

Monitoring System Users

USERS

Smooth operation of a machine train involves the cooperation of several disciplines which interface with each other and a vibration monitoring system in differing manners. Some disciplines will have very frequent usage of the information supplied, while others will interface infrequently or even indirectly.

OPERATIONS

Operations personnel are usually the front line users of vibration monitoring systems. They will be interfacing on a frequent basis to determine whether the production process requires adjustment. Operating vibration levels are one the indications of how a machine train is behaving to whatever the operators are doing. Should something happen to the machine train, the operators will require some form of warning of an impending failure. This warning may be audible or visual in nature. Advanced warning of an impending failure will provide the opportunity for a controlled machine shutdown, where auxiliary support or process supply systems can be secured.

MAINTENANCE

Maintenance personnel will most likely interface indirectly to information supplied via a vibration monitoring system. Their involvement will be to schedule activities economically, if at all feasible. Scheduling activities allows allocating manpower effectively, spare parts on an "as-needed" basis, and any required external contractors. All of these activities will reduce unplanned outages and overall maintenance costs.

VIBRATION SPECIALIST

The vibration specialist's involvement with a vibration monitoring system will be infrequent under normal conditions. As the levels increase, the vibration specialist will be called upon to diagnose the cause for the higher levels. This type of analysis is usually at the component level, where interest is focused at one particular machine case or bearing where the levels are elevated. After any required maintenance has been carried out the vibration specialist will be called upon to collect detailed vibration information as part of a "new" machine acceptance test program. Successful completion of these tests will culminate in the machine being commissioned, ready for process operation.

Users Checklist

1. Operations
2. Maintenance
3. Vibration Specialist