



Patient Engagement Care Redesign **New Marketplace** Leadership

Making Bundled Payments Work: Leveraging the CMS DRG Experience

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Both the Centers for Medicare and Medicaid Services (CMS) and private insurers are moving toward bundled payments for episodes of care. We believe that the health care industry has an opportunity to make this movement much more effective and useful by drawing on more than 30 years of experience with an earlier form of bundled payment: Diagnosis Related Groups (DRGs), which created a system of fixed payments for inpatient services associated with specific diagnoses and procedures.

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CMS (then the Health Care Financing Administration) adopted the DRG system for prospective payment for Medicare patients in 1983 to curb skyrocketing hospital costs, and states and private payers followed suit, with variations to fit their needs. DRGs represented a radical shift in how health care was paid for. The new system did incentivize hospitals to become more efficient in coordinating care and controlling costs for inpatients. However, DRGs did not extend to services rendered outside the hospital, and therefore did not encourage

integrated, coordinated care overall. Nor did DRGs in themselves provide any incentive to avoid readmissions, though CMS has recently begun to address this drawback by withholding payments for certain types of readmissions that it deems avoidable.

Hospital Utilization Before and After Introduction of DRGs

Metric	Pre-DRG* (1980-1985)	Post-DRG (1988-1992)	Percent change
Average length of stay (days)	6.9	6.4	-8%
Hospital admissions (per 1,000 population)	163	125	-23%
Hospital days (per 1,000 population)	1,129	800	-29%

*The DRG hospital payment, where hospitals accept a pre-determined lump sum for individual diagnostic categories, was rolled out in 1984 to curb the growth of Medicare healthcare costs.

Source: Department of Health & Human Services, Centers for Disease Control and Prevention. 1989. "Trends in Hospital Utilization: United States, 1965-1986. Data from the National Health Survey." Series 13, Number 101; Department of Health & Human Services, Centers for Disease Control and Prevention. 1996. "Trends in Hospital Utilization: United States, 1988-92. Data From the National Health Survey." Series 13, number 124. <http://www.cdc.gov/nchs/nhds.htm>.

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CMS and private insurers are now experimenting with a more comprehensive form of bundled payments, where a single reference price is established for all health care services provided to a patient during a clinical episode of care that extends both before and after the hospitalization formerly covered by a DRG.

Why would we want to pay a high-cost, low-value provider more than a low-cost, high-value provider?"

The primary aim of these extended and comprehensive payments is to create incentives to encourage the provision of integrated and coordinated high-value patient care, resulting in higher quality and lower cost. These models require teamwork and integration among all providers of care, including hospitals, outpatient

services, and home health. These longer-term and more inclusive bundled payments also are intended to eliminate avoidable readmissions during the time covered by the bundle.

The CMS Innovation Center is currently piloting the following:

Bundled Payment for Care Improvement Initiative (BPCI), which is examining four different bundled payment models for 48 high-volume and/or high-cost conditions

Oncology Care Model, for episodes of chemotherapy

Comprehensive Care for Joint Replacement (CJR), for hip and knee replacements

Many aspects of these bundled payment models are positive, including:

The focus on episodes of care that drive the majority of Medicare spending (episodes included BPCI account for roughly 70% of Medicare dollars)

Bundling of Medicare Parts A and B, post-acute care services, and readmission (in various configurations) to promote greater integration and service coordination

The extension of episode length beyond the index hospitalization (by 30, 60, or 90 days), which provides incentives to improve quality and reduce costs by reducing avoidable complications

Establishing requirements for ongoing quality monitoring to ensure that providers deliver care that is not only *efficient*, but also *effective* in the long term

Four lessons from DRGs

However, it would behoove CMS to draw on its successes with DRGs in structuring the reimbursement of these (and any forthcoming) bundles. Specifically, we believe the agency should consider the following steps:

