

EHS Management Software Buyer's Guide



Introduction

Reporting workplace injuries and illnesses to OSHA is a requirement, and for good reason. There were 2.8 million workplace injuries and illnesses in 2022, a 7.5% increase from the previous year¹.

To put into perspective how big a deal that is, consider the cost of non-compliance²:

**OSHA Penalties are
\$16,131 per violation**

**Repeated or Willful Penalties are
\$161,323 per violation**

And that doesn't even include workers' compensation settlements, which cost an average of \$41,757 per claim³. But consider that the nature of an injury dramatically affects the cost. Injuries that result in amputations, for example, cost an average of \$126,033 per claim.

Proper reporting and management of health and safety data is essential to maintaining safe workplaces and managing the costs of workplace injury. In this guide, we outline the most important features and functionality for EHS software and how Vector EHS Management can support your business.

Whether you are looking to replace manual processes or looking to upgrade your solution, this buyer's guide will help you find the best safety management solution for your business.



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What is EHS Management Software?

Environmental, Health, and Safety (EHS) Management Software is a type of technology used to manage all regulatory compliance, risk, and sustainability data for an organization.



A Comprehensive Tool



**Identifying,
assessing,
and mitigating
workplace
hazards**



**Facilitating
efficient
communication
of risks**



**Ensuring
adherence to
regulatory
standards
(e.g., OSHA)**



**Establishing
consistent and
accurate
compliance
reporting**

EHS Management solutions are primarily used to maintain regulatory compliance by recording and reporting workplace incidents to OSHA, performing inspections, and monitoring safety performance metrics.

The goal of EHS software solutions is to create safer work environments, proactively manage risks, and demonstrate a commitment to employee well-being.

Who Needs EHS Management Solutions?

There are numerous industries that benefit from EHS software. OSHA compliance is a major driver and OSHA's updated electronic recordkeeping requirements⁴ include a wide range of high-risk industries, including:



Construction

In 2023, construction had more fatalities than any other industry sector⁵. Many of these are from the same types of incidents—OSHA's Fatal Four.



Transportation, Distribution, and Logistics

In 2020, there were 206,900 total recordable cases of nonfatal injuries and illnesses and 846 fatalities in this industry⁸.



Chemical Processing

In the U.S., we're averaging one chemical accident every two days⁷. This includes the transportation of hazardous chemicals, chemical plant safety, and improper disposal of waste.



Oil and Gas

In 2022, the rate of job-related injuries in oil and gas was 1.8 per 100 workers⁹. This increased in correlation with increased exploration and production activity.



Industrial Manufacturing

In private manufacturing, there were 373,300 total recordable cases of nonfatal injuries/illnesses (2020). Of those, 135,900 had days away from work⁶. This results in costly downtime and workers' compensation claims.



Mining

Mining fatalities rose nearly 21.8% from 2020 to 2021. Prior to MSHA, in 1977 there were 242 recorded fatalities in mining¹¹. There were 42 in 2023. This proves that safety standards and reporting matter.



Pulp and Paper

Pulp and paper manufacturing is very hazardous due to massive weights and falling, rolling, and/or sliding pulpwood loads. Workers may be stuck or crushed, suffer lacerations from misuse of equipment, etc.



Utilities

There were 29 fatalities in the utilities industry¹⁰ in 2019, which has steadily increased to 50 in 2022.

Benefits of EHS Management Software

EHS Management Software is a powerful tool for any organization that wants to ensure company-wide employee safety, as well as continued compliance with regulatory standards. An electronic, centralized system for the management of all safety-related information will carry significant benefits for any organization, including:



Fewer safety-related incidents, resulting in fewer claims and fines



Streamlined safety processes



Elimination of data duplication and manual data entry



Consistent incident reporting



Accurate and real-time safety performance metrics



Increased transparency into safety issues and resolutions



Risk mitigation through ongoing compliance and corrective actions



Increased employee engagement with safety programs

Steps for Buying EHS Management Software

Because manual reporting and tracking is time consuming and prone to errors, having a safety management system is becoming more and more essential. To select the best EHS software for your business, follow these steps.



