



HEAVY INDUSTRIES · SAFETY & COMPLIANCE

Health, Safety & Environment Compliance Tracker

A heavy industry player with multiple sites used Quantum One to track safety rules across them — 10% fewer HSE incidents.

IMPACT

10%

Fewer incidents related to health, safety and environment

40%

Faster identification of risky situations

50%

Quicker issue resolution

CLIENT PROFILE

CLIENT

A large heavy industry player with multiple production and construction sites

COMPANY TYPE

Heavy industry operator with multiple production and construction sites

INDUSTRY

Heavy Industries

SCENARIO

Safety & compliance

CHALLENGES

- The company runs multiple active production and construction sites that, if rules are not followed, pose a constant danger to the health and safety of workers and to the environment.
- It needs to track deviations from the rules automatically in order to prevent incidents, analyze common pitfalls, and raise the overall rule compliance rate.

APPROACH

A chatbot-based GenAI tool lets users ask questions in natural language and get answers with the reasoning and the source references attached.

It ingests structured data — live tables on work permit compliance violations, job productivity overruns, group-level KPIs — alongside 30+ high-priority HSE standards, guidelines and procedures held as documents.

BENEFITS

- Standards Retriever — specific information pulled from the documents
- Performance Monitoring — insights drawn from the live data
- Root cause and risk pattern investigations, guided step by step
- Answers carry reasoning and source references
- Handles questions such as which contractors caused the biggest man-hour overruns, or what the lock-out / tag-out steps are in the working-at-height procedure

MVP FUNCTIONALITY

- An AI assistant that helps HSE teams explore safety standards, operational KPIs, permits, incidents and procedures through natural language questions.
- The assistant analyzes HSE data, answers compliance questions and suggests the next step for deeper investigation.

TIME TO PRODUCTION

Stage	Quantum One	Typical process	
Problem definition	1 week	2–3 weeks	
Proof of concept	2–3 weeks	4–6 weeks	
MVP	4–6 weeks	8–12 weeks	
Scale-up	1–2 months	3–4 months	
Maintenance	Ongoing	—	

TAKE THE NEXT STEP

Speak with our experts to discuss tailored AI solutions for your industry

quantumone.ae