People-Based Safety ™
An evolution of behavior-based safety for greater effectiveness

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Behavior modification… safety management…. attitude adjustment… behavior-based safety… culture change… cognitive alignment… person-based safety… human engineering… social influence. These are all terms used to address the human dynamics of injury prevention. Each can be linked to a set of principles, procedures, or a consultant's service which defines a particular approach to managing the human side of occupational safety.

Each of these terms, and most of the accompanying materials, are insufficient. They are either too narrow and restricting, or too broad and nondirective. Some focus entirely on behavior change, while others attempt to target vague and unobservable aspects of other people, like attitudes and thoughts. Still others have the grandiose notion of directly targeting culture change.

All of these approaches are well-intentioned, and none are entirely wrong. The human dynamics of an organization include behaviors, attitudes, cognitions, and the context (or culture) in which these aspects of people occur. However, some approaches are too equivocal or ambiguous to be practical, while others may be practical but are not sufficiently comprehensive.

The Solution is Not New

More than a decade ago, I proposed the need to address both behavior-based and person-based factors to improve workplace safety over the long term (Geller, 1994). I called this approach "people-based safety" and proposed substituting empowerment, ownership, and interpersonal trust for more traditional safety jargon like top-down control, compliance, and enforcement. And I accompanied these new people-oriented concepts with practical procedures. My partners at Safety Performance Solutions began implementing these procedures in 1995 under the popular label: "behavior-based safety" (BBS).

Systematic evaluations of our implementations have enabled successive refinements of procedures, as well as the discovery of guidelines for increasing effectiveness and the long-term impact of our interventions. We also developed research-based and practical support materials for the behavior-change and culture-enrichment process.

Today we call this approach "people-based safety" (PBS). It strategically integrates the best of behavior-based and person-based safety in order to enrich the culture in which people work, thereby improving job satisfaction, work quality and production, interpersonal relationships, and occupational safety and health. The academic label for this approach is "humanistic behaviorism" (Geller, 1995a).

This presentation explains the essential principles and procedures of PBS. Let's consider seven underlying principles of PBS, with an emphasis on similarities and differences between PBS and BBS.

Seven Basics of People-Based Safety

Principle 1: Start with Observable Behavior.
Like BBS, PBS focuses on what people do, analyzes why they do it, and then applies a research-supported intervention strategy to improve what people do. The improvement of others results from *acting people into thinking differently* rather than targeting internal awareness or attitudes so as to *think people into acting differently*.

However, unlike BBS, PBS considers that people can observe their own thoughts and attitudes. Thus, people can think themselves into safer actions. In other words, self-management requires self-talk or thinking as well as self-directed behavior (Watson & Tharp, 2002).

Principle 2. Look for External and Internal Factors to Improve Behavior.
We do what we do because of factors in both our external and internal worlds. While BBS deals with only external factors, PBS teaches people how to address their internal thoughts, perceptions, and attitudes related to injury prevention. A behavior analysis of work practices can pinpoint many external factors that encourage at-risk behavior and hinder safe behavior. But, it's also possible for individuals to conduct a self-evaluation of their own self-talk and selective perception regarding safety-related behavior, and choose to make appropriate adjustments.

Principle 3. Direct with Activators and Motivate with Consequences.
Activators (or signals preceding behavior) are only as powerful as the consequences supporting the behavior. In other words, activators tell us what to do in order to receive a pleasant consequence or avoid an unpleasant consequence. This reflects the ABC model, with "A" for activator, "B" for behavior, and "C" for consequence (Geller, 2001). This principle is used to design interventions for improving behavior at individual, group, and organizational levels. It is the intervention model for both PBS and BBS.

Principle 4. Focus on Positive Consequences to Motivate Behavior.
Control by negative consequences reduces perceptions of personal freedom and responsibility (Skinner, 1971). Think about it. Do you feel more free or empowered when you are working to avoid an unpleasant consequence or working to achieve a pleasant consequence?

Unfortunately, the common metric used to rank companies on their safety performance is "total recordable injury rate" (or an analogous count of losses) which puts people in a reactive mindset of "avoiding failure" rather than "achieving success." Both BBS and PBS provide proactive measures employees can achieve in order to prevent occupational injury.

