

Occupational Health Management™

*A monthly advisory
for occupational
health programs*

THOMSON
AMERICAN HEALTH
CONSULTANTS

IN THIS ISSUE

■ **Balanced Scorecard** helps you measure your performance and sell yourself to management cover

■ An employee's death inspires innovative workplace program to combat domestic violence . . . 76

■ OSHA is working to ensure younger workers, who are especially vulnerable to workplace injury, receive the attention they deserve from employers. 78

■ **Guest Column:** A disability management expert focuses on emotional ergonomics — aspects of the work environment that can threaten the emotional well-being of workers 80

■ A new study indicates downsized older workers are at greater risk for stroke, heart attack. 81

■ On-site primary care clinics have interesting side benefit — they can serve to create a strong bond of trust between employer and employee . . . 82

JULY 2004

VOL. 14, NO. 7 • (pages 73-84)

The Balanced Scorecard: A tool to measure performance and sell yourself

Scorecard is latest in AAOHN series of Success Tools

One of the ongoing challenges for occ-health professionals has been to demonstrate the economic value of their services to upper management. In a new development unveiled recently at the American Occupational Health Conference, it appears that the Atlanta-based American Association of Occupational Health Nurses (AAOHN) has come up with a tool that can not only provide a powerful vehicle for addressing this challenge, but also can give occupational health managers a more accurate picture of how well they are meeting their goals.

In recognizing one of the growing trends in all health care-related fields — a move toward the adoption of quality tools developed in other fields, particularly manufacturing, and the application of these tools to performance improvement initiatives — AAOHN enlisted an expert team to develop just such a tool for their membership. The third in a series of what AAOHN calls Success Tools is the Balanced Scorecard.

"The Balanced Scorecard represents management by measurement — a way of looking at what your customers expect of you and how well you meet those needs," explains **Vickie Kamataris, RN**, a quality leader with General Electric Corporate Healthcare in South Lancaster, MA, and one of the co-developers of the tool. "You not only show where opportunities [for improvement] are and how you are progressing toward your goals, but what your value is in the organization."

Kamataris, who is a Six Sigma Black Belt and has broad experience with such scorecards at GE, continues, "Say that one organizational goal for your corporation is a healthy work force — how are you contributing to that? It's nice to say we have an occ-med function, but what specific objectives are we headed toward — e.g., risk avoidance? This can be a very valuable communication tool to upper management."

"From my perspective, the one big deficit [occ-med professionals] have is difficulty in demonstrating their value and measuring what they do for the organization," adds **E. Sharon Blaney, RN, COHN[C], COHN-S/CM**, who heads her own company, International Productivity Options, in Surrey, BC, Canada, and was Kamataris' partner in developing the Balanced Scorecard. "When they do measure, they tend to do so in terms of more medical-related factors, and not things that are

**NOW AVAILABLE ON-LINE: www.ahcpub.com/online.html
Call (800) 688-2421 for details.**

more understandable by the organization. So from my perspective, it's designed in a way that's understandable in the work place and that links financial performance as well as people performance."

This business-oriented approach is outlined in the scorecard's four perspectives, which include both financial and nonfinancial metrics (bases of measurement), and ensure that both customer needs and business needs are met:

- **Financial perspective:** What financial objectives must we accomplish?
- **Customer perspective:** What customer needs will be met?
- **Internal perspective:** How well are internal processes working?
- **Learning perspective:** How must our team learn and innovate?

One of the roles of AAOHN is to provide information and resources for its members from the perspective of managing the workplace, Blaney explains. "Their series of Success Tools helps occ-health nurses look at business strategies, and this is another step in that process."

The idea of developing the Balanced Scorecard got its start when Blaney was chair of AAOHN's professional practice committee. "One of the things mentioned was the balanced scorecard, because it was being used in lot of business," she recalls.

The team drew heavily on the work of Robert S. Kaplan of the Harvard Business School. "His seminal works were published in 1996,"¹ says Kamataris. "He considered 'balanced' to mean covering both financial and nonfinancial metrics. For me and GE, it was more than that; it means having a combination of structure, process and outcome metrics, and leading and lagging indicators. The type of metric you choose depends on the maturity of your processes and the needs of your customers."

How, why, and when would an occ-health professional use a balanced scorecard? "We approached it from two perspectives," says Blaney. "How a nurse would manage if there was already a process, and what to do if there wasn't a measurement process in place. For example, let's say the company is going to be adding a new process that might cause employees to have some exposure to hazardous substances. Do you have a process already in place to address this, or do you have to put in a new process in corporate health because you know this will be occurring? If the latter, you must link it up with the direction of the organization."

In other words, says Blaney, you must relate your plan to the corporate vision and mission statements. "You go through the process of strategic development — i.e., what are the strategic imperatives of the organization? You conduct a SWOT [strengths, weaknesses, opportunities, and threats] analysis — what strengths you have, the areas you need to improve," she says. "You do an assessment of the environment of culture you are in, and then you come up with a plan that really links to the strategic plan of the organization." (All of these steps are outlined in detail in AAOHN's copyrighted document, "Creating a Balanced Scorecard," which also includes case studies, a section on metric development, and a scorecard graphic, a copy of which is found on p. 75.)

