WHAT CAN EMPLOYERS DO TO REDUCE WASTE AND LOWER HEALTH CARE SPENDING?

(Issue Brief #2)

Leif Wellington Haase, 2018

BACKGROUND

Employer-based health insurance, which covers around 160 million Americans, is the backbone of the American health care system. This system came about largely by accident. After earlier efforts to create a national health system fell by the wayside, private health insurance grew rapidly during the 1930s. Blue Cross successfully recruited middle-class Americans to buy insurance for hospital coverage, seeking out working Americans because they were more easily recruited at their place of work, were in better health, and could more easily pay the monthly premiums.[1]

During World War II, companies faced wage and price controls and had to compete for scarce labor by offering generous in-kind benefits, which were not subject to taxation. After the war, labor unions successfully included health benefits in their collective bargaining demands, widening the scope of those with coverage. Several court decisions in the 1950s, though not directly involving health care, confirmed that employer payments for their workers' health care would remain tax-deductible.[2]

Through "path dependence," as political scientists term it, these circumstances led to a uniquely American health system that tied employment to health insurance.[3] Most public coverage in the US was built on the chassis of employer-based coverage. For instance, the cumbersome distinction in Medicare between Part A (for hospital coverage) and Part B (for physician and other services) reflects the model of private sector insurance when Medicare was enacted.

This voluntary employer-based system has made it harder to insure all Americans. Those without jobs have always had more difficulty accessing affordable coverage. It also affects why health care is more expensive in the US relative to other developed countries. Thousands of fragmented individual employers, each covering their own employees, generally have been unable to exert countervailing downward pressure on the prices demanded by powerful suppliers: physicians, hospitals, drug and device makers, and supply chain vendors.

Though the overall percentage of Americans with employer-based coverage has slowly but steadily declined, the employer-based system has proven to be remarkably durable. Policy analysts have predicted its demise for decades. Politicians at the federal and state level have introduced bills, such as single-payer legislation, designed either to eliminate or to circumvent it.

Nevertheless, driven by the favorable tax exclusion (a tax subsidy worth over $200 billion a year to the mostly better-off Americans who receive it), the perceived value of offering benefits to recruit workers, the desire for healthy employees, and sheer inertia, the system remains largely intact.[4] Commercial payers, especially large self-insured employers, are the

linchpin to financing the modern U.S. health care system; they frequently pay twice as much as government payers and sometimes much more. There was no "flight to the exits" after the passage of the Affordable Care Act in 2010, even though the creation of state marketplaces for individuals offered employers a potential escape hatch.[5]

WAKING THE SLEEPING GIANT

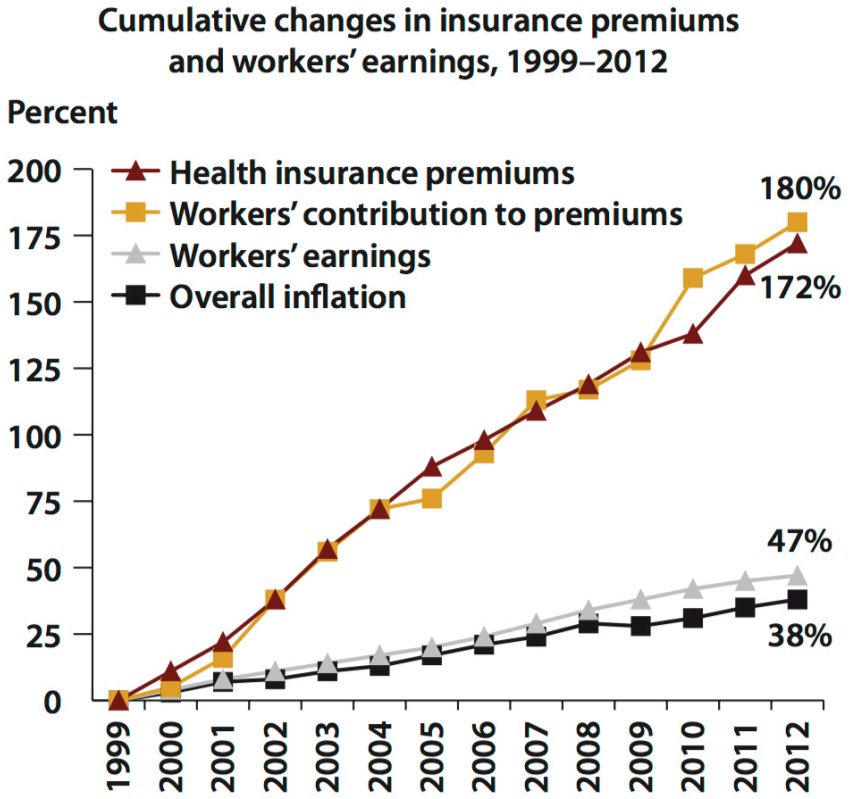
Nevertheless, employers have been uneasy for decades about the rising costs of health care for their companies. Their principal response has been to shift the costs to employees by changing the kinds of insurance they offer, from indemnity coverage—which simply paid claims as they were rendered—to HMOs and PPOs in the 1990s, and on to HDHP's, with their high copays and deductibles, today. Some 70 percent of large employers now offer HDHPs, and 5 percent offer only such plans.[6] They have been less involved in trying to change the way health care is paid for and delivered. Despite their potential clout, employers have had less impact on reining in U.S. health care spending in the past than their potential influence might warrant. There are several reasons for this:

