

BIDI Logger System Quick Start Guide

(AZA-OAD version 41/1.0.7.217 and higher)

AZ-BIDI Noise Logger System
Model: AZ BIDI



FCC ID: 2AGRG-AZBIDI

NOTICE:

Radiofrequency radiation exposure Information:

This equipment complies with FCC and ISED radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with minimum distance of 20 cm between the radiator and your body. This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.

Cet équipement est conforme aux limites d'exposition aux rayonnements ISED établies pour un environnement non contrôlé. Cet équipement doit être installé et utilisé avec un minimum de 20 cm de distance entre la source de rayonnement et votre corps. Ce transmetteur ne doit pas être placé au même endroit ou utilisé simultanément avec un autre transmetteur ou antenne. Attention!!

Changes or modifications made to this equipment not expressly approved by F.A.S.T. GmbH may void the FCC authorization to operate this equipment.

NOTE: This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at his own expense.

Thank you very much for choosing the BIDI logger system. This Quick Start Guide contains some important information to consider before the system is applied.

1. Applying the magnet (solenoid switch) on the BIDI logger

When you run the solenoid switch across the  symbol on the logger cap once, some functions may be activated in the BIDI logger. These functions are indicated through the blue LED as follows:

LED flashes three times: The BIDI logger is set to communication mode and can be read out or programmed with the tablet.

NOTE:

For energy saving reasons, the BIDI logger will return to the mode active previously after 5 minutes. There is no additional command required!

LED flashes once:

The BIDI logger terminates the communication mode and returns to its previously active mode ("Stand-by", "Online", or "Measurement").

Enforcing data transmission:

If the solenoid switch is positioned directly on the BIDI logger and is kept there, the LED will start flashing once a second after a short while. This indicates that the BIDI logger is now forced to transmit its measurement data.

NOTE:

As long as the solenoid switch is kept on the BIDI logger, the logger can neither be read out, nor can it be programmed!

If you wish to stop enforced transmission of measurement data of the BIDI logger, just remove the magnet.

NOTE:

If you transport several BIDI loggers, please make sure that the individual loggers do not have any physical contact to each other through the bottom magnet located at the blue cap as otherwise undesired enforced data transmission procedures may be started, which may make the battery run out of power after a while!

2. Adjusting the tablet and adding a new BIDI logger

If you have procured a **BIDI logger set including tablet** from us, the tablet already has a basic set-up. In this case, please **skip this step**.

The following steps are to show you how to set up a tablet you did not procure from FAST GmbH.

NOTE:

The tablet needs to feature an Android operating system, and an AZA-OAD App has to be installed from Google Playstore!

Step 1: Adjusting the tablet

First, the Servicemaster device has to be connected with the tablet via Bluetooth. In order to do so, **please switch on den Servicemaster**. Then start the **AZA-OAD** software on the tablet. Please select in the main menu:

- 1.1) → Servicemaster,
- 1.2) → Connection,
- 1.3) → available devices,
- 1.4) → Search.

The tablet is now searching for appropriate Bluetooth connections. A list will be displayed in the upper left corner to indicate the Bluetooth devices received. This list may also contain smartphones or other devices. **Please search for the code indicated on the Servicemaster housing and enter this code (e.g. FAST SM-AB12).**

- 1.5) The tablet will request you after a short while to **confirm the interconnection**. If you wish to confirm, please press OK. Under normal circumstances, this step does not need to be repeated in the future. So when the program has been booted and the Servicemaster device is switched on, the tablet will automatically be interconnected with the Servicemaster from now on.

Step 2: Adding a new BIDI logger

If you wish to add a new BIDI logger, please select in the main menu:

- 2.1) → Settings,
- 2.2) → Program settings,
- 2.3) → Add loggers manually.
- 2.4) Several loggers or just one logger can now be added in the window displayed. If you wish to add several loggers, please enter **the highest serial number and the lowest serial number** of the BIDI loggers delivered. The serial number is indicated on the cap of each BIDI logger. As soon as the serial numbers have been entered, tap on
- 2.5) → Apply. The additional BIDI loggers are now displayed in the main menu at
- 2.6) → Patrol.

The tablet has now been adjusted and can be applied.

3. Setting the BIDI logger to data transmission mode

The BIDI loggers are **delivered ex works with a de-activated data transmission function** to spare on battery resources. So please make sure the data transmission function has been activated **before** the logger is deployed in the field. In order to activate this function, please select in the main menu:

- 1.1) → Settings,
- 1.2) → Logger utilities,
- 1.3) → Transmitter state.
- 1.4) A table is displayed indicating all the BIDI loggers from the list. Tap on "All" if you wish to select all BIDI loggers.
- 1.5) Please activate the communication mode on all BIDI loggers with the solenoid valve (**LED of the BIDI logger must flash three times**). Then please tap on
- 1.6) → Apply. A new window is displayed where the operator can choose the state of the transmission mode to be set: ON or OFF. Please select
- 1.7) → ON and then
- 1.8) → Apply.

