

TouchStar™ Theta Burst is a transcranial magnetic stimulation (TMS) treatment protocol that involves higher frequency pulses than standard TMS protocols. Typically, this results in a shorter duration of each treatment.

Competitive Advantage of TouchStar from NeuroStar®

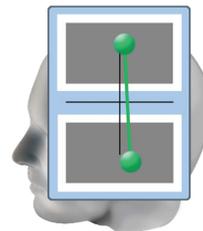
CONTACT SENSING

- **Only NeuroStar Advanced Therapy delivers the right dose to the right location every time**, and provides real-time feedback about the coil's angle and contact.
- **When patients move during treatment, contact with the coil can be compromised.** Coughing, sneezing, or fidgeting can cause the patient's head to lose contact resulting in as much as a 47% loss of the prescribed TMS dose. NeuroStar alerts the treater whenever the patient does not receive sufficient contact with the coil.

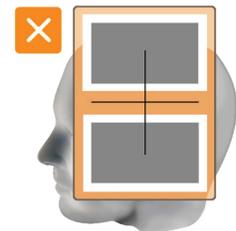
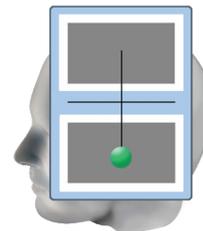


NeuroStar avoids this problem in two ways:

1. Patented Contact Sensing system providing real-time feedback in three dimensions
2. Special contoured coil designed to fit the head



Good Contact



Bad Contact

WITHOUT CONTACT SENSING, DOSAGE MAY BE COMPROMISED

Full ~3
minute
theta burst
dosage
treatment



One Missed
Interval 00:10



Three Missed
Intervals 00:30



Six Missed
Intervals 01:00

How does TouchStar™ theta burst work?

	Standard Protocol	19 Minute Dash Protocol	TouchStar
Pulses	10 per second	10 per second	3 pulses per burst 20 msec interpulse interval 5 bursts per second
Stimulation Time	4 seconds	4 seconds	2 seconds
Inter-train Interval	26 seconds	11 seconds	8 seconds
Number of Pulses	3,000	3,000	600
Intensity	120% resting Motor Threshold	120% resting Motor Threshold	120% resting Motor Threshold
Duration	37:30 minutes	18:45 minutes	3:20 minutes

There are two common forms of theta burst stimulation:

- **Intermittent theta burst (iTBS)**
often involves 3 bursts of pulses at 50 Hz every 200 millisecond (ms) repeated every 10 seconds for 190 seconds
- **Continuous theta burst (cTBS)**
generally involves 3 bursts of pulses at 50 Hz every 200 ms repeated continuously for 20 or 40 seconds

TouchStar is intermittent theta burst, which is the more commonly used form of theta burst, as continuous theta burst puts extreme strain on existing TMS equipment.

- **NeuroStar® is committed** to advance the understanding of clinical outcomes with TouchStar through data collection with TrakStar®
- **Please reach out** to your NeuroStar representative for more information on joining the NeuroStar Outcomes Registry to further the science of TouchStar and TMS

For more information on using the new TouchStar protocol in your practice, please contact your NeuroStar Representative.