



**Master Development System
Prototype Board
Data Guide**

Wireless made simple[®]



Warning: Some customers may want Linx radio frequency (“RF”) products to control machinery or devices remotely, including machinery or devices that can cause death, bodily injuries, and/or property damage if improperly or inadvertently triggered, particularly in industrial settings or other applications implicating life-safety concerns (“Life and Property Safety Situations”).

NO OEM LINX REMOTE CONTROL OR FUNCTION MODULE SHOULD EVER BE USED IN LIFE AND PROPERTY SAFETY SITUATIONS.

No OEM Linx Remote Control or Function Module should be modified for Life and Property Safety Situations. Such modification cannot provide sufficient safety and will void the product’s regulatory certification and warranty.

Customers may use our (non-Function) Modules, Antenna and Connectors as part of other systems in Life Safety Situations, but only with necessary and industry appropriate redundancies and in compliance with applicable safety standards, including without limitation, ANSI and NFPA standards. It is solely the responsibility of any Linx customer who uses one or more of these products to incorporate appropriate redundancies and safety standards for the Life and Property Safety Situation application.

Do not use this or any Linx product to trigger an action directly from the data line or RSSI lines without a protocol or encoder/decoder to validate the data. Without validation, any signal from another unrelated transmitter in the environment received by the module could inadvertently trigger the action.

All RF products are susceptible to RF interference that can prevent communication. RF products without frequency agility or hopping implemented are more subject to interference. This module does have a frequency hopping protocol built in, but the developer should still be aware of the risk of interference.

Do not use any Linx product over the limits in this data guide. Excessive voltage or extended operation at the maximum voltage could cause product failure. Exceeding the reflow temperature profile could cause product failure which is not immediately evident.

Do not make any physical or electrical modifications to any Linx product. This will void the warranty and regulatory and UL certifications and may cause product failure which is not immediately evident.

Ordering Information

| Ordering Information | |
|----------------------|------------------------------------|
| Part Number | Description |
| MDEV-PROTO | Development System Prototype Board |
| CON-SOC-EVM | EVM Module Socket Kit |

Figure 2: Ordering Information

Absolute Maximum Ratings

| Absolute Maximum Ratings | | | | | |
|------------------------------|------|----|------|-----|--|
| Supply Voltage 5V USB | -0.3 | to | +5.5 | VDC | |
| Supply Voltage Battery Input | -40 | to | +20 | VDC | |
| Operating Temperature | -40 | to | +85 | °C | |
| Storage Temperature | -40 | to | +85 | °C | |

Exceeding any of the limits of this section may lead to permanent damage to the device. Furthermore, extended operation at these maximum ratings may reduce the life of this device.

Figure 3: Absolute Maximum Ratings

Electrical Specifications

| Master Development System Prototype Board Specifications | | | | | | |
|--|--|------|------|------------------------|-------|-------|
| Parameter | Symbol | Min. | Typ. | Max. | Units | Notes |
| Power Supply | | | | | | |
| USB Input Voltage | V_{USB} | 4.5 | 5.0 | 5.5 | VDC | 2 |
| BAT Input Voltage | V_{BAT} | 4.55 | | 15.0 | VDC | 3 |
| Input Current | I_{IN} | | 15 | | mA | 1 |
| Output voltage | V_{CC} | | 3.3 | | VDC | |
| Output Current (USB) | I_{CC} | | 475 | | mA | 2 |
| Output Current (BAT) | I_{CC} | | 1000 | | mA | 3 |
| Environmental | | | | | | |
| Operating Temp. Range | | -40 | | +85 | °C | |
| 1. | Board only with no module carrier attached | | 3. | Powered from BAT input | | |
| 2. | Powered from USB bus | | | | | |