The Balanced Scorecard approach will work for an occ-health operation of any size, says

Occupational Health Management™ (ISSN# 1082-5339) is published monthly by Thomson American Health Consultants, 3525 Piedmont Road, Building Six, Piedmont Center, Suite 400, Atlanta, GA 30305. Telephone: (404) 262-7436. Periodical postage paid at Atlanta, GA 30304. POSTMASTER: Send address changes to **Occupational Health Management™**, P.O. Box 740059, Atlanta, GA 30374.

Subscriber Information

Customer Service: (800) 688-2421 or fax (800) 284-3291, (customerservice@ahcpub.com). Hours: 8:30-6:00 M-Th; 8:30-4:30 F.

Subscription rates: U.S.A., one year (12 issues), \$479. Outside U.S., add \$30 per year, total prepaid in U.S. funds. One to nine additional copies, \$383 per year; 10 to 20 additional copies, \$287 per year. For more than 20 copies, call customer service for special arrangements. Missing issues will be fulfilled by customer service free of charge when contacted within one month of the missing issue date. **Back issues**, when available, are \$80 each. (GST registration number R128870672.)

Photocopying: No part of this newsletter may be reproduced in any form or incorporated into any information retrieval system without the written permission of the copyright owner. For reprint permission, please contact Thomson American Health Consultants. Address: P.O. Box 740056, Atlanta, GA 30374. Telephone: (800) 688-2421. Fax: (800) 755-3151. World Wide Web: www.ahcpub.com.

This continuing education offering is sponsored by Thomson American Health Consultants, which is accredited as a provider of continuing education in nursing by the American Nurses Credentialing Center's Commission on Accreditation. Provider approved by the California Board of Registered Nursing, provider number CEP 10864, for approximately 18 nursing contact hours.

Opinions expressed are not necessarily those of this publication. Mention of products or services does not constitute endorsement. Clinical, legal, tax, and other comments are offered for general guidance only; professional counsel should be sought for specific situations.

In order to reveal any potential bias in this publication, and in accordance with Accreditation Council for Continuing Medical Education guidelines, board members have reported the following relationships with companies having ties to this field of study. Dr. Patterson is a consultant for Hewlett Packard Corporation. Ms. Colby, Ms. DiBenedetto, Ms. Haag, and Dr. Prezgia report no consultant, stockholder, speaker's bureau, research or other financial relationships with companies having ties to this field of study.

Editor: **Steve Lewis**.

Vice President/Group Publisher: **Brenda Mooney**, (404) 262-5403, (brenda.mooney@thomson.com).

Editorial Group Head: **Lee Landenberger**, (404) 262-5483, (lee.landenberger@thomson.com).

Managing Editor: **Alison Allen**, (404) 262-5431, (alison.allen@thomson.com).

Senior Production Editor: **Nancy McCreary**.

Copyright © 2004 by Thomson American Health Consultants. **Occupational Health Management™** is a trademark of Thomson American Health Consultants. The trademark **Occupational Health Management™** is used herein under license. All rights reserved.

THOMSON
★
AMERICAN HEALTH CONSULTANTS

Editorial Questions

For questions or comments, call **Alison Allen** at (404) 262-5431.

XYZ Corporate Health Services 2004 Balanced Scorecard

	Objectives	Outcome Measures	Driver Measures	Targets	Initiatives
Cost Effective	<ul style="list-style-type: none"> ■ Improve integration of Workers Comp., STD, LTD and RTW programs ■ Manage on-site injury/illness 	<ul style="list-style-type: none"> ■ ROI ■ Increase employee productivity 	<ul style="list-style-type: none"> ■ Improve in RTW days by an average of 3 days per case ■ Reduction in lost time 	<ul style="list-style-type: none"> ■ Have Workers Comp and RTW integrated by June 2003 ■ Have all programs integrated by year end 2003 ■ Implement on-site health clinics in all location by year end 2003 	<ul style="list-style-type: none"> ■ Integrate the management of all programs into the Health Services Facility in the Administrative Headquarters ■ Implement a computerized tracking system
Customer Satisfaction	<ul style="list-style-type: none"> ■ Identify prevalent health concerns and conditions of the employee population ■ Develop wellness programs relevant to the employee population 	<ul style="list-style-type: none"> ■ Identify top 4 health issues each location ■ Improvement in employee satisfaction 	<ul style="list-style-type: none"> ■ Quarterly report to management outlining top 4 problems ■ Introduction of health promotion to address top 4 issues 	<ul style="list-style-type: none"> ■ Data collected for analysis and health risk appraisal (HRA) conducted by end of 1st quarter ■ Report developed and presented by end of 2nd quarter ■ By beginning of 2nd quarter 	<ul style="list-style-type: none"> ■ Analyze health data for past 2 years ■ Conduct HRA ■ Conduct employee needs assessment
Productivity	<ul style="list-style-type: none"> ■ Provide a safe workplace ■ Assess level of chronic disease present in current work force ■ Develop disease management programs 	<ul style="list-style-type: none"> ■ Reduced injury rates ■ Reduction in absences related to top 4 health issues 	<ul style="list-style-type: none"> ■ Employee injury rates reduced by 5 percent over the next 12 months ■ Reduce absences related to non-occupational absences 	<ul style="list-style-type: none"> ■ By end of 1st quarter ■ Introduction of one new health promotion program per location per quarter 	<ul style="list-style-type: none"> ■ Conduct a safety audit ■ Update and review all safety procedures ■ Create wellness programs specific to each worksite
Client Education	<ul style="list-style-type: none"> ■ Enhance existing safety programs by using diverse styles and materials ■ Develop and implement education programs that improve participation in wellness programs ■ Develop and implement disease management program 	<ul style="list-style-type: none"> ■ Improved safety rates ■ Increase attendance by 10 percent at all health promotion presentations ■ Reduction in absence rate 	<ul style="list-style-type: none"> ■ Reduction in Workers' Comp assessments and cost ■ Increase attendance and satisfaction with wellness program ■ Increased understanding of risk factors associated with chronic illness 	<ul style="list-style-type: none"> ■ By the end of the current fiscal year ■ By the end of the current year ■ By the end of the fiscal year 	<ul style="list-style-type: none"> ■ Review and update all current safety material and programs ■ Develop interactive wellness programs and on-site group programs ■ Develop and implement disease management presentations

Source: American Association of Occupational Health Nurses, Atlanta.

