

Executive Summary:

Real-World Impact of Remote Patient Monitoring on Cost and Utilization

Overview

Two independent analyses were conducted to evaluate the impact of Remote Patient Monitoring (RPM) on total cost of care (TCOC) and healthcare utilization among Medicare patients across acuity levels. The findings illustrate the measurable impact of RPM on cost savings, reduced acute care utilization, and increased engagement in preventive health services.

1. Longitudinal Analysis: Moderate-to-High Acuity Medicare Patients (N = 597)

A pre/post observational study assessed TCOC and utilization trends 5 to 12 months before and a matched duration after RPM enrollment. Results were annualized to reflect annual cost and utilization changes per patient.

- TCOC decreased by 30.6%, from \$39,291 to \$27,255
- Annual savings: \$12,036 per patient
- Utilization improvements for patients achieving cost savings, compared to those that did not, included:
 - 22% fewer hospitalizations
 - 23% fewer ER visits



- 25% fewer readmissions
- **19%** increase in preventive screenings (e.g., wellness visits, early detection)

2. Cross-Sectional Analysis: Lower Acuity ACO Patients (RPM vs. Non-RPM)

This comparative analysis evaluated rates of encounters and healthcare costs in a matched cohort of lower acuity patients (n = 255) enrolled in RPM and across a similar ACO-based non-RPM population (n = 4500).

- TCOC reduction: 26%, from \$4,334 to \$3,224
- Clinical utilization improvements:
 - Emergency visits: **\13.3%**
 - Hospital admissions: **\44.7%**
 - Readmissions: **\J36.0%**
 - Length of stay: **↓11.0%**

Conclusion

Together, these analyses provide compelling evidence that RPM is effective across patient acuity levels. RPM not only drives down healthcare costs but also reduces high-cost utilization events and promotes preventive, longitudinal care. These findings support RPM as a scalable solution to shift chronic care from reactive to proactive, addressing both cost containment and clinical outcomes in value-based care models. These data are currently being prepared for publication.