- Businesses have tended to be reflexively opposed to health reform because they **fear that the burden of change would be largely placed on them in the form of an employer mandate**;
- **CEOs defer consideration of health insurance to the HR department**, which frequently knows little about health care and purchases it on price rather than quality or value, or the firm hires benefits consultants whose interests are not always entirely aligned with the company's;
- Because CEOs frequently serve with hospital administrators, prominent doctors, and other medical executives on local non-profit boards and mingle with them socially, there is **strong social pressure** not to take an aggressive position on medical overspending;
- At the federal level, dealing with health care is always **a "third or fourth priority"** after tax policy and regulation;
- When major companies did become directly involved with health care through the **"managed care revolution,"** which briefly stemmed the upward march of health care costs, they were confronted by a **fierce backlash** from providers and employees;
- **Companies often find it difficult to cooperate and to engage in collective action.**

> "In Health Care, 2018 is the Year of the Corporation."
>
> - Robert Kaplan, Harvard Business School

In the past several years, employers—and especially large self-funded companies—have become newly aggressive about taking on rising health costs. What has changed?

After a brief slowdown due to the recession and the impact of the Affordable Care Act, health costs have steadily ticked upward again, rising more than five percent annually from 2013 to 2017 with similar increases expected in the near future.[7] The total cost of health benefits, including premiums and out-of-pocket costs, averages $14, 156 per employee in 2018, with employees bearing roughly thirty percent of this sum, or around $4400 a year.[8]



Source: *Confronting Costs, Stabilizing U.S. Health Spending While Moving Toward a High Performance Health Care System*. The Commonwealth Fund. January 2013. Commonwealthfund.org

Some cost-conscious CEOs have lost patience with insurers and their own benefits departments and are now pursuing "direct and deep" collaboration with providers. Many have also reached the limit of cost reductions won by compelling employees to pay more in cost-sharing and steering them toward high-deductible plans: in the jargon of the industry, they are suffering from "benefit buy-down fatigue." At the same time, employees have become more educated about health care tradeoffs and are more comfortable trading off narrower networks of doctors for a lower price. A new generation of "value-based purchasing" tools—such as accountable care organizations, bundled payments, and other alternative payment models—is at the business owners' disposal.

In addition to these trends, the scale and scope of purchasing initiatives have grown. These include the Amazon/ Berkshire Hathaway/ JP Morgan partnership, discussed below, Apple's expansion of its wellness initiatives, and the emergence of groups such as the Health Transformation Alliance, which combines forty-six self-funded companies with 7 million covered employees. More companies are self-funded—meaning they use insurers only to perform administrative tasks. This lowers costs in its own right but also allows firms to experiment with new payment and coverage designs outside of insurer preferences and constraints, as well as many federal and state regulations.

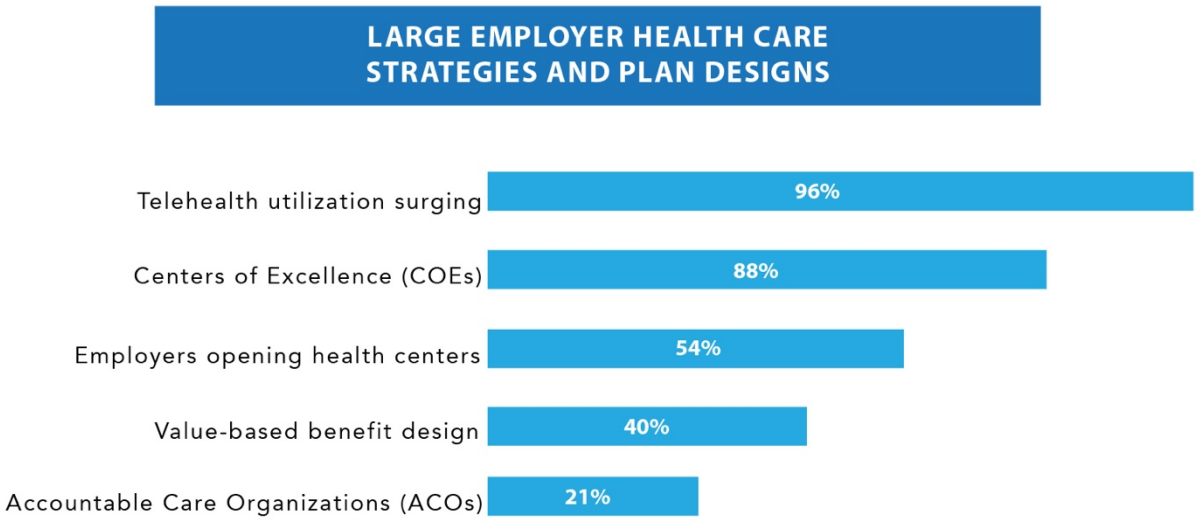
WHAT CAN COMPANIES DO EFFECTIVELY?