Kamataris, but your approach must be adjusted accordingly.

Take for example, the development of your metrics. The SMART (specific, measurable, actionable, relevant, and timely) approach, which has been used since the 1980s, is perfectly fine for what Kamataris calls a Scope A organization, which is a single clinic or a small set of clinics

that are more alike than different.

However, she notes, "When the things you are measuring get bigger and bigger, you need to think in more complex levels."

If you are looking at a very new process — i.e., giving your clinics tools to prepare for a terror incident — "You start by thinking about how you would measure your progress along a continuum,"

says Kamataris. "The first step is structure; do they have an emergency plan? Does it include chemical, biological, and electrical components? The next thing you'd ask is, do they have a process in place? Eventually, the third level would be outcome: Of a given number of events, how many responded to them according to the guidelines? This is the most mature, highest level of metric."

To recognize the different levels of complexity, she added metrics for Scope B (corporations with manufacturing, service, and warehouse facilities with clinics in the United States) and Scope C (a global corporation with financial, manufacturing, and service businesses including aircraft engine, power generator, and medical equipment manufacturing and service, biotech research, security systems, light bulb, appliance, plastics, and electrical equipment manufacturing, equipment leasing, and customer call centers in the Americas, Europe, India, Asia, and China) organizations. For the Scope B organizations, SMARTER metrics are recommended, which add Equitable and Rigorous to the original five. For Scope C, the SMARTEST metrics are Simple and also are Transferable in terms of language, law, culture, and environment.

Thus, says Kamataris, *any* occ-health operation can benefit from the Balanced Scorecard. "Absolutely, even if you are a one-nurse operation in a business with only one clinic," she asserts. "You take your vision, your customers, define who they are, how you contribute to those needs, and you start measuring. It either shows you how great you are doing, or recognizes where the opportunities are so you can start moving toward being great. There's no way this would be a wasted effort for anyone."

Chances are good you won't get ideal scorecards the first time around. "Even if you do not get perfect ones, take the best you can and continuously improve," Kamataris advises. "The scorecard is not going to be perfect the first time; in fact, it will *never* be finished. As customers' needs change and evolve, your approaches will change with them."

The scorecard takes a lot of work, she concedes. "Some docs have trouble with measuring, but once they see what happens they believe in it — and once they believe in it, *anything* is possible."

It's important to remember, says Blaney, to customize your approach to your organization. "If you're doing a program on heart health and you have a fit organization with an average age of 30, where people exercise and eat properly but have

really high stress levels, it might be better to deal with stress issues than with cardiovascular issues," she notes. "Make sure what you do meets the needs of the organization."

"You don't have to use our four quadrants," adds Kamataris. "Pick whatever fits your organization and best defines the needs of your customers."

When you direct your practice to the needs of the organization, says Blaney, "Then you talk the same language."

When properly applied, Kamataris concludes, the Balanced Scorecard "can help improve customer satisfaction, lead to self-improvement, and help you sell yourself to management."

Reference

1. Kaplan RS and Norton DP. Using the balanced scorecard as a strategic management system. *Harvard Business Review* January/February 1996; 74:75-85.

[For more information, contact:

• **Vickie Kamataris, RN, Quality Leader, General Electric Corporate Healthcare, South Lancaster, MA.** Telephone: (978) 368-7919. E-mail: vickie.kamataris@corporate.ge.com.

• **E. Sharon Blaney, RN, COHN[C], COHN-S/CM, International Productivity Options, Surrey, BC, Canada.** Telephone: (604) 669-8188, ext. 233. E-mail: mblaney@direct.ca] ■

Program targets domestic violence

Employee attitudes shift

An innovative workplace-based program targeting domestic violence has succeeded in engendering significant change in terms of employee awareness and attitudes, according to an evaluation report from the San Francisco-based Family Violence Prevention Fund (FVPPF).

The fund was retained by Harman International Industries Inc., a manufacturer of high-end consumer stereo and audio equipment that employs about 3,500 employees across the United States "to provide expertise and knowledge and to design the program from the bottom up," says **Beverly Younger Urban, PhD, LCSW**, a professor at Governor State University in University Park, IL, and author of the evaluation report.

While FVPPF had a pre-existing template for

such a program, this project was customized to meet Harman's needs. And, significantly, "we included an evaluation component" in the services provided to Harman, Younger Urban explains.

