# Case study of APCD use. Health Policy Commission's 2014 Cost Trends Report

Health Policy Commission

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# Overview of talk

- **Background on HPC**
  - **Perspective and process for using APCD**
- **Three examples of completed analyses**
  - **From our 2014 cost trends report**

# **What** is the role of the Health Policy Commission?

Chapter 224 sets the ambitious goal of bringing health care spending growth in line with growth in the state's overall economy. The Commission is working to advance this goal by:

- Fostering reforms to the health care payment system that aim to reward quality care, improve health outcomes, and more efficiently spend health care dollars
- Promoting innovative delivery models that will enhance care coordination, advance integration of behavioral and physical health services, and encourage effective patient-centered care
- Investing in community hospitals and other providers to support the transition to new payment methods and care delivery models
- Increasing the transparency of provider organizations and assessing the impact of health care market changes on the cost, quality, and access of health care services in Massachusetts
- Analyzing and reporting of cost trend through data examination and an annual public hearing process to provide accountability of the health care cost-containment goals set forth by Chapter 224
- Evaluating the prevalence and performance of initiatives aimed at health system transformation
- Engaging consumers and businesses on health care cost and quality initiatives
- Partnering with a ide range of stakeholders to promote informed dialogue, recommend evidence-based policies, and identify collaborative solutions

# HPC perspective on APCD



- The HPC is committed to transparency & evidence-based policy
- The APCD is an essential resource for examination of health spending & system change
  - Critical
    - To begin analysis as soon as possible.
    - To produce accurate & useful results
    - To bring results to public as soon as possible
- The HPC works openly and in collaboration with our stakeholders

# Sample for 2014 Cost Trends Report



| | |
|---|---|
| **Time period** | ▪ Years: 2010-2012 |
| **Payers and products** | ▪ Payers and products included:<br>– Three major commercial carriers<br>– Medicare FFS |
| **Spending type** | ▪ Claims-based medical spending only<br>▪ No drug spending<br>▪ No other payments (shared savings, P4P, infrastructure, etc.) |
| **Level of aggregation** | ▪ Present results for three major commercial carriers collectively<br>▪ No analysis by individual carrier<br>▪ No analysis by provider or provider system |

# Example 1. Provider variation – spending per episode

## Motivation for studying

- Episodes of care cover related spending before and after a procedure.
- Studies of provider practice variation highlight possible opportunities to improve care and/or contain costs.
- Analyzing episodes goes beyond studies of hospital prices to examine spending measures that cross settings.

## New findings in 2014 Report

- For three common conditions (knee replacement, hip replacement, percutaneous coronary intervention in a low-risk commercial population), hospitals vary widely in health spending across an episode of care, without measurable differences in quality.
    - For each condition, we compared spending at academic medical centers against a benchmark or benchmark group.

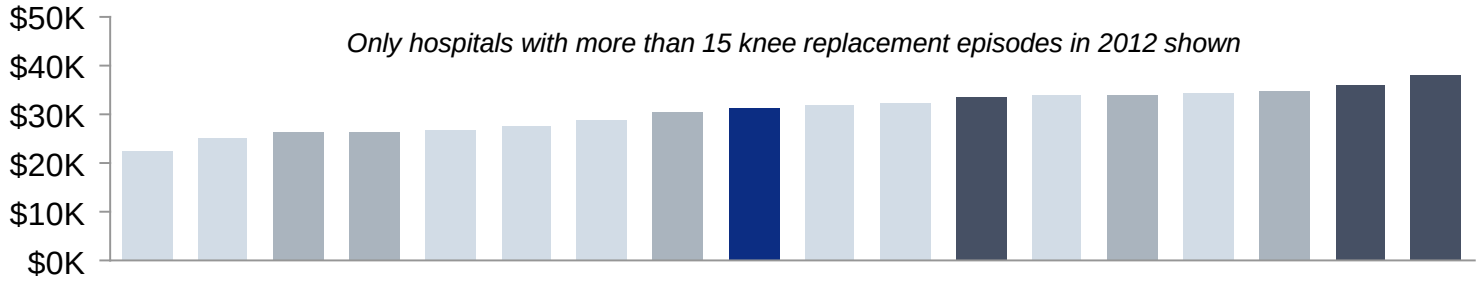
# Total spending for low-severity knee replacement commercial episodes varies by hospital type, with little relationship to quality

