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THE EVOLUTION OF DISABILITY MANAGEMENT IN NORTH AMERICAN WORKERS' COMPENSATION PROGRAMS

H. Allan Hunt

WHAT IS DISABILITY MANAGEMENT?

Disability management refers to a set of practices designed to minimize the disabling impact of injuries and health conditions that arise during the course of employment. Because of the multitude of such practices, it is actually a very difficult term to define precisely. Disability management should be differentiated from traditional safety and prevention activities, which aim to prevent an accident or disease from occurring in the first place; although there are prevention aspects to disability management. It also should be differentiated from medical and vocational rehabilitation efforts, which take the injury or disease as given and attempt to overcome or mitigate the long-term disabling effects; although disability management arose in a rehabilitation context and is frequently carried out by rehabilitation professionals. Last, disability management is not synonymous with "return-to-work." While this is one of the main indicators of success for disability management programs, it is not the only payoff.

This chapter examines the historical development of disability management within the government-mandated workers' compensation insurance environment. We choose to locate the nexus of disability management practice between the occurrence of an injury or health condition and the potential disability which may result. However, that usage is far from universal. In some applications, the focus has shifted "upstream" to prevention and in others the focus has broadened to "absence management" and "presenteeism."[1]

Disability management techniques are applied by employers or insurers between the occurrence of an accident or occupational disease and the full realization of the long-term effects of any resulting impairment. Its purpose is to interrupt the negative progression of an injury or disease. It seeks to maintain the workplace attachment for workers who acquire a disability condition and

[1] There are several outstanding references available to cover the broader sweep of disability management practice. See in particular Harder and Scott (2005), Dyck (2006), and Shrey (1995). Presenteeism is a relatively new term used to describe the phenomenon of employees who are physically present at the workplace but are unproductive due to illness, stress, injury, or even low morale.

are at risk of losing their employment. Thus, disability management is both time- specific and employer-focused.

According to the classic work by Akabas, Gates, & Galvin (1992), “Disability management is a workplace prevention and remediation strategy that seeks to prevent disability from occurring or, lacking that, to intervene early following the onset of disability, using coordinated, cost-conscious, quality rehabilitation service that reflects an organizational commitment to continued employment of those experiencing functional work limitations” (p. 2).

They state the major goals of disability management are:

- to improve the competitive condition of the company in a global economy;
- to achieve a healthier, more productive work force by reducing the occurrence and impact of disability among the labour force;
- to reduce the cost of medical care and disability benefits;
- to shorten the time of absence and workplace disruption caused by the onset of disability among employees;
- to reduce the personal cost of disability to employees;
- to enhance morale by valuing diversity; and
- to achieve compliance with the Americans with Disabilities Act (ADA) or other legislation (pp. 2-3).

Habeck, Leahy, Hunt, Chan, & Welch (1991) provide a more direct interpretation:

“Disability management can be described in general terms as a proactive, employer-based approach developed to (a) prevent the occurrence of accidents and disability, (b) provide early intervention services for health and disability risk factors, and (c) foster coordinated administrative and rehabilitative strategies to promote cost effective restoration and return to work” (p. 212).

Disability management promotes a “win-win” philosophy of gains for both the employer and the employee. The employee gets back to work sooner with less wage loss and a reduced expectation of permanent impairment. The employer gets the employee back at work to minimize interference with production and with reduced costs for workers’ compensation and other benefit

programs. Successful resolution relies primarily on the flexibility and willingness of the workplace to make accommodations and modifications, either temporary or permanent, to enable the worker to perform productive work successfully and safely.

THE ORIGINS OF DISABILITY MANAGEMENT

In the United States, largely as a result of the recommendations of the National Commission on State Workmen's Compensation Laws, there was a great flurry of legislative action updating workers' compensation statutes among the states beginning after the publication of the National Commission's Final Report in July 1972. A set of 86 "Essential Recommendations" were set forth by the Commission, with the proviso that if the states did not meet the recommended standards by July 1, 1975, Congress (i.e., the Federal government) should step in and guarantee compliance with the recommendations.