We can often intervene to increase people's perceptions that they are working to achieve success rather than working to avoid failure. Even our verbal behavior directed toward another person, perhaps as a statement of genuine approval or appreciation for a task well done, can influence motivation in ways that increase perceptions of personal freedom and empowerment. Of course, we can't be sure our intervention will have the effect we intended unless we measure the impact of our

intervention procedures. This implicates the next basic premise of PBS, which is also a foundation of BBS.

Principle 5. Apply the Scientific Method to Improve Intervention.
People's actions can be objectively observed and measured before and after an intervention process is implemented. This application of the scientific method provides critical feedback upon which to build improvement.

The acronym "DO IT" says it all: D = Define the target action to increase or decrease; O = Observe the target action during a pre-intervention baseline period to identify natural environmental and interpersonal factors influencing it (see Principle 1), and to set improvement goals; I = Intervene to change the target action in desired directions; and T = Test the impact of the intervention procedure by continuing to observe and record the target action during and after the intervention program.

The systematic evaluation of a number of DO IT processes can lead to a body of knowledge worthy of integration into a theory. This is reflected in the next principle.

Principle 6. Use Theory to Integrate Information.
After applying the DO IT process a number of times, you will see distinct consistencies. Certain intervention techniques will work better in some situations than others, by some individuals than others, or with some work practices than others. You should summarize relationships between intervention impact and specific interpersonal or contextual characteristics. The outcome will be a research-based theory of what is most cost-effective under given circumstances. By doing this you are using theory to integrate information gained from systematic behavioral observation.

Principle 7. Consider the Internal Feelings and Attitudes of Others.
Feelings and attitudes are influenced by the type of intervention procedure implemented, and such relationships require careful consideration by those who develop and deliver the intervention. This is the essence of empathic leadership taught by PBS, not by BBS.

The rationale for using more positive than negative consequences to motivate behavior (Principle 4) is based on the different feeling states resulting from using positive versus negative consequences to motivate behavior. Likewise, the way an intervention process is introduced and delivered can increase or decrease perceptions of empowerment, build or destroy interpersonal trust, and facilitate or inhibit interdependent teamwork.

The *Acting* of People-Based Safety ™

The four skill components of PBS are Acting, Coaching, Thinking, and Seeing – ACTS (Geller, 2005b). In a Total Safety Culture, people *Act* for injury prevention, *Coach* one another to identify barriers to safe acts and provide constructive behavior-based feedback, *Think* in ways that activate and support safe behavior, and focus and scan to *See* the hazards.

Behavior Change is the Bottom Line
It's fitting the components of PBS spell "acts", because safety depends upon the actions of people. Various principles and procedures of PBS target attitudes, perceptions, and thoughts. But if improvement in these person states does not result in relevant behavior change, there is no benefit to occupational safety.

Because behavior change is the bottom line, BBS has prevented workplace injuries in many organizations. PBS is not a substitute for BBS, but rather is an evolution for greater impact. For example, the typical BBS process involves interpersonal observation and behavior-based feedback. But what about the many times people work or drive alone?

PBS adds to BBS by teaching ways to implement self-coaching and increase self-accountability for safety. In this regard, it's critical to understand the three forms of voluntary behavior—other-directed, self-directed, and habitual (Watson & Tharp, 2002).

A BBS observation-and-feedback process initiates and sustains other-directed behavior. Workers increase safe behavior and decrease at-risk behavior because others – their peers – hold them accountable. With continued application of this coaching process, the proponents of BBS hope safe behavior transitions from other-directed to habitual. This objective reveals some critical distinctions between PBS and BBS.

Self-Direction is Key to Long-Term Behavior Change
Coaching is a key component of PBS, as discussed later in this paper, but interpersonal coaching is not sufficient. People are often alone in situations that require safe substitutions for at-risk behavior, and thus they need to coach themselves. This requires self-accountability and self-directed behavior. In other words, people need to believe in and own the safe way of doing things, even when the more risky approach is supported by soon, certain, and positive consequences like more comfort, convenience, and efficiency.

