Overview: Disease Management

Mary C. Kapp

INTRODUCTION

Improving health care quality and reducing costs are attractive selling points for disease management (DM) programs. DM is widely used by insurers and employers, with revenues approaching $2 billion a year (Mattke, Seid, and Ma, 2007). The appeal of DM has spread beyond the private sector and is increasingly being considered, if not adopted, by public payers. The growing chronic disease burden, expanding emphasis on the importance of life-style related conditions such as obesity, and escalating heath care costs present challenges that DM purports to address.

There are a wide array of DM programs and specific intervention services, some integrated into care delivery settings and others primarily telephonic. Some DM programs' focus is limited to disease-specific support. Others take a broader, holistic, care management approach. This has enhanced appeal when managing populations with multiple comorbidities. A more recent focus for the industry is population health, extending the disease-specific and multiple conditions approaches to incorporate wellness management of entire populations, even those without chronic conditions.

There is no single definition of DM's interventions. Interventions are not just program specific, but person specific and also often vary with each contact. Programs may seek to improve adherence to

evidence based prevention and treatment guidelines, working with providers and/ or with patients to improve care. Other general strategies in DM include patient education aimed at improving self care and adherence to treatment plans, and to communicate with health care providers. Some programs include additional supports such as coordinating or providing transportation, medication, or social support services.

Similarly, target populations can vary dramatically. Questions remain as to what criteria identify the optimal population to benefit from DM. Is it the highest cost group, a specific set of diagnoses, a particular utilization pattern, or some combination of these factors? Are there other subpopulations where the benefit is minimal or non-existent that should be excluded? DM providers working with Medicare populations have remarked on the challenges of multiple comorbidities, especially cognitive impairment, and general frailty of the population. That care is delivered by many different providers for conditions that are often long-standing is often in contrast to younger, healthier populations. Overlaying this are the added complexities of other social service needs, low literacy levels, and financial issues.

The structure of the public sector programs often differs as well. Issues such as the timeliness of claims or other utilization data and the inability for real-time notification of hospital admission may require altering the DM approach. The monthly management fees paid in the Medicare demonstrations reported in

this issue require considerable savings from utilization (averaging $100-$200 per beneficiary per month) to break even.

IN THIS ISSUE

This issue of the *Review* includes five articles that focus on management of populations with chronic conditions. The first three articles present interim results from Medicare's most recent DM efforts. All address fee-for-service populations, one specifically a population dually eligible for Medicare and Medicaid. The remaining two articles report strategies used for identifying at-risk patients. These include defining the target population for a State-sponsored chronic care management program and identifying potentially preventable hospital readmissions in a statewide all payer context.

Evaluation of DM in Medicare

The evaluations of Medicare's DM and chronic care improvement programs are presented in chronological order of their start date. This also corresponds to the length of experience included in the evaluations to date. Brown, Peikes, Chen, and Schore's findings from the Medicare coordinated care demonstration cover 2 years of a 4-year program encompassing 15 sites. The second article, by Esposito, Brown, Chen, Schore, and Shapiro reports on the first 18 months' experience DM demonstration for dually eligible beneficiaries. Finally, Cromwell, McCall, and Burton present 6-month results on the Medicare Health Support pilot program.

In each of these programs, the participating organizations developed their approach and intensity of the intervention, generally based on their previous DM experience. The eligibility criteria and target conditions vary; diabetes, heart failure, and coronary artery disease predominate. Although all programs were intended to be budget neutral (or better), two of the three demonstrations programs were at risk financially, required to repay fees to CMS if savings targets were not met. All of the evaluations address the cost of the intervention and not just the gross savings in Medicare claims costs. Each of these demonstrations has a randomized design and follows an intent-to-treat model.

Even though results are still preliminary, none of the demonstrations have displayed the outcomes or cost savings expected even at this early stage. The absence of large scale impacts challenge these evaluation teams to shift their emphasis from quantifying the many successes to detecting where positive impacts, beyond chance findings, have occurred.

Identification of At-Risk Populations

The article by Weir, Aweh, and Clark tackles the challenge of how to select the target population for Vermont's chronic care management services program. Recognizing that the State's population is not large enough to develop their own model to identify the relevant subset of the eligible population with chronic conditions, the authors sought to empirically test three externally developed predictive models to determine which was best suited to the State's needs and underlying population.

Goldfield, McCullough, Hughes, Tang, Eastman, Rawlins, and Averill report on an approach to analyzing statewide hospital discharge data, identifying readmissions, and classifying them as potentially preventable (PPR) or not. Characteristics of index hospitalizations most likely to generate PPRs are described as are the hospital level rates of PPR. These findings highlight potential areas for targeting quality improvement efforts, whether they are

patient-level efforts such as DM, or institutional-level strategies targeting process or payment reform.

CONCLUSION

The debate on the utility and cost effectiveness of DM will not have a "yes or no" answer. The articles in this issue add to the evidence that purchasers and policymakers should maintain skepticism about the potential benefits of DM and focus on the performance of specific interventions. Consideration should be given to the rigor of the evidence and to the details on the relevance of the findings to other populations and settings. Meanwhile, as CMS continues to evaluate the ongoing or recently completed Medicare DM programs, other work continues to enhance strategies to refine case selection for future interventions strategies.

REFERENCES

Mattke, S., Seid, M., and Ma, S.: Evidence for the Effect of Disease Management: Is $1 Billion a Year a Good Investment? *American Journal of Managed Care* 13(12):670-676, 2007.