> "Shared savings is a transition to full financial risk. As providers take full risk, they become in effect insurance companies. …If I were an employer, I would offer a broad array of products, look for a plan that is owned by providers, and contract directly with doctors."
>
> - Dr. Will Shrank, Director of Insurance Services, University of Pittsburgh Medical Center (UPMC)

In conversations with two dozen health care leaders, from insurance executives to the CEOs of integrated health systems to payers from large companies, a dominant theme emerged: employers are increasingly demanding that their contracted physicians and hospitals show evidence of value, generally in the form both of lower costs and of better health outcomes.

Some are taking baby steps toward this goal by steering some of their business toward Accountable Care Organizations (ACOs) and episode-based and bundled payments. Others are moving more aggressively toward direct contracting with physicians and integrated health systems, which combine a physician-hospital network with an insurer, in which the provider takes on full risk for the cost of treating patients.

McKinsey estimates that some 25-35 percent of all contracts signed by hospitals in 2015 contained value-based provisions, up from less than 10 percent a year earlier, although these contracts still account for a small fraction of hospital revenue.



Source: Large Employers' 2018 Health Care Strategy and Plan Design Survey ©2018 National Business Group on Health.

Accountable Care Organizations (ACOs)

An ACO is a voluntary affiliation of doctors, hospitals, and medical providers who share financial and medical responsibility for coordinating care for patients with the aim of reducing unnecessary procedures and medical spending.[9] 70 percent of employers either expect to adopt an ACO or show considerable interest in the concept.[10]

ACOs were proposed in response to a specific theory of why U.S. healthcare costs were rising. Fee-for-service payment encourages doctors and other medical professionals to perform too many procedures, tests, and other services and resulted in care delivery that was both inefficient and often needless.The work of John Wennberg and his colleagues at Dartmouth College on the wide variation in the volume of services delivered in different regions of the country, as well as the prices paid for them—absent evidence of underlying medical need—was strong evidence for this theory.[11] Atul Gawande, in a much-read *New Yorker* article on the excessive volume of services delivered in McAllen, Texas, brought the argument against fee-for-service payment to the close attention of policymakers.[12]

To combat this inefficiency, ACOs try to arrange structural and payment incentives that encourage coordination of care for a patient, moving away from the fragmentation and incentives for overuse inherent in FFS payment. A primary care physician is usually designated as the quarterback of a patient's care. At the first stage, providers typically receive bonuses ('shared savings') when they collectively meet or exceed targeted measures of quality and outcomes for a particular patient.

In some ways, ACOs resemble health maintenance organizations (HMOs) such as Kaiser Permanente, which provide all patient care to members in return for a capitated (per person, per month) payment from an employer or individual. In theory, the differences are considerable: HMO networks are put together by the insurer rather than providers

themselves, those enrolled in an ACO may go outside the network without penalty (indeed, patients may not even know they are in an ACO[13]), payment is rarely fully capitated, and quality benchmarks are in place to guard against the systematic under-treatment that is a possibility in fully capitated payments.[14]

Both in terms of number and volume of payments, ACOs have grown rapidly over the past decade. Although the concept received its first test in the commercial sector, ACOs received a strong boost through high-profile Medicare initiatives launched through the Affordable Care Act—almost 250 ACOs began contracting with Medicare in 2012 and 2013, most of them accepting only "upside risk" or bonuses for saving money relative to a benchmark but some willing to risk losses if they underperformed the benchmarks. Of the ACOs that contracted with Medicare, 52 initially cut costs enough to share in savings while 115 did not achieve any savings, and eight of those that accepted more risk left the program altogether.[15] Roughly one-third of these ACOs saved money and were eligible for bonuses by their third year, a modest improvement.[16] They continue to become more prevalent—nearly one thousand ACOs are now in operation, and more than 32 million insured are enrolled in or placed in them, six in 10 those in a commercial ACO.

> "In 2012, Medicare had zero percent of payments in alternative payment models, and by 2016 we were ahead of schedule with over 30 percent of payment in these models like ACOs, bundled payment, comprehensive primary care. …The ACOs that have been in the program longer are on average saving significantly more money and having better quality results."
>
> - Patrick Conway, CEO, Blue Cross Blue Shield of Carolina, former director, CMS Innovation Center.

While the future expansion and success of ACOs remains an open question, most large employers will have a substantial number of their employees enrolled in them in the near future.[17] Employers have a strong stake in supporting national performance measures for ACOs, some of which are being developed by regional stakeholder groups.[18] They can explain the concept to their employees, whose active participation can improve the care coordination that ACOs promise. They can insist that providers, over time, take on real risk as a condition of payment. And as with health systems more generally, they can contract with better-performing ACOs and steer their employees to use them.

Bundled or Episode-Based Payments

Bundled payments are single payments that cover the entire cost of care, across providers and settings, for a patient for a particular illness or condition during a specified period.[19] In their aim of lowering costs and improving quality and efficiency by moving away from FFS payment, and in linking payment to outcomes, their goals are similar to those of ACOs.