Step 1: Build Your Internal Evaluation Team

To select the right EHS solution for your business, it's important to include the right internal stakeholders in the decision-making process. This will likely look different based on the size and structure of your organization, but there are a few key individuals to consider:

Stakeholder	Buying Stage	Role
EHS Team Lead	Selection Process Onwards	Should lead the evaluation, selection, and implementation process.
EHS Team Members	Selection Process Onwards	Provide feedback on features/functionality they need to do their jobs. As primary users of the tool, this should be heavily weighted in the decision.
IT Team	Decision Making	Provide guidance on implementation and the organization's security and technology requirements.
Procurement	Decision Making	Partners with the EHS team lead to select a vendor, negotiate terms, and ultimately secure the product.
Executive Leadership	Decision Making	These individuals are likely your final decision maker or will greatly influence the final decision. They will help choose between top vendors and sign off on budget.
Other Relevant Department Managers	Decision Making; Testing	If other teams will be using the tool, consult with their team leads for feedback on features/functionality they will need to do their jobs.
End Users	Go Live	Train end users on how to use the platform successfully. Spend time collecting their feedback on the platform to improve training and utilization.

It is important to include key stakeholders who will be responsible for using the tool and reinforcing its use and benefits to your organization. However, avoid over-complicating the buying process by *defining the key decision makers* whose approval is required. All other stakeholders should have input where appropriate.



Step 2: Define Your Ideal Solution & Goals

Once you've put together your team, the next step is to create a list of requirements for your safety management needs before you begin evaluating different solutions.

This starts by identifying the problems you are trying to solve. For instance, do you need to:

1. **Replace manual processes to save time and reduce recordkeeping errors?**

2. **Reduce safety incidents with better awareness, reporting, and corrective actions?**

3. **Improve leadership visibility into safety issues with improved reporting?**

4. **Increase efficiency by automating reporting and incident management?**

5. **Identify areas of improvement within your current safety program?**

Document the problem you are trying to solve, and then create SMART (specific, measurable, attainable, relevant, and time-bound) goals for your ideal EHS solution.

It can be helpful to rank these goals in order of priority and to tie them back to larger company objectives. This will help you choose between different EHS solutions.

Different software providers have strengths in different areas, and often different features and functionality. Keep in mind that many vendors will be able to meet your criteria but may accomplish them through different processes.



Step 3: Evaluate EHS Software Providers

There are numerous EHS Management solutions on the market. It's easy to feel overwhelmed by choice when many of these solutions have similar capabilities. However, certain modules in an EHS solution aren't negotiable, this includes:



Inspections

Ability to schedule, track, and record any inspections. Should allow you to easily create, import, or configure checklists based on your specific needs.



Corrective Actions

The ability to create and assign specific remedial actions to avoid and correct hazards in the workplace.



Intuitive Reporting

Dashboards should include pre-built metrics that help you track important safety performance statistics. You should also be able to create custom reports to track specific KPIs that matter to your business.



Incident Management

Allows you to track incidents and create claims, including any photos and attachments required. Should easily enable you to create accurate OSHA recordkeeping forms that comply with OSHA electronic recordkeeping requirements.

To help you find the EHS solution that best matches your company's needs, use the following criteria:

