

Evaluation of “Depression in Primary Care” Innovations

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Key stakeholders and executive decision makers in healthcare system require clear and convincing data of the value of chronic illness care models for the primary care treatment of depression. Well-conceived and conducted evaluations provide this necessary information. This case study describes the experience of a large, nonprofit healthcare system's experience with implementing and evaluating a quality improvement program for integrating depression management into primary care. The commentary that follows discusses specific evaluation questions that are relevant to each of the stakeholder groups involved in deciding whether or not to continue supporting such programs.

KEY WORDS: behavioral healthcare integration; depression; evaluation; primary care; quality improvement.

WHY EVALUATE?

Healthcare policy decision makers grapple with choices about resource allocations and quality improvements every day. Often, the decision is that the *status quo* is acceptable and innovation unnecessary. How often the decision to do nothing is rooted in reliable, empirical data versus tradition is open to speculation. Herein lies the value and purpose for evaluations of either the *status quo* or innovative change: evaluation provides necessary information to decision makers.

Information for decisions about supporting new healthcare programs has several dimensions. One is how much the initial investment will cost, and how easy would it be to revert to the original program

should the new one fail. For example, a health plan's transformation from a behavioral health carveout agreement to an integrated model of care is difficult because it requires radically different financial risk-sharing arrangements and new operational costs associated with different personnel and processes. Decision makers need to know if the proposed operational costs are predictable and what the risk is for exceptionally high and unpredictable costs. Another dimension concerns potential risks to patients treated in the new care model. For new programs or interventions where the risk of adverse events is low (e.g., authorizing additional psychotherapy sessions), the rigor of the data supporting the new program may be less than for a new program where the potential for adverse events is high (e.g., ECT), even when the potential for better health outcomes is higher.

Within healthcare organizations, a culture develops around the importance of evaluation in making decisions regarding support of new programs. Some organizations require more intensive evaluations that utilize randomized control designs and comprehensive assessments of outcomes for new clinical programs. Other organizations may accept data from already published studies about improving patient outcomes, but require wide-ranging data on

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potential new direct and indirect healthcare costs. After the implementation of any new program, most organizational leaders expect a careful accounting of the actual costs per clinical outcomes (i.e., value) to their organization and patients.

EVALUATIONS OF DEPRESSION IN PRIMARY CARE

A large body of clinical evidence indicates that implementation of the chronic illness care model in primary care settings improves outcomes for patients with depression (Gilbody, Whitty, Grim-Shaw, & Thomas, 2003; Ford, Pincus, Unutzer et al., 2002), although decision makers continue debating the magnitude of the improvement (Von Korff, 2004). This clinical evidence, derived from well-controlled research studies and community demonstrations, is unambiguous (Dietrich, Oxman, Williams et al., 2004; Wells, Sherbourne, Schoenbaum et al., 2004; Rost et al., 2002). On the other hand, data related to the costs of these chronic care interventions for depression are more uncertain (Pirraglia, Rosen, Hermann et al., 2004, Pincus, Hough, Houtsinger et al., 2003). Indirect cost savings may be important to health plan decision makers, but not as important as the direct costs for which their organizations are responsible. The balance between costs and potential savings is even more complex when behavioral carveout arrangements are in place. With such economic uncertainty about the value of chronic care interventions for treatment of depression in primary care, it is not surprising that organizations might approach the need for evaluation of such programs differently.

The Robert Wood Johnson Foundation's national program on "Depression in Primary Care" offers the opportunity to analyze the evaluation methodologies and underlying organizational expectations of the eight participating demonstration sites. The following case study describes Intermountain Health Care (IHC)'s experience with its evaluation of an integrated primary care depression treatment program.

CASE STUDY: INTERMOUNTAIN HEALTH CARE

With 23,000 employees, 22 hospitals and 75 clinics based in and around Salt Lake City, Utah,

Intermountain Health Care (IHC) is a nonprofit health care system that serves the healthcare needs of Utah and Idaho residents. As a nonprofit organization with no commercial investors, IHC (unlike many other healthcare organizations) combines the financial, administrative and delivery aspects of healthcare into one integrated network committed to providing clinical excellence, quality and innovation rather than stockholder profit. In 1999, a key group of IHC leaders became increasingly concerned that primary care medical resources were not being used efficiently to treat patients with depression and other mental health conditions. These leaders were influential in establishing the Mental Health Integration (MHI) quality improvement program to address the practice burden of managing these conditions.

