

Name: Luke Buonanno

Date of Experience: 12/20/23

Name of Menter: Neil

Location: Flow Serve

Hours of Experience Obtained: 2:30 hours

Mentor's Profession: Mechanical Engineer

1. I arrived at Flow Serve and was checked in by my mentor Neil. Once we checked in he took me to his office and we talked a bit about what brought him to engineering. He is the manager of research and development. We talked about their design process and what really they do in the building that they were in. Neil explained to me that he had previously been in charge of the small lab that is found in the Flow Serve in order to create test loops to test the prototypes that they create in the office. I then talked with the engineers in the office who explained their workflow. Essentially as they explained to me they did a few months of development on a pump (this location pretty much only works with pumps) in order to fulfill requests that were given by clients. After they design all of the things in order to satisfy the customer's need (which is essentially given through two dimensions, flow (feet of movement per minute) and head (pressure of the liquid), and slightly exceed all of these parameters they initiate the testing phase. This phase consists of many months of ordering custom parts and even printing some in the lab with 3d and resin printers. They then benchmark the parts by plugging them into a test loop and testing all the parameters that they theoretically designed to work. This stage very often fails and they have to go back and see what went wrong. If something goes wrong the project is often pushed back a couple more months while ordering new parts. After this, the finished pumps are ready to be manufactured and sold.
2. The team approach is very cumulative in this workspace. Their time-management skills are not really needed as Neil explained that they usually have plenty of time to finish their projects. Their team approach is not necessarily everyone talking together and working in a team but rather everyone taking a piece and contributing to that piece of the puzzle in order to finish the project as a whole.
3. Three adjectives I would use to describe this work environment would be laid-back, hands-on, and friendly. I would say hands-on because once an employee finishes a project they get the opportunity to build and test their prototype. I would say laid-back because there are not huge repercussions for a pump failing in testing, everyone recognizes that mistakes happen there and works to fix them. Finally, I would say they are friendly because although everyone is working on their own project they feel fine asking each other questions and working together on issues.

Emerging Health Professionals Shadowing Schedule
Wednesday am December 20 8:00am - 10:30am
Dr. DeBlois' Students

LVHN Mentor Signature: Phil Hanlon Email: nhavri1la@hanover.com
Date: 12/20/23 Time arrived: 7:43 Time left: 10:36

Reminder if you are going to be absent you need to notify us prior to our 8am start. Failure to do so will remove you from shadowing per our EHP policy.

LVH-Tilghman Ambulatory Surgery Center, as arranged with Stephanie Smilgus. Please go to 4825 West Tilghman Street Allentown PA 18104. Meet Stephanie or Louann in main lobby. You will need to change into scrubs/wear sneakers. 610-402-2780, report at 8:20am. With available staff - Iqrah Mohammed

LVHN MUHL, Trauma 2545 Schoenersville Rd, Bethlehem PA 18017 (as arranged with Dr. Stirparo) Please go to the South entrance and park. Enter South entrance lobby and take the ORANGE elevators to the second floor. Wait for attending to pick you up. If waiting awhile call 484-884-1612 and the attending on call will find them. Report time 7:00 AM. With Dr. Stirparo/team: Madelyn Unser

LVHN-CC, Labor & Delivery (as arranged with Cathy Jacobs (610-402-7158). Take left in main entrance and proceed to Jaiindl Pavilion elevators (red) to 3rd floor and take right off elevator. Follow hallway around corner to reception desk. Report time 8 AM. With available nurses - Ainsley Behr

LVHN-CC, Medical Interpreter (as arranged with Maria Martinez) Please meet outside of cafeteria near main lobby, for pickup. Report time 8:00 AM. With Medical Interpreter: Rhiannon McKee and Rachel Smith

LVHN-CC, Respiratory (as arranged with Ken Miller x5772) Meet in main lobby of Pool for pickup. Report time 8:00 AM. With respiratory staff: Matthew Cabansag and Felicia Croll

LVH-CC, NICU (as arranged with Jessica Dalton (610-402-7647). Please proceed to Jaiindl Pavilion and take (red) elevators to 4th floor. Straight ahead will be NICU. Please press buzzer to be let into locked unit. NICU is on right, please use second entrance. Please proceed to reception desk. Report time: 8:00 AM. With available nurses - Cadence Whalen

LVHN CC Biomedical Engineering (as arranged with Jay Kupiszewski 610-402-4537) Enter main lobby, take left and proceed to children's hospital entrance. Wait there for pick up. Please call number if waiting for more than 10 minutes. Report time: 8:00 AM. With available biomedical engineer - Erik Mather

LVHN-CC, Interventional Radiology (as arranged with Teresa Horack 610-402-8759). Proceed to Jaiindl Pavilion and take (red) elevators to second floor. Once off elevators take a left to the hallway and once in hallway take another left. You will then take an immediate right into the radiology waiting area through the