What's so unique about PATH's DPOAE?

With a combined working experience of over 100 years in OAE algorithms, the team at Path Medical have been responsible for the development of OAE newborn screening applications since 1998. PATH engineers developed handheld screeners, EchoScreen (now distributed under Natus' brand) and the AccuScreen (distributed under Madsen’s brand). All of this knowledge is now combined into the next step beyond newborn screening and is offered by the Sentiero! This knowledge is patented and licensed exclusively by PATH – so you will not find it elsewhere!

Sentiero is the first handheld diagnostic OAE device enabled to conduct measurements on both ears simultaneously. Four DPOAE measurements can be done simultaneously – so you can finish four times faster! The patented evaluation of artificial distortion products during the recording is used to increase robustness and reliability of each test thus decrease the amount of false pass results.

What is FMDPOAE®? Why do I need it?

Frequency Modulation of the two stimuli in DPOAE is a patented method to overcome the problem of the basilar membrane’s fine structure. Fine structure effects can lead to a decrease of DPOAE amplitude of – 20 dB which makes it nearly impossible to measure under normal conditions. But this decrease has no information on the performance of the basilar membrane and the organ of Corti itself! It is just a resonance phenomenon which would lead to an increased false refer rate on a single measurement. FMDPOAE can resolve this and helps to increase the specificity of the test. It reduces the false refer rate. The fine structure differs from person to person – you must know it to avoid it!

Multi-center study on FMDPOAE is conducted by ENT-department of the Technische Universität München, Germany (Prof. Dr. Dr. Thomas Janssen), ENT-department of the Universität Regensburg, Germany (Prof. Dr. Peter Kummer), East Tennessee State University, USA (Prof. Dr. Jacek Smurzynski), publication in preparation.


Did you check out the DEMO mode on your Sentiero yet? 15 days free of charge trials of full featured modules and tests! Do you want to upgrade?