The burst in legislation caused a rapid escalation of workers' compensation costs. The period from 1972 to 1979 came to be known as "The Era of Reform." While workers' compensation benefits increased at 8.5 percent per year from 1960 through 1971, the annual rate of increase rose to 15.8 percent per year from 1972 through 1979 (Thomason, Schmidle, & Burton, 2001; p. 22). Aggregate real workers' compensation benefits increased more than four fold from 1970 to 1980, and benefits as a percent of payrolls increased by 45 percent (Burton, 2005, p. 15).

This rapid increase in employer costs did not go unnoticed. U.S. employers began to search for ways to combat spiraling workers' compensation costs. Meanwhile, in 1980 the World Rehabilitation Fund sponsored a lecture tour by Aila Jarvikoski of the Rehabilitation Foundation of Helsinki, Finland. He spread the word about a program of early intervention among employees of the City of Helsinki to identify those in need of "early" rehabilitation to prevent disability. This program provided assessment, counseling, changes in work tasks, work redesign, and job reassignment as needed (Tate, Habeck, & Galvin, 1986, p. 7).

The 1978 City of Helsinki "early rehabilitation" pilot program was based upon a study of the health, working conditions, and rehabilitation needs of the city's workers. Researchers found that 50 percent of hourly and 43 percent of salaried employees reported "one or more chronic illnesses, physical defects, injuries, or other symptoms" (Rehab Brief, 1981). Self-reports

indicated that about 15 percent of hourly and 8 percent of salaried employees needed “immediate rehabilitative measures because of chronic disorders” (p. 2).

Both objective and subjective criteria were used to develop referrals for the pilot programs at the Port Authority and the Water Works. Most were self-referrals, but individual workers with “excessive” absences were also invited for evaluation. The early rehabilitation team involved an occupational health nurse, rehabilitation counselor, and rehabilitation physician. Treatment began with an interview by the occupational health nurse, followed by a review of workplace issues by the rehabilitation counselor, and a medical examination by the rehabilitation physician. If necessary, the workplace was also assessed.

After the team had assessed the employee’s situation, the rehabilitation counselor would meet with the employee to consider the implications of the findings and to plan for the appropriate “early rehabilitation” activities to prevent further disability. While the majority of treatments were educational in nature, new work assignments were recommended for 23 percent of referrals at the Port Authority and 8 percent at the Water Works. After the pilot programs were concluded, employees at both sites requested that it be continued.

These same techniques were applied in the U.S. at Burlington Industries in North Carolina, in a pilot program to identify and manage osteoarthritis and rheumatoid arthritis among employees (Mitchell & Winfield, 1980 mentioned in Tate, Habeck, & Galvin, 1985, p. 7). Similar developments were occurring with progressive employers in Sweden (Volvo) and Australia (Vic Rail), among others. Before long, many private and public employers began to realize that they might gain control of their spiraling workers’ compensation and disability costs through application of the tools of disability management.

Independent disability management consultants were early advocates of interventions and they disseminated the positive results of their consulting work with employers and state agency systems. Ken Mitchell, Don Shrey, Dick Lewis, and Peter Rousmaniere were especially noteworthy proponents.

Reflecting the real concerns of large employers, the Washington Business Group on Health completed a poll of employer member practices in health promotion and risk reduction among

their employees in 1979 (WBGH, 1979). A search for “best practice” continues to the present day in such efforts as Employer Measures of Productivity, Absence and Quality (EMPAQ) officially launched by the National Business Group on Health in 2004. (Kerr, 2006)

At about this same time the National Institute for Disability and Rehabilitation Research (NIDRR) of the U.S. Department of Education awarded a grant to Michigan State University to support the “University Center for International Rehabilitation.” Don Galvin, a rehabilitation professional with a Ph.D. and rehabilitation agency administrative experience, headed this effort. He wrote a review article for the Center’s newsletter in 1983 entitled, “Health Promotion, Disability Management, and Rehabilitation at the Workplace” (Galvin, 1983) which laid out both the rationale for and the history of disability management efforts. It featured the Helsinki early rehabilitation example, but also the experiences of the Victorian Railway Company from Australia, and Volvo automotive from Sweden. It included some leading U.S. practitioners of disability management techniques, including Burlington Industries in North Carolina, Control Data Corporation in Minnesota, and Herman Miller in Michigan. He provided an annotated bibliography for those desiring a deeper understanding of the subject as well.

