

# Three steps to assess new service line technology beyond price

## Key findings

- New technology continues to emerge in the musculoskeletal care market to help providers improve patient care. During 2020, robots performed 11% of knee-replacement surgeries with projections to increase another 8% from 2021 to 2030.<sup>1</sup>
- New technology might cost more than present treatments — however, it may generate savings, such as reducing O.R. time, for an overall lower total cost of care.
- Look beyond product price and use data for holistic decision-making to determine the full impact of any new technology — incorporate provider data sets to evaluate financial impact and utilization.
- Make your assessment comprehensive and include these three key steps from Vizient’s proven method:
  1. Consider clinical benefits
  2. Evaluate financial impact
  3. Factor in market changes

## Overview

As with capital equipment investments, new patient care technology also warrants detailed, consistent and comprehensive assessments. With new musculoskeletal technology continually emerging and orthopedics outpatient procedures volume forecasted to increase 13% over the next eight years<sup>2</sup>, it’s essential for organizations to use a proven and data-driven model.

Our advisory and analytics experts who help health care providers evaluate these complex decisions developed our new-technology assessment model. Using the model, decision-makers look beyond product price and consider clinical benefits, financial impact and market factors to make a more informed decision.

### 1. Consider clinical benefits

Clinicians need to understand both short- and long-term clinical benefits of a new technology. The technology should ideally decrease the short-term complication rate, readmission rate and/or length of stay. It may have longer-term benefits such as decreases in the future revision rates due to better joint replacement.

### 2. Evaluate financial impact

Assess all the standard financial aspects, including capital cost, disposables and maintenance. For a holistic view of the financial implications, explore all components that impact margin: increased product cost, higher demand, decreased O.R. time, and reimbursement differences – as well as any clinical outcome measures that have an impact on financial performance.

Determine other incremental costs, including O.R. time and demand. For example, a new technology may decrease the margin per case, but increased market demand and revenue can make up for the margin loss.

### 3. Factor in market changes

In many cases, a new technology increases market growth in a particular subset of the musculoskeletal patient population. Creating a market advantage with joint replacement robotics is an obvious example. Health care organizations must weigh the benefit of business growth and additional margin from these joint replacement cases against the cost of the technology.

## Considerations

- Evaluate proposed technology using financial and clinical data. Do you believe you have the needed data for your teams to conduct a comprehensive evaluation of new technology — prior to adoption?
- Too often price is quickly the ruling factor for procurement decisions. Do you feel your decision-makers see the value in using a comprehensive approach that looks beyond price and evaluates clinical, financial and market factors?
- Could your service line stakeholders benefit from introducing a comprehensive assessment methodology to more effectively evaluate new technology procurement?
- For guidance in deploying such a model or accessing data, contact us at [consulting@vizientinc.com](mailto:consulting@vizientinc.com) or your Vizient Market Executive.

## Additional resources

See our analysts apply the assessment model and Vizient Procedural Analytics data to a relatively new spine market technology: 3D-printed interbody spacers. [Read the full cost analysis](#) results and learn more about the three-step method.

Get data insights on volume, utilization and cost to inform your evaluations with Vizient Procedural Analytics. [Learn more.](#)

Explore more information about technology and innovation for orthopedic, cardiology and imaging patient care in our [Tech Watch: Medical Device](#).

## References

1. The surging of orthopedic surgical robots in the knee reconstruction market. Medical Device Network website. Accessed February 18, 2022. <https://www.medicaldevice-network.com/comment/orthopaedic-surgical-robots-reconstruction/>
2. Snapshot 2021: Orthopedics. July 2021. Sg2. Accessed March 1, 2022. [https://intel.sg2.com/-/media/Publications/2021/Service-Line-Snapshots/Sg2-Report\\_Spine-Snapshot-2021.ashx](https://intel.sg2.com/-/media/Publications/2021/Service-Line-Snapshots/Sg2-Report_Spine-Snapshot-2021.ashx)

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