Self-direction requires internal justification for the right behavior. This happens when the external consequences supporting an action are not sufficient to totally justify the behavior. Too often people choose safe over at-risk acts only to obtain a reward or avoid a penalty. Programs that establish such contingencies often get the desired behavior while this accountability system is in place. But what happens when the external controls are unavailable?

The principles and procedures of PBS help people develop internal, self-accountability for safety, which leads to self-directed behavior – the optimal form for safety-related activities. The key is not to over-justify safe behavior with large incentives and severe threats, but to provide education, training, and experience that help people develop a sense of personal control over injury prevention (Lepper & Green, 1978). This includes an understanding that habits can be undesirable when it comes to industrial safety and health.

Safe Habits Are Not Ideal
The development of safe habits is a key objective of BBS. According to leading BBS trainers and consultants, the daily repetition of an observation-and-feedback process builds "habit strength" eventually resulting in the development of safe habits. This is good, but not great. Habits occur without mental awareness or thoughts, as when one buckles a vehicle safety belt without thinking about it.

Is there a disadvantage to putting oneself in automatic mode when the habit is safe? What if your buckle-up behavior is so habitual you don't notice a passenger in your vehicle is not buckled up? You could miss an opportunity to actively care for the safety of others. And you miss an opportunity to develop self-talk or thinking that supports self-direction and self-accountability.

Later in this presentation, I explain the connection between self-talk strategies and self-directed behavior when discussing the *Thinking* component of PBS. Here it's pertinent to understand and believe in the value of accompanying our safe actions with relevant self-talk, even when the behavior is routine. I hope you agree self-directed or mindful behavior is more desirable than mindless, habitual behavior.

Stimuli Do Not Trigger *Voluntary* Behavior

I've heard many BBS trainers, consultants, and students claim that certain environmental cues "trigger" safe behavior. This language, and the accompanying dialogue, implies that stimuli elicit or cause safety-related behavior to occur. This is not true.

Some stimulus events cause involuntary behavior, as when the flashing blue lights of a state trooper trigger certain emotional reactions. But drivers choose to slow down and pull over. Similarly, traffic lights do not trigger or cause intersection behavior, although they may cause an emotional rush following a driver's decision to speed through an intersection as the light changes from yellow to red.

Bottom line: There is a space between the stimulus (or activator) and voluntary behavior. Activators provide direction, but people *choose* whether to follow the direction. This choice is largely determined by perceived consequences and their relative importance to the individual. What positive consequence does the person expect to gain and/or what negative consequence does the person expect to avoid? Yes, this is the standard ABC (Activator – Behavior – Consequence) Principle of BBS, but PBS views this principle with consideration of the individual's beliefs, perceptions, and attitude.

The People-Based ABC Principle

I find the term "positive reinforcement" overused and abused by trainers and students of BBS. They seem to believe any pleasant consequence, from a monetary bonus to safety trinkets and interpersonal recognition, is a positive reinforcer. However a consequence is a reinforcer (positive or negative) only if it increases the behavior it follows (Daniels, 1989).

Trainers and students of PBS realize the reinforcing power of a consequence is in the eye of the beholder. In other words, attitudes and perceptions determine the motivating potential of a consequence. For example, the meaning of a "safety trinket" to an individual determines whether such a consequence is viewed as positive, negative, or neutral and could motivate behavior (Geller, 2005a).

It is usually impossible to determine whether the delivery of a consequence actually influences the behavior it follows. Thus, the loose use of "positive reinforcement" among BBS consultants and students is risky and often inappropriate. With PBS this mistake is not made. The term "positive reinforcement" is not used in PBS, and the impact of positive consequences on feelings or person states is entertained and appreciated.

In PBS, positive consequences are considered "rewards," and negative consequences are "penalties". If these consequences don't impact overt behavior, they will at least influence feeling states which is important in PBS. With PBS, rewards are delivered to increase self-esteem and perceptions of personal competence and control, as well as to improve behavior. Research shows these feeling states increase people's willingness to actively care for the safety and health of others (e.g., Batson, Bolen, Cross, & Neuringer-Benfiel, 1986; Geller, Roberts, & Gilmore, 1996; Michelini,

Wilson, & Messe, 1976; Wilson, 1976). Thus, PBS applications of the ABC Principle are directed to both external behaviors and internal person states.