Like ACOs, bundled payments were developed in the commercial sector—through Thomson Reuters computer software packages, Geisinger's ProvenCare system, and the PROMETHEUS payment model—and given a substantial boost by Medicare, which launched its own initiative, Bundled Payments for Care Initiative (BPCI) in 2012 to cover 48 episodes of care, roughly half acute care conditions and others related to chronic illness.

As Hoangmai Pham explains, bundled payments can complement ACOs while being something of a hedge as well: "The ACO approach theoretically has more upside because it provides incentives to control episode volume as well as to improve the efficiency of episodes of care. But ACOs face greater risk of falling short because the approach essentially relies on fee for service and the organizational changes required for success are more challenging."[20] Some analysts, such as Michael Porter and Robert Kaplan, believe that bundled payments are a preferred alternative to ACOs and to capitated payment, arguing that capitation locks patients into a particular health system, reduces choice, stifles innovation, and entrenches large incumbent health systems.[21]

Bundled payments are far more common than ACOs and are growing more rapidly. Around 10,000 providers receive some kind of bundled payment, while roughly one thousand ACOs are up and running.[22] There is also evidence that they are saving money for purchasers while delivering high quality and improved outcomes. For instance, almost half of the nearly 800 hospitals in Medicare's Comprehensive Care for Joint Replacement bundled payment program saved money in its first year.[23] The first evaluation of Medicare's BPCI found that the cost of hip or knee replacement episodes fell $1166 in participating compared to nonparticipating hospitals, with no measurable differences in outcomes.[24]

After a slower start, the commercial sector has also been benefiting from bundled payment initiatives. Geisinger's non-emergency CABG bundle saved an estimated 5% relative to traditional methods.[25] Horizon Blue Cross of New Jersey reduced its hospital readmission rate for complications from hip replacement by 37 percent after introducing an episode-based payment for joint replacements, and the rate of C-sections for pregnant women with uncomplicated deliveries fell by one-third.[26] Likewise, General Electric and Tri Health have launched a maternity care bundled payment plan for GE's employees in Cincinnati.[27] Baptist Health System in Texas for joint replacement led to a reduction in post-acute care spending by 27 percent.[28]

Not all well-planned and promising bundled payment initiatives have succeeded. In California, a demonstration project launched by the Integrated Healthcare Association and the RAND Corporation, which numbered among its participants most of California's health plans along with eight hospitals and a prominent medical group, attempted without success to inaugurate a model bundled payment for orthopedic surgery for adults in commercial plans, mainly because the potential partners could not agree on either design parameters or how to divvy up compensation.

Both the early successes and setbacks point out a set of criteria for employers and other payers with respect to bundled payment:

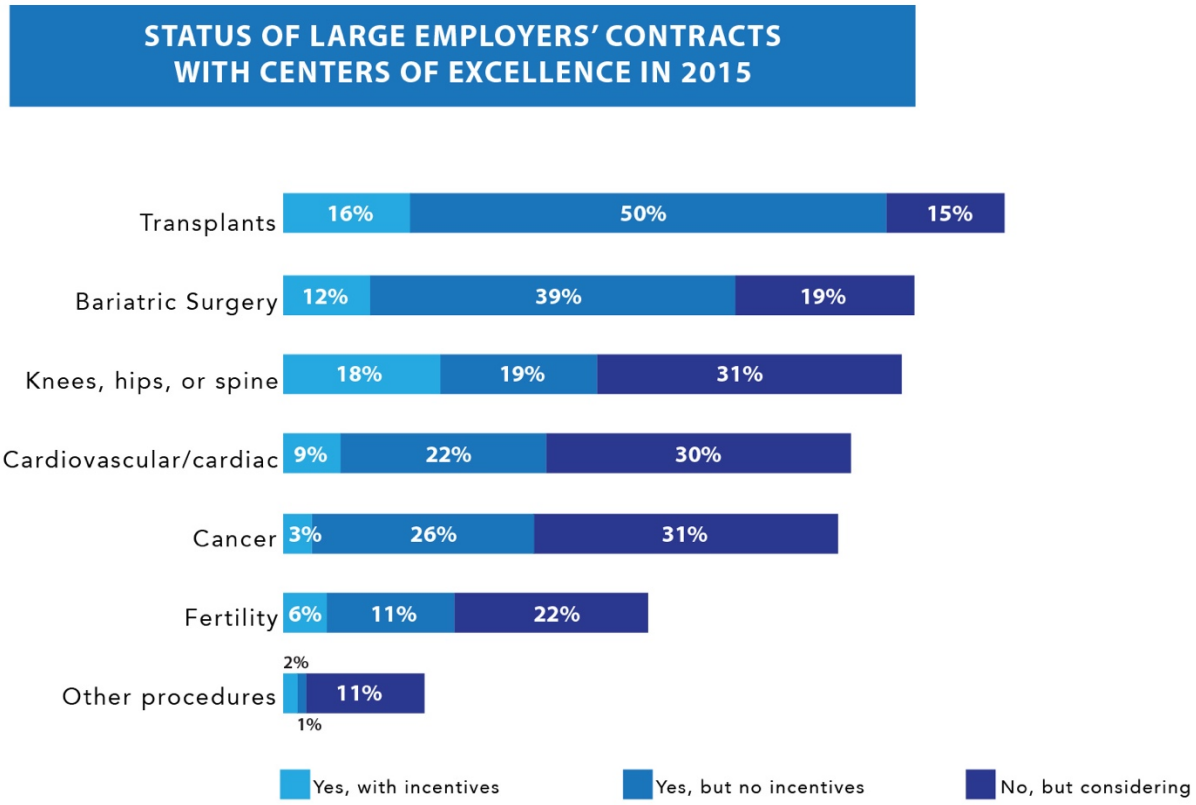
- Put care redesign, not payment reform, at the heart of bundled payment implementation;
- Consider retrospective payment for the first go-around, in order to get a clear picture of the financial risks involved;
- Ensure that there is a high enough volume of patients for hospitals and other participants to adjust their practices;
- Make sure that clinical quality and appropriateness criteria are included in the stipulations for the bundle;
- Keep the initial definition of the bundle simple and revise over time;
- Make sure that the participating providers have sufficient administrative and legal capacity to handle the payment process.

