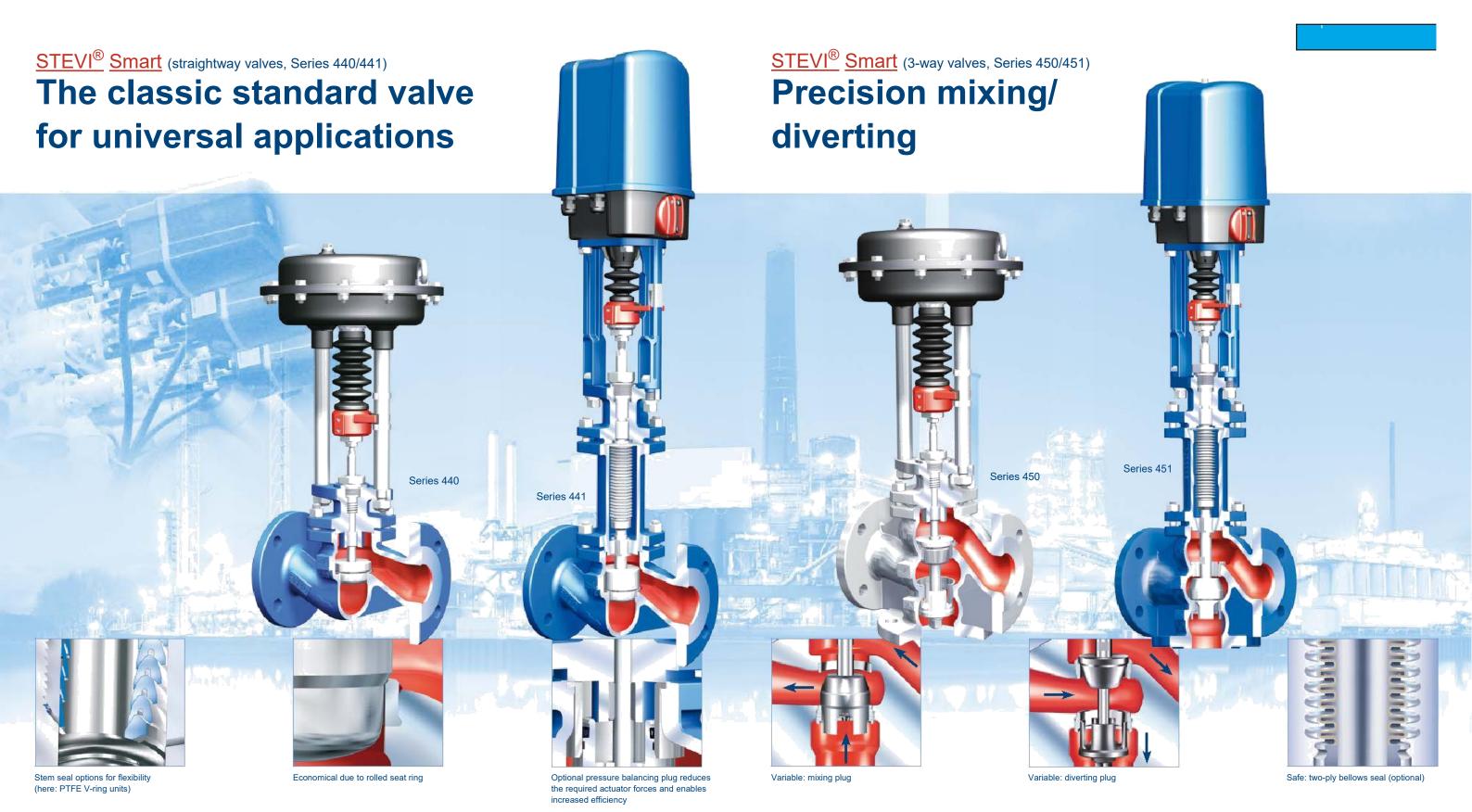


for universal applications (Series 440/441)

Precision mixing / diverting (Series 450/451)

control valve (Series 448/449) valve for critical applications (Series 470/471 DP)



