

Real Time Ultrasound Biofeedback

What is the role of ultrasound in spinal stability retraining?

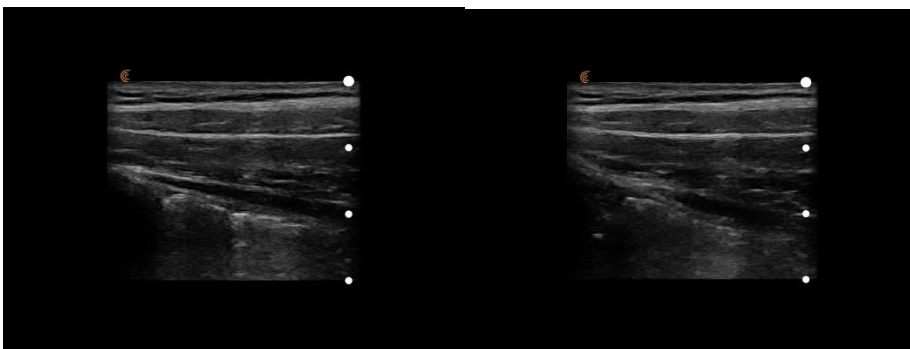
If you've already tried exercises to get your stabilisers working, you will know that it can be difficult and frustrating at first. The muscles that you are trying to work are deep within your body. They are hard to feel and often hard to visualise. It can be very difficult to know whether or not you are doing the exercise right and if you're not then you may be wasting your time and may even stir up your symptoms.

Real Time Ultrasound allows us to watch the muscles as they contract and relax. You and your physio can both see what is happening as you try different ways of switching on the stabilisers and you can get a feel for what it's like when you get it right. The ultrasound also allows us to take measurements to track your progress through training.

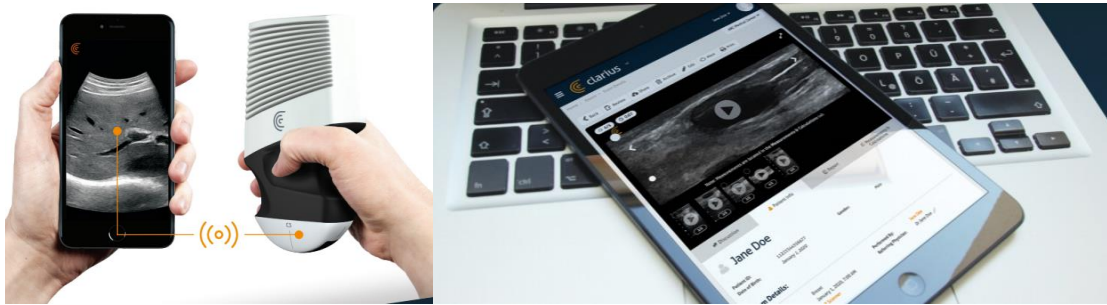
What happens during a Real Time Ultrasound Biofeedback session?

Your therapist will apply a gel to your skin to allow the ultrasound waves to transfer from the scanner into your body. Depending on the muscles being trained, the scanner may be applied over your abdomen, back, groin, buttock or the side of your hip. To image your pelvic floor muscles, the scanner is applied to your abdomen which usually allows an image to be obtained of the pelvic floor providing your bladder is moderately full. The image that is produced can be viewed on a connected device such as the iPad we generally use at Flex-ability as well as on a second screen if necessary to allow easy viewing by you and your physio.

Depending on the stage of your training, your physio will work with you to find different cues and positions that allow you to activate the target muscles effectively. Training can be progressed into various postures and movement patterns as your control increases.



Above: RTU images of the Transversus Abdominus muscle while relaxed (left) and contracted (right)



Above: Flex-Ability uses a compact, portable scanner that allows for biofeedback training during dynamic functional movement

If you would like to familiarise yourself with dynamic images like what you can expect to see during your session, please visit www.flexabilityphysio.com.au/real-time-ultrasound-biofeedback

Preparing for your session

Wear comfortable clothing that allows easy access to your abdomen and back and if possible to your hip area. Loose shorts are ideal. To enable imaging of your pelvic floor, empty your bladder around 2 hours before your appointment and then drink half to one litre of water and try not to empty your bladder again until after your session.