# Safety Management System.

SAFETY ENGINNERING:

Safety engineering assures that a life-critical system behaves as needed even when the component fails. Ideally, safety engineers take an early design of a system, analyze it to find what faults can occur, and then propose safety requirements in design specifications up front and changes to existing systems to make the system safer. Safety cannot be stressed enough when it comes to aviation maintenance, and everyone deserves to work in a safe environment. Safety engineering plays a big role in the design of aviation maintenance facilities, storage containers for toxic materials, equipment used for heavy lifting, and floor designs to ensure no one slips, trips, or falls. In industrial work environments, the guidelines of the Occupational Safety and Health Administration (OSHA) are important.

Another way to gain this understanding is by using a model. For more than a decade, the term “PEAR” has been used as a memory jogger, or mnemonic, to characterize human factors in aviation maintenance. PEAR prompts recall of the four important considerations for human factors programs, which are listed below.

• People who do the job.

• Environment in which they work.

• Actions they perform.

• Resources necessary to complete the job.