

# IF100 CALIBRATION TOOL: OPTIMIZING ENCODER PERFORMANCE

All of Lika Electronic's **kit encoders and modular encoders are pre-calibrated and ready for installation in the customer's application.** The client simply needs to mount both the disk and the sensor, then carefully adjust their mechanical positions to ensure the encoder operates correctly. An LED often assists in the mounting process by indicating when the encoder is installed and functioning correctly. To meet the demands of the most rigorous applications, however, the new **IF100 calibration tool enables users to get the most accurate calibration directly within the final application,** thereby optimizing encoder performance.

The IF100 adapter is a high-performance, high-speed PC-USB 2.0 interface BiSS Master designed using an FPGA logic system.

It enables seamless connections between **SSI and BiSS encoders and a PC, and is compatible with several Lika and Bogen encoders, including the SMAR1, SMAR4, SMRAM, AKP18, AKS16, and AKS17 models.**

The USB port supplies power (+5Vdc) to both the adapter and the connected encoder.

The SSI/BiSS communication is established through an RS-422 transceiver, supporting clock rates of up to 10 Mbit/s. The adapter comes with a USB connection cable featuring Standard-A and Mini-B connectors; however, specific adapter cables for each encoder model must be ordered separately. Drivers for Windows and Linux are also provided.

**A software tool is included at no additional cost.**

The software interface is user-friendly and intuitive.

Once the mechanical installation is complete, simply press the CONNECT button to establish communication between the IF100 and the encoder. Then press the START FINE CALIBRATION button.

The program will start the encoder calibration procedure and execute some steps automatically and sequentially until optimal calibration is achieved, requiring no further action from the user.

In addition, the software allows you to read the current encoder position and provides some diagnostic information, including the activation of warnings and errors.