**Episodes**

*Average total spending per episode of knee replacement, by hospital**

**Spending**

| | Average spending per knee replacement episode | Percent difference compared to NE Baptist | |
|---|---|---|---|
| NE Baptist | $31.3K | - | *Reference Hospital* |
| AMC | $36.1K | **15%** | |
| Affiliated | $29.8K | **-5%** | *Non-AMC hospitals* |
| Unaffiliated | $28.6K | **-9%** | |




**Quality**

- Almost all hospitals had **readmissions** and **complications rates no different statistically** from the U.S. average
- Only New England Baptist had statistically better rates, but the difference was small

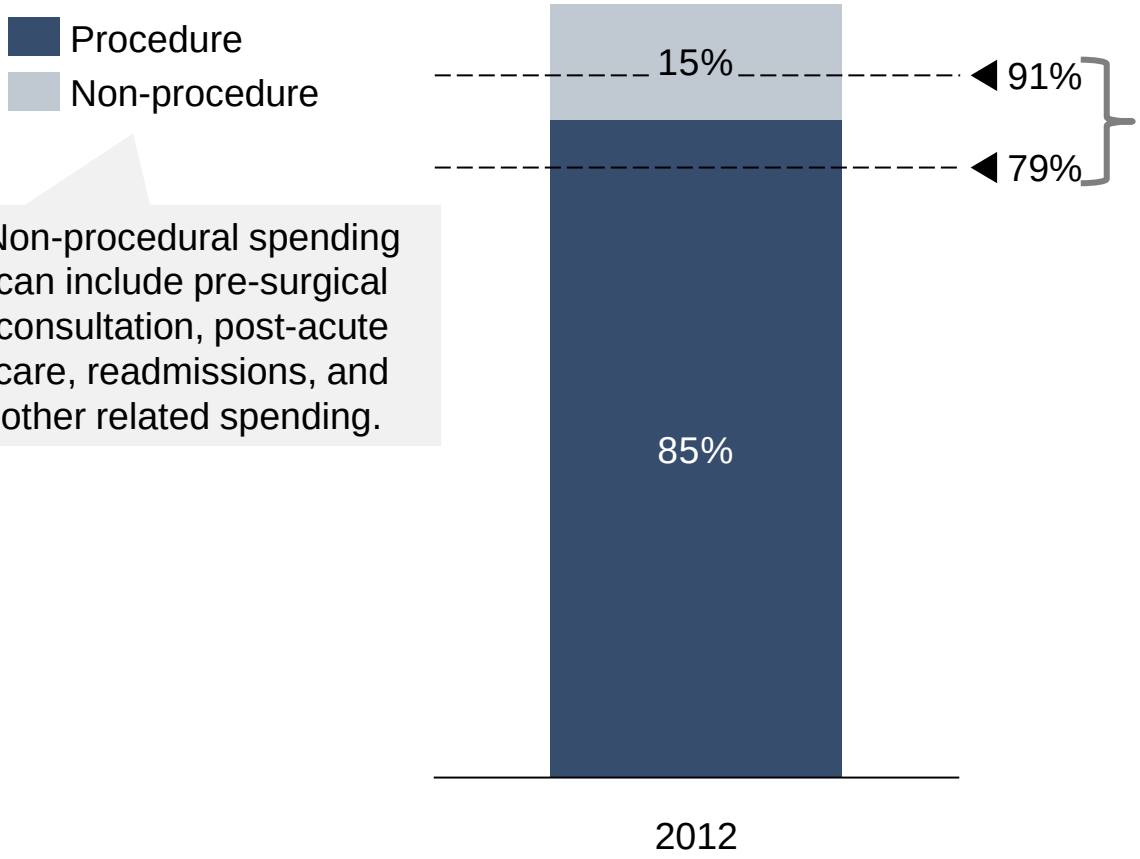
*Only hospitals with greater than 15 discharges are displayed as bars; average payment shown in table includes all hospitals studied

Source: HPC Analysis of All-Payer Claims Database, 2012

# For all hospitals, the price of the procedure drives episode spending

**Episodes**

*Average percentage of episode spending by payment type*




Non-procedural spending can include pre-surgical consultation, post-acute care, readmissions, and other related spending.

