



Connected Learning

NEUROFEEDBACK AND EDUCATIONAL SERVICES

Understanding Brainwaves



	Associated with:	Too Much:	Too Little:
Delta 1-3 Hz Originates from the Brain stem	Restorative sleep, regulate heartbeat and digestion	Learning disabilities, attention issues, cognitive deficits, traumatic brain injury	Trouble Sleeping
Theta 4-7 Hz Originates from the Limbic system	Daydreaming, dissociative state, deep and raw emotions	ADHD, hyperactivity, impulsivity	Poor emotional awareness
Alpha 8-12 Hz Originates from the Thalamus	Regulatory, relaxed, calm, but ready to go or further calm down	Poor sleep, depression, anxiety	Stress, adrenal fatigue, confusion, reduced cognitive stamina, cognitive processing issues
Beta 13-30 Hz Originates from the Cortex	Awake, conscious thought, logical thinking, information processing, complete tasks	Stress, anxiety, inability to relax,	ADHD, daydreaming, depressed, poor cognitive processing

**QEEG brain maps are NOT diagnostic but may be indicative of certain issues.

Longo, Robert E. "A Consumer's Guide to Understanding QEEG Brain Mapping and Neurofeedback Training" 2021.