MicroStrain®

Quick Start Guide

Software Development Kit Ver 1.03
For 2.4 GHz Agile-Link™
Revised: 8 November 2007

Welcome

This SDK is designed to provide the application builder with all the necessary protocol commands and responses to build robust wireless sensor applications for the Agile-Link™ wireless sensor network.

Installation

Copy the SDK zip file into a folder of your choosing. Extract the contents of the zip file into the folder.

Target Devices

The Agile-Link™ 2.4 GHz Software Development Kit (SDK) is designed for use with the 2.4 GHz Agile-Link™ family of wireless sensors including V-Link®, SG-Link®, and G-Link®. The table below describes the products and firmwares supported by this SDK.

Device	Firmware
V-Link® Node	4.99 and higher
G-Link® Node	4.99 and higher
SG-Link® Node	4.99 and higher
Serial Base Station	2.07 and higher
USB Base Station	2.07 and higher
Analog Base Station	2.07 and higher

Contents

The SDK provides a complete Data Communications Protocol manual as well as fully-commented sample applications demonstrating most protocol commands for Microsoft® C++ 7.1, Microsoft® VB 6.0, Microsoft® VB.NET 2003, Microsoft® VB.NET 2005 and LabVIEW® 7.1. The source code contains only objects native to the particular IDE with no third party controls added. Each sample application is also provided as an installable executable. The SDK is laid out as follows:

SDK

- DCP
  - Data Communications Protocol manual
- C++ Sample
  - Visual C++ 7.1
    - Executable
    - Source
- VB Sample
  - VB 6.0
    - Executable
    - Source
  - VB 2003
    - Executable
    - Source
  - VB 2005
    - Executable
    - Source
- LabVIEW Sample
  - Executable
  - Source
- Other Samples
  - LabVIEW 7.1 source (FFT application)

Tips

- If you are developing an application and at the same time expecting to run the hardware in a mission critical situation, you should consider having multiple units. Development, as we all know, can cause a device to go out of service for some period of time while it is being recovered.
- Port "sniffer" tools such as HDD Serial Monitor, Look RS232, terminal programs, etc. are incredibly helpful in that they allow the developer to see the actual Send/Receive traffic on the communication port.

Support

MicroStrain will only accept requests for support for this SDK via email to support@microstrain.com. Please include the following information to expedite the support:

- Your name
- Your company or organization
- Model number, serial number, firmware version of the base station(s)
- Model number, serial number, firmware version of the node(s)
- Coding language
- Hardware platform
- Operating System
- Your issues in detail

License

This SDK is licensed for one user only.

Important Disclaimer

The SDK is provided “as is” and any expressed or implied warranties, including, but not limited to, the implied warranties of merchantability and fitness for a particular purpose are disclaimed. In no event shall MicroStrain or its contributors be liable for any direct, indirect, incidental, special, exemplary, or consequential damages (including, but not limited to, procurement of substitute goods or services; loss of use, data, or profits; or business interruption) however caused and on any theory of liability, whether in contract, strict liability, or tort (including negligence or otherwise) arising in any way out of the use of this software, even if advised of the possibility of such damage. MicroStrain will make every effort to amplify the instructions contained in the Data Communications Protocol manual but will neither undertake to detail the functioning of the hardware or firmware in the Agile-Link™ family nor debug the purchaser’s code.