Here are some of the key findings in the evaluation report:

- After the domestic violence training, 91% of the employees said they were now more likely to know where to refer someone who is abused for help; 89% said they were now more likely to be supportive of a colleague who is abused; and 86% said they were now more aware of what to do if there is a threat of domestic violence at work.
- The training caused "a highly significant increase" in the number of employees who said they know the signs of abuse, know where to refer a victim to get help, and know who to contact if they know of an employee who might be attacked at work.
- Employees' attitudes about domestic violence were more supportive of victims after the training than before it. In this statistically significant finding, about 20% more employees had highly supportive answers after the training.
- Responding to questions about the training, about three-quarters of Harman employees agreed that the training sessions increased their awareness and readiness to respond to domestic violence.

Death sparks initiative

Younger Urban, who was involved in the project from the beginning, looks at the success of the program from two different perspectives. "From the research perspective, statistically there was a change that was big enough to measure in what people know and understand about domestic violence," she notes. "When we teach them, they can respond in ways that are much more helpful to others."

She also had a very personal reaction to the experience. "Every inch of the way, from planning to training, to doing to evaluating, there has just been a groundswell of support from employees and management to really buy into this," she says.

The initiative at Harman arose following the death of an employee from domestic violence. Chairman Sidney Harman "took a deep interest and tasked his daughter, Lynn Harman [an attorney with the firm], to seek out best practices in the prevention of domestic violence," Younger Urban explains.

The first step in the Harman/FVPPF initiative was to set up regional teams that knew the individual facilities very well. "There were HR [human resources] representatives on each team, who knew the culture," says Younger Urban, noting that this was extremely important because each facility had its own distinct culture.

"We even formally assessed the cultures, the demographics, and the need for training," she continues. "There was a lot of upfront development," including handouts in numerous languages.

For each facility, a community domestic violence service provider was brought into the process. (*Editor's note: Community domestic violence providers are what used to be known as shelters.*) "We identified the provider who was closest to the facility, then brought them in as a full partner in the training program," says Younger Urban.

This was followed by train-the-trainer and planning meetings. "Getting to know the people on the teams really helped and connected them to the hometown," she notes. "It provided a long-term partnership between that immediate facility and community. In the future, if someone has a problem with their partner, they already know a person in the community and can call them."

This really has been a win-win situation, Younger Urban continues. For the employer, these providers function as informal consultants. The benefit for the provider is financial.

"They tend to have very little money," she says, "and we encouraged these Harman facilities to support them through employee drives that collect food and clothing. It's an ongoing collaboration."

Policy is critical

Another critically important piece was a new company policy on domestic abuse, which was part of the employee training about domestic violence. "We included workplace violence risk, but we went beyond that to the needs of people being abused who come to work," Younger Urban observes. "They are much like people with life-threatening illnesses or disability; for some period of time, they are not able to function as fully as they'd like, and they need resources for help."

In light of this vision, the policy went beyond safety and security to how to reach out to help people, and how to address presenteeism. "This *had* to be our foundation," Younger Urban notes. "It sends a message of strong corporate support."

The program, she continues, was highly

successful first and foremost because the company was so committed. "I've measured [employee] attitude change before [at other workplaces] and seen a slight shift, but in this one it was statistically significant — from less positive to more positive attitudes," she says.

"We had employees who had lived through domestic violence and through this program became stronger," Younger Urban reports. "They found a way out, and said they now wanted to help others. They became some very supportive partners in the training process."

Any company can duplicate the Harman experience, she asserts. "The fund has done a lot of work in this area; I helped them create training manuals that can be adapted to different workplaces." This includes a training manual on developing best practices, for which she served as lead author. The evaluation of the project is available at www.endabuse.org (click the workplace program button).

[For more information, contact:

• **Beverly Younger Urban**, PhD, LCSW, Governor State University, University Park, IL. Telephone: (312) 771-4440. E-mail: b-urban@govst.edu.] ■

OSHA seeks to teach young workers safety

Population vulnerable to injury

Much of the attention of occupational health professionals has recently been focused on the aging segment of the working population, and with good reason. But that doesn't mean we can ignore our youngest workers, and the Occupational Health and Safety Administration (OSHA) is going to make sure we don't.

Beginning about a year ago, OSHA took the first steps toward creating what now is known as The Young Worker Initiative, which targets individuals between the ages of 12 and 24. "It started semiformally in early 2003, and eventually became part of the OSHA strategic plan," recalls **Elise Handelman**, RN, COHN-S, MEd, director of the office of occupational health nursing in the Directorate of Science, Technology & Medicine in OSHA's national office.

This initiative goes farther than just targeting teen workers, who mostly take summer jobs, she explains. "We're looking at a broader base —

we're trying to get people who are entering the work force." College-age workers who work part-time but year-round to help pay their tuition also are "very typical," Handelman adds.

The rationale for the initiative, she notes, was the desire to "protect the next generation," which became OSHA's motto. "Our goal is to get workers who are just developing their work skills and habits to incorporate safety and health into those newfound habits and skills," she observes.

Traits differentiate group

This particular group of workers is very vulnerable, says Handelman, because of their age and because, in terms of knowing how to take care of themselves at work, they are a blank slate. "We are trying to develop a sense of empowerment among them, so they will be able to take action if they feel they are in an unsafe condition," she says. "Sometimes employers ask them to do things they haven't been trained to do or not have the necessary experience to do, and in an effort to please an adult they will do it."

One of the main areas of focus for the initiative, then, is on actions young workers can take to protect themselves and on alerting employers to their unique characteristics. These characteristics, Handelman says, include:

- vulnerability;
- a desire to please adults;
- lack of experience;
- physical growth spurts; constant change physically to which the worker has not had a chance to adjust;
- a sense of invincibility.

