

The Hidden Asymmetry in Employer Healthcare.

Every transaction in employer healthcare takes place across an information asymmetry that the buyer rarely sees in full. The asymmetry has four distinct components. None of them is accidental. Together, they explain why employer healthcare costs rise on a schedule that the buyer cannot interrupt, and why the introduction of a metabolic intelligence and forecasting layer changes the structure of the market.

Metra Healthcare Intelligence · Editorial Brief · Approximately 1,720 words ·

Published with full assumption disclosure

Markets in which one party has substantially more information than the other are well studied in economics. The seminal work, by George Akerlof in 1970, described how an information asymmetry between sellers and buyers can degrade an entire market over time. Employer healthcare is one of the most consequential examples of this phenomenon operating at scale in the modern economy, and it has been hiding in plain sight for decades. The buyer side, that is the employer, transacts annually with carriers, pharmacy benefit managers, third party administrators, and stop loss writers under conditions in which the counterparties hold systematically better information about the underlying risk than the buyer does.

This is not a moral failing on the part of any participant. The carriers and their partners did the analytic work, built the models, and earned the informational advantage. The buyer side, with rare exceptions, did not build a counterpart capability because the data required to build one did not exist outside the carrier's systems. The asymmetry is the result of the structure of the data layer that the market sits on, not the result of any single counterparty acting in bad faith. Recognizing the structure is the first step to closing it.

Asymmetry One. The Claims Data Asymmetry.

The first asymmetry is the most familiar. The carrier holds the longitudinal claims experience for the group. The employer holds, in most cases, only an aggregated annual report. The carrier sees the per member per month detail, the high cost claimant patterns, the diagnosis level mix, and the prescription utilization curve. The employer sees a summary. When the renewal arrives, the carrier knows precisely what produced the number. The employer is in the position of asking why the number is what it is. This asymmetry has narrowed in recent years through transparency rules and broker side analytic tooling, but it has not closed.

Asymmetry Two. The Predictive Model Asymmetry.

The second asymmetry is less visible and substantially more consequential. The carrier has spent decades building chronic disease progression models. Those models project, with reasonable confidence, what fraction of a given group will move from prediabetes to clinical type two diabetes within a defined horizon, from stage one to stage two hypertension, from elevated liver enzymes into clinical nonalcoholic fatty liver disease, from obesity into the cardiovascular cluster, and from any of those into the long tail of coronary heart disease. The carrier prices the renewal against this projection. The employer rarely sees the model and almost never has one of its own. The result is that the price the employer pays is set against a forecast the employer has no independent ability to test.

The science underpinning these models is in the open literature. Knowler and colleagues, writing in the New England Journal of Medicine in 2002, established baseline diabetes progression rates and the effect of lifestyle intervention. Tabák and colleagues, writing in The Lancet in 2012, refined the multi year trajectory of glucose and insulin before clinical diagnosis. The Centers for Disease Control, through its 2017 reporting and subsequent updates, quantified the share of healthcare expenditure attributable to chronic disease. The Milken Institute, in 2019, sized the total economic burden. The literature is available to both sides. The capability to operationalize it has, until recently, only existed on the seller side.

"In every market shaped by information asymmetry, the price the buyer pays is set against a forecast the buyer has not seen. Healthcare is not an exception. It is the largest current example."

Asymmetry Three. The Temporal Asymmetry.

The third asymmetry is temporal. The carrier begins forecasting the next renewal cycle months before the employer is informed. By the time the broker is asked to negotiate, the boundary conditions of the carrier's position have been set. The employer is participating in a conversation that the counterparty has already had with itself. The temporal asymmetry compounds the other asymmetries, because the buyer does not have a window in which to assemble counter evidence or alternative scenarios. The conversation begins after the model has already produced its answer.

Asymmetry Four. The Behavioral Signal Asymmetry.

The fourth asymmetry is the most important and the least understood. Almost everything that determines next year's claims cost is being expressed today, by the workforce, in behavioral signals that neither party has historically been able to observe at scale. Blood pressure, weight trajectory, waist circumference, fasting and sleep patterns, body composition, and the metabolic syndrome cluster that they collectively describe, are being generated continuously by the population that the plan covers. Until the past several years, none of those signals were measurable in the volume and structure required for actuarial analysis. The market simply did not have access to the upstream data layer.