- •• 50:1 rangeability for precision and high performance (inherent rangeability 40:1)
- Variable: stem seal options (PTFE V-ring unit, PTFE packing, graphite packing, stainless steel bellows seal, EPDM lining)
- Long life: precision stem guiding
- Safe: two-ply bellows seal (optional)

Plug design: Parabolic plug, optional V-port plug (optional pressure balancing in both cases from DN 65) / equal-percentage or linear characteristic

Nominal diameter: DN 15-500 Nominal pressure: PN 16-40 Actuators: Electric or pneumatic

Body materials: e.g. EN-JL1040, EN-JS1049, 1.0619+N, 1.4408 Flow media: e.g. cooling water, brine, warm water, hot water,

steam, gas, refrigerant, heat transfer oil, etc.

- 30:1 rangeability for precision and high performance Variable: reducible Kvs values
- ■■ Variable: stem seal options (PTFE V-ring unit, PTFE packing, graphite packing, stainless steel bellows seal, EPDM linings)
- Variable and economical: two screwed seat rings (optional)
- Long life: stable plug guidance
- Long life: precision stem guiding
- Safe: two-ply bellows seal (optional)

Plug design: Mixing plug / diverting plug

Nominal diameter: DN 15-300 Nominal pressure: PN 16-40 Actuators: Electric or pneumatic

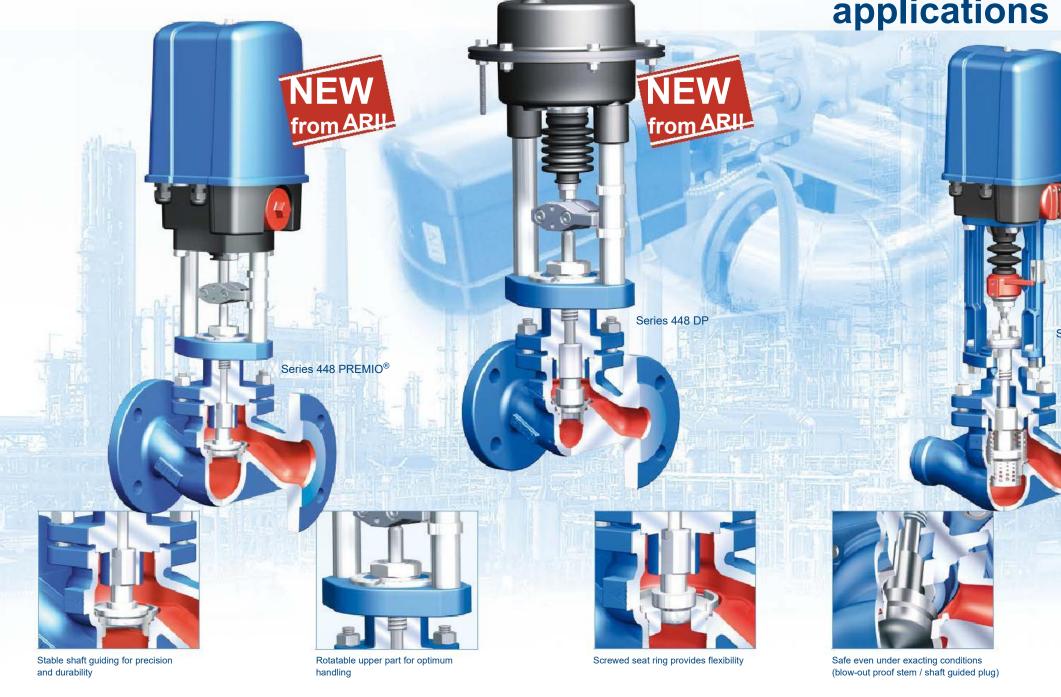
Body materials: e.g. EN-JL1040, EN-JS1049, 1.0619+N, 1.4408

Flow media: Cooling water, brine, warm water, hot water,

refrigerant, heat transfer oil, etc.