The tablet will now set all BIDI loggers to an active data transmission mode, i.e. the measurement values can be received during the set data transmission times.

Note:

If several BIDI loggers are transmitting their particular measurement data in confined spaces and at the same time, data reception malfunctions may occur on reading out the data and on programming the devices. Please use the solenoid valve to set the loggers to communication mode.

If not all BIDI loggers could be programmed, the table with the non-activated loggers is displayed again. Please check by the particular serial numbers whether the BIDI loggers have been set to communication mode.

Repeat the process from Step 1.4 until all loggers have finally been activated.

NOTE:

A BIDI loggers does not transmit any data as long as it is set to communication mode! Please use the solenoid valve to reset the BIDI logger to "Stand-by" or wait for 5 minutes until the devices is reset automatically.

As soon as all loggers have been set to data transmission mode, they can be deployed in the field. The LEDs of the BIDI loggers will flash for **approximately 1 hour** according to the pre-set data transmission interval (8 seconds as a standard) and thus indicate that the data transmission mode has been activated. The LED is de-activated after this initial period to spare on battery resources.

NOTE:

Please make sure that eye (included in delivery) is attached to the logger in a moderate way (to be tightened by hand) to avoid any damage on the housing!

4. Reading out and programming the BIDI logger

Our BIDI loggers are most versatile and can be adjusted to your personal requirements in terms of connection time, operating mode, transmission interval, transmitter power, and measurement period. The following parameters are set ex works:

transmitter power:	medium
transmission interval:	every 8 seconds
operating mode:	7 days+/wake up
connection time:	Mon thru Sun, from 8am until 4pm
start of measurement period:	2am
amplification:	high

If you wish to program our BIDI logger, the logger needs to be **set to communication mode** beforehand (**LED of the BIDI loggers must flash three times**). There are three options on how to set the logger to communication mode:

1. Run the solenoid switch across the  symbol on the logger cap to set the BIDI logger to communication mode.
2. If the BIDI logger has already been set to data transmission mode, it can be set to communication mode during the data transmission times. Please go to the main menu and tap on Settings → Logger utilities → Wake up to set the BIDI logger to communication mode.
3. Or go to the main menu and tap on the menu Patrol → Start (wait until the requested BIDI loggers is being received) → Settings. The tablet is now trying to “Wake up“ the selected BIDI logger and will then read it out.

If the BIDI logger has been set to communication mode, please select in the main menu:

- 1.1) → Settings,
- 1.2) → Logger settings.

If you have chosen option 1 or 2, please note that the BIDI logger **needs to be read out before it can be programmed**. If you tap on

- 1.3) → Download, all listed BIDI loggers will be displayed. Select the desired BIDI logger and tap on
- 1.4) → Apply.

The selected BIDI logger will now be read out.

NOTE:

If the process is cancelled, please make sure the BIDI logger is still within radio range (+/- 8metres), that the logger is still set to communication mode, or that other loggers set to data transmission mode do not interfere with your communication with the logger you have selected.

Menu 1 offers the option to change the set data transmission times as well as the particular days when the data is to be transmitted. **Menu 2** hosts the settings for Measurement, Amplification, Transmitter power, Transmission interval, Logger time and Logger date, Signal check, Summertime, as well as some information on battery voltage and software version applied. Furthermore, there is a button called Factory settings, which can be used to reset the logger to the basic settings as described above.

NOTE:

Every individual setting directly affects battery lifetime!
Please take this fact into consideration when you apply
more energy-consuming settings such as extended
transmission times or short transmission intervals.

As soon as the settings have been changed, the BIDI logger can be programmed by tapping on

- 1.5) → Upload. The system will ask the operator if the current Time or also the Time + Date are to be programmed. Select
- 1.6) → Time. The system will now ask the operator if he/she intends to program only the chosen BIDI logger or if several loggers are to be programmed. Select
- 1.7) → Yes, if only the chosen BIDI logger is to be programmed.

The tablet will now transfer the changed settings including the current time to the BIDI logger. It will then **terminate the activated communication mode** and will start the set program.

NOTE:

If several BIDI loggers are to be programmed, these loggers should be set to communication mode with the solenoid switch beforehand to save programming time.

For more detailed and more comprehensive descriptions on all other technical functions of the system and on the correlation process itself, please refer to our website www.fastgmbh.de. You are welcome to download the requested information as a pdf file for your convenience.

We wish you best success for the future with our leakage detection equipment.

With best regards
F.A.S.T. GmbH