

## **Tensileweld (Jinzhou Special Welding Electrodes Co., Ltd.)**

### **1. Company Overview**

**Tensileweld (Jinzhou Special Welding Electrodes Co., Ltd.)**, headquartered in Jinzhou, China, has been dedicated to the R&D and manufacturing of high-end welding materials and special alloy welding consumables since its establishment in 1993. As one of China's most comprehensive manufacturers of special welding consumables, the company successfully launched its new generation smart production facility in 2025, marking a significant leap forward in manufacturing capability and technological advancement.

#### **Core Mission:**

For 32 years, we have consistently provided high-performance, highly reliable welding solutions for critical sectors including heavy industry, energy equipment, rail transit, and port facilities, empowering our customers to build safer and more durable industrial equipment.

### **2. Core Capabilities & Products**

**Leading Special Welding Consumables Manufacturer:** China's broadest supplier of high-end welding materials.

**Smart Manufacturing:** The next-generation smart factory, operational in 2025, ensures product consistency and efficiency.

## **Core Product Lines**

### **Special Welding Wires & Electrodes:**

- Stainless Steel Welding Consumables
- Nickel-Based Alloy Welding Consumables
- High-Temperature Corrosion-Resistant Stainless Steel Welding Consumables
- High-Strength Steel Welding Consumables

### **Automated Welding Consumables:**

- Robot Welding-Specific Copper-Coated Solid Wires (GMAW)
- Robot Welding-Specific Flux-Cored Wires (FCAW)

### **Special Fluxes & Auxiliary Materials:**

- Agglomerated Fluxes for Submerged Arc Welding (SAW)
- Special Brazing Alloys

## **Technological Differentiators**

**Material Science Expertise:** Precise control of alloy composition (e.g., Cr, Mo, Ni content  $\pm 0.5\%$ ) optimizes weld corrosion resistance, low-temperature toughness, and high-temperature strength.

**Exceptional Process Stability:** Strict control of wire diameter tolerance

(±0.01mm) ensures continuous wire feeding stability and process reliability in automated welding.

### 3. Quality Assurance System

#### Stringent Certifications

- Full product range complies with 20+ international standards including DIN EN ISO 14341 (wire), DIN EN ISO 2560 (electrode).
- Certified to ISO 9001:2015 Quality Management System and ISO 14001 Environmental Management System.

#### Comprehensive Quality Control

- 100% Batch Testing: Each production batch undergoes:
  - Spectrochemical Composition Analysis
  - Diffusible Hydrogen Content Testing
  - Deposited Metal Mechanical Property Verification

### 4. Proof of Capability

- **Annual Production Capacity:** Welding Wire: 50,000 tons; Welding Electrodes: 9,000 tons
- **R&D Investment:** 5% of annual revenue (2024 data)
- **Core Patents Held:** 32

## 5. Sustainability Commitment

### Green Manufacturing Practices:

- Achieved 98% recycling rate for production waste (metal dust recovery, flux regeneration).

### Responsible Products:

- Provide long-life consumables (e.g., wear-resistant hardfacing wires), significantly extending equipment service life and reducing resource consumption and maintenance costs.

## 6. Vision

**Tensileweld** is committed to empowering customers to build safer, more durable industrial equipment through continuous material innovation and the pursuit of zero-defect quality, jointly advancing the future of sustainable manufacturing.