Galvin intuitively grasped the appeal of disability management techniques to employers concerned about spiraling disability costs and became an effective advocate for the disability management “movement” in the U.S. And in 1989, Don Galvin became the Vice President for Programs of the Washington Business Group on Health (WBGH) and also the Director of the Institute for Rehabilitation and Disability Management (IRDM). From this “bully pulpit” he preached the gospel of disability management.

As early as 1987, the WBGH was actively promoting the concept of disability management (Carbine, 1987) with funding from NIDRR. No doubt this reflected the interests of WBGH members, drawn from Fortune 500 companies who shared an interest in controlling health and disability costs without significantly cutting benefits for individual employees. It also represented the policy interests of NIDRR in minimizing the incidence of work disability and mitigating its effects for those who suffered work disability.

In 1989, WBGH published “The Disability Management Sourcebook” (Schwartz, Watson, & Galvin, 1989) which purported to be a comprehensive guide to disability management practice.

According to the Foreword; “This manual enables companies to avoid the costs and frustrations of trial and error by sharing with readers the practical lessons learned by other companies. It provides a simple step-by-step process for program design, development and implementation” (p. v).

During the decade of the 1980s and extending up to the present, rising health care costs also brought increasing attention to the techniques of disability management. Many employers began to realize that they could gain better control over their short-term and long-term disability program costs, as well as health insurance costs by focusing more on prevention of disability. The application of disability management to non-occupational causes of disability was a natural extension, and can be seen as one of the forerunners of the practice of “disease management.”

In addition to the motive of cost control, there was a strong social welfare component to the emerging practice of disability management. After passage of the ADA in 1990, there was increasing pressure to accommodate disabilities in the workplace and among public facilities (United States Government Printing Office, 1990). Similarly, in Canada, enactment of the *Canadian Charter of Rights and Freedoms* (1982) meant increased attention to human rights and disability as a prohibited ground for discrimination. As the number of cases heard by human rights tribunals and labour arbitrators climbed, employer practices evolved to comply with the legal requirements of accommodation being formulated in case precedent (e.g. British Columbia Public Service Employee Relations Commission v. B.C.G.S.E.U., 1999). Many large employers came to see the practice of disability management as an expression of their social responsibility to their employees. It also became clear that preserving the employment connection with valuable human resources despite emerging disability was a way to increase productivity and profitability.

Another notable influence on the development of disability management practice has been the Disability Management Employer Coalition (DMEC). This non-profit organization was founded in 1992 to advance the development of integrated disability, absence and productivity management processes in all disability related employer programs (see website at www.dmec.org). They formed an alliance with the Insurance Educational Association (IEA) in

1994 to offer a Certified Professional in Disability Management course with certification for graduates.

The emergence of the "consumer movement" among persons with disabilities also played a role in popularizing disability management techniques. For example, the Canadian Diabetes Association was quite forceful in promoting the rights of diabetics to employment, and even funded legal cases that challenged discriminatory workplace rules. Employees with disabilities clearly benefited from accommodation and other services that aimed to improve their job performance, or reduce the strains of the job. These experiences also served to illustrate the degree to which specific impairments could be accommodated in the workplace, thereby mitigating against potential disability.

RELEVANCE TO WORKERS' COMPENSATION POLICY

As indicated earlier, the very first documented instance of disability management principles occurred in Finland as an "early rehabilitation" program for municipal workers who might be prone to, but had not yet experienced, work disability. Thus the initial thrust of disability management techniques was designed to reduce dependence on public income sources. While most major developments in disability management have been among large, mostly self-insured employers, there have been several applications of disability management principles in public workers' compensation programs.

Massachusetts Qualified Loss Management Program

The most imaginative program of which we are aware is the Qualified Loss Management Program (QLMP) for assigned risk employers in Massachusetts. In 1990, under extreme cost pressures and a rapidly expanding residual market[2] for employers who could not secure workers' compensation insurance in the regular voluntary market, the Massachusetts legislature adopted a program for residual market employers which provided premium credits for those adopting disability management techniques. This program is administered by the Workers' Compensation Rating and Inspection Bureau of Massachusetts.

[2] The residual market in private workers' compensation systems is an "assigned risk" pool for employers who cannot secure workers' compensation coverage. Policies are "assigned" to private insurance carriers and they are required to service the policy at a regulated cost. Costs are generally higher in the residual market and many employers feel they do not receive adequate service under these arrangements.

