

Management's guide to behavior-based safety observations

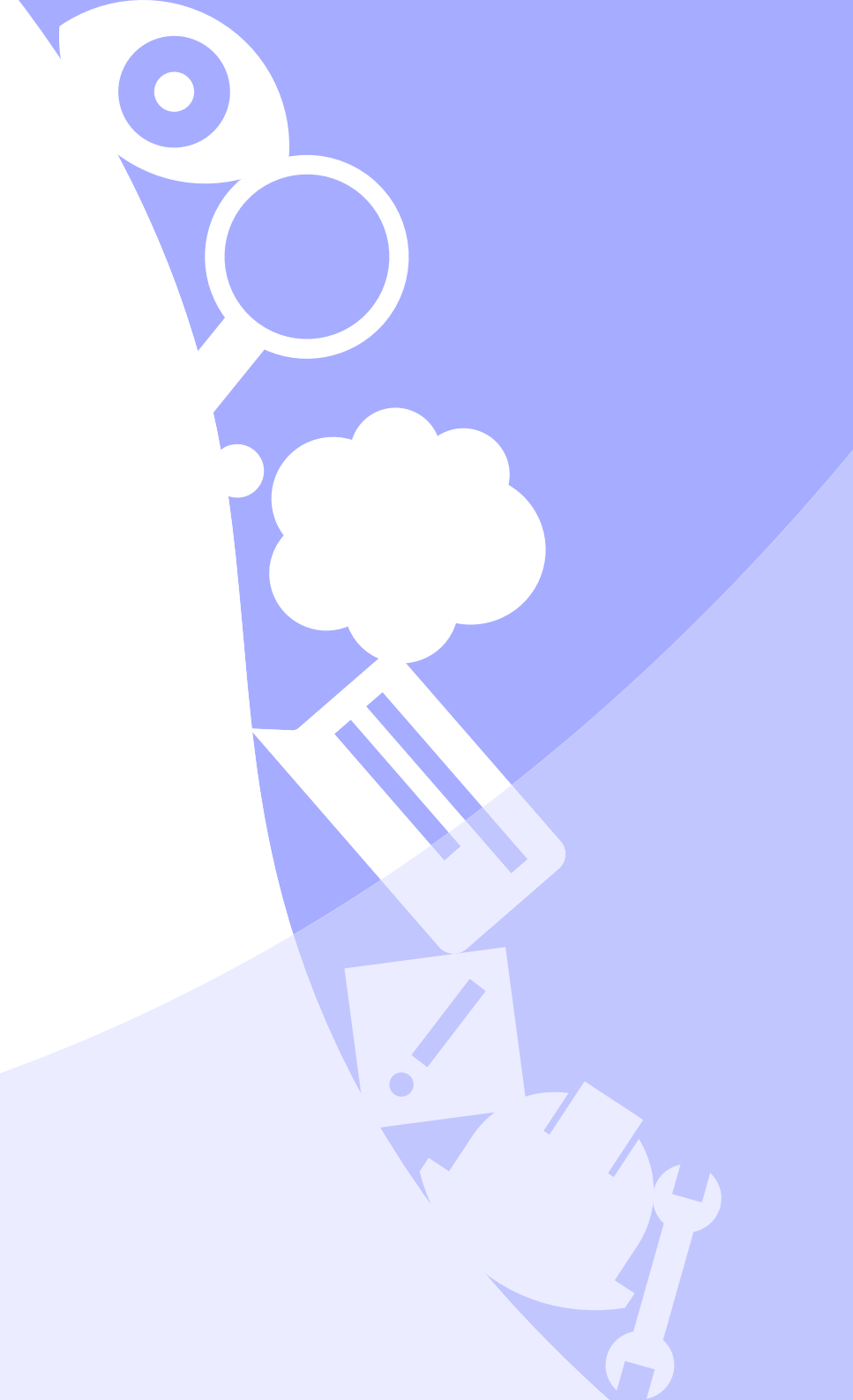


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Introduction

Every day we're faced with hundreds of choices, the likes of which may have a profound impact on the course of our lives. One small lapse in judgement can turn a seemingly benign situation into one that may have fatal consequences. As humans, we're blessed with the capability to use rational thinking to make these decisions – but what's rational to one person may not be rational to another.

