Date:

Recipients Address:

Regarding:

Patient Name

DOB

To Whom It May Concern,

**Patient Introduction and Medical History**

(SAMPLE)

Mr. Jones is a 57-year-old male who is 5’ 8” tall and weighs 138 lbs. In February of 2004, he suffered a heart attack and minor stroke while having exploratory surgery through the femoral vein and the removal of a tumor in his leg. He ultimately underwent a right transfemoral amputation on October 28th 2004, secondary to a chondrosarcoma. In addition to Mr. Jones’s amputation, he has a history of surgery and tumor resection within his lungs. The resulting compromises to his pulmonary efficiency will require every effort to lower the energy cost during ambulation.

**Vocational and Recreational Lifestyle**

(SAMPLE)

 Mr. Jones was employed as a Project Manager for a construction company before the amputation. As a Project Manager, he was required to walk for long periods of time, climb stairs, negotiate inclines and declines, as well as step over debris on the ground. His recreational activities included golfing five times a week, making stained glass, flying Cessna airplanes, walking 2-5 miles a day for exercise, rebuilding computers, range shooting, and collecting coins. His goals are to resume work and participate in the above mentioned leisure activities.

**Prosthetic Assessment**

(SAMPLE)

Mr. Jones currently ambulates at a K3 level, using his current prosthesis. See attached Cadence Report (attach report) generated by the Quattro data capture capability. He has demonstrated the ability to ambulate at various speeds using his prosthesis. However, he has not been able to return to work due to problems he has been experiencing with the limitations of his current prosthetic componentry, as well as secondary health problems. His reasons for requiring a new prosthesis at this time are to correct an ill-fitting socket due to limb maturation, as well as a history of falls both at work and at home. While avoiding major injuries to this point, Mr. Jones’s occupation as a Construction Project Manager requires him to navigate worksites that increase his risk of falls and stumbles due to the varied surfaces encountered daily.

At this time, I am recommending the Quattro microprocessor-controlled knee for Mr. Jones. The Quattro addresses the concerns that Mr. Jones faces on a daily basis. The added safety /stability the Quattro provides will allow Mr. Jones to complete his Activities of Daily Living with safety and confidence needed for Trans-Femoral amputees.

**PROTEOR Quattro™ Microprocessor controlled Knee Justification**

Microprocessor controlled knee were introduced over 20 years ago and their benefits have improved the safety and mobility of thousands of users worldwide. CMS has provided coding recommendations for the provision of Microprocessor controlled knees for several years. Per Medicare guidelines they do not provide items deemed experimental or investigational. This can be further evidenced by the new PDAC verified coding required for prior authorization of which the Quattro is verified.

The Quattro utilizes an advanced stumble recovery feature which allows the user to maintain extremely high levels of confidence and stability when a stumble is detected. A sophisticated sensor suite monitors activity 200 times/sec and if a stumble is detected can react in 5 ms to prevent the knee from buckling. This is the inherent advantage of a microprocessor-controlled knee. This will benefit [Patient Name] in both vocational and recreational activities by improving his safety and confidence in knowing that the knee will not buckle, which may result in a fall ¹˒². The improved confidence and security will allow [Patient Name] to concentrate less on navigating the environmental factors and more on his daily activities.

Another benefit for the user can be illustrated when descending stairs or a ramp ³˒⁴˒⁵ The Quattro provides independent resistance adjustments for these situations. This customizable resistance allows [Patient Name] to customize the braking force when descending ramps or stairs. Due to the advanced sensor technology and control system the Quattro is able to determine when these obstacles are being encountered and adjusts the resistance accordingly, providing the user with customized levels of resistance which provides increased levels of safety and confidence when navigating these daily obstacles.

Another benefit of the Quattro is its ability to fully adjust and optimize the performance of the knee based on the users walking speed or cadence. The control system is constantly monitoring input from the sensors and is able to adapt to the changes in walking speed and optimizing knee performance 200 times a second. When acceleration or deceleration is detected the Quattro will instantly change its settings to provide the user the optimal settings for the chosen speed.

Additionally, the Quattro is IP67 rated, this ingress protection rating allows the Quattro to be subjected to the highest level of dust protection and is rated to be fully submersed in water to a depth of 1 meter for 30 minutes. This provides the freedom for the user to encounter daily exposure to dust and water without concerns of damaging the knee.

The Quattro also provides an Application available for either iOS or Android devices. This App allows the user to monitor the battery level, optimize the settings, change between programmed activities. This interface was designed to be very user friendly and allows the user to have levels of control not seen with competitive microprocessor knees.

**Quattro PDAC Approved Coding**

**L5856**

*Addition to lower extremity prosthesis, endoskeletal knee-shin system, microprocessor control feature, swing and stance phase, includes electronic sensor(s), any type. (Updated 2020)*

**L5828**

*Endoskeletal knee-shin system, single axis, fluid swing and stance phase control.*

**L5828**

*Endoskeletal knee-shin system, single axis, fluid swing and stance phase control.*

**L5848**

*Endoskeletal knee-shin hydraulic stance extension, dampening feature with or without adjustability.*

**L5850**

*Endoskeletal system, above knee or hip disarticulation, knee extension assist.*

**L5925**

*Endoskeletal system, above knee or hip disarticulation, manual lock.*

Thank you for your attention to this request. If you have any further questions please fell free to contact me for further discussion.

Sincerely,

Clinicians Name

Contact Information

**References**

1. (Hafner et al., 2007 and 2009; Highsmith et al., 2010; Kahle et al., 2008; Kannenberg et al., 2014, Kaufman et al., 2018)
2. (Blumentritt et al., 2009; Burnfield et al., 2012; Hafner et al., 2007 and 2009; Kannenberg et al., 2014; Kaufman et al., 2007; Lansade et al., 2018) M
3. (Hafner et al.; 2007 and 2009; Highsmith et al., 2013; Kannenberg et al., 2014)
4. Significant increase in downhill walking speed of up to 40% (Burnfield et al., 2012; Hafner et al., 2007 and 2009; Highsmith et al, 2013; Kannenberg et al., 2014)
5. (Hafner et al., 2007 and 2009; Kahle et al., 2008; Kannenberg et al., 2014; Schmalz et al., 2007)