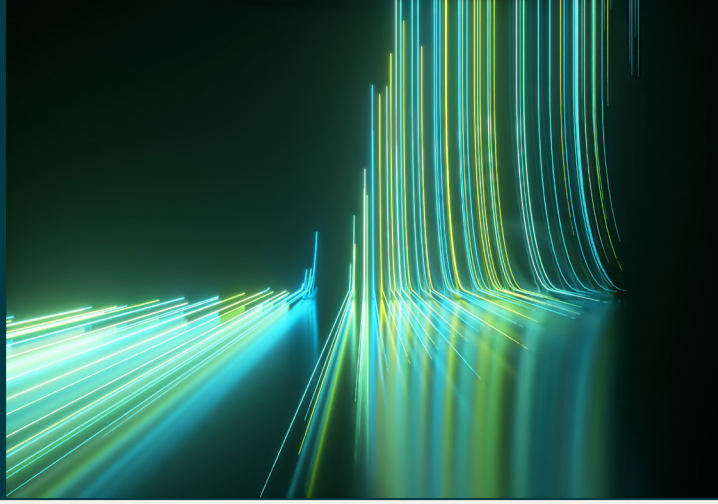
WILEY

Spectral Databases

From the leader in spectral data



ATR-IR - Clinical - Wiley

Spectra – 364

This database is only available as part of the KnowItAll IR Spectral Library subscription.

Description

Attenuated total reflectance infrared (ATR-IR) spectroscopy is a rapid, non-destructive technique for probing the chemical composition of biological tissues and fluids through their characteristic vibrational signatures. This database contains ATR-IR spectra of liver tissue and saliva samples from patients with and without diabetes, providing reference data to support analysis of biological materials. By enabling the study of spectral differences in biological samples associated with various pathologies, this resource is valuable for biomedical and clinical research, method development, and exploratory studies of disease-related biochemical variation.

Applications

- Biomedical research
- Clinical research
- Machine learning

Additional information

When it comes to spectral analysis, the more data you have the better. Wiley spectral databases provide much more information than simply the spectrum. Database records include the following valuable details when available:

- Compound name
- Patient information (gender, age)
- Instrument name
- Instrument accessory
- Sample preparation procedure

Compound coverage

- Human liver tissue
- Human saliva

Technique

Spectra were obtained using either a Mettler Toledo ReactIR15 spectrometer, JASCO FTIR-6600 spectrometer or Thermo Fisher Nicolet i120 spectrometer in the 4000-500 cm^{-1} region with a ZnSe crystal equipped.

Compatibility

- Subscription includes KnowItAll ID Expert software for one-click basic spectral searches
- Optional: KnowItAll Analytical Edition (recommended for advanced analysis)
- Import spectra from most IR instruments for direct comparison to reference spectra. For instrument compatibility, visit sciencesolutions.wiley.com/compatibility.

Trusted data from a trusted source

Wiley is the authoritative source for spectral data. Our renowned databases are processed according to rigorous protocols to ensure they are of the highest quality. Qualification procedures start at data acquisition and continue throughout the database development process. Any data acquired from trusted partners is thoroughly vetted before inclusion in our collections.