



# Spotlight

## The 5 Pillars of High Reliability Organizations (HROs)

### What are the 5 Pillars?

In its over 50 year history, the US Navy's Nuclear Propulsion Program has operated more reactor hours than any other organization and without a single reactor incident; and has done this while operating over one-hundred nuclear reactors in remote and harsh environments with young operators and high turnover. This success is derived from several key philosophies and practices, one of them being a set of cultural fundamentals called the 5 Pillars of the Program. The Pillars are focused on human performance which the US Navy sees as a key means of reducing operational risk and the foundation for creating a High Reliability Organization (HRO).

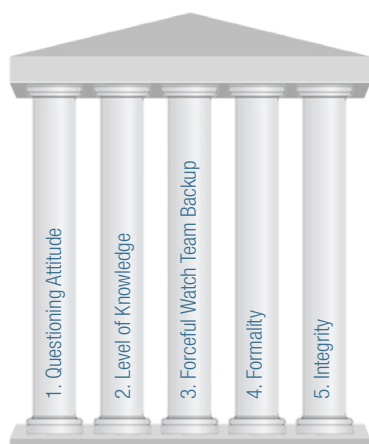


Figure 1: US Navy Nuclear Propulsion Program's 5 Pillars

### Why do the 5 Pillars Matter?

Reducing risk and creating an HRO is not just important to the US Navy, it applies to all companies and all industries. Operational risk grows geometrically with complexity. As complexity continues to grow for companies today, operational risk will grow at an even faster pace. The challenge in complex systems is not all risks can truly be known and therefore cannot be "managed." This leaves organizations vulnerable to normal accidents and major events resulting from a combination of seemingly innocuous non-conformances. It is the low-likelihood, but potentially catastrophic events that traditional risk management approaches struggle to deal with and can literally

destroy a company. The solution is to instill practices, behaviors and discipline, such as the 5 Pillars, in to an organization to keep the chain of events from developing in the first place that would lead to a tragedy. Doing this requires a different way of operating.

### Example of how the 5 Pillars are used

The journey to truly operating in a different way requires establishing the right structure, developing the right culture and ensuring organizational learning. The 5 Pillars can be used as the foundation of culture change and risk elimination in your organization. WP&C recently undertook this journey with a \$25 billion energy company. After redesigning the organization, WP&C tailored the US Navy's 5 Pillars to the specific organizational needs and then aligned the roles, KPIs and performance management system to the Pillars. The WP&C team then worked hand in hand with the client to further the culture change around the 5 Pillars by providing coaching, mentoring and training through all levels of the organization. The culture change around the 5 Pillars reduced the client's loss of containment events (including hazardous material leaks, overflows) by 75% and safety incidents by 25%.



Figure 2: Deep Dive of Pillar 1– Questioning Attitude