



**Made in Germany**



**SENTIERO<sup>®</sup>**  
**//ADVANCED**

**COMPLETE DIAGNOSTIC  
AUDIOLOGY  
IN ONE HANDHELD DEVICE**



THE SOUND OF SCIENCE.

# Who we are?

**Innovations  
that make an  
impact.**



The ability to hear is one of our most precious senses. For us, it is also the most fascinating. From our early years, hearing as a way of perceiving the world has a profound effect on the development of speech and our ability to learn. In old age, it influences the way our memory works. Many types of hearing impairment can be cured or treated if they are detected early on.

PATH MEDICAL develops innovative solutions, which make audiological diagnoses simple for all age and risk groups. With these solutions, pathophysiological issues, which could later only be treated partially or with difficulty, can be prevented at an early stage.

Since 2007, PATH MEDICAL's highly qualified team of experts comprised of experienced scientists and young researchers has been developing new technologies to evaluate the functionality of hearing in its different stages. The use of the most advanced measurement methods enables a reliable diagnosis of hearing impairment at an early stage.

These methods include tympanometry, otoacoustic emissions, auditory evoked potentials, pure tone audiometry, speech intelligibility tests, hearing screenings. Thanks to NHS Tracking, a reliable treatment can also be ensured. Today, PATH MEDICAL solutions, made in Germany, are used by research institutions, hospitals, medical practices and logopedics around the world.

# A technology milestone...



PATH MEDICAL's engineering team developed the EchoScreen in 1998 and continue to contribute their expertise and professionalism to PATH MEDICAL's exciting new solutions for audiology.

**SENTIERO//ADVANCED**<sup>®</sup>, developed by the award-winning group of engineers at PATH MEDICAL, was introduced in 2011 as touch-screen based evoked potentials, OAE and audiometry device.

This was followed by the launch of touch-screen based tympanometer on the **SENTIERO//DESKTOP**<sup>®</sup> platform in 2013 and USB driven Tympanometer in 2019.

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**Today,**  
**SENTIERO//ADVANCED**<sup>®</sup>  
**combines all of these**  
**technological advantages**  
**in one device.**

# ONE device with a choice of tests for patients of all ages



## **MULTIPLE TEST AVAILABILITY**

An all-in-one versatile handheld instrument with ABR, ASSR, ECoChG, VEMP, eABR, distortion product otoacoustic emissions (DPOAE), transient evoked otoacoustic emissions (TEOAE), tympanometry, pure tone audiometry and speech audiometry tests.

## **HANDHELD, PORTABLE PLATFORM**

With up to 8h battery-driven operation, take the test to the patient with large 1000 test memory.

## **BINAURAL DIAGNOSTIC AND SCREENING TESTS**

Faster results testing both ears simultaneously.

## **DEMO MODE FEATURE**

Easy to activate demo mode provides full access to time-limited modules free of charge.





## **CUSTOMIZABLE PROTOCOLS FOR MOST MODULES**

5 fully editable protocols providing maximum user control.

## **WIDE RANGE OF INTERCHANGEABLE TRANSDUCERS**

Selection of ear probes, headphones, insert earphones, bone conductors and ear couplers to optimise test performance. All transducers store calibration data internally allowing trouble-free interchangeability.

## **MANAGE AND PERFORM TESTS FROM TOUCH SCREEN OR PC**

Connection via USB allows remote operation and enhanced data viewing capability.

## **FLEXIBLE PRINTING OPTIONS**

MIRA software provides configurable printouts. Tests can also be printed using a choice of label printers & MIRA direct print to PDF.

## **NOAH COMPATIBLE**

Seamless integration with NOAH suite.



## **SPREAD SPECTRUM STIMULUS SP<sup>2</sup>® TECHNOLOGY BY PATH MEDICAL**

Faster and more efficient AEP responses are possible with spread spectrum stimulus SP<sup>2</sup>® technology by reducing the effects of interference during the test.

