



# CONTRACT MANUFACTURING

## TODAY'S CHALLENGES

Biopharmaceutical Contract Manufacturing Organizations (CMOs) face several market disruptions such as a fast-changing competitive environment, a dramatic increase in demand and rapidly changing expectations from their global drug manufacturing customers.

CMOs must manage a complex set of suppliers. This requires real-time visibility into their supply chains, not just from a price and availability perspective but also in terms of quality.

CMOs face an intensely competitive and fragmented marketplace with high levels of mergers and

acquisitions. This means differentiation is more important than ever, through novel offerings and strategic partnerships.

CMOs depend on enterprise solutions to achieve greater operational efficiency, which helps them utilize capacity while remaining flexible and able to support shorter production runs.

In addition, the longstanding requirement for CMOs to focus on quality, cost and delivery continues and is intensifying.

## FUTURE TRENDS

Increasingly, pharmaceutical organizations will turn to CMOs for more than traditional manufacturing. CMOs will need to support their customers by offering other functions such as R&D, warehousing and distribution.

Global biopharmaceutical companies will demand more visibility into the operations of CMOs to track the status of work-in-progress in terms of completion and quality.

The growing complexity of biopharmaceuticals, coupled with the expanded use of highly personalized medical therapies and devices, will increase complexity in operations and supply chain, leading to greater reliance on contract manufacturing.

CMOs will need to manage multiple customer demands in an environment of complex and expanding global regulatory requirements, making operational efficiency and flexibility paramount.

## IMPERATIVES FOR KEY DECISION MAKERS

COOs need to implement state-of-the-art processes and advanced technologies for digital transformation, such as IoT for production and warehouse operations, to improve regulatory compliance, quality and delivery. COOs also need to develop and deploy connected products and services, as well as improve IT/OT integration.

CEOs need to ensure their company is agile enough to execute rapidly on key decisions – this impacts people, processes, practices, partners and solutions. The CEO will continually need to balance cost, innovation, risk and investment.

CIOs will need to move from old, unsustainable, insecure systems to adaptable solutions that help their organization rapidly adopt changing business models and deal with the turbulent external environment.

The VP of Purchasing must become more strategic, moving from price-centricity to viewing and managing the complete supply chain, by improving visibility and applying best practices.

The VP of Regulatory and Quality must be constantly aware of new industry regulatory and compliance requirements.

## HOW CAN QAD HELP?

QAD has been a trusted solution partner to CMOs for decades. We participate in global industry associations for the development of standards for quality, the supply chain and corporate responsibility. QAD incorporates the resulting practices in its solutions.

**QAD Adaptive ERP** provides a comprehensive yet flexible solution for global manufacturers, supporting the unique needs of each manufacturer and offering excellent fit out of the box. Our cloud-based, FDA-qualified environment reduces the effort required for software validation and 21 CFR Part 11 and Annex 11 compliance. It supports Track and Trace and comprehensive serialization to meet the DSCSA and Falsified Medicines Act to support ever-evolving compliance requirements.

**QAD Enterprise Platform**, the application platform for QAD Adaptive ERP, simplifies the need to be flexible in a rapidly changing industry. It makes it

easy to modify the ERP solution through low/no code techniques which limits the need for costly and difficult to maintain customizations.

QAD is known for fast and dependable implementations and around-the-clock global support, high availability, strong security and scalability via the QAD Cloud.

QAD offers an integrated application portfolio to support the distinct planning and manufacturing needs of contract manufacturers – including quality management, warehousing, demand and supply chain planning and shop floor visibility.

For more information on how **QAD Adaptive ERP** can help your company, please contact QAD at +1-805-566-6100 or email [info@qad.com](mailto:info@qad.com).



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