

HOW CAN WE HELP YOU?

Continuous improvement is a way of life for all our customers. Our customer service department is ready to support you with a portfolio of over 30 service solutions to help you get more out of your Evatec tool. From retrofits that increase capabilities or reduce costs to service concepts that get you back in action quicker after a tool down, Evatec's Head of Customer Service **Thomas Germann** runs through a few examples of the latest new solutions now available in the Evatec tool box and gives us a taste of the future.



SUPPORT SOLUTIONS TAILORED JUST FOR YOU



Support

Customers can benefit from 11 distinct support solution products available through our service organization, each one designed to help maximise tool productivity. Every customer and every market is different, so we put together packages that are just right for them. The examples here highlight the range of services we offer.



Peak production assistance



Tool relocation



Emergency support



Remote assistance



Preventive maintenance



Process consulting



On-site support



CIP



Application support



Health check



On-site calibration



Tool health check

Why not ask our service experts to make a health check on your tools?

Minimize unexpected tool downtime in future by carrying out a complete inspection and functional control now. Identify ways to improve tool reliability, options to replace obsolete parts and opportunities to improve productivity or expand capabilities.

Relevant tool All tool types

Scope

- Visual inspection on site
- Functional control on site
- Condition control on site
- Software check

Written report per tool including relevant recommendations covering maintenance, repair, spare parts, obsolescence and upgrades



Remote assistance

We can assist you remotely based on the newest communication technology. It's quick, cost-efficient and flexible together with you and your technicians.

Remote assistance elements include tradition support techniques like telephone or remote tool access but now we can add Mixed Reality too to get you up and running faster than ever. We provide you with HoloLens equipment from Microsoft and give you a short training. The tool is easy to handle and intuitive in use.

The only thing we need from you is WLAN connectivity in your Fab - of course we fully respect your IT security guidelines. Put on your glasses and off we go into the future of maintenance!

Relevant tool All tool types

Scope Custom service package comprising elements including phone / mail support, mixed reality and remote access

9 REASONS TO UPGRADE YOUR EXISTING TOOL



Retrofits

Why not add new capabilities, improve uptime or extend working life by addressing obsolescence? Retrofitting can be one of the most effective ways to improve productivity in the fab both economically and with minimum disruption. Here are just a couple of recent additions to Evatec retrofit solutions. Contact your local Evatec sales and service office to learn more about retrofit options for the tools in your own production hall.



Extend tool lifetime



Add process capabilities



Minimize downtime



Improve process yields



Increase factory security



Improve system reliability



Enhance system flexibility



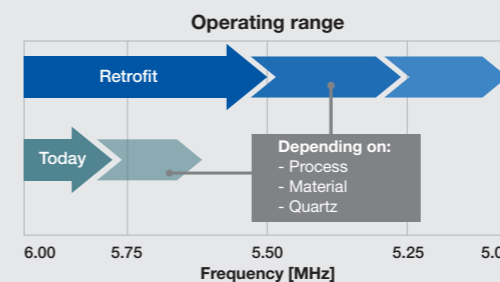
Increase system throughput



Reduce maintenance costs

Case study 1: QSK Performance upgrade

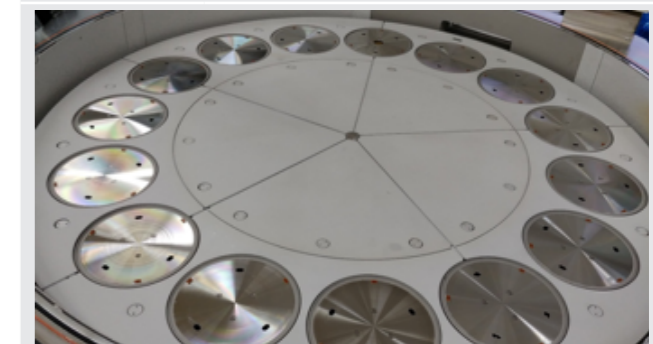
Whether its complex multilayer dielectric stacks or thin metals, improved thickness measurement over the whole crystal lifetime gives you better process control and better repeatabilities. New magazine design and mapping of each crystal at the start of life mean smoother signals, better stability and better control accuracy over longer crystal lifetimes. Hardware and software updates enable reliable operation down to around 5MHz according to the coating materials in use and your own process specs, increasing working lifetimes by a factor of 2 or more in some cases.



Relevant tool	BAK platforms
Function	Increased accuracy & extended quartz life
Retrofit scope	Upgrade of QSK magazine QCO firmware and installation of latest Khan system software
Prerequisites	QCM controller installed

Case study 2: CLUSTERLINE® 200 Batch Process Module table upgrade

What: New high performance table with vacuum motors for each chuck including precise chuck positioning.
Benefit: Allows direct load of substrates with flat or notch, tighter process tolerances for complex stacks through improved table flatness and mechanical tolerances, and reduced maintenance for higher overall uptime.



Relevant tool	CLUSTERLINE® 200
Function	Higher chuck speeds with accurate positioning and improved mechanical stability for best WiW uniformity
Retrofit scope	Replacement of table including individual motors for each chuck and software upgrade for motor positioning control, and temperature monitoring
Prerequisites	Existing tool with belt driven table

LOOKING TO THE FUTURE



Clever machines are coming

Service support has come a long way in the last 20 years. Yesterday's "reactive" approaches are already being replaced by more proactive and preventative solutions. The ability to collect and analyse huge amounts of field data easily is already enabling us to be much better prepared with tailored solutions for everything from spare parts management to tool calibration according to each and every customer's own needs. Tomorrow, however, is all about predictive and integrated approaches.

Our machines will collect data continuously on performance of key components or subsystems (e.g pressure, temperature, vibration, noise). Machine learning, AI and new algorithms will translate data into models which can be used to predict future malfunction of components and our systems will flag that up. Users will then be able to plan interventions in good time to be carried out in periods that fit their production schedules, eliminating unexpected failures, and avoiding any knock-on tool damage from undetected issues which go on unnoticed for long periods of time.

Digital Transformation is key

There's lots of change running in parallel in our organization too. Digital Transformation will revolutionize how our customer service team interacts with customers and tools around the globe. Highly interactive customer portals with expanded information available instantly and capabilities like "Digital Twinning" where we maintain an up to date virtual simulation of the real tool at Evatec throughout its working life at our customers' facilities are both on our development road maps right now.

You will be able to read much more about all these developments in upcoming editions of LAYERS. In the meantime, read the "Going Digital" feature on page 18 of this edition of LAYERS to find out more about Evatec's Digital Transformation program.