DESCRIPTION:
SFC-2509 is designed to weld super duplex stainless steels contains austenite-ferrite duplex steel. 25%Cr-9%Ni-4%Mo-N with excellent pitting corrosion resistance, stress corrosion resistance and crack than 2209.

APPLICATIONS:
Typical applications for petro-chemical industry include pumps, vessels, heat exchanger, such as UNS S31803(Alloy 2505).

NOTE ON USAGE:
1. DC (+); CO2 gas (min. 99.8%) or (80% Ar + 20% CO2); G.F.R: 20-25l/min
2. Use stainless steel wire brush for cleaning of slags and make sure the surface is clean.
3. Follow the recommended welding parameters to achieve good sound welds

WELDING POSITION:

TYPICAL CHEMICAL COMPOSITION OF WELD METAL (wt%):(Shielding Gas: 100% CO2)
Weld Metal Analysis:
Carbon (C) 0.033
Manganese (Mn) 0.87
Silicon (Si) 0.45
Phosphorus (P) 0.022
Sulphur (S) 0.015
Nickel (Ni) 8.51
Chromium (Cr) 23.91
Molybdenum (Mo) 4.11
Nitrogen (N) 0.15

TYPICAL MECHANICAL PROPERTIES OF WELD METAL:(Shielding Gas: 100% CO2)
TS N/mm2 795
EL% 28

APPROVALS:
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SUGGESTED WELDING PARAMETERS (DC <+>)

<table>
<thead>
<tr>
<th>Parameters</th>
<th>1.2mm</th>
<th>1.6mm</th>
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<tbody>
<tr>
<td>Welding Position</td>
<td>F. HF</td>
<td>F. HF</td>
</tr>
<tr>
<td>Voltage (Volt)</td>
<td>23 ~ 33</td>
<td>23 ~ 33</td>
</tr>
<tr>
<td>Current (Amp)</td>
<td>130 ~ 220</td>
<td>200 ~ 300</td>
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</tbody>
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