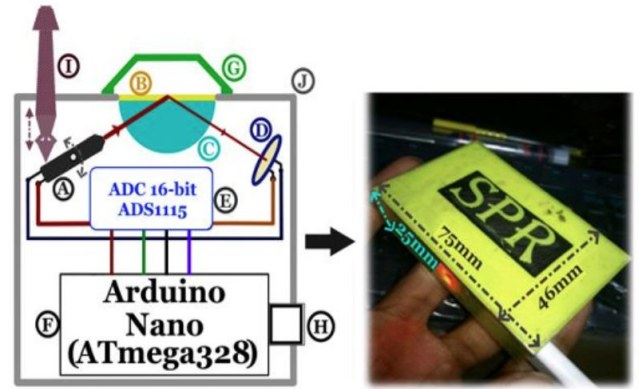


**PENDING****(IN202311047525)**

# Handheld surface plasmon resonance device in kretschmann configuration



## NEED

Field-based diagnostic tools often require high power and large equipment. What if there was a portable solution that could deliver precise results with minimal power requirements, allowing for immediate insights onsite?

## TECHNOLOGY OVERVIEW

This handheld Surface Plasmon Resonance (SPR) device enables rapid and highly sensitive measurements, offering portability, low power consumption, and real-time diagnostics. It uses a USB-powered setup, ideal for remote, field-based applications.

## TECHNOLOGY KEY FEATURES

Compact size, USB-powered, real-time measurements, high sensitivity, field deployable, portable, minimal power consumption, precise signal resolution, Kretschmann configuration, low cost of operation, rapid response for onsite diagnostics.

[Read more here](#)

## MARKET ANALYSIS

The global SPR market is projected to grow at a CAGR of 8.5% from 2023 to 2033 [Source: Grand View Research, 2023]. Increasing demand for portable diagnostic tools drives growth in life sciences and environmental sectors.

## Target Industries

Diagnostics, Environmental Monitoring, Biomedical Research, Diagnostic tool manufacturers, research institutions, environmental monitoring service providers, and healthcare technology developers.

## AT A GLANCE

- SDG 3 (Good Health and Well-being), SDG 9 (Industry, Innovation, and Infrastructure)

Technology is available for licensing/ co-development.

Reach out to Prof. Deepak Chitkara, Coordinator, BITS Technology Enabling Centre,

BITS Pilani Contact Details: [tec.bits@pilani.bits-pilani.ac.in](mailto:tec.bits@pilani.bits-pilani.ac.in), 91 1596-255913