## The variable, compact control valve

# The high-performance control valve for professional control and critical applications



- Long life: stem seals already proven millions of times over, service life now further extended (PTFE V-ring sealing units and EPDM linings).
- Optimum handling: upper part can be rotated 360°
- Flexible: changeable, variable trim (at least 4 Kvs values as well as multiple flow characteristics and plug designs)
- Precise and durable: vibration is prevented even at high differential pressures (stable shaft guiding)
- Easy handling: small footprint and reduced weight (low height)
- Economical: very low air consumption (smaller pneumatic actuators on request)
- Plug design: Parabolic plug / perforated plug
- Nominal diameter: DN 15-100 Nominal pressure: PN 16-40 Actuators: Electric or pneumatic
- Body materials: e.g. EN-JL1040, EN-JS1049, 1.0619+N, 1.4408
- Flow media: e.g. brine, warm water, hot water, refrigerant, steam, gas, etc.

- Precise and high performance: optimised characteristic quality
- Variable: up to 6(!) reducible Kvs values
- Variable: stem seal options (PTFE V-ring unit, PTFE packing, graphite packing, stainless steel bellows seal, EPDM lining)
- Variable: changeable trim
- Minimal noise: multi-stage trim (optional)
- Safe: blow-out proof stem
- Safe: shaft guided plug
- Safe: two-ply bellows seal (optional)
- Long life: precision stem guiding
- Precise: even better control accuracy (optimised flow paths)

Flexible: wide range of applications (very high differential pressures up to max. nominal pressure)

Plug design: Parabolic plug, optional V-port or perforated plug (optional pressure balancing in both cases)

High performance due to double guiding

(V-port plug)

Series 471 DP

Nominal diameter: DN 15-250 / NPS 1"-8" Nominal

pressure: PN 16-160 / ANSI Class 150-300 Actuators:

Electric or pneumatic

Flexibility: variable in situ replacement of the trim -

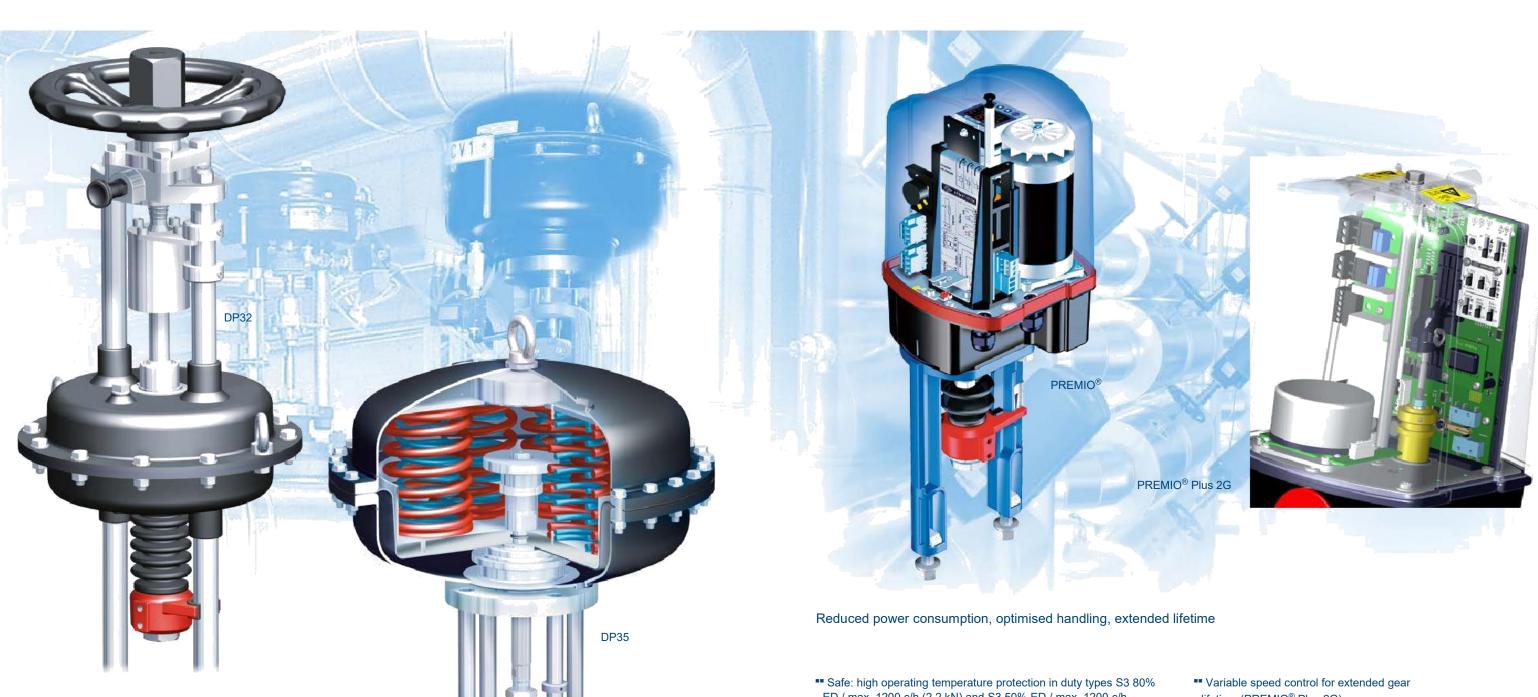
stem, plug (here: perforated plug) and seat ring