The *Coaching* of People-Based Safety ™

Imagine a workplace where everyone feels empowered to: a) eliminate the environmental hazards within their domain of influence, and b) report those hazards they cannot control themselves. Also, imagine supervisors and line workers regularly coaching each other regarding the occurrence of safe and at-risk behavior.

More specifically, employees use behavioral checklists to observe each other's work practices and then share the results of these systematic behavioral observations in one-to-one "actively-caring" conversations. This constructive feedback session includes a presentation of the safe and at-risk behavior observed, as well as a list of workplace conditions (including management factors) that may encourage at-risk behavior or hinder safe behavior.

No directive for change is given in these interpersonal coaching conversations. The person observed is merely shown the results of the observation session, and given opportunities to explore conditions that may influence at-risk behavior. The observation checklists of a work team are turned into a designated location. They only include the name of the observers. Groups of cards are compiled, analyzed, and "percent safe scores" are graphed for group feedback. Plus, the safety-related concerns and suggestions written on the cards are summarized in reports to relevant work teams and management personnel (Geller, 1995b).

Question: Would this scenario prevent occupational injuries? I hope your common sense says "Yes." Actually, there is considerable research and real-world outcome statistics to support this answer, thereby supporting the power of this process which is the essence of BBS (Sulzer-Azaroff & Austin, 2000). Coaching is also a critical component of PBS, but PBS extends the standard behavioral approach in some important ways, as reviewed next.

Actively Caring is Most Important
The upstream leading indicators obtained from one-to-one safety coaching are invaluable. At-risk behaviors and environmental conditions needing special attention are identified, and safe behaviors worthy of recognition are noted. The numbers gained from this process enable proactive management of safety-related behaviors.

However, the human dynamics of safety are more complex than checks on a behavioral checklist, as revealed in the discussion above on the challenge of achieving a transition from other-directed to self-directed behavior. Managers use behavioral data to hold people accountable; leaders use the PBS process to inspire people to hold themselves accountable (Geller, 2000). How? By putting special focus on the actively caring process of interpersonal safety coaching.

Everyone Coaches
You can obtain sufficient upstream behavioral numbers by assigning coaching duties to a select sample of a work force. Thus, some BBS consultants advocate training a small percentage (e.g., 10%) of the line employees to be safety coaches. This approach can save both time and money, and is "sold" on the appearance of efficiency.

It is also easier and more efficient to exclude management from the coaching process. Thus, a number of BBS consultants have trained only the hourly work force to conduct behavioral observation and feedback sessions. But these efficient shortcuts limit the development of self-accountability and can have only short-term benefits, as reflected in the common "pencil-whipping" label given to many of these BBS programs.

The PBS vision is that everyone coaches for safety, managers and line workers alike. Why? Because coaching develops the self-directed accountability needed for long-term impact of a behavioral coaching process. Coaches feel obligated to adopt the principles and procedures they teach and advocate. But, of course, such large-scale interpersonal coaching requires substantial trust-building—a critical PBS skill (Geller, 1999).

Depending on the work culture, especially the level of interpersonal trust, it might be necessary to start with a select number of coaches and to exclude managers from this process. But with PBS, everyone learns the principles and procedures of behavior-based observation and feedback, and it is expected that eventually all employees will coach each other for injury prevention.

Safety Coaching Can Be Informal
PBS teaches and advocates both "formal" and "informal" coaching. Whereas formal coaching parallels the standard BBS application of a critical behavior checklist, informal coaching involves brief personal conversations to maintain daily attention to the safe and risky behaviors and conditions throughout a workplace. By focusing on the process more than checklists and numbers, PBS increases the quantity and quality of informal coaching. This leads to self-coaching, an essential safety process for the lone worker (Geller & Clarke, 1999). I discuss self-coaching below under the *Thinking* component of PBS.

