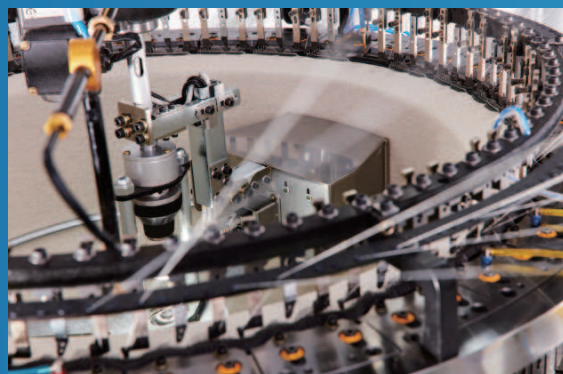


Pailung Smart Knitting Solution

Fabric Defect Detector (FDD)

Overview

FDD is Pailung's artificial vision solution designed to monitor fabric during production and identify fabric defects as they occur. When a defect is detected, the knitting machine can automatically halt production and notify the operator through the controller screen or the Pailung Online Monitoring System (POMS), allowing them to address issues such as a broken knitting needle hook or latch. FDD's sensing position is strategically located near the top of the cylinder, which enables it to prevent yarn wastage from the outset.



Features

The FDD system is equipped with an advanced AI chip known for its high efficiency and low power consumption.

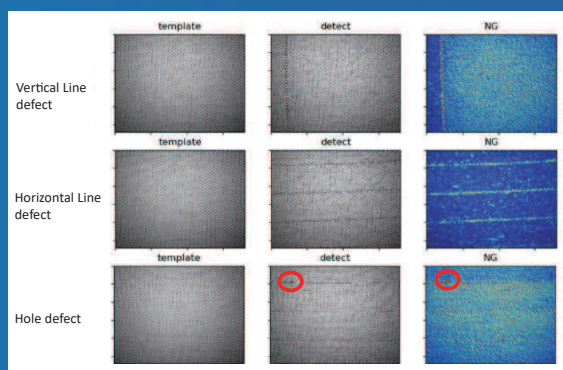
Additionally, the system features an ultra-high-speed industrial camera capable of capturing 300 fabric images per second.



Performance

The entry-level FDD supports the identification of common defects such as vertical lines, horizontal lines, and holes.

For instance, in 28 Gauge single jersey fabric, the system can identify vertical line defects down to a one-wale scale, horizontal line defects down to a one-course scale, and holes down to a 1mm² scale.



Entry-Level FDD System Technical Parameter

Camera	<ul style="list-style-type: none"> - Max. frame rate > 300 fps - IEC 60529 protection certification - SONY IMX series CMOS 	<ul style="list-style-type: none"> - FDD system total power consumption < 36W - CE \ FCC \ RoHS certification.
Light	<ul style="list-style-type: none"> - High density LED array 	
Computing device	<ul style="list-style-type: none"> - NVIDIA multi-cores AI chip 	