

## **MAKING WAVES.**

Waves are so hypnotic. They can be big or small, scary or enchanting, endless or temporary; some people make waves, others try and reduce the impact of said waves; we can have brain waves intellectually; there are many different waves of different elements and different types, in fact waves are pretty much in our lives on a daily basis.

I grew up near the sea so was fortunate enough to spend many a minute either splashing around in waves or simply just strolling alongside them. Whichever waves - I love the sea type and love to spend time sitting and watching them repeatedly, endlessly, soothingly coming to the shore and then re-merging with the sea.

But today I am not talking about water-waves. I am talking about brain waves, of which there are a few. I am no scientist and don't profess to be one but since I have been reading about brain waves, I can't help wondering what they look like if we could see them! I do know what people look like when experiencing certain brain waves, as the whole point of what I do is to get the brain to be "in" certain brain waves patterns so the physical and emotional bodies can be restored.

BETA waves - so these are brain waves which are the ones produced when we are experiencing conscious thought. They are to do with logical thinking and have a stimulating effect. A bit like the apple that hit Sir Isaac Newton on the head while he was sitting under the tree that got him to thinking about gravity - admittedly he probably was more in an alpha kind of wave state prior to being hit on the head! Gravitational waves!

Beta waves are cool - they are the second fastest type of brain frequency, and are present when we are using cognitive thought. So when we are coming up with theories of gravity and whatnot then those beta waves are firing away. Being engaged, solving puzzles, thinking logically and analytically. Really important brain waves. Their frequencies are between 12 and 40 Hz. Listening to binaural beats can create beta waves in our brains. These work if a person can hear a

tone of say 405 Hz in one ear and a tone of 415 Hz in the other. This is the binaural beat which has a frequency of 10 Hz. There are loads of examples on YouTube for you to explore.

It's important to be able to feel engaged with activities so the beta waves are flying around - I know when I was at school I had some reduction of beta waves during some of my classes - maybe schools could tap into this, play some binaural beats throughout the school day???

BUT! we also have our ALPHA waves. These are lovely waves and have a frequency of 7 to 12 Hz. These are the chill-out waves, inducing relaxation, pre-sleep states. When your eyes are closed and you're not asleep, kind of vibe. So when you've been using those beta waves to come up with fabulous and exhausting ideas, you can sit back, close your eyes and relax. Walking in nature, by the sea, just letting your mind wander (NO PHONES) and being able to fully process and allow the alpha waves to wash over your brain and just be in the flow. Colours can induce different emotive reactions and apparently - blues and greys invoke calm emotions therefore increasing the alpha waves and putting us in a state of relaxation.

THETA waves - well these super special waves are where we can access that very important part of the brain that is often, and sadly, not always heard. This is because (my theory), our primitive brain is usually being quite loud and needs a helping hand in being quieted down. A bit like an overtired child. So when our theta waves are activated, we are in a state of deep relaxation - more so than those lovely alpha waves. We have lots of theta wave activity during sleep and often we are dreaming and there is an element of focus in the brain.

This focus, according to some, is where the subconscious mind, our own bespoke and personal font of all knowledge, is alive and kicking and if we are able to hear it and take note, we can really make huge strides in our mental and therefore physical wellbeing. We can become unstoppable, resilient to the stresses of the world we live in, and generally be all powerful and fabulous. Theta

waves have a frequency of 4 - 7 Hz so are one of the lower frequency waves. But they are pretty awesome.

And then we have DELTA waves. These are the slowest waves out of the four. This is when we are in the deepest levels of relaxation. They are associated with restorative and healing sleep. SOOOO important. We do not dream when we're chucking out delta waves - we are in a deep and dreamless state. If you are woken up during delta time, then you may well be confused and disorientated. This is when your hippocampus is happy. It is receiving all the healing and help it needs to sort the day's memories out and do its job well.

I often tell my hypnotherapy clients about how important it is that the brain is able to defrag - in the very olden days when computers were the size of your 55" television and just as deep, they needed to defragment. This would take hours but it was worth it as the computer would then work so much better and be that little bit faster. In a way, they too were having their own version of delta waves sleep. Our hippocampus is an extremely important component of the brain and needs to be looked after and cared for. We need our memories put in the correct part of the brain and in the correct way - so bring on those delta waves. I liken it to a building site at night - dumper trucks carrying all the ingredients to the right place at the right time, needed to build the buildings in the optimal way. When one dumper truck gets it wrong, then this can have a domino effect on the whole workings of the building site.

All these waves are important and we need all of them to be functioning well and in the right place at the right time yada yada yada. I do love a wave, be it water or ethereal.... The one bit of advice I would like to give is that we look after our brain health and become more aware of the impact these waves have on our lives and future lives.