



CONTRACT ENGINEERING

DEVELOPING
THE SOLUTION
YOU NEED



GENERAL INFORMATION

Start getting an idea of the LRE medical process

From the initial idea to the market ready innovation it's one exciting journey. Our state-of-the-art development process eases the way to game changing innovations. Find out more about the way we work:

WHERE THE PROJECT BEGINS

With LRE, an intensive and successful partnership usually begins with this idea. Because just as all departments are interlinked with each other, we also link our customers with each of our departments. This creates a close cooperation, characterized by a morphological approach that connects further ideas, input, feedback and optimization processes towards the realization of the ideal diagnostic device.

PROVIDING SOLUTIONS HOLISTICALLY

Along with the idea wishes, requirements and the general framework are presented. Our experts from the systems engineering and production engineering departments analyze the requirements and clarify the feasibility of the project.

This is the starting point of the realization process, in which we take all elements, parameters, and possible solutions into considerations. What follows is the generation of comprehensive solution approaches, which are presented using a decision matrix for feasibility and cost-effectiveness.



SYSTEMS ENGINEERING

Experience our holistic approach

From the smallest component to the synergy of all parts to the finished, state-of-the-art diagnostic device: the systems engineering department is responsible for the holistic development of new products. This includes full consulting support throughout the entire product life cycle, e.g. through optimization processes initiated by input from other departments.

TRANSLATING CLINICAL REQUIREMENTS INTO PRODUCT SPECIFICATIONS

A thorough understanding of the customer's requirements regarding application, end user needs and business processes supports the next levels of requirements:

- Determination of the functionality of the final solution
- Detailing the specifics about how the solution will be created to achieve the design goals in a technical specification and determination of the scope of work and development tasks.

DEVELOPMENT AND DESIGN

The great strength of our systems engineering department is the deep systematic understanding and approach within the topic. Our development experts are thus able to define the requirements of the overall system in its individual areas in order to bring the big picture together even in the most limited space. This ability of highly integrated miniaturization is a significant quality that we achieve through sophisticated design and extensive engineering knowledge.

WEIGHING FEASIBILITY AND COSTS

An important component in the comprehensive development and planning of the product is to balance feasibility and implementation costs. To this end, we present our clients a decision matrix with several realization routes that represent the best possible options within the budget. In this way we ensure that our customers always receive the best individual solution according to their budget plan.

At the same time our experts make sure that all components are state-of-the-art. It is also made certain that each individual part is available for a long time at our suppliers. In this way, we not only produce high-quality products, but can also secure that they can be manufactured and supplied in continuity.



PRODUCTION ENGINEERING

Learn how we ensure excellence and efficiency

When it comes to precision and quality it's a pretty good idea to turn to a German company. But this is not a cliché. We are always striving for excellence and efficiency, because it's a necessity in our line of work. Learn more about how we ensure both.

CONNECTING IDEA AND REALIZATION

The production engineering department is the decisive interface between the product idea and its realization. Accordingly, the production engineering department links development (systems engineering) and production. As the production engineering department provides all specifications for the creation of the production line, which is then subject to strict validation controls, it is also the direct contact for production.

LEAN EFFICIENCY FOR INDIVIDUAL PROJECTS

Efficiency all along the line. This is what the production engineering department creates. This is where customer-specific product requirements are transformed into a dynamic, lean optimized process ready for production. After all, each individual customer request requires a corresponding implementation of the production technology within the production line.

With our competence and experience, we ensure that the specifications are always met and the quality is always first class.

The extensive range of tasks and services is furthermore divided into two areas: mechanics and test engineering. Both fulfill essential tasks in their areas.

CASE SCENARIO COST EFFICIENT PRODUCT DEVELOPMENT: HANDHELD DEVICE FOR POC AND IVD SCENARIOS

For decades LRE Medical has partnered up with major corporations in the area of diagnostics. So, topics like cost and time efficiency come as no surprise to us, when we are asked to develop innovative devices that change the game. Being efficient is pivotal in our line of work. |

In the course of this project we realised a handheld device in combination with a fully integrated cartridge system for a high sensitive Immunoassay Platform. We solved the customer's challenges with a magnet-induced signal amplification and fluorescence detection with high positioning accuracy, high module integration and manageable manufacturing costs. |



Creating solutions. Improving lives.

LRE Medical combines technological, engineering and consulting competencies to create products that bring patients and diagnostic instruments into immediate proximity. In doing so, we foster the continuous advancement of diagnostics and measurement systems and, thus, help the well-being of people worldwide.

With our wide range of expertise that covers the complete product life cycle, we develop tailor-made products and produce them in small to medium-sized batches.

OUR PURPOSE OF PROFICIENCY

We are here to help. This simple mindset is a defining factor of our daily doing and conduct. We pride ourselves in providing our customers reliably with excellent products that positively impact people worldwide. Likewise, this readiness to help and to cooperate permeates LRE internally, making each employee a driving force behind our collaborative success.

LONG-LASTING, INTERNATIONAL IMPACT

We are here to stay. Our ability to deliver long-lasting quality and to continuously use and implement the latest technologies has established us as the long-term partner of trust for many companies. Together we push the boundaries and realize the progress of diagnostics on an international scale.

INTEGRATED EXCELLENCE

We are here for you. Every project and product we take on is developed and manufactured from the ground up to the requirements and exact specifications of our customers. In order to master this high degree of project individuality, our departments work closely together – from the first consultation to the product-optimizing feedback within the after-sales service process.

CON TACTS

LRE Medical GmbH

Hofer Strasse 5
86720 Noerdlingen, Germany
+49 9081-800-0

Georg-Brauchle-Ring 89
80992 Munich, Germany
+49 89-354 803-0

info@lre.de • www.lre.de