

# What Are Some Effective Chronic Disease Management Strategies That Can Be Used in Case Management?

*Case Management Update appears as part of Clinical Rounds in the Journal. The panel approach provides a forum for sharing ideas, viewpoints, and perspectives. Panel members come with expertise from a variety of case management arenas and have agreed to share their opinions and perspectives in response to specific questions or scenarios. Opinions and perspectives are those of the panel members, and do not necessarily represent the views of the AAOHN, the Editor, or the Publisher. We encourage readers to submit their questions or scenarios for the Panel. This month's Panel members include Christine M. Kalina, Annette B. Haag, and Robin Tourigian.*

Chronic disease case management requires long term commitment, persistence and tenacity on the part of the case manager (Mullahy, 1998). Chronic disease case management often requires a large time commitment on behalf of the case manager. This column discusses chronic disease case management as one of the roles of the occupational health nurse at the job site from a clinical and administrative perspective.

Chronic disease case management requires innovative problem solving and creative thinking. Chronic disease can stretch the emotional coping skills of the employee and the employee's family and coworkers to the limit. The employee's financial resources also may be stretched to the limit. The case manager must consider the psychosocial affects of chronic illness on the employee as well as both the home and work environment of the employee. Clinically, the occupational health nurse case manager must have in-depth understanding of the individual chronic disease process. This understanding includes knowledge of the employee's current treatment modalities as related to the provision of nursing care, both at home and at the work-

site. This information is obtained from the employee, preferably before he or she appears in the occupational health nurse's office at 7:00 a.m. stating he or she is ready to return to work at 7:15 a.m.!

Thus, from an administrative standpoint, it is important to have a return to work company policy in place as well as a return to work process supporting the policy. The return to work policy should state that the employee who is absent for longer than a specified number of days must report to the health services department (the occupational health nurse) before returning to work. The policy also should require the employee to report with the proper release and supporting documentation from the personal physician supporting the employee's return to work on a specific date. This documentation should also include specific requests for work limitations. If such policies and procedures are not in place, the occupational health nurse should make every possible attempt to collaborate with senior management, human resources, and other disciplines as appropriate and develop these documents.

The process should assure that employees who have been away

from the worksite longer than 3 days, for example, have entered into the occupational health nurse's case management system or process. As part of the worksite or company administrative case management process, employees must fully understand that they must see the occupational health nurse and receive a fitness for duty evaluation before returning to the worksite. This must, of course, also be understood by senior management and fully communicated to supervisors as well. Thus, critically important in the return to work policy is a definition of role, responsibility, and accountability of each contact or resource in the case management, rehabilitation, and return to work process.

Entering the employee into the return to work process is necessary to ensure each employee's case has been managed. The occupational health nurse will then be afforded the opportunity to fully understand the demands current chronic disease treatment will place on the employee at the worksite. For example, in the case of an employee who has recently been diagnosed with insulin dependent diabetes, the following concerns need to be addressed:

- How does insulin administration relate to shiftwork demands?

- Determine the employee's insulin needs and communicate with the physician to clarify.
- How is confidentiality of medical information demonstrated and documented?
- Does the employee know how to properly dispose of discarded insulin needles?

From an administrative standpoint, worksite chronic disease case management is unique because in addition to a corporate policy on return to work, this type of case management requires an understanding of the corporate culture such as:

- Does the company support returning to work as part of rehabilitation from an illness or injury?
- Does the company have this same level of support and commitment aside from what is required by, for example, the Americans With Disability Act (ADA) or the Family Medical Leave Act (FMLA) for the employee with chronic illness who may require intermittent time away from the job for treatment?

The occupational health nurse case manager must fully understand the company's corporate culture and may need to assess coworkers' reactions to the employee with chronic illness when he or she returns to work. In addition, the occupational health nurse case manager must coordinate with legislation and regulations surrounding the return to work experience.

This coordination of variables affecting the employee's return to work also must include the occupational health nurse case manager's understanding of the various medical, insurance, and government rules, regulations, and processes such as:

- How does the length of the employee's restricted or light duty relate to the ADA?
- When does the restriction become permanent under the ADA?
- What are the company rules and regulations in regard to long term disability and disability retirement?
- What is the status of the employee's FMLA benefit?
- What is the status of the employee's health insurance?

- How much insurance coverage is remaining?
- Is spousal coverage available?
- What other funding is available supporting cost of chronic illness treatment?
- Will the employee need to be absent from work on a regular basis, for example, for dialysis treatments?
- Does the onsite cafeteria provide the correct nutrition to assist the employee in attaining optimum health and wellness?
- Are supervisors and coworkers supportive of the employee's need to be absent from work for various treatments?

Finally, depending on the number of employees who require chronic disease case management or the occupational health nurse's case management load, chronic disease case management can become a full-time role for the occupational health nurse. The scope of the occupational health nurse case manager, including role, responsibility, and accountability, must be fully defined and coordinated with onsite occupational health nurse responsibilities.

#### REFERENCE

Mullahy, C.M. (1998). *The case manager's handbook* (pp. 523-529). Gaithersburg, MD: Aspen Publishing.

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Chronic illnesses affect 100 million Americans and represent 75% of the nation's health care costs (Nash, 2002). Control of chronic diseases can promote health and prevent or minimize complications, absence, and disability in workers. Many companies are using disease management to reduce and control these costs. Disease management is defined as a process that

identifies populations at risk for a disease, delivers cost effective combination of interventions aimed at optimizing disease control, and evaluates client outcomes subsequent to the interventions. It is a continuous, systematic, and comprehensive approach to disease management in the target population that will lead to improved health at reduced cost. Disease management is most appropriate for those diseases that are chronic and costly, and affect a significant proportion of the population (O'Dowd, 1998).