Organizations first need to understand the reasons why workers use unsafe actions by analyzing the causes of each unsafe behavior. Once those causes are determined, the organization gains a better understanding of exactly why workers make the decisions they do. This behavior-based safety analysis enables organizations to better predict unsafe behavior, and to influence workers to make safe decisions.

To put it simply, a properly executed behavior-based safety program focuses on what people do and more importantly, why people do it. It uses an empirical and objective data-driven strategy to improve worker decision-making. While there are many different strategies that a company can employ to improve their safety practices, if implemented properly, BBS may be effective as a tool to reduce workplace incidents. However, through our experience with thousands of companies in the Oil and Gas and Construction industries, we've come across very few who effectively use a behavior-based approach to safety.

While some people, including managers and business owners believe that workers are to blame for making unsafe decisions, a properly implemented behavior-

based model suggests that the failure is a result of a breakdown of the entire system. While one argument is that since workers have been properly trained on how to perform their job safely, common sense and proper training are enough for the worker to make a safe decision.

Conversely, in order to properly manage and mitigate risk for the entire system (i.e. all decisions by everyone in the company), it's important to recognize that each decision is a result of a multitude of factors that a worker would take into consideration when making a decision on how to perform the task. If management observe unsafe behaviors and take the time to understand the reasons for those behaviors, they can use the information to understand why those decisions are being made and influence the workers to make safe decisions in the future.



Identification and analysis of consequence

When a worker is faced with performing either a safe or unsafe behavior, their decision is based on a number of factors which include the training they have had, the processes in place etc. For example, an employee needs to climb stairs and is faced with the decision of either skipping every second stair or taking them one at a time.

An analysis of the consequences of skipping stairs is as follows:

Skipping stairs

- **Get to the destination faster**
- **Praise from supervisor for punctuality**
- **Keep up with peers**
- **Avoid being teased by peers for being slow**
- **Get hurt**

In [Safe by Accident](#), a book written by behavioral experts Judy Agnew and Aubrey Daniels, an argument is given that decisions are made by weighing three important variables related to the consequences of the decision, which they call a 'PIC/NIC analysis'. The analysis consists of 3 questions:

1- Whether the consequence is **positive** or **negative** to the performer

2- Whether the consequence is **immediate** or in the **future**

3- Whether the consequence is **certain** or **uncertain**

They point out that immediate consequences are more powerful than future consequences, and that certain consequences are more powerful than uncertain ones. They argue that consequences that are both certain and immediate are the most powerful, and therefore most likely to influence a person's final decision. Conversely, consequences that are uncertain and likely to occur in the future are weak, and therefore less likely to influence a decision.



Let’s take another look at the consequences of skipping stairs by taking into account the three variables.

Consequences of skipping stairs

	P/N	I/F	C/U
Get to destination faster	P	I	C
Praise from supervisor for punctuality	P	I	C
Get in trouble for unsafe behavior	N	I	U
Avoid being teased by peers for being slow	P	I	C
Get hurt	N	I	U

P/N = Positive / Negative – **I/F** = Immediate / Future – **C/U** = Certain / Uncertain

The above analysis shows that the more powerful (I and C) consequences are associated with the unsafe behavior. The exact same analysis can be completed for any behavior in the workplace. A less obvious behavior that Agnew and Daniels point out is an executive weighing productivity much higher than safety.

Consequences of weighting productivity higher than safety

	P/N	I/F	C/U
Seeing a good production report	P	I	C
Better long-term productivity	P	F	C
Increased profits	P	F	C
Company stays competitive	P	F	C
Shareholders are happy	P	F	C
Increase incidents	N	F	U

P/N = Positive / Negative – **I/F** = Immediate / Future – **C/U** = Certain / Uncertain

In the above example, if the executive is rewarded by the Board of Directors based on financial and operational metrics, the more powerful consequences influence the decision towards weighing productivity higher than safety. This is a logical conclusion considering the way that the executive is compensated. By understanding the relative power of an action’s consequences, we can actually predict the way workers behave. By changing the relative power of the consequences, we can influence safe behaviors in the workplace.