Centers of Excellence

The term "Center of Excellence" has various meanings in health care: in fact, it was first used extensively to refer to a pioneering Medicare project in bundled care payments for heart bypass surgery in the early 1990s. It now refers to a hospital-based institute or cluster of physicians, often-team based, who achieve a high level of quality in particular niche specialties, with an aim toward gaining market share for an institution and attracting patients both through measurable results and reputation. The specialties tend to involve surgeries that demand a significant amount of medical management in the aftermath: examples include cardiology, neurology, spine and orthopedic surgery, and the treatment of diabetes.

Others have used the term to characterize the future of the hospital once most diseases can be managed by drugs in an outpatient setting and in which "upstream" management of health care leads to better population health: under those conditions, hospitals will predominantly focus on the most difficult and labor-intensive procedures and their sequelae.[29]

In related fashion, Wal-Mart describes "Centers of Excellence" to designate what it deems low-cost and high-quality facilities to perform spine surgery, paying 100 percent of the cost at these locations and only 50 percent elsewhere.[30] The rationale draws explicitly from Choosing Wisely and its estimate that some 30 percent of spine surgery is unnecessary and indeed harmful, in many cases, to the patient. Back and spine treatments, which are conducted more than twice as often in the US as in any other country, have been estimated, including their complications, to consume 4 percent of US GDP alone.



Note: Other centers of excellence include maternity, NICU, sleep apnea, pancreas, cornea, and kidney.
Source: Large Employers' 2016 Health Plan Design Survey ©2015 National Business Group on Health.

Direct Negotiation and Integrated Systems

Some employers are largely bypassing insurers and other intermediaries altogether in order to cut the least expensive deals with a network of high-value providers, in effect creating a kind of "Super ACO." Sometimes such provider-focused initiatives use integrated systems such as Kaiser, Geisinger, and Intermountain Healthcare, and other companies construct partnerships, relatively speaking, from scratch.

Quality improvement expert Harold Miller speaks of FFS payment as buying a TV one part at a time, and bundled payment as getting an assembled product. The newer and narrower employer-based networks are more of a do-it-yourself (DIY) assembly from a set of superior components.

For instance, Seattle-based Boeing has negotiated direct contracts with large integrated systems in four markets—Seattle, St. Louis, Charleston S.C, and Los Angeles—for some 15,000 of its employees, or around one third of those eligible in those locations. Boeing and the health providers agree on a financial and performance guarantee in advance, with health systems sharing in the savings if they materialize. Boeing's managers can also stipulate aspects of care they find important—like including behavioral health and primary care coordination—and can better customize the plans because its employee base is relatively stable and because (unlike in standard insurance plans) the provider has access to specific

data on the employee population served. Since the program only launched in 2015, knowing the extent of cost savings is premature, but satisfaction among executives, participating providers, and employees is high.[31]

One prominent experiment in California paired the state's retirement fund, CalPERS with a hospital system (Catholic Health West), an independent practice association (Hill Physicians), and an insurer (Blue Shield) to successfully reduce premiums for members by fifteen percent—largely by avoiding the high costs associated with back pain and other orthopedic interventions. The design of this program was developed by a RHIC, the Integrated Healthcare Association, based in Oakland. Despite its well-measured success, it hasn't led to further partnerships, mainly because of leadership changes in the companies involved.

The New Jersey-based Health Transformation Alliance (HTA), a nonprofit composed of 46 self-funding companies with over seven million employees, including American Express, IBM, Johnson & Johnson, and Macy's, has constructed a value-based network to deliver care for several costly conditions including Type 2 Diabetes, hip and knee replacements, and back pain, in three cities, with pay tied to performance rather than volume. This initiative has enormous transformative potential, not least because HTA is doing the actual purchasing rather than simply identifying strong performers and trying to drive others their way. HTA's effort to disrupt the supply chain for drugs, however, has yet to show much in the way of results.

