

 Welding Alloys	Storage, handling and redrying recommendations for cored wires	Reference document	Revision
		TS 52	01
Written by : G. BRUEZ		Date of creation : 08.2009	Page 1/1
Approved by : B. GERARD		Latest update : 06/12/2023	
		Related documents :	

Storage, handling and redrying recommendations for cored wires

To maintain the quality, the storage, handling and redrying of the cored wires must be done according to the following requirements:

Storage

Cored wires must be kept under properly maintained storage conditions as follows:

- Cored wires should be stored in original unopened and undamaged packaging. Storage times should be kept as short as possible.
- Whenever possible, the “first in – first out” principle should be respected.
- Flux cored wire should not be stored for more than 5 years. Older wire should be redried before use.
- Spools should not be laid directly on the floor or against a wall. They must be stored at least on wooden pallets.
- Storeroom temperature should be kept as even as possible, temperature variations should not exceed $\pm 5^{\circ}\text{C}$.
- Temperature should not fall below 15°C . Relative humidity should not exceed 60% at $15 - 25^{\circ}\text{C}$ or 50 % at $25^{\circ}\text{C} - 35^{\circ}\text{C}$.

Handling

- Welding should be carried out at room temperature and low relative humidity.
- If relative humidity exceeds 60 %, cored wires should not be left unprotected for more than 24 hours.
- Spools outside the protective packaging should only be exposed to normal workshop conditions for a maximum period of 72 hours.
- Between shifts, wire spools should be stored in their plastic bag, in the above mentioned storage conditions, relative humidity not exceeding 50 %.

Redrying

- If it is not possible to maintain the above-mentioned temperature and humidity level, or if the vacuum packaging is open or damaged, redrying of the wire must be achieved.
- Wire slightly affected by moisture may be redried at $140 - 200^{\circ}\text{C}$ during 2 – 12 hours. The recommended cycle is 6 hours at 150°C .
- Up to 6 maximum redrying cycles are possible.
- Cored wires that are rusty or / and have suffered from severe water contamination or that have been exposed to the atmosphere over long periods of time cannot be restored and should be discarded.

Note

End users may use the cored wires by using their own engineering judgement by doing visual inspection, required NDT, weldability test, mechanical test, chemical analysis etc. to validate their own quality requirements for production.