Metal Wire and Tube Drawbench

A drawbench reduces the cross-section of metal tubes, rods, and wires. It enhances tensile strength and surface finish by pulling the material through a die.

Overview

High-Precision Metal Processing

The Metal Wire and Tube Drawbench is a specialized industrial machine designed to reduce the cross-section of metal tubes, rods, and wires by pulling them through a precision die. This process significantly enhances the mechanical properties of the material, including increased tensile strength and a superior surface finish. It is an essential solution for industries such as automotive, aerospace, and construction that require high-quality metal components with exact dimensions.

Core Components

System Architecture

- Drawing carriage
- Die stand
- Feeding mechanism
- Frequency conversion hydraulic drawing unit
- Automatic hydraulic loading and unloading systems
- Stainless steel storage rack

Process Capabilities

Material Improvements

Enhanced Tensile Strength • Improved Surface Finish • Precision Diameter Reduction • Mechanical Property Optimization

Operational Method	Material is fed into the die while the drawing carriage pulls it through to reduce diameter; process can be repeated with progressively smaller dies.

Applications

Industry Applications	Automotive, Aerospace, Construction, Metal Manufacturing

Technical Features

Automation & Control

- Frequency conversion (VFD) hydraulic drawing
- Hydraulic automatic loading
- Hydraulic automatic unloading