# LC-300 

For welding of $50 \mathrm{~kg} / \mathrm{mm}^{2}$ class high tensile AWS A5.1 E7016 strength steel

## KS D 7006 E5016

JIS Z3211 E4916

## Applications

Welding of $50 \mathrm{kgf} / \mathrm{mm}^{2}$ class high tensile strength steels ships, bridges, buildings and pressure vessels.

## Characteristics

LC-300 is the most widely used low hydrogen type covered electrode for all position welding of $50 \mathrm{kgf} / \mathrm{mm}^{2}$ class high tensile strength steels.
X-ray soundness and mechanical properties of the weld metal are excellent. The usabilities such as arc smoothness, slag removal and bead appearance are good.

## Notes on usage

(1) Dry the electrodes at $300 \sim 350^{\circ} \mathrm{C}$ for $30 \sim 60$ minutes before use.
(2) Adopt the backstep method or strike the arc on a small steel plate prepared for this particular purpose to prevent blowholes at the arc starting.
(3) Keep the arc as short as possible.

Typical chemical composition of weld metal (\%)

| C | Mn | Si | P | S |
| :---: | :---: | :---: | :---: | :---: |
| 0.07 | 0.98 | 0.53 | 0.014 | 0.010 |

Typical mechanical properties of weld metal

| YP | TS | EL | IV J (kgf-m) |
| :---: | :---: | :---: | :---: |
| $\mathrm{N} / \mathrm{mm}^{2}\left(\mathrm{kgf}^{2} / \mathrm{mm}^{2}\right)$ | $\mathrm{N} / \mathrm{mm}^{2}\left(\mathrm{kgf}^{2} / \mathrm{mm}^{2}\right)$ | $\%$ | $-30^{\circ} \mathrm{C}$ |
| $490(50)$ | $560(57)$ | 32 | $130(13)$ |

Size \& recommended current range ( AC or $\mathrm{DC} \pm$ )

| Dia. (mm) |  | 2.6 | 3.2 | 4.0 | 5.0 | 6.0 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathrm{~L}(\mathrm{~mm})$ |  | 350 | 350 | 400 | $400(450)$ | 450 |
| Amp. | F | $55-85$ | $90-130$ | $130-180$ | $180-240$ | $250-310$ |
|  | V VOH | $50-80$ | $80-115$ | $110-170$ | $150-200$ | - |