The initiative has several key elements, says Handelman. "One of the first things we did was develop a teen worker web site, which you can reach right off our home page," she says. (**See the listing of OSHA sites, p. 79.**)

In addition, she reports, the Federal Network for Young Worker Safety & Health (FedNet) will shortly have its own site. "We are cojoining nine federal agencies with activities related to young workers," says Handelman. "Our goal is to reduce redundancies and to share resources. For example, National Institute for Occupational Safety (NIOSH) and Health has developed a curriculum for safety & health for vocational/technical workers, and we've been able to hook them up with the Job Corps."

FedNet also seasonally publishes a summer jobs site, focusing on the types of jobs teens traditionally have in the summertime: lawn care,

farm work, construction, restaurants, safe driving, lifeguarding, and parks and recreation. "We provide information about the jobs teens typically have in the summer," says Handelman.

According to NIOSH, each year about 70 teens die and about 77,000 are injured seriously enough to require hospital treatment. An estimated 230,000 working teens may be injured each year.

"Last summer, we learned of two fatalities of underage workers [ages 15 and 16] on forklifts," Handelman shares. "As a result, we collaborated with NIOSH and the Wage & Hour division of the Employment Standards Administration, mailing out 5,000 information packets to alert small employers to the hazards of teen-age operators." In fact, she adds, a worker is not supposed to operate a forklift if he or she is younger than 18.

OSHA also is continuing to work with its alliance partners. "A number of them have young workers as a focus for the alliance," says Handelman. "They include the Industrial Truck Association, the International Logistics Warehousing Association, and the National Safety Council. A whole slew of them have components related to young workers."

Among the most important issues, she continues, is employer awareness of how to deal differently with these younger workers. "Make sure employers are aware of prohibited jobs for teens," she advises. (You can get to this information from the teen worker web page by clicking "My State" at the top of OSHA's web page, www.osha.gov.)

Occ-health professionals in the jobs areas frequented by younger workers need to be especially on alert for job tasks or equipment that may have the potential for injury. "In health care, for example, kids may work in the kitchen and be around heavy equipment, like grinders or ovens," she notes, "And some of those tasks are prohibited. For example, grounds keeping activities like using ride-on lawnmowers or chain saws are prohibited."

For additional information, see these other targeted sites: YouthRules! Initiative — www.youthrules.dol.gov; Fair Labor Standards Act Advisor — www.dol.gov/elaws/esa/flsa/docs/hazonag.asp; web page with occ-health and safety information for young workers — www.osha.gov/SLTC/teenworkers/index.html.

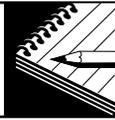
[For more information, contact:

• **Elise Handelman, RN, COHN-S, MEd, OSHA**
Directorate of Science, Technology & Medicine.
Telephone: (202) 693-2120.] ■

OSHA younger worker guidelines

OSHA recommends you consider implementing the following strategies to help improve the health and safety of your younger workers:

- A review of the worksite to eliminate identified hazards and ensure jobs are as safe as possible.
- Provide training to ensure that adolescents recognize hazards and are competent in safe work practices. Training should include how to prepare for fires, accidents, violent situations, and what to do if they get injured. Teens need to know that if they get injured, they have the right to file a claim to cover their medical benefits and some of their lost work time.
- Provide appropriate supervisors for teens who recognize hazards and are competent in safe work practices.
- Routinely verify through supervision that teens continue to recognize hazards and use safe work practices.
- Stress safety, particularly among first-line supervisors; they have the greatest opportunity to influence teens and their work habits.
- Implement a mentoring or buddy system for new youth workers. Have either an adult or experienced teen be a buddy to answer questions to help the inexperienced worker learn the ropes of a new job.
- Encourage teens to ask questions about tasks or procedures that are unclear or not understood.
- Remember that teens are not just little adults. Employers must be mindful of the unique aspects of communicating with teens.
- Ensure that equipment operated by teens is both legal and safe for them to use.
- Develop a safety and health program in your facility to help prevent workplace injuries. OSHA offers the following links:
 - Safety and Health Programs Safety and Health Topic Page;
 - Safety and Health Management System eTool;
 - OSHA's Safety Pays software can assist you in understanding how injuries are adversely impacting your profits.
- A strong safety and health program involves all workers, supervisors, management, experienced workers, and teen workers.
- Many safety and health problems and injuries can be prevented through simple workplace or work process redesign.
- For help in establishing or improving your safety and health program, see the OSHA Consultation Program Directory.
- Additional help for small businesses can be found at OSHA's Small Business Outreach Training Program Safety and Health Topics Page, including a Self-Inspection Checklist. ■



Emotional ergonomics affects productivity

High turnover, low morale linked to Emoerg

By **William W. Simonds**
 National Director, Disability Management
 Zenith Insurance Co.
 Woodland Hills, CA

Emotional ergonomics, sometimes referred to as “emoerg,” is a fast-growing element of ergonomics in general. Various definitions have been offered, most having to do with the interaction between the workplace and the employee. Unfortunately, most of what is written on emotional ergonomics places a greater emphasis on understanding the emotional make up of the employee than it does on the emotion impact of the workplace. For example, there is great discussion about having supervisors understand the emotional landscape of the employee, but little or no discussion about the impact of the lack of control of workflow on the employee.