Disease and case management programs have common goals. The Table shows a comparison of disease and case management goals. Common goals for disease and case management include promoting health; preventing complications; and reducing absence, disability, and costs. Disease management does not include early return to work. Disease management targets groups of employees such as those with diabetes or asthma.

Case management focuses on the individual case or employee. Through case management data, the occupational health nurse may identify and target common case problems. For example, I experienced an increase in the number of cases of low back and knee problems. Based on the increase of specific types of cases, I developed a health promotion program related to keeping employees' backs and knees healthy.

Disease management programs use similar data from claims or absences, but may look at longer time periods (i.e., annualized data). Disease management strategies can be incorporated into a case management program. Case managers have the opportunity when working with employees to prevent chronic disease complications and disability, and impact the workers' health. As case managers, occupational health nurses are in an ideal position to interact with employees and their providers related to the effectiveness of treatments and compliance with clinical guidelines.

Case managers can also help employees with individual counsel-

Table Comparison of Disease and Case Management Goals		
Goals:	Disease Management	Case Management
1. Promote health.	✓	✓
2. Prevent or minimize complications.	✓	✓
3. Decrease absence.	✓	✓
4. Reduce disability.	✓	✓
5. Cut costs.	✓	✓
6. Promote early return to work.		✓
7. Focus on groups.	✓	

ing and finding resources to empower employees to control the chronic illness and prevent complications. For example, an employee had excessive absences because of poor control of his asthma. The occupational health nurse case manager spoke to the employee and his health care provider about the treatment regimen. The treatment regimen was adjusted. The employee was given and instructed on the use of a peak flow meter by the occupational health nurse case manager and given parameters to report early signs of problems with the asthma. The outcome of these interventions was control of the asthma, early intervention to reduce exacerbations, and elimination of absences because of poor control.

There are many approaches to disease management. Often a company will start by reviewing data to determine specific disease management needs for its population. The disease management needs assessment may contain:

- Claim data.
- Absence or lost time experience.
- Disability data (both occupational and nonoccupational).
- Health problems presented during clinic visit or routine physicals.
- Risk factor or health assessment surveys.
- Screening program results.
- Demographics of the company population.

The next step after reviewing and analyzing population data is to determine the high cost and frequently occurring diseases for the group. Programs are designed to target the most costly diseases that affect the greatest number employees. Commonly targeted chronic diseases include diabetes, asthma, and cardiovascular disease.

A disease management program is designed for the specific needs of a target group. This can be integrated into the case management program. For example, one company I worked with had a population composed of 76% of women of child bearing age with the greatest claim costs in the area of pregnancy and health care of young children. A good disease management program for this company included prenatal, postpartum, and onsite lactation strategies. When the occupational health nurse case manager identified employees that were in the target population of considering pregnancy or pregnant, they would refer them to the disease management resources.

Programs vary in their approach to disease management. Some programs are provided by internal occupational health services at the company location; others use outside vendors. Internal and external program providers may offer individual counseling, classroom or groups, telephonic interventions, arrange for local resources, and pro-

vide information services for company employees and their families.

Some companies rely on their health insurance plans, HMO, or individual employees' personal health care providers to handle their disease management needs. In this era of escalating health care costs and shrinking health care provider time with clients or employees, disease management by health care providers is limited. Consider the following employee case example: A routine screening glucose performed at the worksite revealed an abnormal fasting glucose level. The occupational health nurse referred the employee to his personal health care provider for further testing and treatment. The employee's provider repeated the fasting glucose, 3 hour glucose tolerance test, hemoglobin A1c, and urine micro albumin, confirming a diagnosis of diabetes.

The employee was started on medication (metformin), self glucose monitoring was ordered four times a day, and the employee was instructed to purchase a book about limiting carbohydrates. The employee bought the glucose monitoring device and book, and was told to follow the instructions. The employee described feeling overwhelmed and confused. The occupational health nurse worked with the employee doing finger stick glucose monitoring and arranged for the employee to attend diabetic diet classes with a local dietician. The outcome for this employee has been to remain on medications, lose 40 pounds, maintain normal glucose and hemoglobin A1c levels, and avoid absences and complications related to diabetes.

Disease management programs can aim interventions at the primary, secondary, and tertiary levels of prevention. For example, if there is a large population with diabetes, primary levels of prevention such as early detection with glucose screenings or risk evaluation may be a part of the program. A secondary prevention strategy may be to offer a weight management or exercise program addressing lifestyle risk factors. Tertiary prevention strategies could

include diabetic support groups, classes, or individual interventions.

Measurement of outcomes is important in determining the effectiveness of disease management interventions and return on investment. Measurements should be directed at both subjective and objective data collection. Subjective measurements focus on the employee's perceptions of the program. Objective measurements are directed toward specific positive behavior changes and cost savings. Some examples of objective measurements include:

- Decrease in individual and group claims.

- Reduction in lost time or disability.
- Number of pounds of weight loss.
- Improved glucose and hemoglobin A1c levels.
- Improved peak flow levels.

Return on investment can be calculated from the cost of the program in comparison to the savings related to claims, lost time, and estimates from avoidance of complications.

Companies and case managers that incorporate disease management strategies are improving health, preventing complications, reducing absences, and decreasing disability in their workers. Disease management programs can improve

the employees' health and the company's bottom line.

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## QUESTIONS ABOUT CASE MANAGEMENT ISSUES?

### HERE'S HOW TO GET ANSWERS!

The AAOHN Journal has put together a panel of experts who will serve as consultants for readers' questions and/or scenarios about case management issues. Selected questions and panelists' responses will be printed in future issues of the Journal.

Please send your questions to:

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Please limit questions/scenarios to 500 words.

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| 2. C | 7. A  |
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| 4. A | 9. C  |
| 5. C | 10. B |

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