Purchasers need not be as large as Boeing nor part of a giant health alliance to realize the promise of direct contracting. Langdale Industries of Valdosta, Georgia, a rural wood products company, held its average increase per employee to 1.31 percent annually from 2000-2009, far below the national average of 8.83 percent over that time period, while keeping quality high. Its main strategy was to set-up a HIPAA-compliant firm that could figure out quality and cost data for individual providers, then aggressively court those firms to place them in an ad hoc network.[32]

The Pittsburgh (Allegheny County) school board likewise managed to spend less in 2016 on health care than in 2014 by thoroughly researching hospital and quality data and using reference pricing to steer its members toward preferred, less expensive sites.[33]

The newfound determination of American business to bring down health care costs, reflected in the move toward alternative payment schemes, is driving two forms of consolidation in the health care industry, vertical and horizontal. The spate of mergers between health care businesses of various kinds—such as CVS-Aetna-- are being prompted not only by the historic desire to dictate terms of payment to insurers but to achieve the scale necessary to succeed in the new payment environment. The physical networks being created by hospitals and medical groups of emergency rooms, urgent care centers, and freestanding outpatient facilities are responding to the same incentives.

At the same time, the horizontal integration taking place between insurers, drugmakers, and retailers, as United Healthcare VP Lewis Sandy points out, shows responsiveness to the landscape of high deductible health plans and consumer "skin in the game" with respect to a wide range of everyday health costs formerly covered by insurance, as well as carving out a niche should insurers, as is increasingly the case, be gradually shut out of their traditional business with companies.

"There are proven but mostly untapped approaches in the market that consistently deliver better health outcomes at significantly lower cost. In the main, legacy health care organizations have ignored these solutions, because efficiencies would compromise their financial positions."

- Brian Klepper, Principal, Worksite Health Advisors

The Buyer Whose Time Has Come: the Amazon Moment in Health Care

Few vague press releases have ever caused such a stir. When Amazon announced in late January 2018 that it would partner with Berkshire Hathaway and JP Morgan (the nation's largest bank) to create a company that would seek out long-term "technology solutions that will provide…simplified, high-quality and transparent health care at a reasonable cost" it roiled the stock market and prompted a tsunami of speculation. Most of the responses, both in the daily press and in online health care sites and journals, took the form of *schadenfreude*: Messrs. Bezos and Buffett, like many before them, were sure to be ground up on the reefs of American health care. Or even if their one million employees or so got a better deal, it was unlikely that this new consortium would improve the system as a whole. One prominent health economist grumbled that the entire episode was as insubstantial as "pixie dust."[34]

While there are dozens of things Amazon could and probably should do—starting with the creation of a framework for making choices in health care that would range from identifying high and low value providers to how best to pick a primary care doctor—the reaction to the announcement was more significant than any of the specific ideas in the sparse press release. Stock analysts—who are as unsentimental as Vegas bookies—clearly expect a set of serious challenges to incumbents in health care. Those organizations, in turn, are all too aware that their dominance largely depends on more money being spent on health care, rather than that it is spent judiciously. In this respect, Amazon is painting a bullseye on changes yet to come. Because of its entry into the health care lists, the set of reforms discussed in this brief are much more likely to get a closer look.

Tackling the High Price of Drugs

The high prices of pharmaceuticals and particularly of specialty drugs are of deep concern to employers: for many CEOs, it is their single greatest worry about health costs. Increased drug spending has accounted for more than a third of cost increases for large employers over the past three years, outpatient drug costs are now a larger source of employee spending than inpatient hospital costs for many employers, and the unpredictability of price changes has especially rattled purchasers. Moreover, many of the levers that can affect drug pricing are in the hands of governments, including price regulation or reimportation, not directly in the control of employers or insurers.

What employers can try includes bypassing PBMs and other suppliers, especially for very large companies, insist on greater transparency on how the price of their pharmaceuticals is set, ensuring that drugs are administered in the least effective setting that is clinically acceptable, and making outcomes-based pricing agreements with drugmakers by setting reimbursements, based on data about a patient's condition, to reflect the expected value of a drug in treating it.[35]

Historically, drug spending has reached around ten percent of total U.S. health costs, then fallen back. Just six years ago, when drug price rises were in single digits, many analysts argued that drug price rises were of relatively low importance or were self-correcting.[36] This correction may not happen quickly this time around, in substantial part because the availability of cheaper generics is likely to be far less for newer drugs. Moreover, the introduction of drugs that actually cure rather than palliate medical conditions (such as Harvoni for Hepatitis C) is likely to upend traditional calculations of drug costs and benefits.

Improving Population Health

Rochester, N.Y., which has some of the lowest premiums and slowest premium growth in the country, is a very good example of how the business community has led on health care. Rochester features living well and prevention initiatives, community-wide technology assessment and oversight of hospital expansion, electronic record sharing, and chronic care management programs, among others.[37] Grand Junction, Colorado, is another standout example of a collective commitment by employers to demanding affordability not only for their own workers but for the community at large.

