

To: SPH Board of Directors
From: Angela Hinnegan, COO
Date: August 16, 2023
Re: Stryker Mako SmartRobotics System

SUMMARY

South Peninsula Hospital's Orthopedic Department is an important component of our mission to provide high quality, locally coordinated care. In today's highly competitive and technology rich healthcare environment the use of advanced technology to perform general and orthopedic surgeries is the new standard. With a growing number of residents leaving the service area to have their surgeries performed with robotic technology. The reason for this outward migration are documented improvements in through-put, quality, shorter recovery, quicker ambulation, and improved patient experience. South Peninsula Hospital's surgery program is one of the backbones of Hospital growth and also an important service to our growing and aging community. This memorandum serves as our business analysis and support for the capital lease of a Stryker Mako SmartRobotics Total Joint Arthroplasty System.

DETAIL

South Peninsula Hospital performs approximately 48% of Total Knee Replacements (Total Joint Arthroplasty or TKA) for residents of the Southern Kenai Peninsula.* Total Knee surgeries for our resident population reached a high of 58% in 2021 and has since dropped to 42% of market share in 2023. Anecdotally we have been informed by our patients that many would prefer to have their knee replacements performed with the use of more advanced robotic technology, rather than using the traditional manual surgery approach. This anecdotal data has been proven out by the Market Share report attached to this memorandum. In 2022, we lost 15% of our market share to Hospital's that offer robotic Total Joint Arthroplasty procedures. In 2023, another 5% of TKAs were lost to Hospital's with robotics.

The Stryker Mako SmartRobotics System works simultaneously with a CT Scan in order to design and plan the exact surgery cuts prior to entering the operating room. The precision of the imagery coupled with the robotics allows the surgeon to know the exact implant size based upon the individual physiological structure of the patient and how the procedure will be best performed before a single cut is made. While traditional surgeries may still be performed in certain instances, the use of the Mako SmartRobotics has the ability to not only recapture market share but provide local surgical procedures at the highest quality with the least downtime, travel, and inconvenience.

In July SPH received the final 2023 Community Health Needs Assessment which speaks to the rate of community population growth (4%) far outpacing State wide growth (1%). Further, the population of the Southern Kenai Peninsula has a large bolus of individuals moving into the 45 to 65 year age group which leads to the need for expanded healthcare services. All of these factors support a projected increase in Total Joint Arthroplasty procedures.

South Peninsula Hospital uses Stryker Implants in all of its Total Knee Replacement Surgeries. A traditional TKA surgery requires the use of a 'navigational system' and technician from Stryker to operate that system. The cost of navigation system is approximately \$1,600 per patient. South Peninsula Hospital

has been offered an option to enter into a 7-year Capital Lease for the Stryker Mako SmartRobotics System through an implant purchase commitment with Stryker. At the end of that Capital Lease commitment period, the title to the Mako SmartRobotics System shall transfer to South Peninsula Hospital for \$1. The use of the SmartRobotics System would eliminate the need for the TKA navigation system, resulting in cost savings to organization. The reduction in navigation charges is projected to be approximately \$800,000 over the next 10 years. Conversely, an increase in CT Scans will result in increased net patient service revenue to cover the remainder of the program costs.

The undiscounted cost of the Stryker Mako SmartRobotics System is approximately \$1 million. After discounts, Stryker has offered the system to South Peninsula Hospital through the 7-year capital lease for \$675,000 plus interest. The implicit lending rate in the capital purchase commitment master agreement is based on the Bloomberg SOFR Swap rate (approximately prime plus 2% or 10.5%). Current SOFR rates show a total of \$918 thousand will ultimately be 'paid' for the machine through the purchase of implants over the life of the 7-year master agreement.

The projected increase in market share for Total Joint Arthroplasty Surgeries, the associated net income from CT Scans, and the reduction TKA Navigation charges results in a projected 10-year net income projection of \$279 thousand (see attached business analysis) after the inclusion of machine costs and implicit interest.

What is not included in this business analysis are the current and future applications of the Mako SmartRobotics unit. Currently the System can also perform total Hip replacements, and in 2024 and 2025 the FDA is scheduled to approve it for Shoulder and Spine surgery. The cost to add these services may be the subject of future capital requests to add both the software and the surgical tools/additions to the Mako System.

*SOURCE: MHA OHDIN Database provided by the Alaska Hospital and Healthcare Association