A premium credit (i.e., in advance of performance) of up to 10 percent was offered to employers who would engage a certified consultant to implement a "loss control management" program. Massachusetts even offered retroactive premium adjustments, so long as the employer participated for at least six months of the year. Furthermore, this credit could be maintained for three years, provided the loss control program continued in effect for the employer. However, the third year only carried 50 percent of the credit as the goal was to improve employer performance and depopulate the assigned risk pool.

It was expected that the program would pay for itself and that employers would soon realize that they could sustain their disability management efforts on their own. Subsequently, based upon the results for the first three years, the program was expanded to a fourth year with 25 percent of the original credit available in year four. In addition, the maximum premium credit was increased to 15 percent to provide even more incentive for employers. The 1993 amendments also provided that the premium credit could continue even after a subscriber "succeeded" in moving to the voluntary market. They also cancelled the retrospective premium adjustment provision.

Most interesting as a program design element, the actual size of the premium credit is determined by the average credit factor assigned to the loss management consultant, not the employer's actual performance. Provided the loss management firm certifies full QLMP participation, the performance improvements of other clients of the loss management consultant firm provides the basis for the credit. So the system is built upon the assumption that disability management practitioners can replicate their loss management performance in any firm.

The requirements for QLMP certification included:

1) a structured approach to safe work practices;
2) action plans for post-injury response; and
3) early return to work provisions.

These are the classic elements of any disability management program. According to an evaluation done by Howard Mahler and Carol Blomstrom (1999), the program produced immediate and sustained benefits for participating employers. In the first year of the program (September 1990 through August 1991), QLMP participants showed 13 percent more improvement than non-participating employers in the loss ratio (ratio of incurred losses to

standard premium) at first report. In the second year, the same cohort of employers showed 36 percent improvement, and in the third year 40 percent improvement over non-participating employers, all at first report. Further, these results held up through second and third report, as claims matured over time (Mahler & Blomstrom, 1999, Table 3, p.100). Clearly, participating employers enjoyed demonstrable results.

In addition, the initial impact of the program also seemed to improve over time. According to the same evaluation study, the first year impact of the QLMP program was 13 percent for the first cohort (9/90 through 8/91); but 28 percent for both the second cohort (9/91 through 8/92) and the third cohort (9/92 through 8/93) when compared to assigned risk firms that did not participate. This program is still in effect in Massachusetts (See www.wcribma.org for more details), and was subsequently emulated to a greater or lesser degree in workers' compensation systems in West Virginia, New Hampshire, Missouri, and Wisconsin.

Ohio Occupational Health Plan

Another interesting application of disability management principles has been adopted as policy in Ohio. This program began with a "Health Partnership Program" in 1993. This was a managed care program designed to improve medical care for injured workers in Ohio (an exclusive workers' compensation fund state). It has evolved more recently into a full disability management program with extensive support available from the Ohio Bureau of Workers Compensation (BWC).

In addition to assistance with establishing a disability management program, they provide risk analysis, lists of approved Managed Care Organizations, assistance with administration of drug testing programs, access to local occupational health nurse case managers, management of local medical provider relationships, on-site nurse staffing, and other services (See www.ohpinc.com for more information).

Their disability management program development offers all of the following services, which can be financed with a grant from the Ohio BWC, resulting in a low-cost way for employers to gain control of their future workers' compensation costs:

- To complete a Disability Management cost-benefit analysis that documents the employer's current costs associated with work related disabilities and duration, as well as establishing an on-going risk reduction goal of the program.
- To develop a comprehensive Workers' Compensation Administrative Guideline and employee Claim Packet enabling management and workforce to better understand the steps to take when filing a claim and treating a work-related injury.
- To develop a Disability Management Administrative Guideline allowing management to understand and control all aspects of injury management reporting, documentation and provider compliance.
- To develop a brief employee procedure for Workers' Compensation filing as well as Disability Management Plan compliance to be documented in the existing employee manual/ handbook.
- OHP will provide a standard job analysis format to document essential functions and physical demands of select jobs in each department. OHP will establish categories of jobs to be analyzed that enable the employer to accommodate the majority of the injured worker's restrictions. These categories will offer a transition of physical demand progression.
- To conduct a case review on all current "experience claims" to determine an appropriate Disability Management Plan for each eligible claim.
- To analyze the feasibility of on-site rehabilitation services and to deploy cost effective and pro-active assistance to return the injured worker to productive employment.
- To supply the employer with effective disability management training to employees, supervisors and management.
- To obtain a BWC Transitional Work Program Grant on behalf of the employer to cover the OHP consulting costs of developing the program. (Occupational Health Plan Integrated Services, 2006a)