Three ways to put behavior-based safety into action right now



Many essays and books have been written about behavior-based safety. Each publication goes into depth about the various theoretical and concrete ways to apply behavior-based safety in the workplace. From our perspective, there are three important pillars to the research, which we've outlined below and which we believe are actionable and will provide an immediate and significant impact to the organization.

Include safety in company organizational objectives

Using proper communication techniques, it's important for management to understand how the objectives of the organization (influencers, rewards, and KPIs) have a profound impact on whether employees make safe decisions. By making operational efficiency a KPI and not safety, executives are requiring employees to make decisions that favour one or the other.

Organizations that make employee safety at the same level as organizational objectives, enjoy higher operating income and higher margins. If management use influential language, based on the executives' own KPIs, safety as an organizational objective can and will be achieved.

Look above the worker's actions when analyzing incidents

When faced with an incident, management must gain a deep understanding of the situation through interviews and proper investigations. This understanding allows management to fully analyze every decision that contributed to the incident. It's not acceptable to merely look at the immediate events prior to the incident. Management must also examine all of the decisions that contributed to the unsafe behavior, including those made by managers, executives, and even safety professionals themselves.

Each decision should be analyzed to determine why the decision was made and what can be done to decrease the likelihood of making the same decision in the future.

Remove the word punishment from your vocabulary

Punishment is often used to correct an undesired behavior. While punishment may yield the benefit of providing evidence that action has been taken, resisting the use of punishment and instead



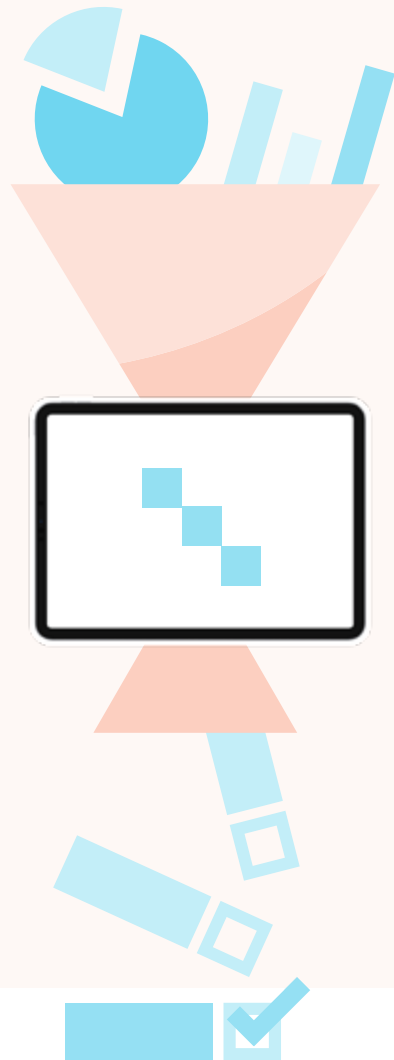
correcting the broken system will provide for continuous improvement within the workplace.

Very few of the safety professionals we interact with relish the idea of being a 'safety cop'. Unfortunately if punishment is the primary corrective action when an incident occurs, workers will perceive the job of the safety professional as being just that – policing the workplace.

Resisting the impulse to punish the employee who was involved in an incident, allows organizations to develop a true accountability framework. The manager in charge of investigating an incident should look beyond the worker to the decisions that were made by shareholders, executives, and management which resulted in the worker's unsafe action.

The idea of looking 'up and out' is one that both management and other thought-leaders believe is pivotal to the success of a safety program. Sidney Dekker, professor and best-selling author on human factors and safety is quoted as saying, "Don't ask who is responsible, ask what is responsible". The actions of humans are a result of the system within which they find themselves, including their tools, training, and manager's decisions. A disruption in the system is responsible for encouraging the behavior of the worker. By properly investigating unsafe behavior and understanding the consequences that lead to the unsafe behaviors, management are able to correct problems upstream.

