FORMATA NI Cast 98 For Cast Iron

Classification

AWS A 5.15 : ENi-CI DIN 8573 : E Ni BG 23 Approvals

Applications

Welding and filling up of cavities of cast iron products.

Characteristics

YAWATA Ni Cast 98 is a graphite type electrode with a pure nickel core wire. Weld metal is not so hard and is easily machined. Arc is stable and slag is easy to remove. No preheating is required in general.

Typical Chemical Composition of Deposited Metal (%)

С	Si	Mn	Р	S	Ni
0.5	0.5	0.5	≦0.020	≦0.010	98.0

Typical Tensile Strength & Hardness of Deposited Metal

Tensile Strength N/mm ² (kgf/mm ²)	Vickers (HV)	Share	Heat Treatment
430 (43)	193	28	As welded

Sizes & Recommended Current Range (AC or DC +)

Diameter/ Length (mm)	2.6/300	3.2/350	4.0/350		
Welding Position	Current (A)				
F	60~80	70~110	110~150		
V, OH	50~70	80~100	120~140		

Guideline in Usage

- 1. Use dry electrodes only. Damp electrodes should be re-dried at $80 \sim 120^{\circ}$ C for 60 minutes before use.
- 2. Remove degenerated layer completely and avoid continuous welding.
- 3. Deposit short runs and give hot peening at each bead.
- 4. Preheating and postheating are not necessary in general. However, preheating at $100 \sim 200^{\circ}$ C is required for a structure which is apt to cause stress cracks.

Welding Positions

All positions, except vertical down