In addition, the Ohio BWC offers a premium discount program (PDP+) which offers up to a 30 percent reduction in the employer's workers' compensation premium. It requires the implementation of a 10-step "Safety and Health Business Plan." This plan must reduce the claims frequency and severity for the employer by 15 percent to achieve the maximum premium discount.

Ohio is also rather unique in publishing a "report card" on managed care organizations (MCOs) operating in Ohio. The current version reports:

- the number of employers assigned to the MCO,
- the number of claims handled since March 1997,
- timing of the first report (average number of days between the date of injury and claim filing with BWC),
- first report turnaround efficiency (the number of days from receiving the notice of injury from the employer to the date they file the claim with BWC),
- the return-to-work score based on a degree of disability management (DoDM) model which controls for type of injury and occupation,
- employer satisfaction with services received (as determined by an independent consultant survey), and
- injured worker satisfaction (also determined by an independent consultant survey). (Ohio Bureau of Workers' Compensation, 2006b, pp. 1-3)

The Ohio WCB publishes these performance statistics on the MCO's (currently 27 in number) who are operating in the state on their web site annually. While there has been no formal evaluation of the Ohio initiatives, there is plenty of empirical evidence to suggest the efficacy of disability management techniques in general and in application to specific disabling conditions (Krause, Dasinger, & Neuhauser, 1998; Williams, & Westmoreland, 2002; and Hursh, & Lui, 2003).

These two U.S. workers' compensation programs illustrate the degree to which disability management principles can be integrated with public policy on a voluntary basis with financial rewards for successful participation. Commitment to an early and sustainable return to work obviously has strong appeal to policymakers, because it both reduces workers' compensation costs for employers and minimizes income losses for injured workers.

THE GLOBALIZATION OF DISABILTY MANAGEMENT

Disability management arose in Finland in the 1970s, as discussed earlier, but it gained prominence in the United States as a tool for large employers to reduce their workers' compensation costs during the 1980s, and found its way into public policy on workers'

compensation in the 1990s. This is a very interesting transition in many ways. It demonstrates the ultimate effectiveness and flexibility of disability management principles. They work at the individual employer level, at the industry level, and at the workers' compensation system level.

These past two decades have been tumultuous years, as employer's desires to keep their disability costs under some control ran headlong into the interests of persons with disabilities, as expressed in North American legislation. But many U.S. corporations apparently did succeed in slowing the rate of growth in their disability costs as demonstrated in the fact that average workers' compensation costs for employers actually dropped by 39 percent during the decade of the 90s versus the 24 percent increase in the 80s and 59 percent increase in the 70s (Burton, 2005, p. 17). In an overview article on workers' compensation developments, Burton and Spieler stated "Perhaps the most remarkable change in workers' compensation over the past twenty years has been the shift to a focus on disability management and 'return to work' for injured workers" (Spieler, & Burton, 1998, p. 229).

But in the last decade, the mantle of leadership has shifted to Canada. The Canadian National Institute for Disability Management and Research (NIDMAR) was founded in October 1994 in British Columbia by a group of unions, employers, and interested individuals, largely based in the forestry sector. Firmly founded on a commitment to joint union-management action, NIDMAR is achieving extraordinary success with its "consensus based" approach to disability management. Under the persistent leadership of Wolfgang Zimmerman, himself an injured forest worker, NIDMAR has spread its influence around the world through a system of partnerships with local people in the respective countries.

The initial front was the International Labour Organization in Geneva, which adopted the *ILO Code of Practice on Managing Disability in the Workplace* in 2002. This policy document was based firmly upon the foundation provided by NIDMAR, with the addition of international research and development contributions from Australia, Europe, New Zealand, and the United States. Conceptualizing disability management as a joint union-management program reflects commitment to the twin goals of helping injured workers keep their employment and reducing the employer's cost of disability (International Labour Organization, 2002).

