

Impacts of the IIoT-Based Platform in the Maintenance Service Market

Should manufacturers compete or cooperate with maintenance firms?

The Industrial Internet of Things (IIoT) is a network of connected devices, sensors, and instruments that work together to collect, analyze, and monitor data from industrial operations. It can be used to help businesses maintain their equipment more efficiently and reduce costs.

Manufacturers are increasingly adopting IIoT-based platforms for preventative maintenance (PM), IIoT's most valuable application. Manufacturers can either compete with independent maintenance, repair, and operations (MRO) firms by offering after-sales services or adopt a "coopetitive" strategy by opening platforms.

Due to the limited research into IIoT platforms for PM, Dr. Kumar and his team investigated when do IIoT platforms benefit manufacturers through PM and whether manufacturers should pursue competitive or coopetitive strategies.

Their findings include that manufacturers may benefit from establishing a platform even when IIoT adoption increases PM costs, or when royalty revenues are lower than the increased costs. Additionally, opening the platform can lead to greater MRO profits, creating a win-win scenario. While this strategy may reduce profits for end customers, it can increase total profits for all stakeholders involved. The findings offer important guidance for manufacturers, MROs, and policymakers on platform development, strategic choices, and welfare impacts.

MAJOR TAKEAWAYS:

- Establishing IIoT platforms does not always benefit manufacturers.
- Adopting a coopetitive strategy can be a win-win situation for MROs and manufacturers
- Opening of the IIoT platform sometimes causes less profits for end customers, yet it can increase total profits for all stakeholders involved.

WHO NEEDS TO KNOW:

- Manufacturers
- Policymakers
- Maintenance, repair, and operations firms
- Customers

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