

# TWH-52-S x TF-R85

## Characteristics and Applications:

TWH-52-S is a submerged arc flux-cored wire welded with TF-R85 neutral flux. Its deposit contains Cr, Ni, Mo, V elements and lower impurity which provide resistance to extreme hot cracking, adhesive wear, abrasive wear and hardness even at high temperature and high stress condition.

It is suitable for pinch rolls, work rolls, warp roll and surfaces subjected to sliding metal/metal wear.

## Notes on Usage:

- (1) Set preheating temperature at 300 ~ 400°C, the inter-pass temperature is controlled at 300 ~ 400°C.
- (2) Avoid cold cracking, roll temperature should be slow cooking after welding and heat treatment.
- (3) When the base metal with higher carbon content, it is recommended RolClad-19-S / TF-R85 used as buffer layer.
- (4) The flux bag opened, it should be redry 300 ~ 350 °C x1 hours.
- (5) If use of recycled flux, it is need to add new flux to ensure quality.

## Typical chemical composition (wt%)

C	Mn	Si	Cr	Mo	V	Ni
0.18	1.9	0.6	3.9	1.8	0.4	3.3

## Typical weld metal hardness (on mild steel)

Hardness (HRC)	48-52
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## Suggested welding parameter (DC<+>)

Parameters	Diameter (mm)	3.2
Voltage (Volt)		26-29
Current (Amp)		350-450
Stick out (mm)		25-30

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