Figure 4: Electrical Specifications

Pin Assignments

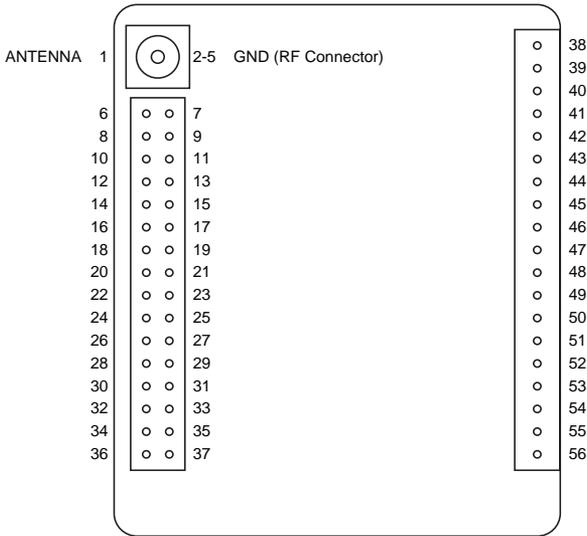


Figure 6: Carrier Board Pin Assignments

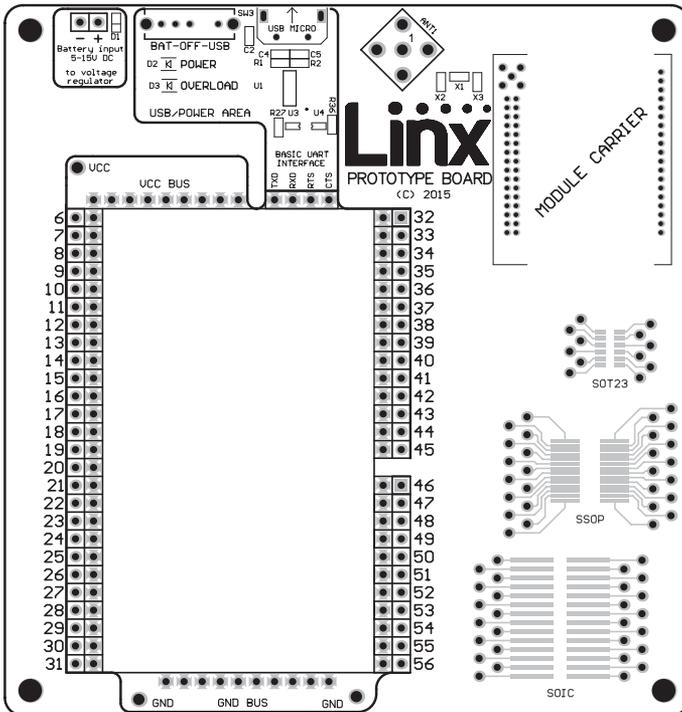


Figure 7: Prototype Board Pin Assignments

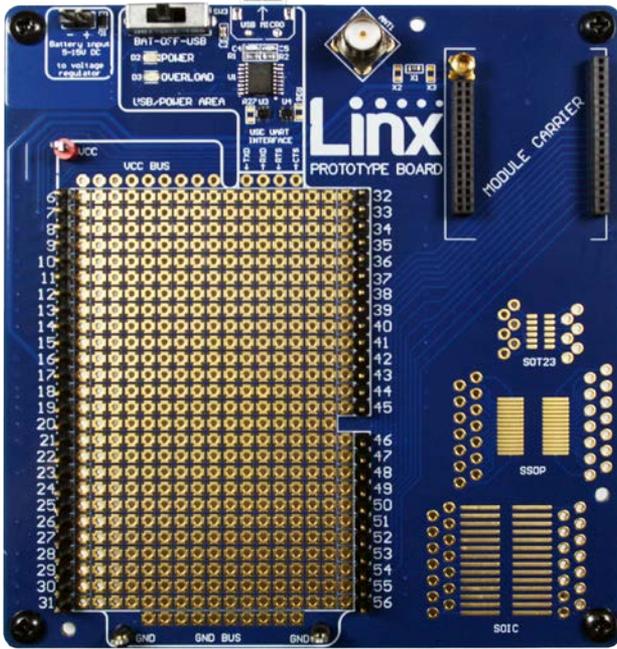


Figure 9: Prototype Board

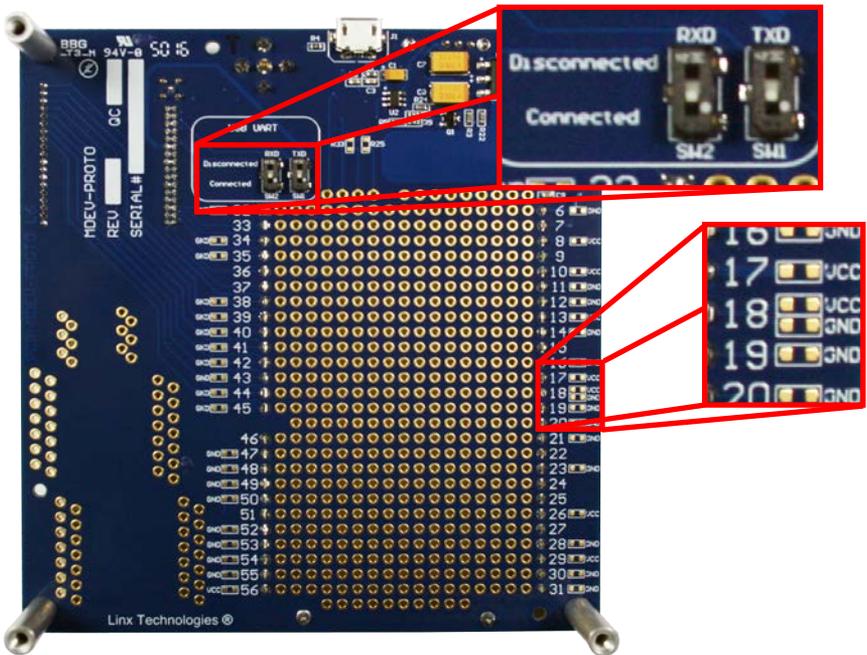


Figure 10: Prototype Board Bottom Side

Prototype Board Schematic

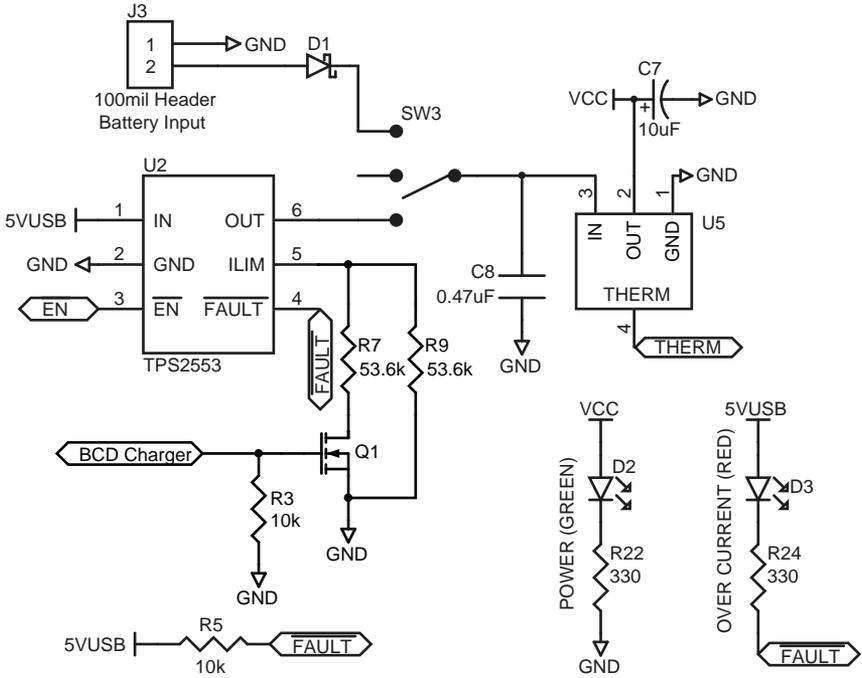


Figure 11: Prototype Board Power Supply Area Schematic



Linx Technologies
159 Ort Lane
Merlin, OR, US 97532

Phone: +1 541 471 6256
Fax: +1 541 471 6251

www.linxtechnologies.com

Disclaimer

Linx Technologies is continually striving to improve the quality and function of its products. For this reason, we reserve the right to make changes to our products without notice. The information contained in this Data Guide is believed to be accurate as of the time of publication. Specifications are based on representative lot samples. Values may vary from lot-to-lot and are not guaranteed. "Typical" parameters can and do vary over lots and application. Linx Technologies makes no guarantee, warranty, or representation regarding the suitability of any product for use in any specific application. It is the customer's responsibility to verify the suitability of the part for the intended application. **NO LINX PRODUCT IS INTENDED FOR USE IN ANY APPLICATION WHERE THE SAFETY OF LIFE OR PROPERTY IS AT RISK.**

