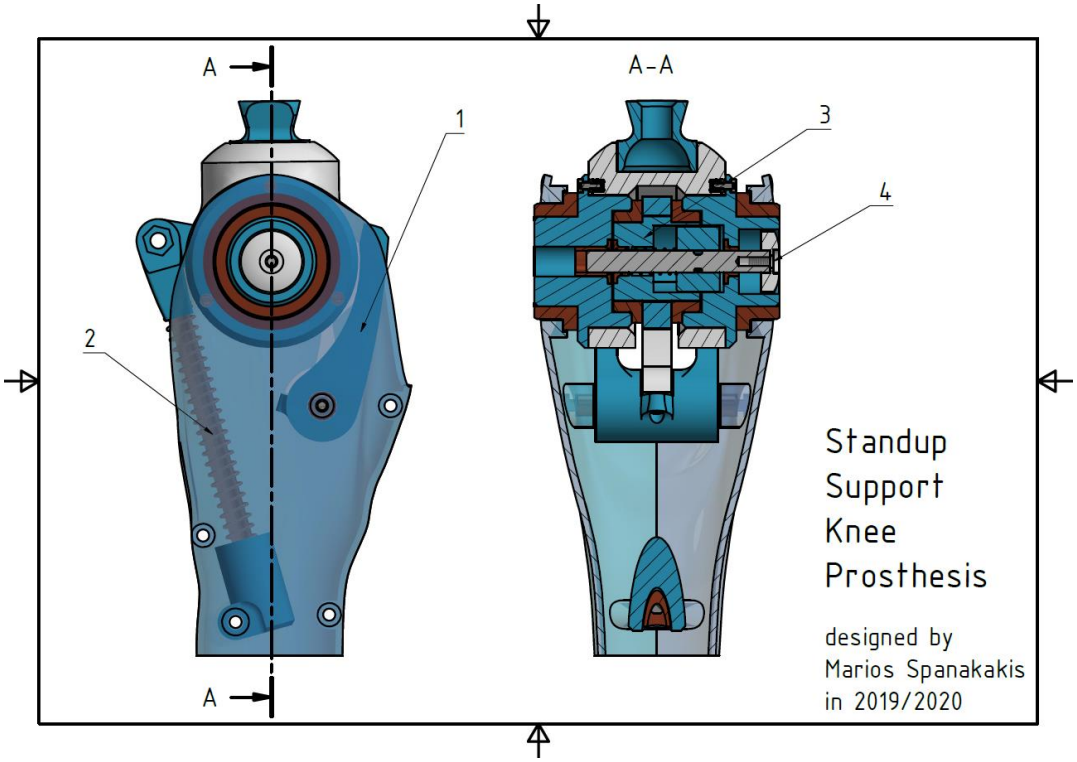


Wearers of knee prostheses, especially among the elderly, often report difficulty sitting down and getting up again in a controlled manner. This knee prosthesis provides support when sitting down, stores the energy gained and releases it when standing up. The focus is on ease of use and absolute safety. The system works purely mechanically, without any electrical components or energy sources.

When standing, the knee prosthesis is locked in extension by a locking lever (1). To sit down, this locking lever is opened to release the knee. During knee flexion, the spring mechanism (2) is compressed and stores energy that is later available for standing up. Unwanted re-extension is prevented by the unilateral locking of the knee head at a defined angle. To ensure leg mobility even when the spring is compressed, the energy storage can be disconnected from the knee head via an internal coupling mechanism (3). This is done by pressing the side button (4). The transitions between the three states (standing, sitting, disconnected) are clearly defined by mechanical links to ensure safe use. The energy storage unit is automatically discharged when the leg is extended, even if it was previously uncoupled, to prevent the user from sitting down unassisted.