BECKER'S
Hospital Review
BUSINESS & LEGAL ISSUES FOR HEALTH SYSTEM LEADERSHIP

How Advanced Cost Accounting Can Help Manage Post-Acute Care

Written by Josh Goodman, Strata Decision Technology | August 1, 2018

Many healthcare organizations are still in the dark when it comes to understanding what drives costs after discharge, even though post-acute care costs are nearly equal to acute care costs, especially for patients with major joint replacements, pneumonia, heart failure, renal failure, and chronic obstructive pulmonary disease (COPD). The implications are significant: Without considering post-acute costs, healthcare leaders fail to see the entire picture—and that can be dangerous as providers enter into more episode-based payments such as bundles.

For years, leaders at Hebrew Senior Life, the largest post-acute provider in Boston, relied solely on Medicare cost reports and cost-to-charge ratios for insights into their costs. Yet as they planned for the future, they realized their approach was inadequate.

In particular, the team at Hebrew Senior Life, an affiliate of Harvard Medical School, wanted more accurate cost information when planning a new rehabilitation hospital. "We needed to think through all of the space in the new building and determine which service lines we should expand and contract," says Lise Paul, vice president of reimbursement and contracting.

Another impetus was value-based care. Paul and her colleagues recognized they needed more credible and accessible cost information as the organization took on more risk through its ACO partnerships as well as its participation in the Bundled Payments for Care Improvement (BPCI) Model 3. "It was important that we figured out the costs so we could be successful and qualify for the bonus payments," Paul says. Leaders also wanted to prepare for payment changes resulting from the Improving Medicare Post-Acute Care Transformation (IMPACT) Act of 2014, which creates standardized post-acute payments, regardless of the site of care.

In 2017 Hebrew Senior Life adopted an advanced cost accounting strategy that relies on different approaches, including activity-based costing, to get a better handle on its performance. Since then, Paul and her team have gained greater insights into the key cost drivers for post-acute care, which differ from the typical cost drivers in acute settings. Basic cost accounting approaches used at hospital would not suffice.

Using Activity-Based Costing for Insights into Longer Stays

Hebrew Senior Life offers adult day care, independent and assisted living, two skilled nursing facilities, home health, and palliative care. The organization has 600 long-term care beds with an average length of stay (LOS) of 2.9 years. With longer LOSs, using days to assess costs is often inadequate to accurately attribute the costs of labor, supplies, and other resources to different areas of care. "If we were just going to allocate costs based on LOS or days, we wouldn't get a real picture of our costs," Paul says. For this reason, her organization embraced an activity-based costing approach.

Activity-based costing can help identify clinical variation—including differences in the amount of resources used to care for specific categories of patients—that is not apparent through the procedure master alone. By using activity-based costing, leaders at Hebrew Senior Life could convert a typical indirect expense into a direct expense to account for this clinical variation.

Two areas that Hebrew Senior Life focused on were medical acute care and rehabilitation. Through discussions with nurses, Paul and her team discovered that patients with wounds, intravenous (IV) lines, diabetes, and heart failure required more labor and supplies. They used their decision support system to group those patients based on ICD-10 codes and now, the organization can apply an estimated add-on cost every time a patient meets specific ICD-10 criteria, such as a wound or another diagnoses requiring additional care. This is in addition to the normal daily cost for that unit. "This approach offers more realism and accuracy to costs on nursing floors," she says.

Getting a Handle on Atypical Cost Drivers

When costing for post-acute care, leaders at Hebrew Senior Life recognized that they could not rely on the typical acute care cost drivers. With longer lengths of stay, pharmaceuticals,

Continued on page 2

meals, and housekeeping were major cost contributors.

Pharmacy costs. After clinical labor, the second most important cost driver at Hebrew Senior Life was pharmacy.

"It was really important to get the true cost of drugs without the distortions of errors in billing, units, and so forth," she says. To do this, they pulled unit cost data from their pharmacy information system into their billing and decision support platform. They primarily used billing units for utilization at the patient level, except when they recognized errors, such as charges for 1,000 units of insulin (the quantity in one vial) instead of one unit (a single dose). In such cases, they swapped in the ordered units in the medical record to get actual dose costs.