NIDMAR developed an enterprise audit tool, the *Consensus Based Disability Management Audit (CBDMA)* to assess disability management programs, their strengths and weaknesses, and specific steps for improving such programs and their results. This tool is licensed by NIDMAR to various parties around the world who have the capacity and experience to conduct such an audit. The audit itself is a three-day process involving a review of written policies and procedures as well as minutes from relevant meetings, plus extensive face-to-face time with both labour and management representatives who must agree on the answers to some 80 questions about their program (hence the "consensus"). The auditor provides a detailed report, including a numerical score for the program, and advice on how the program might be improved.

In addition to the audit, NIDMAR provides a thorough set of 25 on-line courses designed to provide mastery of the subject of disability management, and leading to an exam for certification as a Certified Disability Management Professional (CDMP) or Certified Return to Work Coordinator (CRWC) (see Scott, Brintnell, Creen, & Harder, 2003, for a description of the processes involved). Thus, NIDMAR can provide the training and professional certification for practitioners and the audit tool with which to evaluate program performance against the international standards which NIDMAR was instrumental in developing. And this package has proven to be very appealing to workers' compensation agencies around the world.

The NIDMAR program has been adopted in whole or in part by Canadian provincial workers' compensation systems in British Columbia, Newfoundland and Labrador, Ontario, and Saskatchewan. In 2003, British Columbia extended an offer to employers in the pulp and paper industry under a 3-year pilot project. Firms with CBDMA-certified disability management programs would receive an immediate 10 percent discount on their workers' compensation premiums.

The Canadian Federal government adopted the NIDMAR program in 2004 through a license taken out by Human Resources and Skills Development Canada (HRSDC). The WCB of Newfoundland and Labrador also adopted the NIDMAR standards in 2004, followed by Ontario in 2005 and Saskatchewan in 2006. The WCB of Manitoba has commissioned a matched sample research project involving 50 high-risk employers. A contractor will perform a full CBDMA audit on 10 of the firms and compare their performance to the others.

The most aggressive adopters of the NIDMAR program have been the network of Hauptverband der gerblichen Berufsgenossenschaften (HVBGs) in Germany. These agencies conduct workers' compensation insurance and safety and health promotion activities in Germany organized by industry group. The NIDMAR tools were formally adopted by the HVBGs in 2002, and their enthusiastic endorsement has led to a number of other international adoptions as well.

A measure of NIDMAR success in Germany is represented by the fact that approximately 350 individuals had received Certified Disability Management Professional (CDMP) status by November, 2005. Ford of Germany recently received the IDMSC Certified Award from the International Disability Management Standards Council. This certifies that the company passed the CBDMA audit with a score of more than 80 percent (NIDMAR, 2006). A disability manager from Ford of Germany was the first in Europe to achieve the CDMP in 2003.

Of course, Germany starts with a great tradition of joint labour-management activity, fostered by the co-determination principle of German corporate governance. So it is no surprise that a disability management program built upon a foundation of consensus between labour and management would find fertile soil there. But the program has attracted a great deal of notice from other workers' compensation systems and insurers around the world (see Shrey, & Hursh, 1999).

In addition to Canada and Germany, at this writing the NIDMAR program has also been licensed in Australia, Austria, Ireland, Singapore, Switzerland, and the United Kingdom. Interest has been expressed from China, New Zealand, South Korea, and Brazil as well (NIDMAR Annual Report, 2005, p. 5).

CONCLUSION

Disability Management has progressed from radical idea to mainstream accepted practice in a period of 20 years in North America. During a period of increasing globalization, the practice of disability management is spreading throughout the developed world. Greater consideration of functional abilities in the work environment, as opposed to medical status alone, constitutes a revolution in thinking about work disability. Acceptance of the concept of modified work and focusing on accommodation of functional limitations is a major paradigm shift. These changes in thinking and practice have undoubtedly enabled many persons with disabilities to continue their

employment, and allowed many employers to lower their disability costs. The growing inclusion of disability management principles into existing statutory workers' compensation programs can be expected to further increase their reach and impact. While disability management has not been a panacea, it has clearly been a win-win situation for employers and employees, as early protagonists claimed.

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