Consider a high-volume call center at peak times of the year. Calls come in continuously, with a backlog of unanswered calls waiting in queue. Reps are fed the calls automatically, without the need to even pick up a receiver or push a button, sometimes with as little as three seconds between phone calls. The process is very efficient, but it is no wonder call centers are derisively referred to as the sweatshops of the new millennium. Employees are managed to

shorter calls (read: more calls per hour/day) for better results.

The impact of all this is not a broken arm or a slip and fall; the impact is excessive turnover, low morale, and a higher than expected number of performance issues. And all of these are the result of management that doesn't understand the emotional impact of the workplace on the individual — emotional ergonomics.

Adjusting the workplace

Just as physical ergonomics adjusts aspects of the workplace to fit the physical person, so emotional ergonomics adjusts the workplace to fit the emotional person.

In our example of the high-volume call center, simple strategies could reduce the high emotional impacts of peak times. For example, allowing the employee to answer the phone by some physical act changes the perception that the employee is at the mercy of the machine. You still can manage to the same call handling times, but the simple act of pushing a button or picking up a receiver can significantly change attitudes and enhance performance.

The best physical ergonomics occur when the workplace is made flexible and the employee is empowered to adjust it to his or her own comfort level. Monitors that tilt and are mounted on adjustable stands, chairs that adjust to the shape and size of the individual, work surfaces that can be raised or lowered at will are all examples of such an approach.

However, managers are not trained to see the workplace in emotional terms. What is the impact of headsets that project the caller's voice in stereo into the middle of the employee's head? What is the impact of cubicles constructed of soundproof

materials, but then covered with notices, job aids and reference lists that all collect and reflect sound back at the employee? What is the impact to a fast-food worker who is stuck on the register with an endless line of customers while his friends are doing fries or working the grill and talking with one another?

Consider also that one of the costs of faulty or missing emotional ergonomics

Table A - Workplace Injury Patterns

ERA	Locus of Work	Disability Class	Indemnifying Vehicle
Agrarian	Hands/Feet (Manual)	Dismemberment*	AD&D
Industrial	Raw Materials & Controls (Machine)	Joint, bone major muscle**	Medical
Informational	Phone, Desk, Computer	Nonspecific/subjective pain, psychiatric ***	Salary Continuation, STD, LTD, & WC

Examples: *Digit, Member, Appendage; ** Back, Contusion, Bone, Strain/Sprain/Pull; *** Fibromyalgia, CTD/RMI, M&N.

Table B - Emerging Disabilities

Type of Injury	% of Increase
Mental & Nervous Claims	+269%
Muscle/Tissue Claims	+249%
Chronic Fatigue/Epstein-Barr	+161%
Carpal Tunnel	+119%

also is the direct costs of disability in the workplace, both worker's comp and nonoccupational lost time.

Of adults ages 18 to 65, almost one in four find their work is impaired by either major depression or panic attacks.¹ Similarly, a study of a large bank merger revealed that when all causes of work disruption were analyzed (lost time, presenteeism and casual absences) that employees with digestive issues lost almost half their productivity (15.96 hours) per week. One suspects there is an element of stress involved here. The next highest impact for lost productivity was mental health-related issues at 13.19 hours per week.²

The growing emphasis on emotional ergonomics is necessary and none too late. Consider the historical progression of types of disabilities incurred in the work place. Table A (p. 80) illustrates the three major work paradigms of the last 100 years and their impact on the causes of lost time.

This is reflected in data from a large disability database. From 1995 to 1998, the insurance industry has seen the explosive growth of classes of disabilities that could be impacted by effective ergonomics.³ (See Table B, above.)

The necessary first steps in developing any program to mitigate the impact of these emotional injuries must be the recognition of the emotional impact of normal workflow and changes in that workplace on the individual.

Second, line management must share the costs of these collisions. Lost time should not be charged to some corporate cost center. The costs of lost time should be attributable to the department that creates it.

Similarly, the savings of a good return to work program should also be allocated to those departments that support it through "lost-time credits." There must be an incentive to bring people back to work.

And finally, the employee should be considered a resource in the redesign or reorganization of the workflow. They are, after all, the experts in

the emotional impact of the work place on the individual.

References

1. Kessler et al. *JOEM* 2001; 43(3):218-225.
2. Burton et al. *JOEM* 1999; 41(10):863-877.
3. UnumProvident, *Emerging Disabilities*. Chattanooga, TN; 2000.

[Editor's note: William W. "Skip" Simonds is responsible for the development and implementation of return-to-work and vocational rehabilitation programs throughout Zenith Insurance Co. and its policyholders. He speaks and writes extensively on matters pertaining to return to work and assistive technology. He is a member of the Arlington, VA-based Rehabilitation Engineering & Assistive Technology Society of North America and has been certified in Assistive Technology Applications by the California State University at Northridge. In addition, Simonds has provided consultative input to companies such as Compaq, Microsoft, and IBM on a wide variety of return-to-work and assistive technology development issues. Simonds can be reached at (818) 251-5858.] ■

Downsized older workers at risk for stroke, MI

Need for preventive care strategies

While occupational health professionals are well aware of the increased stress levels associated with employees at risk of job loss through downsizing and other cost-cutting strategies, a new study shows that older employees are specifically at greater risk for life-threatening conditions such as stroke and myocardial infarction (MI).

