

LIGHTNING DATA CENTER MINUTES

January 8, 2021
ST. ANTHONY HOSPITAL
www.lightningdatacenter.org

Monthly Quote: “The more brilliant the lightning, the quicker it disappears.” - Avicenna
Source Credit: <https://www.wisesayings.com/lightning-quotes/>

1. Members Present: Clark, Langford, Stemple, Yarnell, Terry, Crow, Brewer (Jeremiah) and Swanson. Clark moderated. Meeting began at 11:50 AM and ended at 1:05 PM.
2. **VERY IMPORTANT – PLEASE READ!** We will continue to hold meetings via Zoom only. As of January 8, 2021, the number of cases has fallen since last month and the positivity rate is still around 7-8%. We may be able to resume in-house meetings as early as February 2021. I will keep you posted.
3. The LDC is accepting donations, either as cash or check. If you donate via check, please make your check payable to Steve Clark at 755 S. Clinton Street, #2A; Denver, CO 80247. He will cash the check and keep the cash holdings specifically for the LDC. When the LDC incurs expenses, Steve will pay for services rendered through his bank account using the cash from LDC’s cash holdings. A log will be maintained detailing the inflow and outflow of monies. At the present, the LDC has \$482.00 in cash.
4. Dr. Phil Yarnell said the Lightning Strike & Electric Shock Survivors International (LSESSI) group is planning to hold a virtual conference meeting this February. Their website, www.lightning-strike.org, lists dates of February 27 and 28. A flyer is available on the website.
5. We are still working with the graphic artist to get the lightning safety brochure ready to print.
6. We were scheduled to meet with Mike Utley during this meeting to explore a possible “merger” with the LDC, but he had other commitments come up. We will reschedule his appearance.
7. We discussed the lightning strike Coleen Crow had in Grand County. We spent some time on Google Earth trying to figure out where she was when she was hit and we came up with a couple of locations where she may have been struck. Once we have that figured out, we will have a more complete presentation of her case.
8. Ken Langford showed three Russian videos which recorded an apparent occurrence of ball lightning from different angles. Ken reviewed the video and wrote a short report on it. He found the object was most likely not ball lightning due to an easily visible shadow on one side of the object. Genuine ball lightning would be fully illuminated around the sphere without a shadow.
9. We spent most of the meeting with Jeremiah Brewer, the father of Jacob, the boy whose case we heard last month. Jeremiah e-mailed Phil a detailed history of what happened to Jacob and what he has been through since. Here follow my incomplete notes about what happened.

Fasciotomies were performed on Jacob to relieve the pressure in Jacob's leg muscle and maintain blood flow to his foot, which later resulted in some nerve damage.

Two MRIs were taken at two different facilities. The first was non-diagnostic. The second indicated damage to the spinal cord between the T6 region and the anterior section. Further evaluation of the damage will be needed. The idea of an additional MRI of the thoracic and lumbar areas was discussed.

Jacob is currently in a paraplegic state because he cannot voluntarily move his legs below his hips. Two types of EMG tests were performed. The first is a nerve conductivity test to see if any muscles twitch distally (knees, ankles and toes) and the second involves the placement of a needle to see if there are any voluntary contractions or spontaneous activity. The first showed there was no conductivity to the leg and the second showed some contraction on the gluts and on the outer side of the left leg.

Jacob is able to contract the gluts on both sides of his body along with both hip flexors but he cannot move his legs. He can also contract the outer left thigh on his left leg and the right inner thigh. He can feel his butt muscle tighten. Both of Jacob's feet have the most sensation on the bottom of the foot and the least sensation on the top of the foot. Initially, he was able to move his toes, but cannot do so now.

Dr. Yarnell met with several of his professional colleagues that are experts in spinal cord injury to get their thoughts on Jacob's case, with the following question: What is the prognosis for functional activity in Jacob's legs? Here is some of what came out of those discussions.

There are three places in the nervous system that control the nerves that go to the legs: 1 – the end of the spinal cord, 2 – anterior horn cell (cells from which the nerves arise), and 3 – nerve roots and nerves.

Some further avenues of investigation and treatment were discussed. A further EMG test may reveal if there is conduction down to some of the muscles. Another possibility is the stimulation of the end of the spinal cord with TSS (trans-spinal stimulation), which is experimental and not an established procedure. Legs are controlled by the thoracic portion of the spine on down. Sores and ulcers need to be prevented in areas where sensory activity is reduced. Contractures of the weak muscles need to be prevented through the use of active mobility. A functional electric bicycle is being used now and Phil mentioned robotic walking as another option.

We will keep the membership updated as things develop.

10. LDC welcomes your medical questions. Please send them via e-mail to Steve Clark at sclarktoto@gmail.com. Your medical questions will be forwarded to Dr. Phil Yarnell for his review and will usually be taken up for discussion in the next month's meeting. Please be advised any questions posed are for the general consideration by the group and do not constitute a formal medical opinion. If a formal evaluation is requested, arrangements can be made directly with Dr. Yarnell. If you have a medical emergency, please call 911 or your local EMS.

11. Questions, comments, error notifications, and critiques of these minutes are welcome. Please forward those to Steve Clark. Please keep your communications professional and respectful. Communications will be forwarded to the appropriate author(s) of the minutes and addressed accordingly.
12. LDC Disclaimer: These minutes do not represent official positions of the LDC or its members. They simply reflect the comments made at the meeting. Furthermore, the LDC does not implicitly or explicitly recommend or endorse any product or service. Any product or service presented in these minutes is done so for purposes of discussion and analysis. The merit (or lack thereof) is open for the consideration and review by the entire membership.
13. Next meeting: Zoom meeting. Friday, February 12, 2021, from 11:45 AM to 1:00 PM MDT.

Respectfully Submitted,
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Lightning Links

This is a monthly listing of periodicals, websites, and videos about lightning and allied areas from a variety of sources. A headline or description is listed, followed by the link. Please note that some of the links are perishable, which means you'll need to go to the source for the information.

No Links this month.