# **SP<sup>2</sup>® equals robustness!**

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# Auditory Evoked Potentials

**Superior performance ABR** with broadband click and chirp stimulus, frequency specific stimulus, including toneburst, in addition to the unique SP<sup>2</sup>® ABR technology.

**Fast and reliable ASSR test results** with binaural multi-frequency and multi-rate stimulation providing variable modulation rates.

**ECochG** with intuitive wave editing and evaluation using a comprehensive selection of cables and electrodes connected to PATH's electrode trunk cable.

**eABR** (Electrical ABR) to validate integrity of cochlear implants with trigger input provided by implant fitting system.



**NEW VEMP** MODULE  
for both  
**cVEMP & oVEMP** evaluation!

Depending on regulatory requirements in your territory, this module might not be available.

**Accurate AEP  
results within  
minutes!**





# Diagnostic & Screening

## TEOAE & DPOAE



**WHERE  
SPEED  
MEETS  
RELIABILITY**

### **BINAURAL MULTIFREQUENCY DPOAE TESTING**

Conducting measurements at multiple frequencies on both ears simultaneously greatly reduces test time.

### **SCREENING & DIAGNOSTIC PROTOCOLS**

with customizable test parameters and pass criteria.

### **ULTRA-HIGH RESOLUTION DPOAEs**

up to 30 points per octave, providing fine detail inter-octave information up to 10kHz for ototoxic evaluation.

### **DPOAE THRESHOLD**

provides a cochlear audiogram with objective thresholds.

### **PATENTED FMDPOAE®**

Reduce fine structure effects providing smoother DPOAE recordings with FMDPOAE® (frequency modulated DPOAE).

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# Multi-Frequency Tympanometry

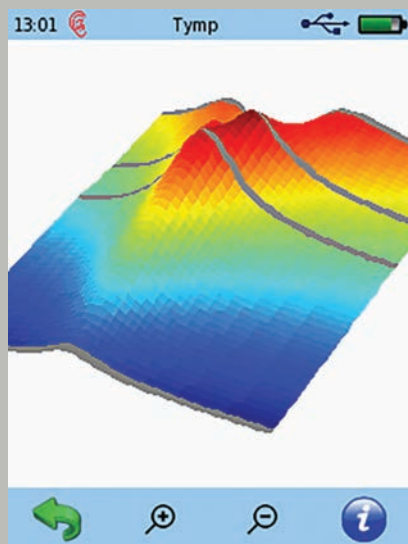
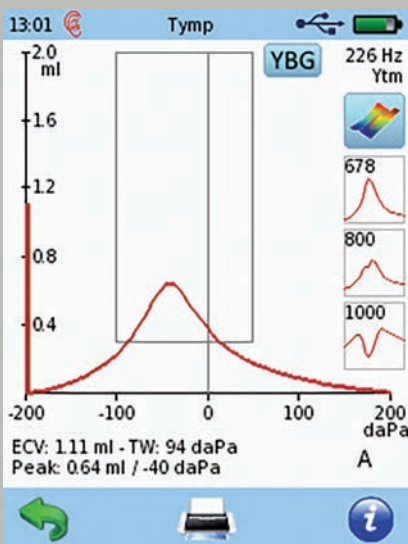


## SENTIERO//ADVANCED® (TY-MA)

- Complete your Diagnostic or Screening toolbox with the **SENTIERO//ADVANCED®** Tympanometry Add-On.
- Complement your test battery with Class 1 and Class 2 Tympanometry, Multifrequency testing, Ipsi/Contra reflexes and ETF testing for full assessment of the middle ear function.

Multi-Frequency Tympanometry invented by PATH MEDICAL, introducing simultaneous stimulation at:

- 226 Hz
  - 678 Hz
  - 800 Hz
  - 1000 Hz
- in one single recording.



