Can Big Data Solve Healthcare’s Big Problems?

By Blake Zenger

I am a data/information geek. I like proof before I make a decision, and I really like proof expressed in numbers. I am skeptical of anything that smacks of an easy fix or a miracle cure. I don’t click on pop-up ads that promise to erase my mortgage or my wrinkles or my belly. And I pride myself on being somewhat of a skeptic when it comes to the overblown predictions of industry pundits. So, as the benefits of “big data” (defined below) are brandished and heralded, I am cautious. In a recent study published by SAS, author Dan Briody noted that most organizations have struggled to realize value from “big data”: their capacity to analyze and exploit insights has not kept pace with the amount of information they are collecting.¹ This is obviously true for most health care related organizations. Briody quotes Jim LaBelle, Corporate VP at Scripps Health who says, “In healthcare, it’s not ‘big data’. It is a tidal wave of data.”² The claims, care management, and biometric data we are collecting have exceeded our current capacity to wield it effectively.

As a healthcare informatics specialist, however, I understand that “big data” will be imperative to drive innovation, profitability, and productivity in the health care industry. The rising health care trends have stabilized some, but, the stagnant economy and continued absolute high cost trends of health care, demands that employers execute even more robust cost management guided by you, the Benefit Professional. In the past, Benefits Professionals worked to maintain the delicate balance between managing health benefit plan costs and attracting and retaining the best workers. It’s safe to say that attracting and retaining employees is now necessarily a secondary concern. Further, as more C-suite executives are involved, Benefits Professionals can be found scrambling to add more analytic rigor to health benefits decisions and to bring data to the forefront as they make difficult plan decisions.

So, before we get too far, let’s answer the question of, “what is ‘big data’?” For purposes of this discussion, “big data” means accessing large volumes of data and using it to influence the day-to-day decisions of consumers and—since we are talking about healthcare—providers and care managers. Most of us are familiar with the ways that retailers use data to motivate and track our purchasing patterns. Companies that do this very well, like Amazon, are big winners. The stakes aren’t smaller in our industry. In much the same way that Amazon uses information to improve the effectiveness of its online shopping, data analytics can improve the effectiveness of healthcare for employers. A recent study by the McKinsey Global Institute states that “big data” can provide the basis for dramatic improvements in health quality and efficiency with an estimated potential value of $300 billion every year.³


Erik Brynjolfsson, a Professor of Management at MIT, tells us that, “most great revolutions in science [or health care] are preceded by revolutions in measurement.” Data and smarter analytics are at the core of virtually every interesting potential industry “fix.”

But organized and accessible data, which has been the life-blood of most industries, has been a real struggle for health care. Although the health plans, PBMs, and care management vendors have vast data troves, the majority of employers are stuck with what they can glean from their various vendor reports that land on their desks (or computer screens). Few Benefits Professionals can muster the time, skills, or resources to build more robust data capabilities on their own. In the end, employers are reminded only too frequently that their data is only as good as the solutions it delivers.

Equity Healthcare believes that you can’t manage what you can’t measure. A good data warehouse/decision support system is a requirement for making the leap to data-driven decision making by employers. Equity Healthcare’s partnership with Thomson Reuters Healthcare (TRH) demonstrates our conviction that usable, actionable data is an essential ingredient in decision making, and to our commitment to provide actionable reporting.

We will provide better information to you. That’s one part of creating a powerful partnership in health cost management. You can also maximize the value of our offerings by doing the following:

- **Become Immersed in the Numbers:** Dig into the data that is now available to you through the self-service reporting and the emerging set of Equity Healthcare standard reports. Ask questions about your results and get cozy with your data.

- **Cultivate an Analytically Savvy Staff:** You and your staff need the analytic skills to effectively use the plan performance data available to you now. The available data will explode in the next few years. Money is flowing toward health care IT. Analytic skills will be essential if you want to leverage this emerging asset.

- **Let the Data Drive the Solutions:** With the new data assets, healthcare plan management decisions should be based on sound analytics, not the friendly advice of industry peers or over-zealous vendors looking to sell their latest product line. Let the data speak for itself.

- **Convey Strategies Clearly to Senior Management:** You must clearly present your management strategies to Senior Executives including projections of savings and/or cost avoidance. Don’t underestimate the importance of the delivery. Too much information is as bad as not enough. Make your strategy proposals clear and convincing.

The final arena for every corporation is dollars earned versus dollars spent. Benefits Professionals need to embrace the benefits of “big data.” Equity Healthcare is ready to help you successfully translate the “tidal wave” into something useable and powerful. And with the Thomson Reuters’ reporting tools, we will all find this easier to do.

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