Companies should pay far more attention to the direct impact of employment conditions, especially stress. Even at top companies, job stress produces chronic illness and "presenteeism" which is a large cause of high US health care spending. According to Stanford Business School professor Jeffrey Pfeffer, stressful work conditions cost U.S. companies as much as $300 billion annually and result in 120,000 "excess deaths" annually. Solutions might include more control over work hours for employees, work space adjustments, less outsourcing, and other changes.[38]

Wellness Programs

More than half of all American employers with forty or more employees have some kind of wellness program in place, with disease management, lifestyle change, physical activity challenges, digital health assessments, and similar features. While opinions vary, there is little evidence that such programs either save companies much money or contribute substantially to population health. The main reason is self-selection of employees: while costs are invariably concentrated on a few sick employees, it is the mostly healthy ones that avail themselves of the wellness benefits.[39]

CONCLUSION: WHY WORKING WITH REGIONAL STAKEHOLDERS BENEFITS EMPLOYERS

There are many reasons why being actively involved with other stakeholders, including in a formal RHIC, is mutually beneficial both to employers and to consortia dedicated to eliminating waste and bringing down the costs of care:

- It exposes employers to new forms of value-based purchasing and moves them away from purchasing based on price, convenience, or the preferences of the HR department.
- Employers can help drive the progress of performance measurement and data sharing, and benefit in turn from these initiatives;
- They can become aware of, and participate in, the broad range of activities that improve health outcomes and bring down costs long-term, especially "upstream" costs;
- RHICs are a natural liaison to hospitals and the medical environment for employers who want to improve their understanding of how care is delivered;
- Participation in education and training programs can result in employers being better able to explain health programs and initiatives to their employees;
- Joining RHICs brings together competitors and companies that ordinarily focus on other goals than health reform.

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[1] Leif Wellington Haase, *A New Deal for Health*, New York: Century Foundation Press, 2005.
[2] Jonathan Engel, *Unaffordable: American Healthcare From Johnson to Trump*, University of Wisconsin Press, 2018.
[3] Other countries, such as Germany, use employers to facilitate enrollment and contribute to paying for health care, but individuals outside the firms are allowed to join the plan or "sickness fund."
[4] Sherry Glied, "The Employer-Based Health Insurance System: Mistake or Cornerstone," in David Mechanic et.al., ed. *Policy Challenges in Modern Health Care*, New Brunswick: Rutgers University Press, 2005.
[5] Many companies and health policy analysts expected a much different outcome. For the flavor of just one of these, see Moss-Adams LLC, "Will Employer-Based Health Care Live or Die?" February 2013.
[6] https://www.shrm.org/resourcesandtools/hr-topics/benefits/pages/high-deductible-plans-more-common-but-so-are-choices.aspx
[7] Center for Medicare and Medicaid Services, Health Care Cost Accounting Group, 2017.
[8] National Business Group on Health, "Large U.S. Employers Project Health Benefit Costs to Surpass $14,000 per employee in 2018," August 8, 2017.
[9] See Jenny Gold, "Accountable Care Organizations, Explained," *Kaiser Health News*, September 14, 2015; Victor Fuchs and Leonard Schaeffer, "If Accountable Care Organizations Are the Answer, Who Should Create Them," *JAMA, June 6, 2012;* CMS.gov, "Accountable Care Organizations (ACO); Elliott S. Fisher and Stephen M. Shortell, "Accountable Care Organizations: Accountable for What, to Whom, and How?" The Commonwealth Fund, October 20. 10.; Mark McLellan et. al., "Accountable Care Around the World: A Framework to Guide Reform Strategies," Health Affairs, September 8, 2014; Fred Pennic, "What Is the Aim of An Accountable Care Organization?"
[10] This understates the interest in the latter, since virtually all the new payment strategies, such as bundled or episode-based payments, include metrics that demand that care meet a population-based or individual standard, which entails delivery reform.
[11] John Wennberg, *Tracking Medicine*, New York: Oxford University Press, 2010.