Empathy is Essential
Students of PBS learn the limitations of the Golden Rule—"Treat others as *you* want to be treated". They aim for the Platinum Rule—"Treat others as *they* want to be treated". The difference between these two philosophies is dramatic, and reflects the essence of empathy.

It may be efficient to assume people want the same things you want and to act accordingly. However, it's more effective to discover other peoples' needs and perceptions before choosing a treatment or intervention approach. Even when the eventual tactic is the same as you would have selected, because you asked, you can expect greater acceptance, appreciation, and ownership.

Empathy plays a significant role in almost every component of PBS, from empathic listening to empathic leadership. The Platinum Rule is especially pertinent for PBS coaching. Like client-centered or humanistic therapy (Rogers, 1957, 1977), the focus is on the perceptions and feelings of the individual being coached. Behavior and environmental conditions are observed from this person's perspective, and feedback communication is supportive and nondirective. Feedback is not delivered to suggest behavior change, but rather to empower personal responsibility and self-accountability to improve.

The *Thinking* of People-Based Safety [TM]

At workshops and keynote addresses on PBS, I often ask the audience whether they buckle their safety belts automatically, without thinking. Most raise their hands to affirm their buckle-up habit for

safety. My reaction: That's good, but not great. It would be better to think about what you're doing while fastening your safety belt.

Conscious competence is usually better than unconscious competence, especially when the behavior is safety related. I'd like to convince you of the validity of this perspective, which deviates markedly from the philosophy of BBS. As mentioned earlier, BBS promotes development of safe habits as a primary objective of applying BBS tools.

Thinking Safe Behavior
Thinking is self-talk or internal verbal behavior. I advise my audiences to tell themselves what they are doing when they perform a safety-related behavior. For the safety-belt example, I recommend self-talk that acknowledges the behavior—"I'm buckling up for safety".

When safe behavior is accomplished for positive consequences, it is beneficial to also verbalize the rationale for the behavior. What are your personal reasons for choosing safe behavior? For safety-belt use, you might say to yourself, "I'm buckling up to do the right thing for safety—to be a competent driver" or "I'm buckling up to set the safe example for other passengers in my vehicle, and for anyone else who might see me driving."

It's possible, however, your safe behavior is not self-directed, but other-directed. In other words, you might be working safely because someone other than yourself is holding you accountable. For example, some might buckle up to avoid a fine, as implicated by the popular U.S. slogan: "Click-it or ticket".

If your safe behavior is other-directed, your self-talk should not include the external controls influencing your behavior. Until you can give a self-directed rationale, you should only tell yourself you are performing the behavior. Forget the external, other-directed reasons for your safe behavior. Here's why.

Self-Direction and Self-Accountability
When people are mindful about their behavior they are more likely to avoid human error (Langer, 1989). Self-talk enables the adjustment of behavior per situational factors. It could call your attention to other people not following your safe example, such as a passenger in your vehicle who is not buckled up.

This behavior-based self-talk increases your awareness of the best way to perform under certain circumstances. But there is a more profound reason for thinking about your safe behavior. Your self-talk influences self-persuasion (Aronson, 1999) which in turn enhances self-accountability for safety. Indeed, we hold ourselves accountable by talking to ourselves. What kind of safety self-talk builds our self-accountability or responsibility for safety?

Outside vs. Inside Control
The reasons we give for our behavior determine the degree to which our behavior is other-directed or self-directed—whether we are accountable to others or accountable to ourselves. This is not an all-or-none state. We can be motivated by both outside and inside controls. But the more our behavior is directed and motivated from within ourselves, the more apt we are to perform the behavior when alone and only accountable to ourselves. This is the ideal safety state for the lone worker.

How do we put ourselves in this state? You know the answer—self-talk. We talk ourselves into being self-accountable. Some situations facilitate this thinking; some do not. In general, self-accountability thinking decreases as the degree of external negative control increases (as in severe threats and strong enforcement), and people's perception of personal choice decreases (Festinger & Carlsmith, 1959; Lepper & Green, 1978). Also, the more a behavior aligns with our perception of who we are—our core values—the greater the self-accountability for that behavior (Bem, 1972).

Self-Perception, Personal Values, and Self-Accountability
Who do you think you are? In other words, what kind of person are you? Do you hold safety as a core value? How do you know?