**FULL AUDIOLOGY CLINIC  
IN YOUR HANDS  
WITH THE TYMP ADD-ON!**



# PATHTRACK®: a reliable partner for your NHS program



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- **SENTIERO**//ADVANCED® is precisely developed to fit your needs in newborn hearing screening, offering efficient, accurate and reliable TEOAE, DPOAE and non-sedated ABR screening.

- Providing flexible protocols, **SENTIERO**//ADVANCED® can be configured to match your NHS program regional requirements.

**The hearing future of all babies matters.  
No baby left behind with PATHTRACK®**

- **PATHTRACK**® is a specialized, ready-to-use solution using software designed to optimise management of your screening program. Incorporating wireless LTE technology provides bi-directional data transmission between instruments and the central server.

- The whole setup can be used in any location with no need to change any hospital IT settings. This enables a quality controlled tracking system to help manage NHS programs and reduce loss to follow up.

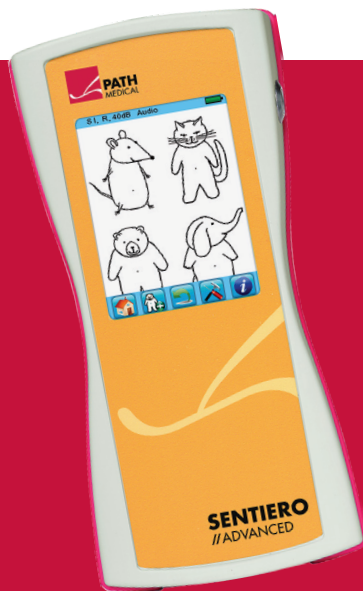
- All data is transmitted with SSL encryption, offering the very highest level of security. configured to match your NHS program regional requirements.

■ For further information on **PATHTRACK**® please visit our website:  
[www.path-medical.de/path-track](http://www.path-medical.de/path-track)

# It's **MAGIC** time!

NOAH compatible audiometry tests

are available on **SENTIERO**//ADVANCED®



- Screening or diagnostic audiometer (DIN EN 60645-1)
- Air and bone conduction with masking
- Automatic audiometry
- Free field option

Image based pure tone audiometry and speech tests designed for children:

- MAGIC
- MATCH
- spondees

**MAKE AUDIOMETRY  
FUN AGAIN  
WITH MAGIC  
PLAY AUDIOMETRY.**

- Speech understanding in noise (SUN) screening test.
- Screening tests for auditory processing disorders.
- CD/microphone-based speech tests with live speech.
- Speech tests available in multiple languages.
- Multiple transducer options including headphones and insert phones.

Our engineers, coming from Technical University of Munich or other established universities, are constantly working on improvements and new product features.

## **CUSTOMER SUPPORT**

Identifying the customer's needs and solving them to provide full satisfaction.

## **MADE IN GERMANY**

We develop, produce and coordinate every single piece for our devices in our headquarters next to Munich, Germany.

## **ACCURACY**

Every single soldering point is set carefully and accurately, enabling us to guarantee our products comply with the highest quality standards.

## **NEXT GENERATION AUDIOLOGY**

Our engineers, coming from Technical University of Munich or other established universities, are constantly working on improvements and new product features.

## **CLIENT CENTRIC**

Our main objective is to solve our customers' problems.

## **MINDFUL SCIENCE**

Scientific work that includes a vision for a better world and provides networking opportunities.

## **OPTIMIZED WORKFLOW**

We implement the tasks considering the most efficient sequence for both the product interface and the customer.

## **VERIFIED QUALITY**

PATH MEDICAL is working according to latest standards, using state of the art equipment. Each product undergoes final inspection prior to shipment. Further we always check our actions with the 4-eyes principle.

## **RELIABLE**

Officially, the lifetime of our products is 5 years. They usually exceed those 5 years significantly.

**For more information  
visit our website**  
[\*\*www.pathme.de\*\*](http://www.pathme.de)

**Go online to  
explore our full product  
range at [www.pathme.de](http://www.pathme.de)**



**LET'S TAKE  
THE JOURNEY  
TOGETHER**

**Made in Germany**



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