[12] Atul Gawande, "The Cost Conundrum, *The New Yorker,* June 1, 2009; "Overkill," *The New Yorker,* May 11, 2015.
[13] Mark Lutes and Joel Brill, "The 'Missing Link' in ACOs: Patients," *Kaiser Health News*, March 15, 2011; Ian Morrison, "Why Some ACO Pioneers Turned Back," *CAPG Health Magazine*, September/October 2013.
[14] Austin Frakt, "Accountable Care Organizations: Like HMOs, but Different," *New York* Times, January 19, 2015; Richard Amerling, M.D., "ACOs Are Just the Failed HMOs, but With More Power," *The Wall Street Journal*, October 31, 2014.
[15] Analyzing the early performance of ACOs in Medicare was a virtual cottage industry: some of the key reports and articles include Sharon Silow-Carroll and Jennifer N. Edwards (Health Management Associates), "Early Adopters of the Accountable Care Model: A Field Repot on Improvements in Health Care Delivery," The Commonwealth Fund, March 2013;
[16] "Larger Share of MSSP ACOs Earn Payouts For 2015 Program Year; Half Break Even," *AIS's Value-Based Care News*, September 2016.
[17] Optimists note that ACOs that have operated longer are achieving higher levels of savings and quality, especially in physician-led models. They believe, as well, that comparing savings with benchmarks underestimates how much ACOs have actually saved because it can't be determined how much would have been spent had the organizations not existed. Pessimists see ACOs as representing a small portion of hospital revenue, and a negligible amount of revenue for most physicians, despite the overall number of contracts signed and organizations created. They also note that any savings seem largely unconnected to coordination of care, as expected by advocates, and cast doubt on the studies that show savings. They see the model stalling and meeting a fate similar to many physician-led organizations in the 1980s and 1990s, which mostly collapsed thanks to a lack of capital and an inability to accept full risk for patients.
[18] Roslyn Murray and Suzanne Delbanco, "Two Ways Employers Should Push ACO Arrangements to Evolve," *Health Affairs* blog, April 9, 2018; Delbano and David Lansky, "The Payment Reform Landscape: Accountable Care Organizations," *Health Affairs* blog, August 5, 2014; Integrated Healthcare Association, "IHA/PBGH ACO Measurement Initiative Gains Momentum," December 15, 2017; Integrated Healthcare Association (James Robinson and Emma L. Dolan), "Accountable Care Organizations in California: Lessons for the National Debate on Delivery System Reform," 2010.
[19] For excellent definitions, descriptions, and overviews, see Cathy Schoen et.al., *Bending the Curve: Options for Achieving Savings and Improving Value in U.S. Health Spending*, The Commonwealth Fund Commission on a High Performance Health System, December 2007; Hoangmai H. Pham et.al., "Episode-Based Payments: Charting a Course for Health Care Payment Reform," National Institute for Health Care Reform, January 2010, and Harold Miller, CHQPR, glossary.
[20]Pham op.cit. p.9. Joshua M. Liao, et.al., "BPCI Advanced Will Further Emphasize the Need to Address Overlap Between Bundled Payments and Accountable Care Organizations" is a thorough and up-to-date analysis of the ways ACOs and bundled payments can co-exist, and where pitfalls may lurk, in the Medicare program, *Health Affairs* blog, April 17, 2018.
[21] See, in particular, Michael E. Porter and Robert S. Kaplan, "How to Pay for Health Care," *Harvard Business Review*, July-August 2016, the most comprehensive and thoroughgoing case on behalf of bundled payments.
[22] Paul Kamel et.al., "Expanding the Use of Episode Analytics Beyond Alternative Payment Models," McKinsey & Co., March 2018.
[23] Amol S. Navathe et.al., "Characteristics of Hospitals Earning Savings in the First Year of Mandatory Bundled Payment for Hip and Knee Surgery, *JAMA*, March 2018. One non-measurable but telling testament to the momentum around bundled payments is that the Department of Health and Human Services in the Trump administration, after initially intending to roll back some of the bundled payment initiatives, reversed course and now plans to go forward with a similar plan: Jacquelyn W. Chou et.al., "Bundled Payments: Balancing Incentives, Quality, and Affordability," *Health Affairs* blog, December 20, 2017; Robert Pear, "Trump Officials Rejected An Obama Medicare Idea, But Now Adopt One Like It," *The New York Times*, January 11, 2018.
[24] Jonathan O'Donnell et.al., "Moving Beyond Joint Replacement: Expanding Payment Reforms To Better Incentivize Chronic Care For Degenerative Joint Disease," *Health Affairs* blog, April 23, 2018.
[25] NYS Health Foundation, "Bending the Health Care Cost Curve in New York State: Options for Saving Money and Improving Care," (The Lewin Group), July 2010.
[26] Kamel, op.cit. The PBGH/ ECEN network is a good example…it is value-based purchasing, largely for joint replacement, with McKesson, Walmart, JetBlue, and Lowe's participating.
[27] https://www.bizjournals.com/cincinnati/news/2016/04/08/ge-taps-cincinnati-hospital-system-to-deliver.html

[28] Kamel, op.cit.

[29] https://www.athenahealth.com/insight/why-hospitals-must-become-centers-of-excellence
[30] https://news.walmart.com/2016/10/10/the-right-care-at-the-right-time-expanding-our-centers-of-excellence-network
[31] Joseph Burns, "With Direct Contracting Boeing Cuts Out the Middleman," *Managed Care*, October 31, 2017. Integrated Health Network of Wisconsin promised to lower costs by 10-15 percent for 55.000 employees of self-insured companies, but it disbanded instead.
[32] Brian Klepper, "Case Study: Langdale Industries," in Dave Chase, *The CEO's Guide to Restoring the American Dream*, 2016..
[33] Chase, op.cit.
[34] Knowledge @ Wharton (Mark Pauly), "Will Amazon, Berkshire Hathaway, and JP Morgan Reinvent Health Care? February 6, 2018.
[35] Daniel L. Blumenthal, et.al., "Using Outcomes-Based Pricing for Medical Devices To Improve Cardiovascular Disease Treatment Value," *Health Affairs* blog, March 29, 2018; Suzanne Delbanco and Andrea Elizabeth Caballero, "The Payment Reform Landscape: For Employers, Keep Pushing Ahead," *Health Affairs* blog, April 21, 2017.
[36] See, for example, John Marcille, "A Conversation with Jeff Goldsmith: Finding Success in Change," *Managed Care*, December 14, 2014.
[37] Ian Morrison, "Rochester Revisited," *Hospitals and Health Networks*, November 2017.
[38] Jeff Pfeffer, *Dying For a Paycheck,* Stanford Graduate School of Business, 2018.
[39] RAND's study "Do Workness Wellness Programs Save Employers Money?" (2016) is a good, though skeptical, introduction to this debate and the vast literature that it has generated.