Criteria	Definition	What to Look For
User Experience	How easy to use and intuitive the software is.	• Is the experience user-friendly for both end-users and administrators? • Is it easy to log in and use? • Are buttons, fields, and icons in intuitive places?
Configurability	The ability to use tools within the system to modify features / behavior to fit your needs.	• How easily can admins make changes and to what extent? • Can fields be renamed, edited, added, moved, or removed? • Can admins make changes to forms and checklists? • How much control do admins have over incident workflows? • To what extent can admins edit email templates and notifications?
Security and User Access Levels	The ability to assign permissions and user roles to control the amount of administrative access a user has.	• Does the system come with out-of-the-box and/or configurable user roles? • Are the user roles easy to assign / change? • Does the system allow configuration of your own user roles? • Can roles be set up to protect sensitive user information?
Workforce Organization and Hierarchy	The ability to organize employees in your workforce for easier reporting.	• Does the system allow you to organize your workforce based on key demographic information like job title, department, site, etc.? • Does the software integrate with existing systems such as HR, payroll, etc.?
Mobile Functionality	Software designed and optimized for use on mobile devices (phones, tablets) not just personal computers.	• Can the software be accessed on smartphones and tablets? • Is there a mobile app for field/offline use? • Does the app cost extra? • What other features does the mobile app offer? (e.g., taking pictures to attach to forms)
Future Growth and Scalability	A solution that is continuing to grow, receives support, and scales with your organization.	• How often is the software updated? • How often are new features delivered? • How are customers notified of new features? • Can the product scale with your organization to accommodate more teams/users?
Customer Support	Does the vendor have a proven track-record of providing high-quality support and high levels of customer satisfaction?	• What kinds of customer support does the vendor offer? • How responsive are they? • What kind of implementation support do they offer? • Do they offer an online knowledge base and other resources?

About Vector EHS Management

Vector EHS Management supports hundreds of thousands of worksites throughout North America and is trusted by some of the world's largest brands as well as local businesses to minimize risks so they can focus on what's important—their core business, employee safety, and day-to-day operations.

Vector EHS Management connects all areas of safety into one **easy-to-use platform**.

Manage your entire environmental health and safety program in our **configurable system** to save time, reduce risk, and improve efficiency in your safety department.



“With Vector EHS Management, we make sure no part of our safety program is overlooked, whether it’s notifying us of potential hazards or scheduling regular inspections.”

Safety Specialist, [LES](#)

Customer Results Achieved with Vector EHS

78%

Reduction in employee injuries within first five years of utilization

57%

Reduction in average annual workers compensation payouts since implementation

Significant decrease in time and resources spent to conduct and complete an incident investigation (reduced time spent from 18 days to 4 days)

Our Platform's Ten Core Modules Provide Customers with All the Tools they Need

1.

Incident Management

Record, track, and analyze workplace incidents including near misses, vehicle accidents, and worker injuries, and easily link claims, assets, and attachments to each incident report. Streamline incident investigations and easily achieve compliance with OSHA recordkeeping and reporting requirements.

2.

Inspections and Audits

Schedule, track, and record any type of inspection with our Inspections module and mobile app. Review deficiencies and implement corrective actions to resolve hazards and open issues before an incident occurs.

3.

Behavior-Based Safety (Observations)

Encourage safe behaviors in the workplace. Record employee safety behaviors, monitor unsafe conditions, and give supervisors the tools to improve safety from the ground up. Our platform offers prebuilt, customizable forms and checklists to streamline workflows and allows you to create safety observation schedules.

4.

Corrective Actions

Generate plans to address hazards and safety risks that you identify from incidents, inspections, observations, job safety analysis, and industrial hygiene activities. Easily track assignments and completions, send automatic notifications, and review overdue actions with intuitive reporting.

5.

Claims

Create workers' compensation claims, and then easily track them and link them to their originating incidents. And quickly generate required, state-specific first report of injury (FROI) forms.

6.

Hazard Reporting

Report, assess, and resolve all types of safety hazards. Easily link corrective actions to resolve open issues and make reports to track hazards by source, department, and more. And automatically send alerts to team members of new hazards at their work location.

7.

Job Safety Analysis (JSA)

Establish best practices for completing hazardous jobs and projects. Identify hazards associated with each step of a task and record controls to mitigate risks.

8.

SDS and Chemical Management

Store, organize, and access safety data sheets (SDS) and chemical inventories online. Access a vast database of GHS-compliant chemical SDSs.

9.

Industrial Hygiene

Monitor workers' exposures to potentially harmful substances or events and streamline the process of alerting employees of test results and sampling activities.

10.

Real-Time Safety Metrics, Dashboards, and Reports

Track key safety performance metrics for the entire organization, including total recordable incident rate (TRIR), training pass rates, and more. Review detailed leading and lagging indicators in real-time and make safer, more informed business decisions.



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