

FOTRIC

Sense the Digital Future

Give Them Eyes, and Ears

Expand Robots' Sensory System

FOTRIC TD2 Sense
Acoustic Image Module



Compact In Size



Light and compact,
made for mounting on
robots



Expand the robot's
auditory 'vision'



*Size can also be customized

Multiple Inspection Modes



Leak Monitoring:
Automatically locates
and evaluates
compressed air leakage
volume and vacuum
leaks



Partial Discharge Monitoring
Mode: Diagnosing partial
dischargedefects in power
equipment



Real-time Monitoring

64

Microphone array
& acoustic imaging
algorithm

5 MP

High-definition industrial
cameras. Acoustic and
image fusion for more
accurate positioning

2k-65kHz

Covering multiple
industrial sound source
types

0.3-100 m

Ultra-long working
distance



Dense In Power

IoT / SCADA / AI

Standard interface for IoT / SCADA / AI

Detect + Analyze + Output

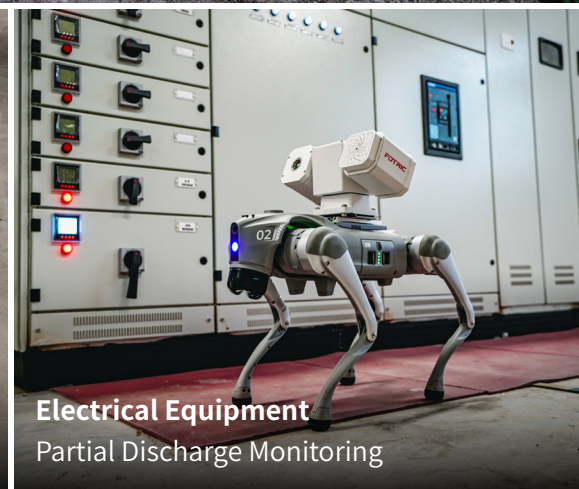
In one go



Applications



Smart Industries
Safety and Energy Monitoring



Electrical Equipment
Partial Discharge Monitoring



Mechanical Equipment Inspection
Automatic Inspection, Remote Diagnosis



Pipeline Maintenance
Discover and Reflect Defects in Real-time

Safe

Find potential defects
and prevent accidents

Economical

Quantify leakage and
cut costs

Smart

Visualizes sound

"A Sensor that can Look, as well as Listen."

Enables Comprehensive Inspections

Specifications

Model	TD2 Sense
Basic Parameters	
Microphone Channels	64 MEMS digital microphone
Acoustic Image FOV	66° × 52°
Acoustic Sampling Rate	200kHz
Acoustic Refresh Rate	25Hz
Working Distance	0.3~100m(1~328ft)
Frequency Range	2~65kHz
Detection Mode	Leak Mode: Displays the leakage level; PD Mode: Displays a PRPD diagram
Digital Camera	5-mega pixel
Holographic Stream	Transmits holographic grit data and visible light video stream, FFT diagram, PRPD diagram, and leak evaluation results.
T-FFTD®	Capture instantaneous sound signals and make it stay longer in real-time acoustic display.
Network Connection	
Ethernet Type	10M/100M/1000M Adaptive
Network Protocols	IPv4, HTTP, UPnP, NTP, UDP, TCP, RTSP, RTCP, RTP, DHCP, WebRTC
Connection Method	ONVIF
Power System	
Power Supply	12V/24V DC, PoE
Typical Power Consumption	<5.5W
Reliability	
EMC	GB/T 18268.1/EN IEC 61326-1
Protection	IP65(GB/T 4208/IEC 60529)
Shock	25g(GB/T 2423.5/IEC 60068-2-27)
Vibration	2g(GB/T 2423.10/IEC 60068-2-6)
RoHS Compliant	Yes
Physical Parameters	
Size	91mm*50mm*87mm
Weight	420g
Casing Material	Aluminum alloy
Installation Method	Tripod Mounting: Two 1/4-UNC-20 standard tripod mounting holes Supports rear mounting
Language	
Languages	English,Chinese

Infrared Thermal Module

It not only captures the temperature of each pixel in real time but also outputs full-field temperature distribution, enabling non-contact, allweather, and comprehensive temperature monitoring. It integrates seamlessly with industrial control systems, providing efficient and reliable data support for equipment safety, energy management, and smart factory operations.

