

Neurological Insights:

My Time Shadowing at Sinai Hospital

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Bioengineering

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Introduction

This past January, I had the pleasure of shadowing a neurologist, Dr. Braeme Glaun, at the Brain and Spine Institute of Sinai Hospital. Dr. Glaun specialized in electromyography (EMG) tests, as well as Multiple Sclerosis patients, and while shadowing, I was able to sit in on many cases. I was also given the privilege of viewing multiple spinal surgeries.



. Image from Access Sport Medicine and Orthopedics featuring an electromyography test (<https://www.accesssportsmed.com/electromyography-emg/>)

Activities:

During my time at Sinai, I sat in on many multiple sclerosis cases, and watched as Dr. Glaun would assess the patient's health and come up with possible treatments and therapies to improve their quality of life. I also witnessed many EMG tests and was taught how to assess the electrical activity displayed through fibrillation waves.

Takeaways:

Shadowing at Sinai gave me valuable insight on the importance of various therapeutics. While I already knew of the great importance of medicine, I hadn't realized how vital it is to improving quality of life for individuals with incurable diseases. Furthermore, I was able to learn of the usefulness of innovations in medical devices firsthand, having seen multiple electronic study devices, x-rays, and even shunts, devices which control fluid levels inside the brain. My time at the hospital further motivated me to continue in the field of Bioengineering with a focus on biotherapeutics, so that I too can improve the quality of life for patients with autoimmune and neurological diseases.

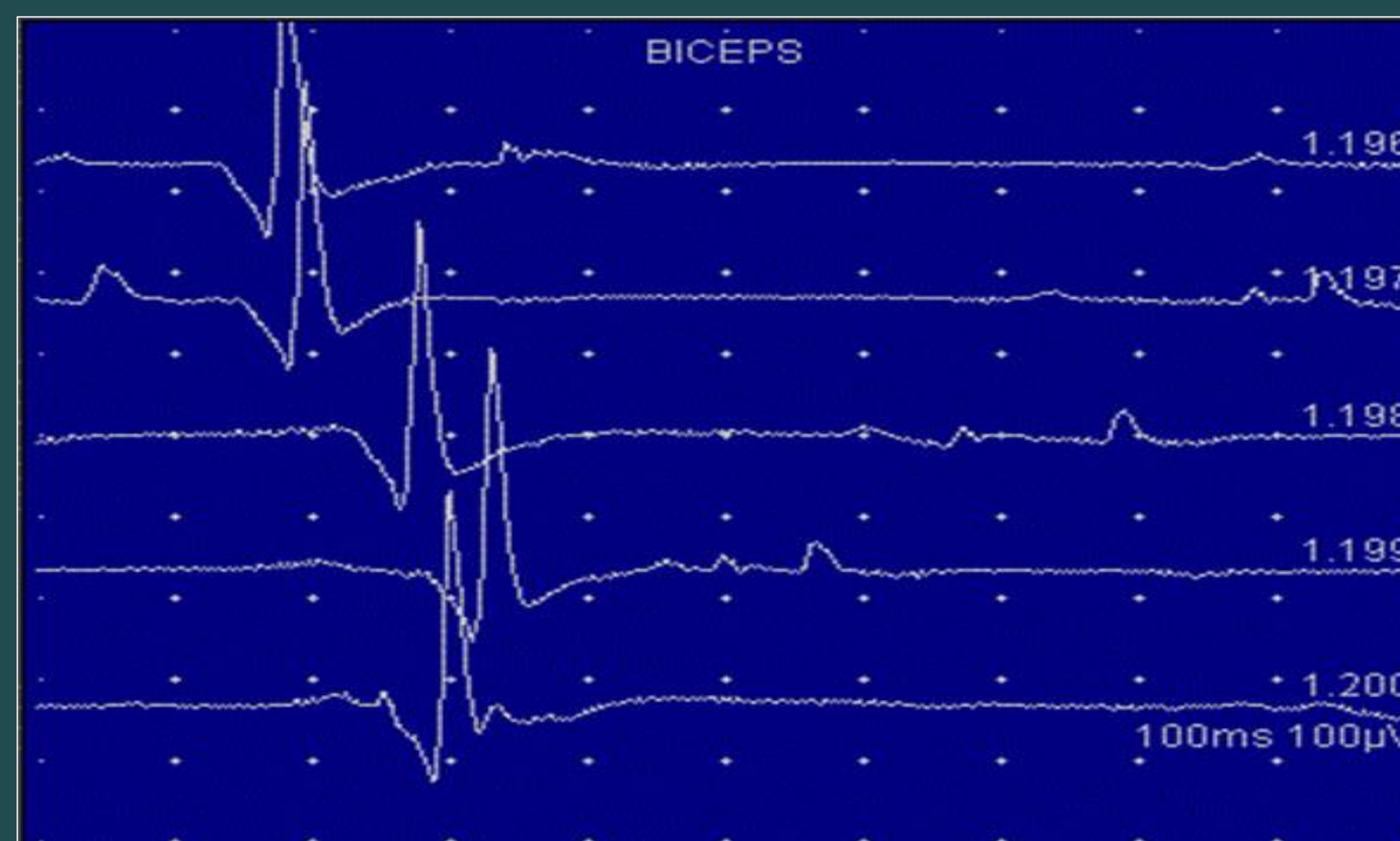


Image from Carefree Neurology Clinic depicting EMG readings <https://carefreeneuro.com/nerve-conduction-study-electromyography-testing/>

Site Information:

Sinai Hospital

2401 West Belvedere Avenue, Baltimore, MD 21215

Dr. Braeme Glaun

Site mission:

Provide comprehensive brain and spine care to patients through thorough treatment

Issues Confronting Site:

- Patient insurance and healthcare
- Patient "no shows" due to poor mobility and inadequate transportation services

Future Work:

- Work as a bioengineer to create and innovate biotherapeutics that can improve patient well being
- Apply to medical school if working in engineering is not for me

Acknowledgments:

- I would like to thank all the Sinai Hospital Staff for being extremely accommodating and welcoming, and a special thank you to Dr. Braeme Glaun for giving me the opportunity to shadow and taking me under his wing. I would also like to thank Dr. Holtz and Dr. Merck for their guidance and support throughout my scholars and professional journey.



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