The share of the knee replacement episode represented by the procedure varies little by hospital, ranging from 79% to 91%

Note: Only hospitals with greater than 15 discharges are displayed as bars; average payment shown in table includes all hospitals studied
Source: HPC Analysis of All-Payer Claims Database, 2012

# Example 2. High-cost patients

## Previous findings from 2013 Report & 2014 Supplement

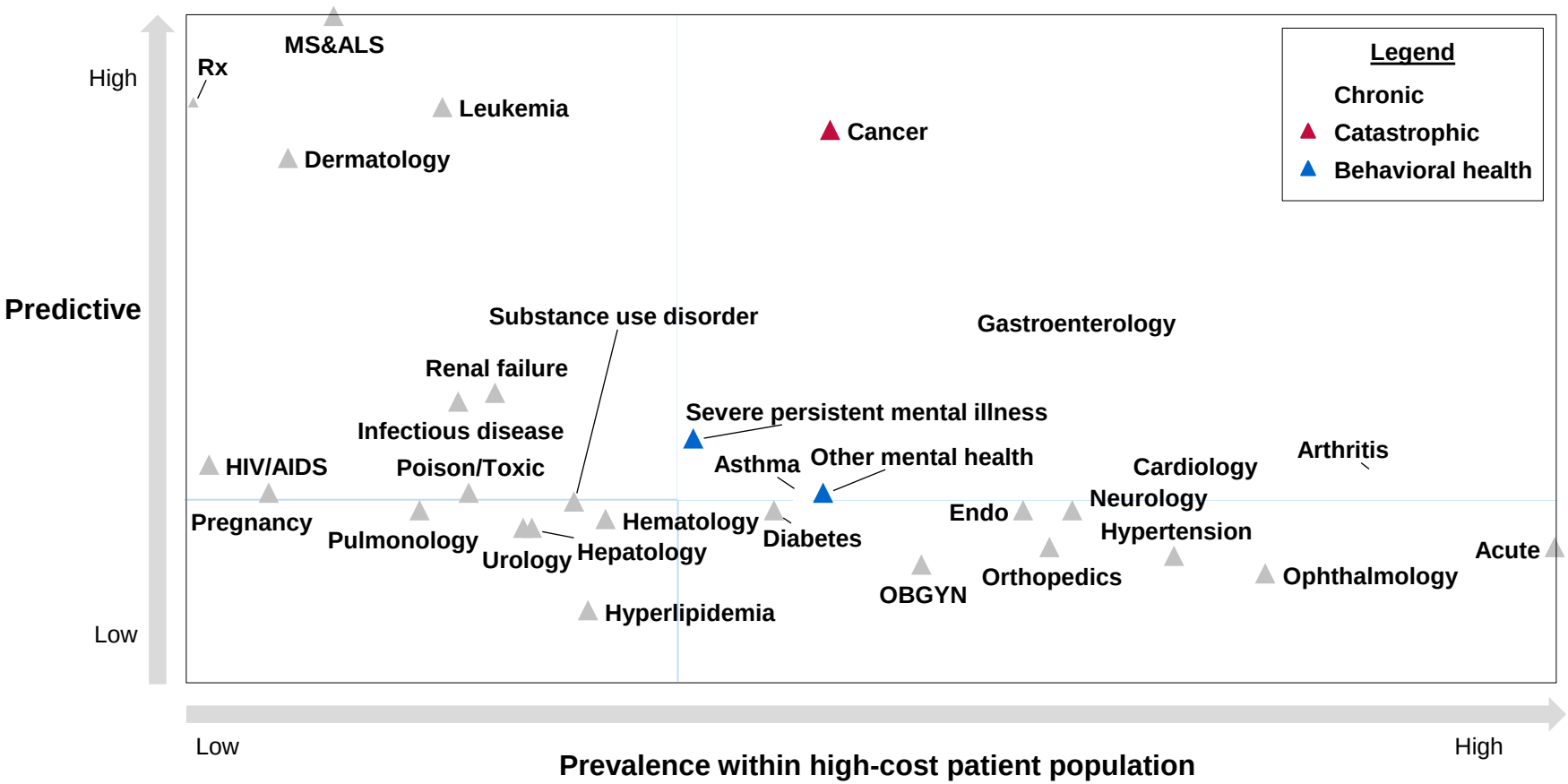
- Five percent of commercial patients account for 45 percent of total commercial medical spending.