- 1. Set a prospective, reality-based, national benchmark payment rate**, and adjust it for local factors such as patient case mix and geographic cost of doing business. We discuss payment rates further in the four-quadrant analysis below. The goal is to allow providers to focus on improving quality and lowering costs, rather than on managing administrative complexity. This undue administrative burden can be alleviated if a single reference price is set based on the actual total costs incurred by the highest-quality and lowest-cost providers. Currently, all but one of the four models being tested under BPCI require Medicare to continue making the usual fee-for-service payments to providers (with all of the attendant paperwork), with adjustments made later against the provider-specific target price determined by CMS. A single payment rate would remove this reconciliation step and the need for additional fund transfers to or from the provider.
- 2. Update price benchmarks annually instead of quarterly.** Unlike DRG base rates,

which are updated annually, BPCI episode prices to date have been updated quarterly based on actual national average change in Medicare spending across the 48 bundles. This ongoing uncertainty about target prices (and thus the potential savings for providers) has made for a challenging business case for providers who are making investments to improve the value of patient care. We support the use of annual benchmarks for all bundles, as is the case for CJR bundles and is being proposed for the recently announced BPCI Advanced program (subject to a possible adjustment during the semiannual reconciliation process).

3. Reward an absolute level of performance, instead of the degree of improvement.

DRG payments are fixed, so a hospital's DRG margin depends on its level of efficiency (and increasingly, also on the quality of care provided). In contrast, under the current Medicare bundle models, separate target prices are set for each hospital and include a discount to all participating providers, regardless of the value they already provide. Moreover, the shared savings structure of most bundles, where target prices are derived from either the hospital's historical spending or a combination of hospital and region-specific spending, continues to favor high-cost facilities and regions, while penalizing already efficient providers. As shown in Figure 1, under the current reimbursement arrangements, a high-value care provider (Medical Center 1) will see significantly less upside from improving the value of patient care in the bundle than a low-value care provider (Medical Center 2). Perhaps, more important, why would we want to pay a high-cost, low-value provider more than a low-cost, high-value provider?

4. Make provider participation in bundles mandatory, instead of voluntary, to do away with "pilot program" mentality. DRGs were effective because they were mandatory. Recognizing that providers need time to set up the infrastructure required to do bundles well, we would suggest that CMS focus initial efforts on its top three to five most expensive procedures and its top three to five most expensive medical conditions and roll those out over a 1 to 2-year period.

A Better Way to Set Prices

We believe that the four-quadrant value analysis, pioneered by The Dartmouth Institute and recently extended by the Commonwealth Fund, can help CMS create bundled pricing based on real costs, while establishing the right types of provider incentives.

Figure 1 shows how this analysis would work, using the cost and quality of coronary artery bypass graft procedures as an example. The analysis allows CMS to identify providers that already deliver high-value care (above-average quality at below-average cost, in the upper left quadrant). Using this provider group as a benchmark, CMS could establish a single, national

DRGs were effective because they were mandatory.”