The MHI program began at the Bryner Clinic, an urban primary care clinic in Salt Lake City, which houses a team of well-respected pediatricians and internists. This group of IHC physicians had already initiated collaborative care for conditions like diabetes and asthma and convinced IHC leadership to redesign the clinic workflow in order to integrate mental healthcare as part of everyday practice. Providers, hospital and physician administrators, community partners and research staff worked together to enable this integration. Early results demonstrated that collaborative primary and behavioral care led to improved functional status in patients and improved satisfaction and confidence among physicians in managing mental health problems as part of routine care at a neutral cost.

The efforts at the Bryner Clinic have been enhanced by the development of a strategic partnership between IHC and the Robert Wood Johnson Foundation's (RWJF) "Depression in Primary Care" program. This partnership has provided an opportunity to assess and alter economic barriers to sustaining the MHI program within the IHC community. An important component of this strategic process was to build consensus on the data required by organizational leaders and key stakeholders when faced with the decision to support the integrated depression program.

Initial Evaluation Strategy

Without comprehensive evaluation, it is not possible to build a cogent business case for

improving the delivery of preferred health outcomes. Such evaluation requires analyses designed to produce meaningful data for executive decision makers, while engaging a diverse team of stakeholders in quality improvement.

To evaluate the value of MHI, IHC leaders utilized a strategy of measuring satisfaction, clinical and economic variables to determine if integration: (1) improves satisfaction for both patients and clinicians; (2) improves the health, functioning and productivity of the patients and their families and (3) is cost neutral, in terms of both health plans claims and clinic operational expenses.

Finding a useful way to present these data to multiple stakeholders is an iterative process that requires ongoing adjustments. While clinical stakeholders are interested in measures such as depression detection rates and clinical outcomes for their patients (as measured by the PHQ-9 questionnaire), health plan stakeholders are interested in measures of cost. Reaching both groups of stakeholders requires ongoing manipulation and presentation of reports containing various levels of information and analysis. This iterative process has helped to design better internal evaluation tools and has kept key stakeholders engaged. Additionally, RWJF requested that external evaluation metrics, including depression detection rates and the activity of care managers, be reported on a bimonthly basis. These reports have also been useful to IHC senior management in evaluating the overall impact of MHI.

With the advice and assistance of RWJF economic consultants, both “cohort analysis” and “cost-trend analysis” were planned and conducted to study the MHI impact on healthcare claims costs. A cohort analysis shows the evolution of a system over time and, hence, the impact of an intervention on that system. It allows separation of random variations (noise) from intervention variations and is therefore the analytical method of choice from a quality improvement point of view. However, cohort analysis describes a relatively small subset of a health plan’s patient population and, therefore, is of limited inferential value. Cost-trend analysis, on the other hand, carries more validity from a health plan’s perspective. Cost-trend analysis studies the whole patient population. Initial results of both types of cost analyses showed significant increases in depression detection rates, without corresponding increases in healthcare claims costs.

Additional Evaluation

Initial analyses showing that MHI increased depression detection rates for adults and children, while not increasing healthcare claims costs were a start. However, IHC executive management requested a more comprehensive evaluation of all the operational costs and clinical outcomes for the process assuring that quantitative processes were in place to account for all costs and outcomes. Therefore, with support from the RWJF grant, an adult depression patient registry is under construction to create a unique electronic depository in the IHC system where all pertinent clinical and cost data is accessible so that consistent and accurate reports can be done on a regular basis.

IHC information technology staff plans to link this registry database to a “mental health intervention module” installed in office workstations. This will allow the patient’s clinical and risk stratification data, including PHQ-9 scores, to be tied to cost data. For example, IHC’s mental health integration care process calls for stratifying patients into three different treatment levels based on disease severity (mild, moderate, or severe), as follows:

1. Routine Care is recommended for mild depression. This level of care involves only the primary care physician and support staff (with care management included only by PCP or patient preference)
2. Collaborative Care is recommended for moderate depression. This level of care involves the primary care physician as well as ongoing care management support. Brief onsite mental health team consultation is available as requested.
3. Referral to a Mental Health Specialist(s), along with treatment from the primary care physician, care management, and onsite mental health team, is recommended for severe depression.

