Special Features and Advantages

- patented valve pallet technology guarantees excellent tightness resulting in the lowest possible product losses and reduced environmental impact
- 10% technology for minimum pressure increase until full lift
- set pressure close to opening pressure for optimum pressure maintenance in the system
- high flow efficiency
- valve pallet is guided inside the housing to protect against harsh weather conditions
- can be used in explosion hazardous areas
- sturdy housing design
- secured movable components
- best technology for API tanks

Design Types and Specifications

The valve pallet is weight-loaded. Higher set pressures are achieved with types ER/V and ER/VH (lever-operated) valves or Type ER/V-F (spring-loaded) valves.

Pressure valve in basic design

ER-V-LP

Additional special devices available upon request.
Table 1: Dimensions

To select the nominal size (DN), use the flow capacity chart on the following page.

<table>
<thead>
<tr>
<th>DN</th>
<th>200 / 8&quot;</th>
<th>250 / 10&quot;</th>
<th>300 / 12&quot;</th>
<th>350 / 14&quot;</th>
<th>400 / 16&quot;</th>
<th>450 / 18&quot;</th>
<th>500 / 20&quot;</th>
<th>600 / 24&quot;</th>
<th>700 / 28&quot;</th>
</tr>
</thead>
<tbody>
<tr>
<td>a</td>
<td>343 / 13.50</td>
<td>406 / 15.98</td>
<td>483 / 19.02</td>
<td>533 / 20.98</td>
<td>597 / 23.50</td>
<td>635 / 25.00</td>
<td>699 / 27.52</td>
<td>813 / 32.01</td>
<td>837 / 32.95</td>
</tr>
<tr>
<td>b</td>
<td>378 / 14.88</td>
<td>399 / 15.71</td>
<td>409 / 16.10</td>
<td>440 / 17.32</td>
<td>455 / 17.91</td>
<td>464 / 18.27</td>
<td>481 / 18.94</td>
<td>556 / 21.89</td>
<td>571 / 22.48</td>
</tr>
</tbody>
</table>

Table 2: Material selection

<table>
<thead>
<tr>
<th>Design</th>
<th>A</th>
<th>B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Housing</td>
<td>Steel</td>
<td>Stainless Steel</td>
</tr>
<tr>
<td>Valve seat</td>
<td>Stainless Steel</td>
<td>Stainless Steel</td>
</tr>
<tr>
<td>Valve pallet</td>
<td>Stainless Steel</td>
<td>Stainless Steel</td>
</tr>
<tr>
<td>Sealing</td>
<td>Stainless Steel</td>
<td>Stainless Steel</td>
</tr>
</tbody>
</table>

Special materials upon request.

Table 3: Flange connection type

- EN 1092-1; Form B1
- ASME B16.5 CL 150 R.F.

Other types upon request.

Flow Capacity Chart

The flow capacity charts have been determined with a calibrated and TÜV certified flow capacity test rig. Volume flow \( \dot{V} \) in (m³/h) and CFH refer to the standard reference conditions of air in ISO 6358 (20°C, 1bar). For conversion to other densities and temperatures, refer to Sec. 1: “Technical Fundamentals.”