

AVR32 STK1000 Quick Start Guide

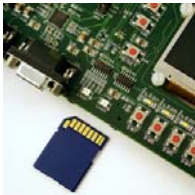
The STK[®]1000 provides a complete development environment for the AT32AP7000 processor from Atmel[®].

This document is a guide for initial setup of the STK1000 and the Linux[®] server.

1. Connecting to the STK1000

1. Insert the SD card into the MMC slot. Notice the direction of the SD card.
2. Connect a serial cable between UART_A and a COM port on the computer.
3. Connect a network cable to ETH_A and attach the power line.
4. Turn on the STK1000 with the red power switch.
5. When the AVR32 logo appears on the LCD, the STK1000 Linux server is running.

Step 1.



Step 2.



Step 3 and 4.



Step 5.



The IP address is automatically assigned to the Linux server via DHCP. Manually obtain this address using a terminal program, e.g. HyperTerminal, on the computer. Select the correct COM port and use these port settings:

- Baud rate/Bits per second: 115200
- Data bits: 8
- Parity: None
- Stop bits: 1

Once connected, type the Unix command *ifconfig*. This returns the address, e.g. “inet 10.0.0.1”, used when connecting to the server using HTTP, FTP, or TELNET.

2. Development Tools

The AVR[®]32 Instruction Set Architecture (ISA) is specifically designed for high level programming languages like C, C++ and Java[®]. Compilers with C and C++ support include GNU GCC and IAR Embedded Workbench[®].

Atmel's AVR JTAGICE mkII emulator supports AVR32. The Vitra and Opella products from www.ashling.com provide high end debugging capabilities.

3. General Information

More information can be found in the complete user guide bundled with the STK1000. This user guide can be downloaded as a CD image from www.atmel.com/avr32.

- <http://www.atmel.com/avr32> - The official AVR32 homepage
- <http://www.avrfreaks.net> - AVR32 forum homepage
- <http://avr32linux.org> - AVR32 Linux kernel homepage



AVR[®]32 32-bit
Microcontroller

STK[®]1000
Quick Start
Guide





Atmel Corporation

2325 Orchard Parkway
San Jose, CA 95131, USA
Tel: 1(408) 441-0311
Fax: 1(408) 487-2600

Regional Headquarters

Europe

Atmel Sarl
Route des Arsenalux 41
Case Postale 80
CH-1705 Fribourg
Switzerland
Tel: (41) 26-426-5555
Fax: (41) 26-426-5500

Asia

Room 1219
Chinachem Golden Plaza
77 Mody Road Tsimshatsui
East Kowloon
Hong Kong
Tel: (852) 2721-9778
Fax: (852) 2722-1369

Japan

9F, Tonetsu Shinkawa Bldg.
1-24-8 Shinkawa
Chuo-ku, Tokyo 104-0033
Japan
Tel: (81) 3-3523-3551
Fax: (81) 3-3523-7581

Atmel Operations

Memory

2325 Orchard Parkway
San Jose, CA 95131, USA
Tel: 1(408) 441-0311
Fax: 1(408) 436-4314

Microcontrollers

2325 Orchard Parkway
San Jose, CA 95131, USA
Tel: 1(408) 441-0311
Fax: 1(408) 436-4314

La Chantrerie
BP 70602
44306 Nantes Cedex 3, France
Tel: (33) 2-40-18-18-18
Fax: (33) 2-40-18-19-60

ASIC/ASSP/Smart Cards

Zone Industrielle
13106 Rousset Cedex, France
Tel: (33) 4-42-53-60-00
Fax: (33) 4-42-53-60-01

1150 East Cheyenne Mtn. Blvd.
Colorado Springs, CO 80906, USA
Tel: 1(719) 576-3300
Fax: 1(719) 540-1759

Scottish Enterprise Technology Park
Maxwell Building
East Kilbride G75 0QR, Scotland
Tel: (44) 1355-803-000
Fax: (44) 1355-242-743

RF/Automotive

Theresienstrasse 2
Postfach 3535
74025 Heilbronn, Germany
Tel: (49) 71-31-67-0
Fax: (49) 71-31-67-2340

1150 East Cheyenne Mtn. Blvd.
Colorado Springs, CO 80906, USA
Tel: 1(719) 576-3300
Fax: 1(719) 540-1759

Biometrics/Imaging/Hi-Rel MPU/ High Speed Converters/RF Datacom

Avenue de Rochepleine
BP 123
38521 Saint-Egreve Cedex, France
Tel: (33) 4-76-58-30-00
Fax: (33) 4-76-58-34-80

Literature Requests

www.atmel.com/literature

Disclaimer: The information in this document is provided in connection with Atmel products. No license, express or implied, by estoppel or otherwise, to any intellectual property right is granted by this document or in connection with the sale of Atmel products. **EXCEPT AS SET FORTH IN ATMEL'S TERMS AND CONDITIONS OF SALE LOCATED ON ATMEL'S WEB SITE, ATMEL ASSUMES NO LIABILITY WHATSOEVER AND DISCLAIMS ANY EXPRESS, IMPLIED OR STATUTORY WARRANTY RELATING TO ITS PRODUCTS INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTY OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, OR NON-INFRINGEMENT. IN NO EVENT SHALL ATMEL BE LIABLE FOR ANY DIRECT, INDIRECT, CONSEQUENTIAL, PUNITIVE, SPECIAL OR INCIDENTAL DAMAGES (INCLUDING, WITHOUT LIMITATION, DAMAGES FOR LOSS OF PROFITS, BUSINESS INTERRUPTION, OR LOSS OF INFORMATION) ARISING OUT OF THE USE OR INABILITY TO USE THIS DOCUMENT, EVEN IF ATMEL HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.** Atmel makes no representations or warranties with respect to the accuracy or completeness of the contents of this document and reserves the right to make changes to specifications and product descriptions at any time without notice. Atmel does not make any commitment to update the information contained herein. Unless specifically provided otherwise, Atmel products are not suitable for, and shall not be used in, automotive applications. Atmel's products are not intended, authorized, or warranted for use as components in applications intended to support or sustain life.

© 2006 Atmel Corporation. All rights reserved. ATMEL®, logo and combinations thereof, Everywhere You Are®, AVR®, STK®, and others, are registered trademarks or trademarks of Atmel Corporation or its subsidiaries. Other terms and product names may be trademarks of others.