极尽完美，营造生活新空间
Construct new space for life with utmost perfection

不锈钢作为一种新型的建筑材料，不仅可以提升设计与建筑的美感，改善建筑的整体质量和使用性能，长期来看具有较高的成本效益性，可以完美体现现代、持久、经济、环保的综合品质，是现代建筑的理想选择。

宝钢不锈钢秉承“更好的钢铁、更好的环境、更好的生活”的理念，依靠一流的制造和技术研发能力，致力于为社会营造新空间。

Stainless steel, as a new category material for construction, promotes not only the beauty of design and construction, but also lowers the life cycle cost by extending service life span, displaying a comprehensive quality of modernization, durability, cost-effectiveness and environment friendliness.

Baosteel Stainless Steel Unit, with its leading manufacturing facility and R&D capability, cherishes the belief "Better steel, better environment, better life" and is dedicated to create new space for the society.

特点:
• 耐久、耐热、耐蚀性好
• 易加工，成品表面形成不同的光泽度和反射能力
• 装饰效果好，具时代感
• 维护方便，外形清洁
• 绿色可回收的环保材料

Characteristics:
• Durable, heat-resistant, corrosion-resistant
• Accessible to variety of surface finish with various light gloss and reflecting ability
• Excellent in decorating effectiveness and enrichment in beauty
• Facile to maintenances and surface cleanliness
• Environmental friendly and 100% recyclable

应用领域
• 电梯类、扶梯扶手、电梯面板
• 内部装饰类，走廊栏杆、大厅支柱、门类、拉手
• 外部装饰类，立面、屋面、墙面幕墙
• 水箱类，工业水箱，民用水箱

Applications:
• Elevators and Escalators: escalator handrail, elevator lift
• Interior decoration: handrail, hall column, door, handle
• Exterior decoration: roofing, wall beam
• Water tank: industrial water tank, civil water tank
B445R
Key Product

Application:

B445R chromium content (≥22%) and nitrogen content are very low (C+N ≤ 250ppm). It also contains high concentrations of Nb and Ti. Compared to SUS316L, B445R has better chloride corrosion resistance, better atmospheric corrosion resistance, smaller thermal-expansion coefficient, and higher thermal conductivity, leading to less thermal deformation.

<table>
<thead>
<tr>
<th>Property</th>
<th>B445R</th>
<th>316L</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yield strength (MPa)</td>
<td>300</td>
<td>7.69</td>
</tr>
<tr>
<td>Tensile strength (MPa)</td>
<td>470</td>
<td>16.0×10^6</td>
</tr>
<tr>
<td>Elongation (%)</td>
<td>22.35</td>
<td>2.25×10^6</td>
</tr>
<tr>
<td>Hardness (HV)</td>
<td>&lt;200</td>
<td>6×10^7</td>
</tr>
<tr>
<td>Bending (180°) @ 180° (d=1a)</td>
<td>OK</td>
<td>7.4×10^7</td>
</tr>
<tr>
<td>Density (g/cm³)</td>
<td>7.98</td>
<td>1.39×10^6</td>
</tr>
<tr>
<td>Linear thermal expansion coeff.</td>
<td>10.1×10^6</td>
<td>443</td>
</tr>
<tr>
<td>Thermal conductivity (W/m·K)</td>
<td>2.25×10^4</td>
<td>316L</td>
</tr>
<tr>
<td>Specific electrical resistance</td>
<td>6×10^7</td>
<td>7.4×10^7</td>
</tr>
<tr>
<td>Magnetic properties</td>
<td>Yes</td>
<td>No</td>
</tr>
</tbody>
</table>

Corrosion resistance:

- FeCl₃ solution average corrosion rate (g/m²·h):
  - 443: 11.91
  - 316L: 6.1
  - B445R: 0.43