Sample Reports

Current analyses allow evaluation of clinical improvement based on level of care provided for each severity classification. Future analyses will allow linkage between clinical outcomes, operational expenses and claims costs. For example, this graph compares clinical outcomes for adult

patients with “severe” depression based on the level of care they receive. These are exploratory data used internally by IHC to assess its data collection methodologies and measurement systems, in order to improve and customize evaluation reports to stakeholders (See Fig. 1).

CONCLUSION

The most effective healthcare delivery systems are able to match healthcare resources to the level of disease severity, thereby providing the communities they serve with the means to plan and allocate resources in a rational way. Measuring and reporting satisfaction, clinical, and cost outcomes that are meaningful to all stakeholders builds consensus and fosters continued support of MHI. The data generated from ongoing evaluations will legitimize use of more resources (for example, in the form of care management services) for severe patients and fewer resources for less severe patients.

As a result of these evaluations, and with the support of enlightened leadership and grant support, IHC has improved care for depression and other mental health conditions in over 20 of its clinics, and has established eight MHI clinics with

onsite MHI teams in varying stages of implementation. These results are widely talked about by IHC executive management and community leaders as an example of improved quality care and service to the community. This is only one of many examples of IHC’s success in promoting clinical quality as the driver of sound economics. Some might say that healthcare in the American free marketplace is all about the profit margin, no matter how altruistic a mission statement may sound. As leaders of the IHC team responsible for improving mental healthcare for patients and families in primary care clinics, we would say that healthcare in our community is all about using resources responsibly and building and maintaining quality relationships with all stakeholders.

COMMENTARY

Decisions to implement and sustain depression care programs in primary care settings are complex because multiple stakeholders, often with competing and overlapping interests, are involved. The objections of even one key stakeholder can reduce the likelihood of successful implementation. Therefore, evaluations of depression chronic care

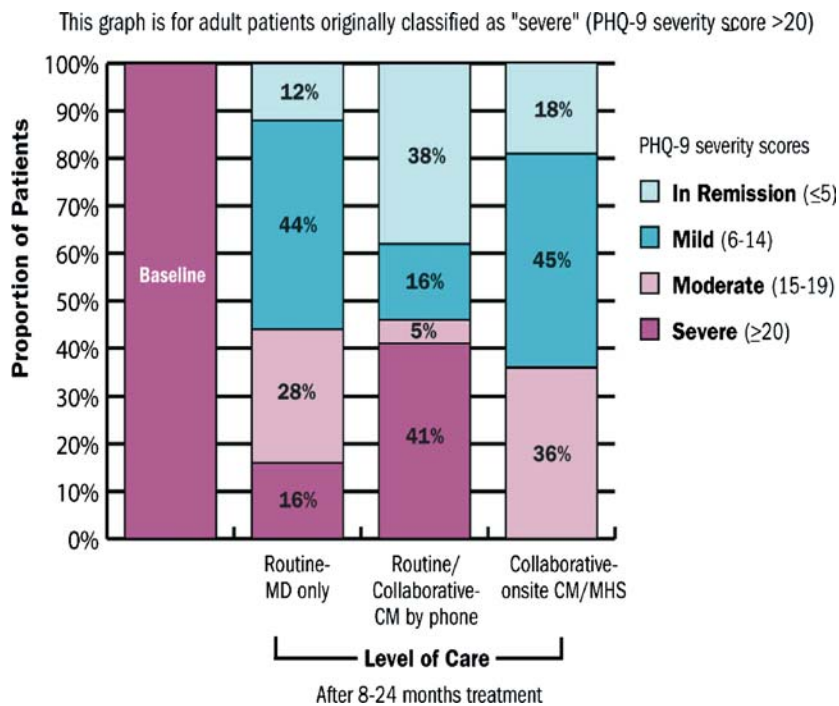


Fig. 1. Changes in depression severity ratings based on level of care provided.

programs need to consider the perspectives and information required by these stakeholders—patients, providers, health plans, behavioral health plans, payers and the philanthropic foundations funding such projects. As the IHC case study indicated, it is imperative to include a full range of potential decision makers in order to produce a credible evaluation.

