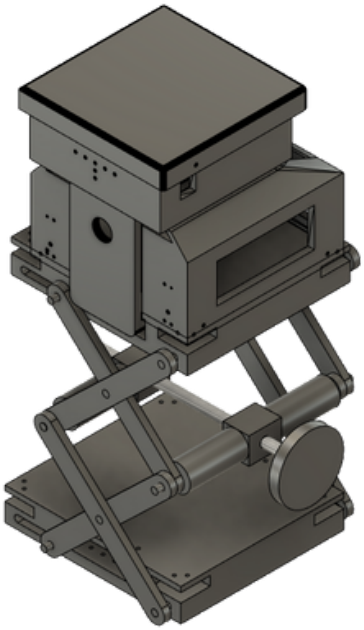
PaiByTwo



PaiMonitor

Real-Time Insect Monitoring System

PaiMonitor is an AI-powered insect monitoring system that automates pest detection using smart cameras, IoT sensors, and cloud analytics. Built for Asia-Pacific farming conditions, it reduces manual scouting and pesticide use, while delivering real-time insights and early alerts. With species-level identification and predictive analysis, PaiMonitor helps farmers take faster, smarter, and more sustainable pest control decisions — transforming traditional farming into precision agriculture.

AI-Based Pest Identification

Detects and classifies pests using high-resolution images and computer vision — accurate down to the species level.

Smart UV Attraction with Auto Light Control

12V UV LED strip attracts flying pests, while a light sensor (LDR) automatically turns it on/off based on ambient light.

Instant Alerts & Notifications

Sends SMS/WhatsApp alerts when pest thresholds are exceeded — enabling timely pest control actions.

Environmental Monitoring

Built-in sensors continuously track temperature and humidity to understand pest behavior and optimize spray timing.

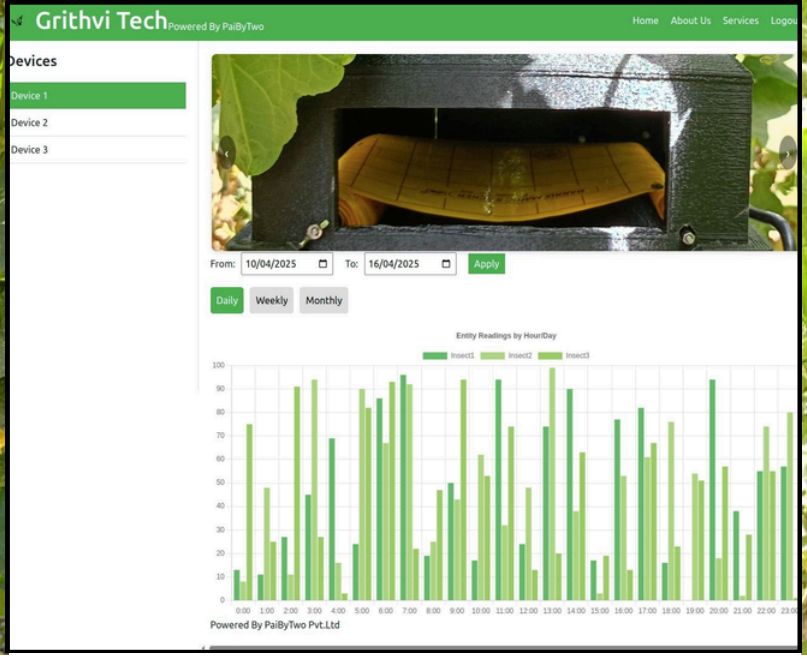
Cloud Connectivity & Dashboard

Uploads real-time pest data and sensor logs to a cloud dashboard for remote monitoring, visual trends, and analytics.

Automatic Sticky Trap Replacement

Servo-controlled mechanism rotates the sticky trap to ensure full surface coverage, without manual intervention.

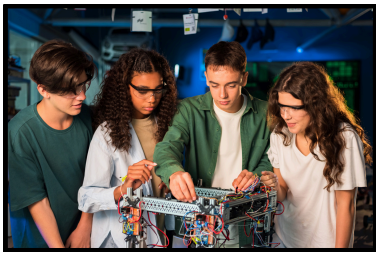
www.paibytwo.com / contact@paibytwo.com



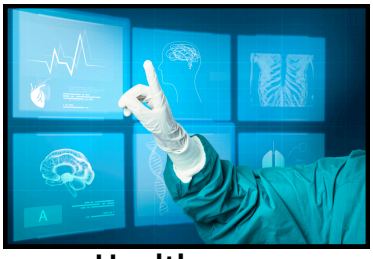
Category	Details
Technology Used	Artificial Intelligence (AI) and Internet of Things (IoT)
Target Environments	Fields, Orchards, Greenhouses, Forests
Pest Capturing Method	Sticky paper with pheromone and color attraction
Camera Resolution	12 MP HD
AI Functionality	AI-Based Pest Type Recognition & Pest Counting
Detection Accuracy	High accuracy in species-level pest identification
Trap Monitoring	Automated Sticky Paper Fullness & Dirtiness Detection
Automatic Trap Change	Motorized Paper Roller
Build Quality	High-quality material; outdoor weather-resistant design
Real-Time Alerts	Sends alerts for pest outbreak, trap fullness, and dirtiness
Environmental Sensors	Measures Temperature & Relative Humidity
User Interface	Access Web + Mobile Application (App & Dashboard)
Connectivity	Wireless, antenna-free communication setup
Installation	Easy Installation – No technical setup required
Data Visualization	Real-time pest population warnings and trends
Maintenance	Minimal – auto paper change + durable build
Spraying Suggestions	Recommends optimal spraying time based on temp and humid
Power Source	Integrated Solar Panel – no external power required

Our Service

Agriculture



Education



Healthcare

Industry 4.0

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