

ESAB 309LMo

ESAB 309LMo is a low carbon basic coated all positional stainless steel electrode, giving an austenitic weld deposit of 23Cr-13Ni-2.5Mo type for welding stainless steels to unalloyed and low alloyed steels. The weld metal has excellent resistance to corrosion and oxidation at elevated temperatures up to 1100°C.

| Specifications | |
|-----------------|---------------------------|
| Classifications | SFA/AWS A5.4 : E309LMo-15 |

| | |
|-----------------|---------------------|
| Welding Current | DC+ |
| Ferrite Content | 15-22 FN |
| Alloy Type | Austenitic Cr-Ni-Mo |
| Coating Type | Basic |

| Typical Tensile Properties | | | | |
|----------------------------|-----------------------|----------------|------------------|------------|
| Condition | Conditional Statement | Yield Strength | Tensile Strength | Elongation |
| AWS | | | | |
| As Welded | As welded | 500 MPa | 600 MPa | 34 % |

| Typical Charpy V-Notch Properties | | |
|-----------------------------------|---------------------|--------------|
| Condition | Testing Temperature | Impact Value |
| AWS | | |
| As Welded | -46 °C | 30 J |

| Typical Weld Metal Analysis % | | | | | |
|-------------------------------|------|------|-------|-------|------|
| C | Mn | Si | Ni | Cr | Mo |
| 0.025 | 0.70 | 0.85 | 13.30 | 23.00 | 2.30 |

| Deposition Data | |
|-----------------|-----------|
| Diameter | Current |
| 2.5 x 350.0 mm | 60-90 A |
| 3.15 x 350.0 mm | 80-120 A |
| 4.0 x 350.0 mm | 100-170 A |