How to use a formal corrective action process to encourage safe behaviors



Using a properly managed corrective action process encourages companies to practice continuous improvement. It's no longer enough to simply identify tasks for employees to complete. A corrective action starts with the collection and analysis of field-level data which allows someone to understand the reasons why the unsafe behavior occurred. Only after all of the reasons are understood can management outline the appropriate tasks to correct the unsafe activity and ensure that the process, including outcomes, are recorded in the company's safety management system.

“Organizations that optimize their learning from experience will outperform those that do not. Those that do not are digging their own graves by making it easier for their competition.”

William Corcoran

PhD. President of Nuclear Safety Review Concepts

Collecting and analyzing field level data

First and foremost, management must observe and analyze the unsafe behaviors that exist in the field. Some companies have a strict policy that requires managers to complete daily field-level observations and inspections. However, completing inspections only serves to collect data; it's equally if not more important to gain insights from inspection results. Without analyzing the data, the inspection itself serves only as a pencil-whipping exercise.

Many companies are moving from a paper/clipboard-based inspection program to one that uses an iPad/ iPhone or Android device to capture and analyze data in real-time. Two-thirds of North American adults carry a smart phone, which means there's a tremendous opportunity to use an app to make work easier. More importantly, the application you use must have capability to organize and analyze the field-level observations.

Again, observations are useful, but without careful analysis of the data and effective follow-up accountability, they are of little value.

Outlining tasks to correct the actions that led to the unsafe behavior

The best companies understand that corrective actions are not an administrative burden, but rather a tool used to continually improve the organization, ensuring they remain best-in-class. Your company is going to make mistakes. This is a fact that cannot be disputed. However, industry leaders and their forward-thinking executives encourage a formal process to learn from those mistakes. In occupational health and safety, leaders must identify the tasks that workers, managers, and executives should complete. There are a number of publications that detail best practices for creating corrective actions, but all have the same desired result: to identify the gaps in the safety program and as an outcome, strengthen the system. Taken one step further, best-in-class companies use tools to properly organize their corrective actions so that they can trend the data and publicize the results to celebrate key improvements to the overall system. Only with a strong, formal corrective action process will a company be in a position to continually improve.

Analyzing the data to understand the reasons why the unsafe behavior occurred

The consequences of each unsafe behavior should be analyzed in order to determine which action should be taken to reduce the likelihood that the behavior will occur in the future.

Recording the corrective action as part of your company's safety management system

Lastly, management should ensure that all information is properly captured as part of their safety management system for future reference. A safety management system provides a way to identify hazards and control risks while maintaining assurance that the hazard controls are effective. As with all management systems, a safety management system provides for goal-setting, planning, and measuring performance.

A safety management system is only effective if managers are properly recording data and using that data to make decisions and change behaviors. For example, if one of your managers observes a worker failing to use fall protection equipment, the observation is recorded, the situation is analyzed and corrective action is issued. This process can be identified as a hazard mitigation technique

and should be recorded as part of your safety management system for future reference. If you or the management at your company are not recording all of the actions taken to manage hazards in the business, you may find yourself unable to prove to stakeholders that your company did what was reasonably necessary to manage and mitigate risk. The safety management system should be continually refined based on the repository of hazard mitigation techniques that you've completed since inception.

Conclusion

Behavior analysis is an important part of maintaining a world class health and safety program but can only be implemented if the safety leaders, employees and most importantly executives make safety the company's number one priority. Without buy-in from everyone in the organization, friction will occur and will prevent continuous improvement. Properly analyzing the reasons why people make decisions is fundamental to changing behavior in the workplace and should be encouraged by everyone to promote industry best practices.



[Connect with our team](#) to learn more about how we can help you on your journey to creating a safer work environment.



About EcoOnline

EcoOnline is a leading provider of technology-led risk management solutions providing clients with advice, expertise and support to help them identify and mitigate risks, navigate compliance and keep people safe. It supports clients with a wide range of risk management services, including products across Supply Chain Management, EHS Software, and Asset Inspection Systems.

Our people are at the heart of our business, building strong relationships with our clients to understand their needs, minimize risks and navigate compliance through our in- depth knowledge of your sector, regulations and challenges.

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