Our behavior defines us. We are the kind of person who does the things we do. However, there are exceptions. When we feel our behavior is controlled entirely by external factors, we do not view that behavior as a reflection of who we are (Bem, 1972).

When we perceive our behavior as self-directed, we use that behavior to define our attitudes and values. In other words, the behaviors we choose to perform provide information for our self-perception. These behaviors are certainly motivated by expected consequences, both intrinsic and extrinsic. The key is to perceive some degree of choice, and perception of choice is stifled by enforcement or negative reinforcement contingencies, as when we act in a certain way to avoid a negative consequence (Skinner, 1971).

Thus, our self-directed behavior informs our self-perception and our core values. And, our self-perception and personal values influence our behavior. We strive for our behavior to be consistent with our values, and vice versa. When we perceive an inconsistency between behavior and the values that define us, we experience tension or cognitive dissonance (Festinger, 1957). We direct our self-talk to reduce this negative state.

Bottom line: The rationale we provide ourselves for performing safe behavior determines whether we feel self-accountable and will continue to perform that behavior in the absence of an external accountability system. And, of course, the rationale for our behavior is determined by our thinking or self-talk. PBS teaches the kind of thinking needed to develop self-accountability, as well as the kinds of environmental/management conditions/systems needed to promote and support self-accountability thinking.

The *Seeing* of People-Based Safety ™

As discussed earlier, PBS teaches the Platinum Rule—"Treat others as *they* want to be treated". This principle is founded on the need to understand the perceptions of others before making intervention decisions that impact their lives. To illustrate this perspective, I tell audiences of a memorable experience I had in third grade. My teacher called me to the front of the class to recognize me for the superb job I did on my homework assignment. Later, several classmates beat me up in the playground.

I did not want public recognition in the classroom. But, my teacher did not see the classroom situation as I did. Perhaps she had heard that silly pop-psychology slogan, "Reprimand privately and recognize publicly." She meant well, but did not consider my perceptions before implementing her intervention. Understanding workers' perceptions is a critical challenge of PBS, both when developing and delivering a process to support safe behavior and/or to correct at-risk behavior.

Perception Surveys
Perception surveys are useful in assessing workers' views of safety at their facilities before and after the implementation of a process to improve safety-related behavior. Pre-intervention surveys inform the design of intervention strategies, and comparisons of pre- and post-intervention surveys estimate the diverse impact of an intervention on people's perceptions, attitudes, and values.

My SPS partners have been applying the same comprehensive perception survey for over a decade, and thus have a database of more than 8.5 million safety-related perceptions across a broad range of industries worldwide. These culture surveys are invaluable for benchmarking, and for customizing intervention strategies for various types of operations within a particular work culture. Bottom line: People's views of safety-related issues vary widely and should be considered when designing and evaluating procedures for improving safety performance. Let's consider the power of perception in influencing safety-related behavior.

Risk Perception
Researchers have identified a number of psychological factors that influence an individual's perception of risk and safety-related behavior (Slovic, 1991). High on this list is the role of familiarity. The more experience we have regarding a potential risk, the less risk we perceive. You can appreciate this principle by recalling your safety-related behaviors when you first started to drive and comparing them with your current driving. As experience increases our perception of control, it also increases the possibility of risk-taking.

When reviewing the thinking component above, I discussed the importance of perceived choice when transitioning from other-directed accountability to self-directed responsibility. Here, consider how less risky those hazards we choose to experience seem (on the road, in the workplace, and during recreation) compared to those hazards we feel compelled to endure (like food preservatives, environmental pollution, and earthquakes).

Most practical from an intervention perspective is the fact that perceived risk is raised more easily with individual case examples than group statistics. This suggests a shift in format for group safety presentations. Specifically, safety meetings and interventions should focus on individual experiences rather than numbers. This implies a need for the work culture to encourage the public reporting of close calls and injury experiences. When people hear the personal perceptions and regrets of the recipients of a workplace injury, they imagine themselves in a similar unfortunate circumstance. Their perception of risk is thereby enhanced, and safe behavior increases.