## New findings in 2014 Report

- Patients with high total medical spending for three consecutive years represent an important group to understand.
- Results reinforced a focus on behavioral health and managing chronic conditions.

# For commercially insured persistent high-cost patients, chronic conditions and behavioral health conditions are predictive and prevalent

## High-cost patients




Note:
(A) Long-term high cost patients (HCP) are defined as the 5% of patients with highest claims-based medical expenditures (excluding pharmacy spending) over three consecutive years (2010-2012).
(B) The sample was limited to patients who had full years of enrollment for 2010-2012 and costs greater than or equal to $0 in each year. Figures do not capture pharmacy costs, payments outside the claims system, Medicare cost-sharing, or end-of-life care for patients who died during the study period.
(C) Commercial adult population is limited to ages 19-64 in 2010 base year
(D) Predictive is defined as having an odds ratio of at least 2.0; prevalent is defined as having at least 15% of high cost commercial patients with a given medical condition

Source: HPC analysis of Massachusetts All Payers Claims Database (payers include Blue Cross Blue Shield, Harvard Pilgrim Health Care, and Tufts Health Plan), 2010-2012

# Example 3. Behavioral health

## Previous findings from 2013 Report & 2014 Supplement

- Patients with behavioral health conditions spend more for medical conditions particularly if both mental health and substance use disorders are present.

## New findings in 2014 Report

- HPC research identifies spending differentials between patients with and without behavioral health conditions for specific medical conditions.
- Addressing current data challenges is essential for the success of any state strategy on behavioral health.

# Spending differential between patients with and without behavioral health conditions is pronounced for many medical conditions

## Behavioral health

*Average claims based medical expenditure per episode of care for select medical conditions with high aggregate difference (calculated as number of cases for people with at least 1 behavioral health condition* average difference in spending per episode of care) between people with and without behavioral health (BH) conditions, among patients with at least one chronic medical condition, for top 3 commercial payers, 2012*

| Medical conditions | Aggregate difference | = Number of episodes in people with at least 1 BH condition | × Difference in spending per episode of care between people with and without BH conditions |
|---|---|---|---|
| **Localized joint degeneration** | $29.3M | 52.3K | $0.6K |
| **Ischemic heart disease** | $20.8M | 7.0K | $3.0K |
| **Obesity** | $19.5M | 14.3K | $1.4K |
| **Cerebral vascular disease** | $18.9M | 3.0K | $6.3K |
| **Leukemia** | $16.1M | 0.3K | $55.3K |
| **Total for 5 conditions with highest aggregate difference** | $104.6M | 76.9K | |
| **Total All Types of Conditions** | $395.8M | 908.8K | |

- Integration of appropriate and timely treatment for patients with behavioral health conditions is critical to promote population health and contain costs.
- Better data is essential to develop and implement a state strategy for behavioral health.

*Presence of behavioral health and chronic medical conditions determined by episode risk flags from Optum (see technical appendix for more information)
Note: ED = Emergency Department
Source: HPC analysis of Massachusetts All Payers Claims Database (payers include Blue Cross Blue Shield, Harvard Pilgrim Health Care, and Tufts Health Plan), 2012

# Future plans

- **Update analytic file to 2013**
- **Include pharmacy**
- **Include MassHealth, when possible**
- **Make national comparisons, when possible**
- **Interested in collaborations with outside researchers that share our aims**

# Contact information



For more information about the Health Policy Commission:

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