## Our Expertise

### Wireless Design

Our world-class RF and antenna design services allow different approaches from utilization of off-the-shelf components to customized solutions, whatever meets the requirements best.

### Software Design

Our long experience in the field of embedded devices is the foundation for providing high-quality software development services for medical devices. Our know-how enables long operating times and best possible user experience.

### Electronics Design

We have vast experience in designing hardware, and we excel in designing battery-operated, low power devices. We have well-established relationships with all key suppliers on the field.

### Mechanics Design

We have strong experience in designing mechanics, selecting the correct materials, and integrating sensors. Our product concepting, product development, and manufacturing support services are tailored to meet unique customer requirements.

### Testing & Verification

Our comprehensive internal laboratory capability and good partnerships with external test houses ensure extensive coverage for product testing. We can provide global market access for your products.

# Bittium

**Connectivity to be trusted.**
www.bittium.com/engineering-services

# Your Engineering Partner for Healthcare and Medical

# Bittium

# Your ISO 13485 Certified Partner

We at Bittium support leading healthcare & medical technology companies as a trusted engineering partner. We help you to deliver technological innovations to all stages of the care continuum and for any environment, inside or outside the hospital, to shape the future of healthcare.

We provide quality based on ISO 13485 certified processes and IEC 62304 medical device software lifecycle processes.

# Innovation Since 1985

We have over 30 years of experience in wireless technologies, with an extensive track record in implementing, verifying, and managing the development of innovative, purpose-built wireless solutions that meet customer-specific needs.

Bittium is a forerunner in wireless technologies, with over 300 engineering projects covering the major wireless protocols from BLE to 5G and to proprietary waveforms.

| Founded in 1985 | 300+ Engineering Projects |
| --- | --- |
| Listed on the Nasdaq Helsinki (BITTI) | Headquartered in Finland |

Offices in Finland, Germany, and USA

# Selected Offering

## Secure Wireless Connectivity Solutions

Wireless solutions improve productivity and efficiency in healthcare by enabling mobility for both patients and caregivers. But with the increased use of such solutions, also the need for security is increasing.

We are your partner in creating secure and reliable wireless connectivity for embedded medical devices that can be operated in any environment - hospital, ambulatory, and home. We support you to ensure the highly secure and reliable connectivity from the devices to the cloud keeps critical data safe.



## Innovative Power-Optimized Devices

We help you to accelerate the medical device industry evolution as your engineering partner for innovative power-optimized devices varying from robust to small form-factor. Leverage our comprehensive expertise in sensor integration, reliable radio connectivity, and wearable device and software development to enable new connected devices and solutions.

We can support you with high quality embedded design, integration and testing services, and both hardware and software expertise. Our radio and antenna expertise ensures maximum coverage and data throughputs even in complex multi-radio systems.

## Standards-Based Product Verification & Validation

When you trust us to design your medical device according to your requirements, you can also trust us to verify and validate the product according to medical standards.

We have excellent in-house test laboratory capabilities for mechanical & environmental testing, antenna measurements, RF & signaling / protocol pre-conformance, and many additional areas. We can also handle pre-certification and certification for the products and solutions.



# Development Partner for Major Brands

Bittium has a proven track record from being the main engineering partner for several major brands in their product development projects. Our expertise has enabled the development of purpose-built devices in cooperation with GE Healthcare, Philips, and adidas, for example.

GE Healthcare    PHILIPS    adidas