



Interacoustics Academy Clinical Diploma Newborn Hearing Assessment

What is the Clinical Diploma?

The Clinical Diploma is an online course designed to deliver theoretical and practical training for evoked potential testing in newborns. Covering auditory brainstem response (ABR) assessment, otoacoustic emissions (OAEs) and auditory steady state response (ASSR) testing, this course will equip delegates with the knowledge and skills to perform accurate hearing assessments in the newborn population.

How does the course work?

You will follow case studies through from the point of referral, via the diagnostic process to the point of decision making regarding their management. Video presentations, demonstrations and practical sessions will be used to familiarise delegates with evoked potentials equipment, patient preparation, testing

technique, establishing threshold, results interpretation and the management of straight forward and complex scenarios. Your Interacoustics Academy course tutors will guide you through a series of interactive tasks and knowledge checks, as well as practical components to allow you to get hands-on, in order to facilitate the optimum learning experience.

Who is this course for?

This course is ideal for any clinician new to evoked potentials testing in young infants, or for more experienced clinicians seeking a refresher or update to their clinical practice. You will need access to an evoked potentials system such as the Interacoustics Eclipse in order to complete the compulsory practical components of the Diploma.

What will this course cover?

The patient journey and the diagnostic pathway structure

- The importance of early intervention and newborn hearing screening programmes
- Referral routes into diagnostic ABR and the different options available
- Pre-appointment preparation: what your clinic can do

Room set up and environmental considerations for evoked potentials testing

- How to create the ideal testing environment
- How to check for and manage environmental and patient noise
- Protocol management: how to adapt the parameters available for the best ABR test

Patient preparation and history taking

- What to do when the patient first arrives
- History taking, electrode placement and impedance checking

Starting the auditory brainstem response

- Natural sleep vs sedation: which is best?
- What other tests should be performed, and when?
- Starting the test: stimuli, intensity levels, frequencies, transducers, ear side and discharge levels

Getting to know your wave V

- How to identify and mark wave V
- Strategies for when wave V isn't identifiable

Improving ABRs using the CE-Chirp® family of stimuli

- The importance of synchronised neural firing and how different stimuli affect this
- Broadband vs frequency specific stimuli
- Evidence to support the use of the CE-Chirp® family of stimuli

Establishing threshold in ABR

- The categorisation of individual ABR waveforms
- What is threshold and how do we define it in the world of ABR testing from the series of ABR waveforms recorded?
- Testing strategy for efficient ABR threshold identification

ABR correction factors

- The need for and evidence behind ABR correction factors
- What correction factors are available and how do we apply these values?
- The problem if we do not use ABR correction factors

What happens when a hearing loss is detected: Bone conduction ABR testing

- The importance of performing bone conduction ABR testing
- Understanding stimuli and transducer effects
- Testing strategy and trouble shooting: practical tips
- 2 channel / contra-curve bone conduction testing

Using ASSR to complete the audiogram

- What is ASSR testing and how is it performed?
- Clinical application of ASSR testing for the newborn population
- Integrating ASSR testing into the clinical pathway

Hearing loss management: Straightforward and complex cases

- Sensorineural hearing losses, mild hearing losses, conductive hearing losses, asymmetrical losses, mixed losses, microtia and atresia

Masking the ABR and ASSR

- The difference between masking in evoked potential testing and pure tone audiometry: why an alternative approach is required
- ABR and ASSR masking calculators: tools to establish if and when masking is required, and how to much masking noise to apply

Diagnosing auditory neuropathy spectrum disorder

- The pathophysiology of ANSD
- The diagnostic process for identifying ANSD
- How to record a cochlear microphonic

What do I need to do?

In order to obtain the Interacoustics Academy Clinical Diploma, you will need to navigate through the course. There are a total of 16 lessons, each of which should take between 1 and 2 hours to complete. However, there is no set time limit and you can revisit each lesson as many times as you wish. You may take as long as you wish to complete the full course. Through the course you will find a series of tasks, questions and interactions to assist in your learning experience and check your knowledge. Some of these tasks are compulsory and you will need to submit evidence of completion to the Interacoustics Academy in order to obtain your Diploma. At the end of the course, the final step is completing an exam, which you must achieve a score of 80% or higher in order to pass. After you have passed the exam and submitted the compulsory tasks, we will be delighted to award you with your Clinical Diploma Certificate.

Cost: 800 Euros.