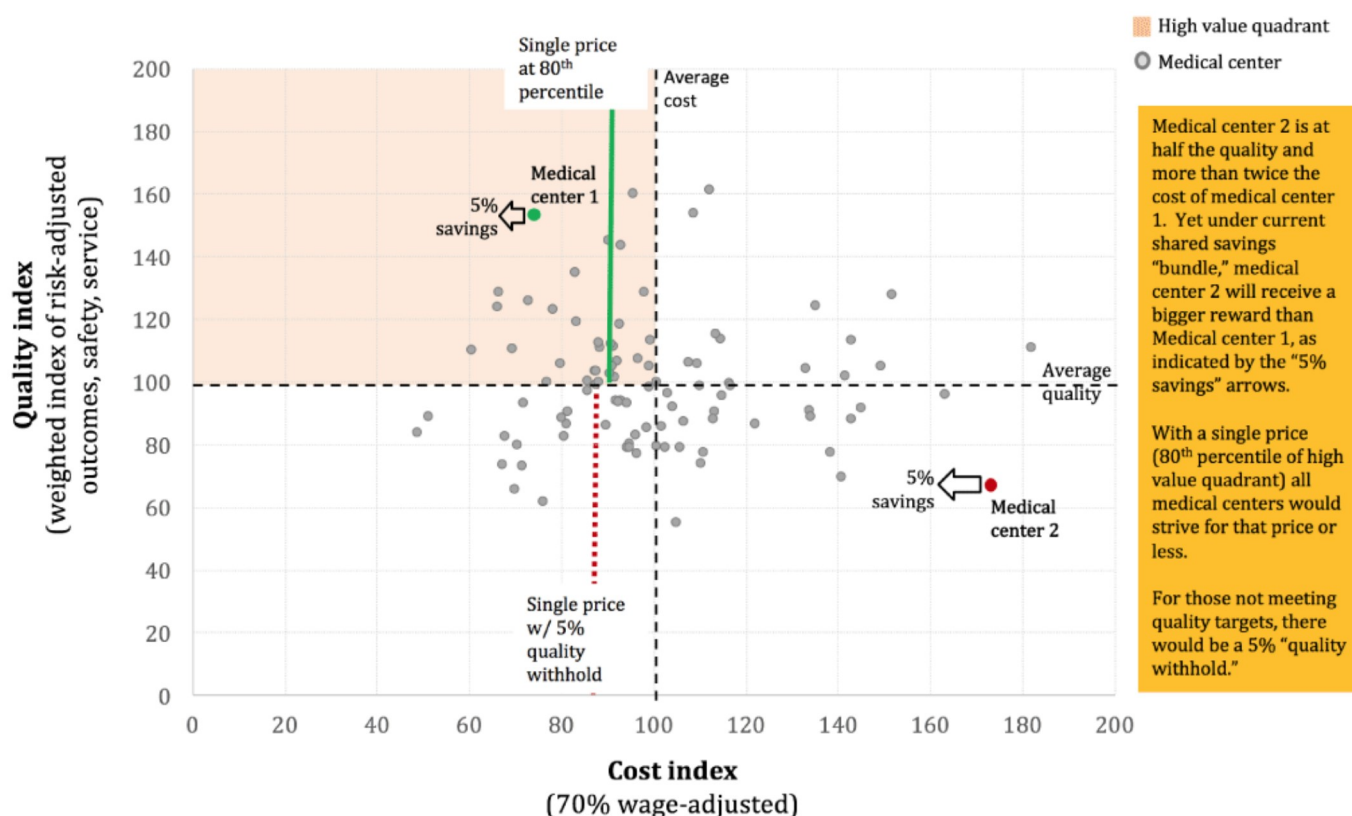
reference price for the bundle (for example, based on the 80th percentile of actual costs for the high-value group). In doing so, CMS would steer clear of penalizing high-value providers, while creating a strong change incentive for those providers who find themselves outside the high-value quadrant.

The four-quadrant value analysis...can help CMS create bundled pricing based on real costs, while establishing the right types of provider incentives.”

This approach also carries the strongest cost savings potential, since the incentive (and potential) for improvement would be particularly strong for high-cost organizations. To ensure that low-quality organizations do not get rewarded for simply being low cost, we propose a 5% quality withhold to create an additional incentive to improve the quality of patient care. To that end, all delivery

organizations would initially receive 95% of the base payment amount. Providers with above-average outcomes would receive an additional 5% (bringing their total to 100% of the base payment amount), while payment to providers with below-average outcomes would be capped at 95% of the base payment amount (red dotted line in Figure 1).

Example 4-Quadrant Analysis and Price Setting for a Single Procedure Bundle



Source: Example distribution based on author analysis of publicly available data on one procedure (in this case, coronary artery bypass graft), for all reporting California hospitals. Data sourced from <https://www.oshpd.ca.gov> and <https://www.medicare.gov/hospitalcompare/search.html>

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Figure 1. Click To Enlarge.

As we can see, the potential for improvement at Medical Center 2 under our proposed model, which uses a specific benchmark, is much greater than under a model that rewards improved performance.

Given its clout and experience, CMS has a unique opportunity to lead the health system toward high-value care. By leveraging lessons learned from DRG implementation, aided by the four-quadrant value analysis, CMS can set itself and providers up for real success in implementing new payment models.

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