A recent article in the *American Journal of Industrial Medicine* indicates that the risk of stroke associated with involuntary job loss in the years preceding retirement is more than double.¹ And while the association with MI was not statistically significant, the lead author, **William T. Gallo, PhD**, an associate research scientist in the department of epidemiology and public health at Yale University School of Medicine in New Haven, CT, says, "The results are nonetheless suggestive of MI — not statistically significant, but very close."

The study, which was funded by The Claude D. Pepper Older Americans Independence Center at Yale and by The National Institute on Aging,

analyzed data from the first four years of the Health and Retirement Survey, a nationally representative sample of older individuals in the United States. The sample included 457 workers who experienced job loss, compared with a control group of 3,763 individuals. And while Gallo's study did not specifically look at retirees, many of whom continue to have some health benefits covered by their employers, the findings suggest the same risks may be true for them as well, he reports.

Implications for occ-med

With the work force steadily aging, the prospect of a growing number of employees being at risk for MI and/or stroke should make occ-med professionals sit up and take notice. While they have no control over who is retained and who is let go, Gallo suggests there are some strategies they might adopt to lower the health risk for these workers.

"In the short term, re-employment is restorative in terms of depression and anxiety; so if possible, you'd want to get these people re-employed as soon as possible," he notes. "Short of that, you could consider preventive strategies such as health education. Clearly, we would want any known risk factor to be made known to people who are about to be unemployed. You also want to make certain providers are aware there is an additional risk factor beyond medical symptoms or conditions."

Specifically, Gallo recommends programs for soon-to-be-dislocated workers that make them aware of the potential health impact of stress associated with coming unemployment.

"On the provider side, those who are treating individuals with classic risk factors should also be asking about their employment status," he adds.

Some companies adopt strategies that enable older employees to continue working in some capacity, either part-time, as teachers or mentors, or even as volunteers. Is this a strategy that would help lower the risks for these workers?

"I think so, but I don't know that there's any evidence of that," says Gallo. "The crucial mediating evidence is the severance of workplace social interaction — all the things that give us intrinsic gratification from work. This includes the opportunity to demonstrate your skill, your mastery, your worth, and your value to the organization. The opportunity to volunteer could be somewhat restorative and might decrease your risk."

The bottom line, he notes, is that addressing

the greater health risks such employees face "should be in a company's self-interest."

There also are policy implications, he adds. "[Our findings] probably suggest extended health care plus programs to expand awareness might be important in reducing the risk of something that is debilitating or fatal," he says. "It's another risk factor [for stroke or MI] that may not be so obvious — yet it has to be considered."

Reference

1. Gallo WT, Bradley EH, Falba TA, et al. Involuntary job loss as a risk factor for subsequent myocardial infarction and stroke: Findings from the Health and Retirement Survey. *Am J Ind Med* 2004; 45:408-416.

[For more information, contact:

• **William T. Gallo, PhD**, Associate Research Scientist, Department of Epidemiology and Public Health, Yale University School of Medicine, One Church St., Seventh Floor, New Haven, CT 06510. Telephone: (203) 764-6729. E-mail: william.gallo@yale.edu.] ■

On-site clinic can build worker trust in company

Show that you are a caring employer

Many good reasons have been given for providing an on-site clinic — primary and/or urgent care — for employees. Clearly, there can be physical health benefits, and often such a benefit is appreciated by employees.

But when **Gabor Lantos, MD, MBA, P.Eng.**, an occ-health consultant in Toronto, considers the reasons for offering such a clinic, he drills down to one very specific dynamic: trust.

"It comes down to that one word," he says. "If you read the literature, whether on disability, absenteeism, or presenteeism management, there's a lot of adversity [between employer and employee]. What a primary care clinic does is establish trust over a period of time."

Lantos says with most of his corporate clients, he provides on-site clinics that are occ-health focused. "But we also provide primary care — *not* family practice — and this has worked extremely well. The employers are satisfied because it is very cost-effective, and the employees like it because it is convenient, they don't need to miss work [and lose money], and

because they have confidence in us — in contrast to an unknown urgent clinic or ER.”

Establishing a trusting relationship

Seeing individuals for non-occ issues establishes a trusting relationship, says Lantos. “If you have a service available, employees will start to use it, no matter what the existing climate is in the company,” he says. “Employees will come in if they feel dizzy, have abdominal pains, if their doc is out of town — you name it.”

By providing such a service, the first encounter with employees actually will be in pre-placement, he continues. “This gives you the opportunity to indicate there’s a caring employer, it allows the face to face establishment of a doctor-patient, nurse-patient, employer-employee relationship,” Lantos observes.

A strong rapport can be established through the clinic, he adds. “So, when you need to ask questions, or if you call to see how they’re doing, you won’t get a bad reaction from them because you’re a ‘management representative,’” he notes. “These things fall by the wayside; they realize over time that you are looking after their welfare, that you’re not taking sides. They acknowledge the fact that you call a spade a spade — that you are objective.”

Lantos adds that he’s never had problems with any of the unions involved in such arrangements. “In fact, they become staunch supporters once they see it in action,” he asserts.

Another benefit of an on-site primary care (or primary care-plus) clinic is that it can help strengthen your prevention efforts. “What everybody wants is early intervention, and this is what allows you to practice proactive prevention at the group or the individual level,” Lantos asserts. “You know the employee’s medical history before anything ever happens. If they cut themselves, and you know they’re diabetic, you have to warn them they may be a slow healer, and you follow them more closely.”