Patient Perspective

Patients and their families can be influential in decisions about benefit design and healthcare coverage, more so in employer-based than government-funded health care systems. However, the stigma surrounding depression and related behavioral disorders can mitigate consumer advocacy for programmatic improvements and funding (Corrigan, Watson, Warpinski, & Gracia, 2004). To ensure their voice is heard, evaluation of the patient perspective should assess clinical outcomes, satisfaction with care, utilization of care management services, use of self-management programs and the like. Ultimately, the most important question is whether patients believe depression chronic care programs are worth the added cost, particularly in the form of increased copayments, deductible amounts and premium expenses. With the increased focus on consumer choice in self-directed healthcare purchasing, a “naturalistic” evaluation of these questions already may be underway.

Provider Perspective

Healthcare organizations indicate that the provider perspective is important in decisions to fund depression chronic care programs and would be reluctant to do so if providers are dissatisfied. Evaluation of the provider perspective should include whether they think that implementing a depression chronic care model improves patient outcomes, adherence to therapy and satisfaction with their care. Other relevant questions include: Do primary care providers rate access to specialty behavioral health providers as better after implementation of the model? Do providers think that implementing the depression chronic care model improves their own efficiency, for depressed patients and overall? Do providers think that depression care management services are worth

the additional expense? If a payer was willing to pay for chronic depression care, do providers agree that the additional funds should be used to support the model? Are primary care providers willing to negotiate with payers to support the depression chronic care model? Evaluations should consider the perspectives of not just primary care physicians, but physician assistants, nurse practitioners, care managers and specialty behavioral health providers too.

Health Plan Perspective

Health plans emphasize economic issues, as well as patient outcomes and provider satisfaction, in developing evaluation plans. They are likely to frame the key assessment questions as: How will implementation of a depression chronic care model affect provider recruitment; acquisition and retention of purchasers; member reenrollment rates? How much will the program cost in start up and annual maintenance expenses? Are there cost savings in other areas to be realized as a result of this program? Will implementing the chronic care model for depression be helpful in developing chronic care for other conditions? Will implementing the model improve HEDIS scores and strengthen the organization’s competitive position in the local marketplace? Some costs are not always easily assigned to innovative quality improvements. For example, while a sophisticated clinical information system was essential to IHC’s mental health integration program, it would be difficult to determine exactly what share of its costs should be assigned to the costs of the new depression program.

Behavioral Health Plan Perspective

Many health plans provide specialty behavioral health care to members through a behavioral health carveout arrangement. In these situations, the carveout organization may have some unique questions related to the evaluation of the depression chronic care model: Will implementing the model increase specialty utilization? Will the carveout organization be responsible for providing and supporting care managers for patients originating from primary care sites? Will any of the additional funds from payers that are meant to support the model go to the behavioral health plan? Are the specialty

providers within the behavioral network satisfied with the chronic care model for depression?

Payers

Major payers in the current American health care system, government agencies and private employers, seek information about the “return on investment” when they fund quality improvement projects, such as the depression chronic care model. Private employers are interested in measures of work-related productivity and employee satisfaction as factors in profit-and-loss projections and worker retention. Governmental agencies are interested, for example, in accelerating welfare-to-work rates and decreased recidivism in their covered populations. Important evaluation questions for payers include: How will implementation of a depression chronic care model affect total health care costs (general medical, specialty mental health and pharmacy)? How will implementation affect work productivity, employment status and welfare costs? Are employees/clients more satisfied when depression care is provided as part of primary care? Payers will also want to know if the depression chronic care model affects costs in other service areas, such as employee assistance plans, disability programs or general assistance.

Robert Wood Johnson Foundation

The philanthropic organization funding the “Depression in Primary Care” program, the Robert Wood Johnson Foundation, is dedicated to improving the health and healthcare of all Americans. From this perspective, the focus of the evaluation is its ability to show if and how the program advanced the Foundation’s mission. It may over simplify such an evaluation to say that it is a meta-analysis of all the other perspectives, but the Foundation has also funded a national evaluation program to determine how the local evaluations impact the decision making process. Conducted by researchers from the Johns Hopkins University, eight case studies (Yin, 2003) will be developed that analyze how and which evaluation goals were agreed upon, what parameters were actually measured, how the evaluation data were interpreted by the various decision makers and used in subsequent decision making processes. Results will be interpreted in conjunction with evaluations of other chronic illness care model

implementation programs that are underway (Cretin, Shortell, & Keeler, 2004).

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