Linx Technologies **DISCLAIMS ALL WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT SHALL LINX TECHNOLOGIES BE LIABLE FOR ANY OF CUSTOMER'S INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING IN ANY WAY FROM ANY DEFECTIVE OR NON-CONFORMING PRODUCTS OR FOR ANY OTHER BREACH OF CONTRACT BY LINX TECHNOLOGIES.** The limitations on Linx Technologies' liability are applicable to any and all claims or theories of recovery asserted by Customer, including, without limitation, breach of contract, breach of warranty, strict liability, or negligence. Customer assumes all liability (including, without limitation, liability for injury to person or property, economic loss, or business interruption) for all claims, including claims from third parties, arising from the use of the Products. The Customer will indemnify, defend, protect, and hold harmless Linx Technologies and its officers, employees, subsidiaries, affiliates, distributors, and representatives from and against all claims, damages, actions, suits, proceedings, demands, assessments, adjustments, costs, and expenses incurred by Linx Technologies as a result of or arising from any Products sold by Linx Technologies to Customer. Under no conditions will Linx Technologies be responsible for losses arising from the use or failure of the device in any application, other than the repair, replacement, or refund limited to the original product purchase price. Devices described in this publication may contain proprietary, patented, or copyrighted techniques, components, or materials. Under no circumstances shall any user be conveyed any license or right to the use or ownership of such items.

©2018 Linx Technologies. All rights reserved.

The stylized Linx logo, Wireless Made Simple, WISE, CipherLinx and the stylized CL logo are trademarks of Linx Technologies.

X-ON Electronics

Largest Supplier of Electrical and Electronic Components

Click to view similar products for [RF Development Tools](#) category:

Click to view products by [Linx Technologies](#) manufacturer:

Other Similar products are found below :

[MAAM-011117](#) [MAAP-015036-DIEEV2](#) [EV1HMC1113LP5](#) [EV1HMC6146BLC5A](#) [EV1HMC637ALP5](#) [122410-HMC686LP4E](#) [ADL5363-EVALZ](#) [130437-HMC1010LP4E](#) [EKIT01-HMC1197LP7F](#) [SKYA21001-EVB](#) [SMP1331-085-EVB](#) [EVAL01-HMC1041LC4](#) [MAAL-011111-000SMB](#) [MAAM-009633-001SMB](#) [107712-HMC369LP3](#) [107780-HMC322ALP4](#) [SP000416870](#) [EV1HMC520ALC4](#) [EV1HMC244AG16](#) [EV1HMC539ALP3](#) [124694-HMC742ALP5](#) [SC20ASATEA-8GB-STD](#) [MAX2692EVKIT#](#) [SKY12343-364LF-EVB](#) [108703-HMC452QS16G](#) [119197-HMC658LP2](#) [EV1HMC647ALP6](#) [ADL5725-EVALZ](#) [106815-HMC441LM1](#) [UXN14M9PE](#) [SIMSA868-DKL](#) [SIMSA868C-DKL](#) [SKY65806-636EK1](#) [SKY68020-11EK1](#) [SKY67159-396EK1](#) [SKY66181-11-EK1](#) [SKY65804-696EK1](#) [SKY13396-397LF-EVB](#) [SKY13380-350LF-EVB](#) [SKY13322-375LF-EVB](#) [SKY12207-478LF-EVB](#) [SE5023L-EK1](#) [SE5004L-EK1](#) [SE2436L-EK1](#) [Se2435L-EK1](#) [SIMSA915C-DKL](#) [SIMSA915-DKL](#) [SIMSA433C-DKL](#) [SKY12211-478LF-EVB](#) [EVK-R202-00B](#)