"If I had to do it over, I would use ordered units across the board," Paul said. "By pulling the actual usage from the medical record, we were able to correct that error."

Culinary costs. To get a better handle on their meal costs for longer lengths of stay, the culinary director at Hebrew Senior Life tracks food and supplies for each unit. Leaders also use a weighted meal cost per day for four different service areas (long-term care, rehab, acute care, and adult day care), as the cost of each meal and number of meals can vary per day depending on patient acuity.

"Depending on how sick the patients are, the meal costs can be different," she says. Now, meal costs are considered a direct, rather than an indirect, cost.

Housekeeping costs. Paul and her team developed a similar approach to get a better handle on variation in housekeeping costs across the organization. They asked their commercial cleaning vendor to share the formula for calculating their housekeeping bills (based on square footage) to determine a cost per weighted square foot for each of its four main service areas: hospital, long-term care, office, and corridor care.

"They basically came up with a cost per productive hour," Paul says, noting that costs were highest in the hospital units due to higher turnover and concern about infection control. Now, Hebrew Senior Life can more accurately allocate its housekeeping expenses.

Using Data to Deliver Value

To help monitor its performance in value-based payment programs, Hebrew Senior Life flags its ACO and bundled payment patients in its electronic health record (EHR). Paul and her team assign the costs of ACO-related social workers and case managers to various units, so this major cost center gets allocated to specific patients on a per day basis. "This helps us point the resources the best that we can to various programs and track utilization of patients in the program," Paul says. "It's possible that we might end up expending more resources making sure that the patient will not end up as a readmission, which gets counted against us in a bundled payment program."

They also work with a vendor to determine if the organization is due a bonus based on claims data. They measure that future bonus against any additional costs that they may have occurred, such as additional rehabilitation or case management, to gauge their performance.

Hebrew Senior Life plans to leverage its decision support system as it explores more risk programs with various payers. "With our ability to measure the true cost of our part of the care and hopefully find a way to bring in external claims data, we will be able to do the whole bundled payment analysis ourselves and determine if the risk is a good idea," she says. "Before we implemented our decision support system, we just went with it—we didn't really know whether it was a good idea to invest these administrative resources in the ACOs and global payment or whether the small revenue bonus would pay for the administrative costs. Now we can look at our ACO and bundled patients versus other patients and see if there are any differences there," she says.

Looking Ahead

Paul recognizes that advanced cost accounting can be difficult for some post-acute leaders to understand. That is why she plans to train a select group of users, including key physicians and service line managers, on their sophisticated decision support platform. "After several trainings, it will start to make sense to people not used to thinking that way," Paul says.

More leaders at Hebrew Senior Life may learn the advantages of advanced costing as they pilot the "household" or "greenhouse" care model that creates a more home-like, communal environment for residents. Because this model requires more square footage than the traditional model of care, Paul and her team will use advanced costing to get a solid understanding of the costs involved before converting some or all of their units.

In addition, Hebrew Senior Life is assessing the right level of rehabilitation services to offer in future, particularly as Medicare will be paying the same amount for certain diagnoses whether or not a patient is in rehabilitation or home care. In preparation for this change, Paul and her team set up their decision support platform to review different categories of patients—such as those with dementia, diabetes, IV use, and a high fall risk—to cost those patients across various levels of post-acute care. "This gives us two pictures into our business: one using the traditional service line and the other using patient categories based on ICD-10 codes," Paul says.

Given the dynamic healthcare environment, Paul says it is important for post-acute facilities and integrated delivery systems to realize that their volumes could change dramatically once Medicare moves to standardize payments under the IMPACT Act. Yet by adopting advanced cost accounting, her organization is well positioned for the future. "At Hebrew Senior Life, we feel like we are doing what Medicare wants, which is driving patients to the least intensive, least costly care at the right place and at the right time," she says.