



Next-Generation Heart Failure Management

**The Power of Prediction
Delivers Value-Based Payment
Return on Investment**



The Opportunity for New Value

Heart failure (HF) is a progressive condition that results in at least 1 million hospitalizations each year¹, and half of all patients admitted for HF are readmitted within 6 months.²

Patients with advanced cardiopulmonary conditions such as HF present a tremendous opportunity for value-based payment (VBP) programs. But there are some challenges.



Solutions that monitor late-stage symptomology create reactive clinical scenarios and have not had a large impact on the cost of care.

Hemodynamic monitoring has shown the ability to predict cardiopulmonary events such as heart failure earlier. However, the most effective of these solutions are invasive and make it difficult to generate a VBP return on investment (ROI).

HF COHORT (PPPY)

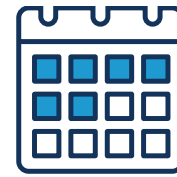
90-Day Total Cost of Care, HF Admission ⁴	\$28,958
Worsening HF-Related Admissions/Year ^{5,6}	1.5 - 2
Annual Total Cost of Care, HF Admission	\$50,677
Sensinel Potential Annual Costs Reduction*	\$17,000 - \$20,000



BUT



AND



10.5%

of Medicare beneficiaries have been diagnosed with HF¹

34%

of all Medicare spending is for patients with an HF diagnosis²

22.9%

of admitted HF patients are readmitted within 30 days³

50%

of admitted HF patients are readmitted within 6 months³

90-Day Mean Total Costs: Admission + Post Acute⁴

\$10,500

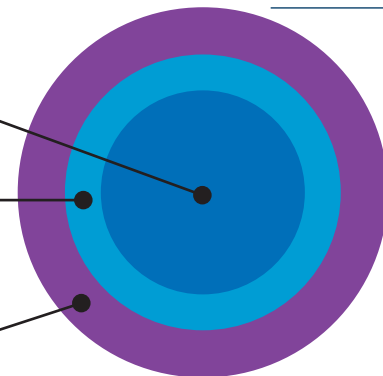
Mean inpatient cost of an HF-specific admission

\$7,126

30-day post-discharge cost of care per HF admission

\$11,332

31- to 90-day post-discharge cost of care per HF admission



\$28,958

90-day mean total cost of care of an HF admission

Sensinel™: Next-Generation HF Management

The Sensinel CPM System provides an advanced noninvasive solution to monitor early hemodynamic changes for patient care teams that can support early intervention and potentially help reduce high-cost events and improve total cost of care results—and drive VBP ROI.

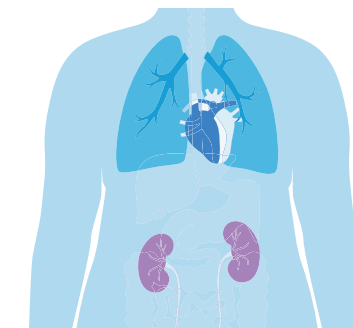
THE SITUATION

- The high costs associated with HF-related hospitalizations can be dramatically reduced with earlier prediction
- Of more than 6.5 million HF patients, 1 million stand to benefit from Sensinel



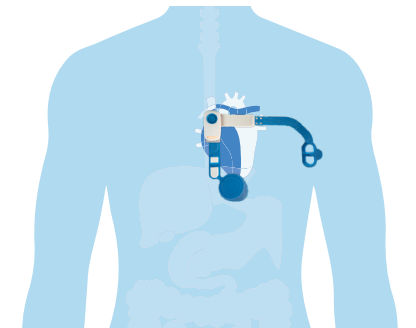
THE HOW

- Multiple sensors
 - **Heart:** Increased filling pressures, rhythm abnormalities
 - **Lungs:** Respiratory parameters, intrathoracic fluids
 - **Kidneys:** Electrolyte imbalance



THE SENSINEL SOLUTION

- Noninvasive
- On the body for only 3-4 minutes a day
- Data analyzed in the cloud and triaged to external care team



- Sophisticated predictive algorithms with low false alerts
- No information overload
- Ecosystem for "last-mile" care

The Sensinel CPM System: Potential Economic Benefits

- Replace lower-margin DRG admissions with higher-margin admissions
- Decrease acute HF patient care incidences; increase scheduled patient visits
- Reduce care manager nurse-to-HF patient ratio and staffing costs
- Reduce 30-day readmission rates and penalties
- Reduce hospitalizations, ED visits, and SNF admissions
- Enhance patient satisfaction, resulting in improved Quality Scores
 - Medicare Hospital Quality Metrics
 - MIPS scores (physicians)
 - Star Scores (Medicare Advantage Plans)
 - ACO Quality Metrics
- Lower patient out-of-pocket costs
- Improve clinical workflow and enhance communication among clinical team



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REFERENCES

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2. [https://hcup-us.ahrq.gov/reports/statbriefs/sb278-Conditions-Frequent-Readmissions-By-Payer-2018.jsp#:~:text=In%202018%2C%20there%20were%203.8,percent\)%20and%20by%20expected%20payer](https://hcup-us.ahrq.gov/reports/statbriefs/sb278-Conditions-Frequent-Readmissions-By-Payer-2018.jsp#:~:text=In%202018%2C%20there%20were%203.8,percent)%20and%20by%20expected%20payer)
3. [https://www.amjmedsci.com/article/S0002-9629\(22\)00384-6/fulltext](https://www.amjmedsci.com/article/S0002-9629(22)00384-6/fulltext)
4. <https://www.ahajournals.org/doi/10.1161/CIRCOUTCOMES.121.008069>
5. IAC study commissioned by ADI 05-2023
6. Economic Burden of hospitalizations of Medicare beneficiaries with heart failure

NOTES

*All-Cause Admissions/Year: 3/year⁶

*HF-Related admit of 50% is across all HF beneficiaries with an admit over a 6-year period regardless of NYHA Classification type. Our solution is intended for Class 2,3,4 and not Class 1 patients.

*Sensinel Potential Annual Cost Reduction (\$17,000) includes incremental, hospital-related costs only; excludes baseline costs.

*We believe the Sensinel Potential Annual Cost Reduction (\$20,000) is inline when compared to invasive, remote monitoring devices which provide a far lesser number of measurements.