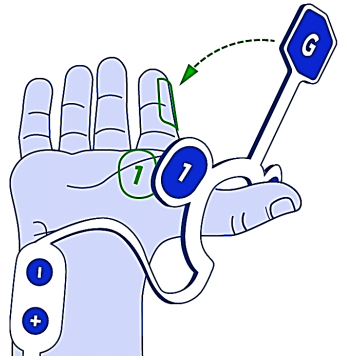
TwitchView®
TRAIN OF FOUR MONITOR

Scan the QR code to Access the TwitchView Monitor In-Service Video and Site

Hand Placement:

1. *Place stimulating electrodes directly over ulnar groove just proximal to wrist crease.*
2. *Wrap J-shaped cutout connecting 1 & 2 around inside of thumb and affix G to index finger.*

Note: Numbers reverse on left hand.

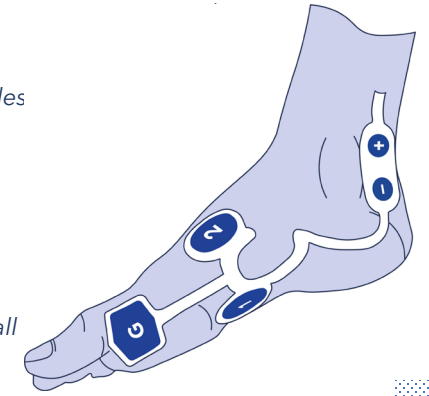


Ulnar nerve is medial to body (pinky side)

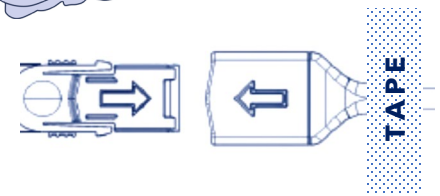
Foot Placement:

1. *Place stimulating electrodes on posterior tibial nerve behind medial malleolus.*
2. *Wrap1 & 2 around flexor hallucis brevis and affix G distally.*

Note: G may only extend to ball of foot.



3. *Connect electrode to cable and tape cable to patient.*



Tips:

- Expect faster muscle recovery of the face and diaphragm.
  - Patient can take spontaneous breaths while in PTC.
  - TOFC = 4 on the face can equate to TOFC = 1 or PTC at the hand.
- If EMG amplitude is low or decreases after repositioning, increase stimulation current. ☰ Menu → Stimulation Parameters
- Extubate after TOF ratio of ≥90%.
- Reset monitor after every case. ☰ Menu → New Session → OK

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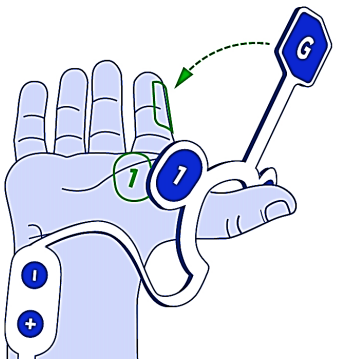

Ulnar nerve is medial to body (pinky side) on wrist edge.

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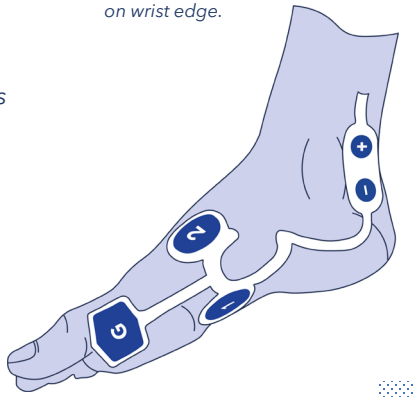

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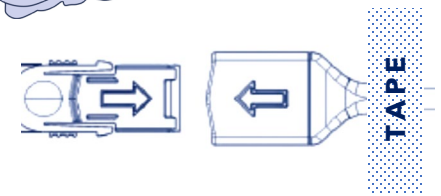

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EMORY HEALTHCARE

EHC Guidelines for Reversal of Neuromuscular Blocking Agent

These guidelines do not substitute for clinical judgment. There are clinical situations that these guidelines do not apply. **For safe practice, patients should only be extubated if the TOF is ≥ 90%.**

Reversal of Rocuronium or Vecuronium

TRAIN-OF-FOUR ASSESSMENT AT ULNAR	REVERSAL AGENT	NOTE
Train of four ratio ≥ 90%*	None needed	Requires quantitative twitch monitor*
TOF count = 4	Neostigmine 70 mcg/kg + glycol. 15 mcg/kg	IBW
TOF ratio ≤ 50%* or TOF count = 2-3*	Sugammadex 2mg/kg	ABW
TOF count = 1* or TOF count = 0 and PTC ≥1	Sugammadex 4mg/kg	ABW

Recommendations:

1. Patients who receive nondepolarizing neuromuscular blockade and will be extubated in the operating room should have the neuromuscular blockade monitored at adductor pollicis with a quantitative twitch monitor when available and with qualitative monitoring when not

2. If only qualitative TOF is used, neostigmine may be used if 4/4 twitches are elicited. If there are fewer than 4/4 twitches, sugammadex may be appropriate.

3. If quantitative train of four is used and:

    a) TOF is ≥ 90%, no neuromuscular reversal is necessary
    b) TOF count is 4, reversal with 70 mcg/kg neostigmine + 15 mcg/kg glycopyrrolate is recommended
    c) TOF Count is ≥ 1, Sugammadex 2 mg/kg ABW
    d) PTC ≥ 1 – TOF count <1, Sugammadex 4 mg/kg ABW

4. If a patient has no PTC, consider:

    a) Waiting to reverse until PTC ≥ 1 (preferred) or
    b) Administer 4 mg/kg Sugammadex, wait 10 minutes, and then assess PTC. Follow PTC rescue algorithm (Table 2).

5. For emergency uses, sugammadex 16 mg/kg ABW may be administered for rapid reversal of rocuronium or vecuronium.

6. If the calculated dose of sugammadex is <300 mg, consider administering 200 mg and reassess the TOF after 5 minutes to see if additional sugammadex is required.

7. If the calculated dose of sugammadex is >300 mg, utilize a 500 mg vial for your dose.

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