Because of the ongoing relationship, injury situations also are easier to deal with, he notes. “The employees don’t see you as a disability claims manager, but rather, as a specialist in

occ-health who knows workplace issues and how relate to individual health. This makes you able to bridge the gap between the workplace and an employee’s individual work issue — something a specialist out in the community can’t do. When a neurologist writes ‘light duty,’ people come to us; they know we’re the ones who can assign *appropriate* light duty.”

What’s more, says Lantos, there’s no critical mass in terms of company size for setting up such a clinic. “You just go into the company, conduct a needs analysis, and come up with a suggestion that will prove to be cost-effective,” he advises. “There are places where a nurse will go in a half day a week. In general, however, to make it worthwhile you usually need to have 200 or so employees. On the other hand, complex organizations with 40-50 people who, for example, deal with infectious disease issues — such as a research institute — will have a nurse go in one half-day a week, and I might go in once month.”

The bottom line, he says, is if you set up such a clinic “as professionally and as objectively as humanly possible, it works out to be a win-win.”

[For more information, contact:

• **Gabor Lantos, MD, MBA, P.Eng, Occupational Health Management Services, Toronto.** Telephone: (416) 410-5018. Fax: (416) 229-2669.] ■

Toronto nurse sues over second SARS outbreak

It could have been prevented, lawyer says

A Toronto nurse who contracted severe acute respiratory syndrome (SARS) has sued the city, provincial, and federal governments, asserting that the public health authorities halted precautions too soon and put political considerations above health and safety concerns.

She is seeking damages and compensation of \$600 million (Canadian), and has asked for the case to be certified as a class action on behalf of

COMING IN FUTURE MONTHS

■ Do self-care strategies work when targeting mental health?

■ Women and musculoskeletal disorders: How big an occ-health issue?

■ The risks and rewards of going into business for yourself

■ CDC reorganization: What are the implications for occ-health?

■ When religious principles conflict with occ-health practices

EDITORIAL ADVISORY BOARD

Consulting Editor:

William B. Patterson,
MD, MPH, FACOEM
Chair, Medical Policy Board
Occupational Health +
Rehabilitation
Hingham, MA

Judy Colby, RN, COHN-S, CCM
Manager
Glendale Adventist Occupational
Medicine Center
Burbank, CA
Past President
California State Association of
Occupational Health Nurses

Deborah V. DiBenedetto,
MBA, RN, COHN-S/CM, ABDA,
FAAOHN
Past President, American
Association of Occupational
Health Nurses
Atlanta

Annette B. Haag,
MA, RN, COHN-S/CM, FAAOHN
President
Annette B. Haag & Associates
Simi Valley, CA
Past President
American Association of
Occupational Health Nurses

Charles Prezzia,
MD, MPH, FRSM
General Manager
Health Services and
Medical Director
USX/US Steel Group
Pittsburgh

about 200 people who became ill from SARS after April 15, 2003.

The Ontario Ministry of Health has not commented on the suit. In mid-May, Ontario public health authorities declared an end to the SARS epidemic, and officials lifted the state of emergency. Hospitals relaxed their infection control precautions related to SARS.

Andrea Williams, a nurse at North York General Hospital, still wanted to wear a mask when she was admitted on May 20 for a surgical procedure, says her attorney, **Douglas Elliott** of Roy, Elliott, Kim, O'Connor in Toronto. Yet when she emerged from general anesthesia, Williams no longer had her mask and was not given a new one, her suit asserts.

The next day, public health officials alerted Williams that she had been exposed to SARS and needed to be tested. She developed SARS, became "extremely ill," and was hospitalized for a couple of weeks, Elliott reports. "If they had just been rigorous about ensuring that the epidemic was over in the first place, then all of these infections would have been prevented, [including] some deaths and very serious debilitating conditions."

In fact, nurses at North York had raised an alarm about a cluster of SARS-like symptoms in five members of a family. That turned out to be the beginning of the second wave of SARS cases.

Elliott contends that the hospital was pressured by public health authorities to relax infection control precautions because the government wanted the World Health Organization to withdraw a

CE questions

Nurses and other professionals participate in this continuing education program by reading the issue, using the provided references for further research, and studying the questions at the end of the issue.

Participants should select what they believe to be the correct answers, then refer to the list of correct answers to test their knowledge. To clarify confusion surrounding any questions answered incorrectly, please consult the source material.

After completing this semester's activity, you must complete the evaluation form provided in the **December** issue and return it in the reply envelope provided in order to receive a certificate of completion. When your evaluation is received, a certificate will be mailed to you.

1. The Gallo study showed a statistically significant increased risk of MI for older downsized workers.
 - A. True
 - B. False
2. The following are characteristics of younger workers:
 - A. Vulnerability
 - B. A sense of invincibility
 - C. A desire to please adults
 - D. All of the above
3. After workplace training, how many Harman International employees said they were more likely to be supportive of an abused colleague?
 - A. 19%
 - B. 79
 - C. 59%
 - D. 89%
4. Emotional ergonomics also is sometimes referred to as:
 - A. Mental gymnastics
 - B. Emonomics
 - C. Emoerg
 - D. Ergonalism

Answers: 1-B; 2-D; 3-D; 4-C.

travel advisory to the area. Williams still suffers from some impairment to her memory and concentration that she says is related to her SARS infection and treatment, her attorney adds. "All my clients are worried about what the long-term effects are going to be. There's still a lot of fatigue as well as other effects." ■