A Just and Fair World
The common belief in a just and fair world (Lerner, 1980), has intriguing implications for industrial safety. I believe this perception contributes to the common perspective, "it won't happen to me". Since most believe they are essentially good and therefore undeserving of a bad-luck injury, they expect the "other guy" to get hurt on the job – not them. Everyday experiences usually support this perception. Injuries do happen, but not to most individuals, even when they take risks.

Also, the public generally perceives workplace injuries as justifiable. They are indiscriminately distributed among workers who take risks, and thus deserve what they get. This perception lessens the outrage people feel when someone gets hurt on the job.

Furthermore, the benefits of risky work behaviors are obvious to all (from individual comfort, convenience, and efficiency to increased output). Aren't injuries just the cost of doing business? This public perception can make it difficult to get financial resources for corporate safety efforts.

Perceptions of Protection
When you feel protected, do you take more risks? Many people do. Such increased risk taking is due to perception. People presumably accept a certain level of risk, which varies widely across individuals. This perception is influenced by a number of factors, from personality characteristics to prior training and experience. When their perception of risk changes, people change their behavior accordingly (Adams, 1995; Wilde, 1994).

The implication of this phenomenon is that making a job safer with machine guards or PPE lowers people's risk perception and thus can lead to an increase in at-risk behavior. This change in perception and behavior as a function of protection is intuitive and is supported with sound research (Janssen, 1994; Streff & Geller, 1988). However, the increase in risk-taking and injuries does not negate the benefits of the protection. Although football players increase at-risk behaviors when suited up with protective gear, they sustain far fewer injuries than they would without the PPE.

Since risk perceptions and safety-related behavior are influenced by the use of protective devices, safety pros need to be aware of this phenomenon and adjust their training programs and coaching procedures accordingly. For example, when safety guards or PPE are added to a work task, behavioral observers should be alert to the possibility of extra risk-taking related to the behaviors protected by the new safety equipment.

Perceive and Seize the Moment
I'd like to review one more safety-related perception; one that contributes to many injuries. It is a perceptual orientation that makes me injury prone. Specifically, my Type-A personality (Jenkins, Zyzanski, & Roseman, 1979) and need-to-achieve attitude (Atkinson, 1957, 1964) facilitate a future-oriented mindset that gives too much attention to the future and too little on the present. I can still hear my mother admonishing me to "stop and smell the roses".

Perceiving and seizing the moment means being mindful and attentive to our ongoing behavior in every respect. We are using all relevant senses to recognize what we are doing and where we are doing it. Our antennae are fully extended, enabling us to fully encounter the present. Now that's a perceptual orientation that surely makes a mishap unlikely. Procedures and tools of PBS help to initiate and support present-focused perceptions and mindfulness.

In Conclusion

I hope you see from this overview of PBS that this approach embraces the human side of our coworkers, far beyond that addressed by BBS. Yes, this includes observing behaviors and giving feedback – the principles of BBS. But PBS is much broader in scope than defining behaviors, handing in observation cards and giving feedback.

You see, at the heart of PBS is the need for us to view each other as people – rather than objects. And in safety, people can indeed turn into objects – statistics on record-keeping forms, signatures on policies, or a BBS numbers game of counting the observations.

PBS requires a very sincere, honest appreciation of other people. It requires an understanding and acceptance of the internal feelings, needs and perceptions of other people. Each person's uniqueness is recognized and appreciated.

That's just the starting point. To improve workplace safety, PBS builds and strengthens feelings of self-effectiveness, personal control, optimism, and belongingness. For employees to work safely over the long haul, often without direct supervision, we must nurture personal pride, dignity, and self-respect. Yes, we can do this for each other!

How? First by viewing our organization as a family of people working together. This is a key aspect of PBS. Think about it. We see our own family members as people with their own unique set of feelings and beliefs, and we never hesitate to actively care for their health and safety.

But we must do more than respect people for the individuals they are. We must go into action if we want to improve safety. Actively caring behavior is essential to the success of PBS. Actively caring behavior in an organization increases directly with the number of employees, including managers, who view their coworkers as family. So you see, PBS enables us to successfully approximate a family atmosphere in the workplace.

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