September 25, 2006

Re: Ms. D Private Ins. DOB: 1956 Ht: 63 inches Wt: 430 lbs.

To Whom It May Concern:

Ms. D is a 50 year-old female who was diagnosed at 9 years of age with Milroy's disease stage IV primary congenital lymphedema. Her past medical history is also significant for cellulitis, aerophasia, DM type II, and Mitral/Aortic valve regurgitation. Ms. D is an active member of her household and continues to work as a middle school teacher. She has significant mobility impairment due to the size of her lower extremities and is no longer functionally ambulatory. She is only able to stand for short periods of time for stand pivot transfers.

Ms. D relies on motorized mobility at this time to meet her needs in her home environment, at work, and in the community. Unfortunately, her current mobility device is no longer meeting her needs as she has no means for independent position changes putting her at risk for further fluid retention leading to hospitalization. Ms. D was hospitalized four times in 2005 and three times thus far in 2006 due to MRSA and cellulitis in her lower extremities. This is due in part to dependent positioning of her lower extremities and her inability to independently elevate her legs during the day. Ms. D continues to be a productive member of society and is motivated to continue working despite her physical limitations. She deserves the opportunity for independent mobility as well as independent position changes to decrease the risk of further fluid retention which leads to costly medical intervention. The following motorized wheelchair and custom seating system have been recommended and deemed medically necessary for Ms. D:

- A Quantum 1650 motorized wheelchair is recommended in order to support Ms. D' unique frame. This chair has a 650 lb. weight capacity that will be adequate to support her weight which fluctuates up to 460 lbs. In addition, this mid-wheel drive chair will allow access to her home and work environments as it can maneuver through her hallway and make the turns necessary to access her bedroom and bathroom. This chair was also chosen because it can support the power positioning features as described below.
- A Swing away joystick is required in order to allow Ms. D to move the joystick out of the way to gain close access to her work surface for increased independence with self care tasks.
- **Batteries** are required in order to power the chair and seating system.
- Flat free drive wheels are required as Ms. D is not capable of independently maintaining pneumatic tires. The flat free inserts will eliminate the risk of a flat

which would render the chair useless leaving Ms. D stranded with no means for mobility.

- A Power tilt/recline system is necessary in order to allow independent position changes during the day. Ms. D is at a high risk for soft tissue breakdown and continued fluid retention due to her medical condition and impaired mobility. This powered system will allow Ms. D to tilt back for pressure relief and to position her lower extremities above her heart for decreased edema. The reclining feature will allow Ms. D to open her hip angle to decrease the pressure on her circulatory system associated with an upright, seated position.
- A Power center of gravity sliding seat is required in order to allow Ms. D to transfer into the chair. This seat will move forward seven inches to assist with transfers, and then slide back over the base to evenly distribute her weight. A large portion of Ms. D' weight is located in her lower extremities which front loads the chair causing it to be "tippy". The sliding seat will move her center of gravity to the rear of the wheelchair base thereby ensuring that the stability of the base is not compromised by the distribution of her weight.
- A Power elevating calf pad is necessary in order to provide a means of elevation for her lower extremities during wheelchair use. This elevating system will allow Ms. D to change the angle of her lower extremities, and when combined with tilt, will allow her to position her legs above her heart. This is the only way Ms. D can be positioned out of bed without compromising her health and causing further fluid retention.
- A Multi-function control box is necessary in order to allow access to the powered seat functions of the chair. Ms. D will have independent control and will be able to independently reposition herself throughout the day to decrease the risk of further medical compromise.
- A MaTRx heavy duty cushion is required in order to provide a pressure relieving surface for Ms. D. This cushion will conform to her unique anatomy and distribute pressure away from areas that are prone to skin breakdown including her sacrum and ischial tuberosities. Ms. D has multiple risk factors for soft tissue breakdown including the inability to independently relieve pressure, an asymmetrical sitting posture, and a tendency for shearing. A decubitus ulcer would be devastating to her health and function.
- A Solid curved back with visco foam will provide trunk support to promote an upright position in the chair. This back will have a sliding feature that will decrease the shear normally experienced with a reclining system. The visco foam layer will conform to her shape and decrease the risk of peak pressure areas.
- A Headrest and hardware is necessary for cervical support during tilt/recline. Ms. D does not have the strength to achieve a sustained upright head position during tilt.
- **Integrated hip guides** are required in order to decrease the risk of peak pressure caused by the single pivot point of the reclining armrests. This hip guides will distribute pressure evenly along the proximal aspect of her femurs thereby reducing the risk of injury or breakdown.

I respectfully request your assistance in procuring this motorized wheelchair and custom powered seating system that has been recommended for Ms. D. Without a means of independent position changes to decrease fluid retention in her lower extremities, Ms. D will be rendered bed bound and will be unable to continue working. In addition, she will have no means for independent mobility within her home and community. Ms. D is highly motivated to continue to work and be a productive member of her household. This wheelchair and seating system are the only means by which she can continue to achieve this without causing undue medical risk. Thank you for your consideration.

Sincerely,

Peter Nguyen, MD