PRECISE Lubrication

Oil Analysis & Industrial Lubrication Management

Visual Management in Lubrication Management

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One of the core components to lean manufacturing is a solid 5S visual management system. It is easier to manage an operation if you can fully understand it, and understanding often comes from being able to "see" what is happening. The 5S visual management system is designed to create a visual workplace – an environment that is self-explaining, self-ordering, and self-improving. The 5S system consists of five elements. These elements are Sort (eliminate those things not truly necessary, remove the clutter), Set in order (organize that which is necessary to minimize waste), Shine (keep areas clean and well-ordered with regular inspections), Standardize (document and communicate what good condition looks like), and Sustain (institutionalise through process development and training). Self-explaining, self-ordering, and self-improving - visual management assists in the simplification of work management systems. If an employee can visually see what is required of them, their work becomes easily understood and as a consequence they become more efficient and productive. Practically speaking, putting visual management systems in place is one of the simplest lean ideas to implement.

Lean is about eliminating waste and unscheduled equipment downtime is wasteful. Therefore, lean has application in improving asset reliability. All maintenance and operations environments are challenged to do more with less. There are real challenges to be faced every day with the requirement to maintain (and expand) production with fewer skilled personnel. Skilled personnel are retiring and they are either not being replaced or their replacements are not fully trained with the proper procedures. Applying lean techniques in the interest of improving asset reliability can help.

Visual management can be applied to a plant facility on a wide scale basis. In fact, many plant facilities already utilize visual aids by identifying piping systems (pneumatic, natural gas, various gases, etc), electrical wiring (control, connections), and locations of danger (paint on floors or railings, emergency phone locations), etc... Applying visual management techniques in the interest of improved reliability can occur on a step by step basis. One of the best places to start is with the lubrication management program. Creating a system of well tagged and even colour coded lubrication points will help maintenance personnel and operators clearly understand what lubricants are appropriate for each application. The system needs to be applied from the moment lubricants are received in inventory all the way through the chain to the specific lubrication point on the equipment and then to lubricant disposal. In most facilities, lubricants are handled by a variety of people (with different responsibilities) and in a variety of locations throughout the chain. A simple tagging and coding system will assist in helping employees understand the internal supply chain ensuring that the right lubricant gets to the right application.

A lubrication assessment or audit is an important step in fully understanding what lubricants are being used in the facility, what lubricant is required for each lubrication point on the equipment, the frequency of lubrication, and the method of lubrication required. Most lubrication assessments/audits are very comprehensive covering many additional aspects of the lubrication program, but these mentioned are key components. The understandings mentioned take time to establish, but investing this time is important. It is equally important to put a system in place to ensure the understandings reach throughout the operation and employees clearly "see" what is required.

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Colour coding is now available for lubrication systems reaching from lubricant receipt and storage through the lubrication room to the point of application. Coloured tags or identifiers can be assigned to designated lubricants. Assigning specific colours to designated lubricants (both oils and greases) allows for a tagging system to be deployed throughout the lubricant chain within the facility. From the point of storage to the point of application, the operator and/or maintenance person will know which designated lubricant is supposed to go to each specific equipment lubrication point. This is an excellent example of employing visual management within the lubrication program in the interest of lean (in its simplest form). A system like this minimizes the opportunity for error as the individual(s) performing the lubrication tasks does not need to know specifically which lubricant is used with each equipment application. The colour can be identified with lubricant type and/or lubrication frequency. As long as the system is set up properly, documented well, and deployed thoroughly with the necessary identifiers, the individual(s) performing the tasks can understand what is required without needing to be “experts” in lubrication. No employee should have to rely on memory and no employee should be performing a task that he/she has not been trained in and competent in.

Help your employees “see” what is required of them by implementing a visual management system. Simple can be better and more reliable. Managing the information they are required to know will improve their effectiveness.