Body materials: e.g. EN-JL1040, EN-JS1049, 1.0619+N, SA216WCB, 1.4581 and 1.7379

Flow media: e.g. hot water, steam, gas, refrigerant, brine, etc.

## **ARI-DP** pneumatic actuators

# **ARI-PREMIO®** and **PREMIO®** Plus 2G electric actuators



- High performance: broad spring rangeability (higher closing forces)
- Practical: reversible operating direction
- Economical: favourable size / performance ratio
- Variable: wide range of accessories (positioners, solenoid valves, limit switches, etc.)
- Sizes up to 2800 cm<sup>2</sup> diaphragm area (DP 35)
- Durable even in aggressive environments: corrosionresistant design (optional)
- Added safety through manual override (optional)

- ED / max. 1200 c/h (2.2 kN) and S3 50% ED / max. 1200 c/h (5 kN) acc. to EN 60034-1
- High performance: optimised gear transmission and improved load cut-off
- ■■ BLDC motor: significantly reduced power consumption, exceptionally smooth and quiet running due to circular rotating field, high duty classification (ED) even at high actuating forces because selfheating of the motor is restricted to a minimum, integrated Hall sensors guarantee reliable position measurements (PREMIO® Plus 2G)
- User friendly operator panel with variable control speeds (PREMIO® Plus 2G)
- Improved Economy Function for even better durability, e.g. more efficient, low-wear conversion of control signals (PREMIO® Plus 2G)

- lifetime (PREMIO® Plus 2G)
- High durability and precision because small positional deviations are approached at low speed (PREMIO® Plus 2G)
- Optional: version with fail-safe function

Other actuators available on request!

Actuating force: 2.2 kN, 5 kN, 12 kN or 15 kN Permissible ambient temperature: -20°C to +70°C Compatible with a wide voltage range (AC from 90 to 264 V / 47 to 63 Hz or DC from 137 to 370 V) (PREMIO® Plus 2G) Positioner: freely selectable analogue control signal (0 to 10 V or 4 to 20 mA)

