

UM11527

RDK01DB1563 USB-I²C interface kit quick start guide Rev. 1 — 19 November 2020 Us

User manual

Document information

Information	Content
Keywords	TEA2016AATdev, TEA2016DB1514v2, RDK01DB1563, programming kit, quick start guide
Abstract	This quick start guide describes how to get started with the RDK01DB1563 programming kit



RDK01DB1563 USB-I²C interface kit quick start guide

Revision history

Rev	Date	Description
v.1	20201119	Initial version

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1 Introduction

Congratulations on your new RDK01DB1563 USB-I²C programming interface from NXP Semiconductors. The TEA2016AAT offers the leading solution for (computing, all-inone, gaming, 4K/8K LED TVs, LED lighting, and so on) power supplies. The high level of integration of the IC allows easy design of a compact size, highly efficient, and reliable power supply with a very low number of external components. A power supply using the TEA2016AAT provides a very low no-load input power (< 75 mW; total system including the TEA2016/TEA2095 combination) and high efficiency from minimum to maximum load.

Included in the box are the TEA2016DB1514v2 interface and a set of cables for connecting it to your computer via USB. The cables can also be used to connect the TEA2016DB1514v2 to the I²C connections of the IC and to a TEA2016AATdev IC in a TEA2016DB1561 programming board. Or to a TEA2016AATdev IC in a power supply. The guide contains a link to product pages, user manuals, data sheets, application notes, and brochures.

Note: The interface is also suitable for using TEA2017AAT(dev) samples.

To find out more, check out the TEA2016 product information page and learn more about the complete range of GreenChip solutions on the NXP website: https://www.nxp.com/products/power-management/ac-dc-solutions.

Best regards,

The NXP Smart Power Team

WARNING

Lethal voltage and fire ignition hazard





The non-insulated high voltages that are present when operating this product, constitute a risk of electric shock, personal injury, death and/ or ignition of fire. This product is intended for evaluation purposes only. It shall be operated in a designated test area by personnel qualified according to local requirements and labor laws to work with non-insulated mains voltages and high-voltage circuits. This product shall never be operated unattended.

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2 Programming quick start guide

Type: RDK01DB1563

TEA2016DB1514v2 USB-I²C interface and a set of cables

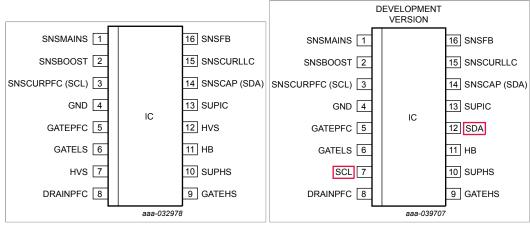
12nc: 935418795598

Documentation: https://www.nxp.com/products/power-management/ac-dc-solutions/ac-

dccontrollers-with-integrated-pfc/digital-controller-for-high-efficiencyresonant-

power-supply:TEA2016AAT

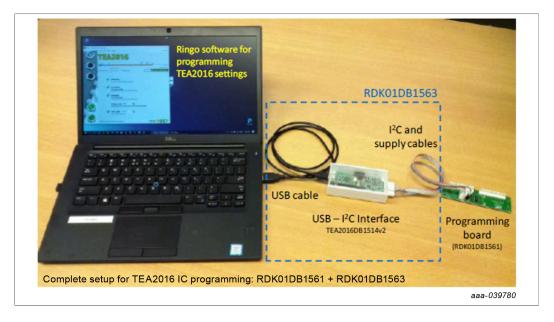
IC connections:



a. Normal version TEA2016AAT

b. Development version TEA2016AATdev

In the TEA2016AATdev (development) samples, the high-voltages spacer pins are used to connect directly to the I^2C interface in the IC. By connecting these pins to the PC/GUI via the TEA2016USB I^2C interface, parameter values can be changed directly in a live application.



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Note: The latest updates and information for the TEA2016 can be found on the NXP website: https://www.nxp.com.

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Please be aware that important notices concerning this document and the product(s) described herein, have been included in section 'Legal information'.

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