That has changed. Continuous glucose monitoring has expanded into tens of millions of healthy adults. Home blood pressure monitoring is routine. Sleep and fasting are tracked by consumer devices. Body composition is part of the everyday measurement layer of life. The behavioral signal layer now exists. The party that builds the intelligence and forecasting layer on top of it captures a structural advantage in any conversation about cost.

THE STRATEGIC IMPLICATION

The behavioral signal asymmetry is the only one of the four that the employer is now positioned to close before the carrier does. The carrier built its advantage on claims data, which is generated only after a clinical encounter. The metabolic signal layer is generated by the workforce continuously. Whichever side builds the forecasting layer on top of that data first holds the new informational edge.

What Closing the Asymmetry Looks Like

Closing the four asymmetries does not require dismantling the carrier model or restructuring the market. It requires the employer to acquire a buyer side capability that did not previously exist. A metabolic intelligence and forecasting layer sits on top of the continuous signal layer that the workforce already generates, models risk at the individual level under strict privacy controls, returns only aggregated and de identified output to the employer, and produces forecasts of cost exposure with thirty, sixty, and ninety day horizons. With that layer in place, three of the four asymmetries narrow or close entirely.

The behavioral signal asymmetry closes outright, because the employer is now operating from the same upstream data layer that the carrier is increasingly trying to reach. The predictive model asymmetry narrows substantially, because the employer can now bring a counter projection to the renewal conversation. The temporal asymmetry narrows, because the employer is now forecasting continuously rather than waiting for the annual renewal proposal. The claims data asymmetry persists, because the carrier will continue to hold the longitudinal claims experience, but its strategic importance declines once the upstream signal is being modeled directly.

What the Population Level Picture Shows

The aggregate cost of the four asymmetries is visible in any responsible reading of the national data. Healthcare expenditure in the United States reached \$4.5 trillion in 2022. Roughly seventy percent of employer healthcare cost is driven by preventable chronic conditions, most of them metabolic in origin, including type two diabetes, hypertension, nonalcoholic fatty liver disease, obesity, and the coronary heart disease cluster. The economic burden of chronic disease in the United States, when direct medical cost is combined with lost productivity, exceeds \$3.7 trillion annually. None of those numbers describes a market in which both sides hold equivalent forecasting capability. They describe a market in which one side has been forecasting and the other has been absorbing the consequences.

Why This Moment Is Different

There have been previous attempts to close one or more of these asymmetries. Wellness programs were sold, partly, as a way to influence the upstream behavioral layer. They were largely evaluated on participation rather than on shifts in metabolic trajectory. Disease management programs were sold, partly, as a way to influence the progression of identified chronic conditions. They were largely evaluated on engagement rather than on cost outcomes.

The reason previous attempts did not close the asymmetries is that they were not built as forecasting layers. They were built as intervention programs evaluated on intermediate metrics. The data infrastructure required to operate as a forecasting layer did not exist when those programs were designed.

It exists now. The employer side has, for the first time, the technical means to operate with the same forward looking discipline that the carrier side has operated with for decades. The market consequence of that capability is straightforward. The asymmetry that produced thirty years of one directional cost trajectory will narrow. The buyers that close the asymmetry first will set the new baseline for what governance, finance, and benefits leadership at an enterprise employer is expected to look like.

REFERENCES

1. **Akerlof GA.** The Market for Lemons: Quality Uncertainty and the Market Mechanism. *Quarterly Journal of Economics*. 1970; 84(3): 488 to 500.
2. **Knowler WC, Barrett-Connor E, Fowler SE, et al.** Reduction in the incidence of type 2 diabetes with lifestyle intervention or metformin. *New England Journal of Medicine*. 2002; 346(6): 393 to 403.
3. **Tabák AG, Herder C, Rathmann W, Brunner EJ, Kivimäki M.** Prediabetes: a high risk state for diabetes development. *The Lancet*. 2012; 379(9833): 2279 to 2290.
4. **Centers for Disease Control and Prevention.** Health and Economic Costs of Chronic Diseases. National Center for Chronic Disease Prevention and Health Promotion, 2017 with subsequent updates.
5. **Milken Institute.** The Costs of Chronic Disease in the United States. 2019.
6. **Centers for Medicare and Medicaid Services.** National Health Expenditure Data. 2022.
7. **Kaiser Family Foundation.** Employer Health Benefits Annual Survey. 2023.
8. **Willis Towers Watson.** Best Practices in Health Care Employer Survey. 2023.