

## Remote monitoring: You don't have to go to know

The traditional approach to equipment service has long been for the maintenance engineer or technician to strap on the tool belt and take a walk or a drive to the site. It's a simple and straightforward approach, but it's also very inefficient.

Your techs waste valuable travel time that can really mount up when maintaining large manufacturing or process facilities, or traveling to remote utility substations. Need parts to make a repair? That means another trip. As many organizations struggle to find and maintain qualified techs, you can't afford that wasted time.

There's a good chance that your more recently purchased assets include some remote diagnostic capabilities. If they don't, it's very likely that you can retrofit the assets with the needed sensors.

"Transformers are a huge investment for utilities and a great remote monitoring opportunity," according to Randy Schrieber, head of ABB marketing and sales for power equipment service in North America. "Beyond just temperature and load levels, we can measure certain gasses in the cooling and insulating oil that not only indicate a potential problem but also point us to a root cause before a failure occurs. There are similar monitoring opportunities for other types of equipment and in other industries."

Remote monitoring greatly reduces the need for routine service inspections. Instead of visiting the asset, it transmits information about its health. The data can be provided continuously or at regular intervals. Either way, you have data stream that makes it possible for you to see trends in key operating parameters.



For various types of assets, increased temperature, reduced pressure, unexpected vibration and other vital signs can all be captured, transmitted and monitored. Now there's no need to dispatch a tech to check on perfectly healthy equipment. They can devote their attention to the assets that need it.

"All modern production assets have diagnostic information available to the maintenance staff at local consoles," explained Dan Duncan, ABB's vice president-process automation. "If you consolidate all this information at a single location, your maintenance staff has a single window into the equipment's health and history. This in itself saves thousands of hours of walking around to gather that information. The addition of a monitoring and reporting solution makes it possible to automatically inform local or remote crews of changes in machine performance so they can quickly and proactively correct these issues before a catastrophic failure. ABB's ServicePort monitoring solution enables diagnostic data from ABB and third party equipment to power these kinds of proactive maintenance programs."

It's not just hardware issues that can be identified and repaired remotely. Remote monitoring also simplifies software support.

"When a customer's robot programming goes bad, they usually waste hours trying to find the last backup and hope that it's current," said Joe Chudy, vice president of customer

service – robotics. “Often it’s not, so they spend time – sometimes days – modifying an older version. Remote monitoring of robots includes routine backups of their programming. We have over 4,000 robots connected globally. Those customers can easily restore a lost or damaged program. Many major manufacturers have been very relieved and happy that this capability was included with their remote monitoring.”

The current generation of digital equipment monitoring technology is cheaper than ever. It’s now affordable to add sensors to many of your assets. With those sensors in place, you can tap a continual stream of data that will let you more efficiently use your limited maintenance resources and more effectively maintain your equipment. The efficiency opportunities created by remote monitoring get even bigger when you consider that the data gathered will enable you to apply some pretty intense analytics to your asset health strategy.

For more information please contact:

**ABB Inc.**

**Anne Roberts-Kraska**

29801 Euclid Avenue

Wickliffe, OH 44092

Phone: 403-225-5511

**[www.abb.com](http://www.abb.com)**

**Note:**

We reserve the right to make technical changes or modify the contents of this document without prior notice. With regard to purchase orders, the agreed particulars shall prevail. ABB does not accept any responsibility whatsoever for potential errors or possible lack of information in this document. We reserve all rights in this document and in the subject matter and illustrations contained therein. Any reproduction, disclosure to third parties or utilization of its contents – in whole or in parts – is forbidden without prior written consent of ABB.

© Copyright 2013 ABB Inc. All rights reserved.