Nominal diameter: Diaphragm area 80-2800 cm<sup>2</sup>

Operating modes: Spring closes / air supply pressure closes

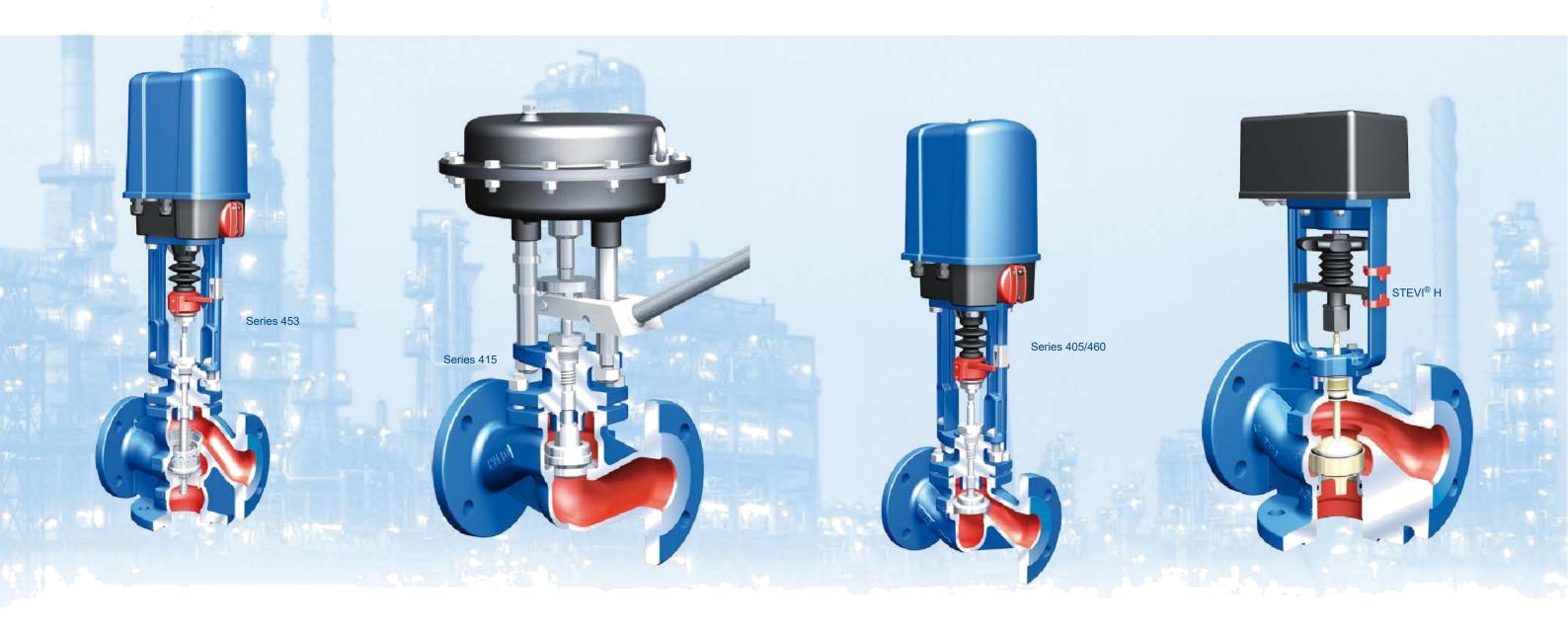
Max. permitted air supply pressure: 6 bar

Actuating force: 490-83,000 N

body seat



# "Even more STEVI® diversity..."



## STEVI® 453

Feedwater control valve with integrated pump spill-back

- Permanently reliable because the pump is protected (guaranteed supply of feedwater integrated pump spill-back)
- Variable: Kvs values adapted to the quantities required
- Long life: trim optimised for critical operating conditions Applications: Boiler construction / plant manufacturing

#### STEVI® 415

Automatic blow-down valve – e.g. for steam boilers or autoclaves

- Optimum handling: compact design
- Flexible: accessories adapted to the blow-down process (e.g. limit switches, solenoid valve, time delay relays, etc.)
- Optional: operation by means of a separate lever (for quick and easy manual control)

Applications: Boiler construction

## STEVI® 405/460

Automatic stop valve (with electric or pneumatic actuator)

- Long life: precision stem guiding
- Safe: two-ply bellows seal (optional)
- Variable: stem seal options (PTFE V-ring unit, PTFE packing, graphite packing, stainless steel bellows seal, EPDM linings)
  Applications: Industry, chemicals, shipbuilding

#### STEVI® H

Lightweight, compact valve

- Precise: optimised control accuracy even at low flow rates (rangeability 30:1)
- Economical: maintenance-free, frictionless EPDM lining
- ■■ Variable: available with cast iron flanges or red brass sockets ■■ Flexible: intelligent PACO® electric actuators Applications: HVAC and industry (for low differential pressures and low flow velocities)