

# @Web Software TCP/IP PSTN/GPRS Modem Solution Evaluation Kit

GET YOUR APPLICATION CONNECTED



The @Web PSTN51S kit allows the user to evaluate the full range of options available for integrating TCP/IP software into Atmel® C51 Flash Microcontrollers.

## Key Features

- On-chip Full TCP/IP Stack
- Direct or PSTN & GPRS Modem Connectivity
- Internet to CAN Gateway
- Internet Services: HTTP, FTP, SMTP
- Flash MCU Supported:
  - T89C51CC01: with CAN Controller
  - T89C51AC2: with A/D Converter
  - AT89C51RC2/AT89C51RD2

## Applications

- Embedded Industrial Control
- Building Automation
- Remote Control
- Home Appliances
- Vending Machines
- Smart Card Readers
- Alarm Systems



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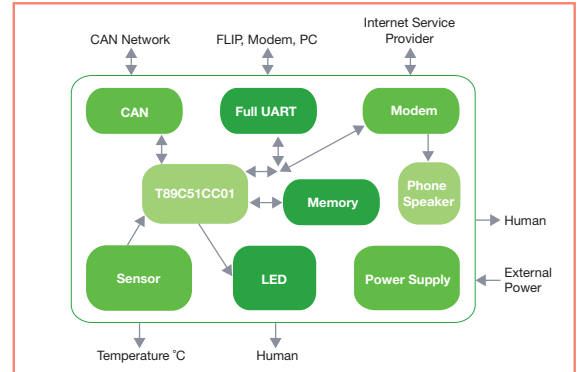
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Atmel has developed the @Web PSTN51S TCP/IP protocol stack for its C51 Flash Microcontrollers to enable easy and cost-effective implementation of any Internet services such as HTTP, FTP or SMTP to run on customer applications like data storage, e-mail services and on-line software updates. Thanks to the optimized size of the TCP/IP stack, it can be implemented together with the application program, avoiding the use of expensive external modules.



### Product Features

- Internet Services
  - HTTP server enables direct Web browser access
  - FTP server to download files into on-chip MCU Flash memory
  - FTP client for uploading files from anywhere on the Internet
  - SMTP support for sending e-mail

### Communication Ports

- Direct connectivity through RS232
  - Baudrate up to 115 Kbits/sec (or 38400 bps at 11.059 MHz)
  - DB9 connector
  - Null or external modem connection type
- V.34bis Analog Modem – PSTN Line Connection
  - Cermetek Modem chip (Hayes)

### Application Microcontroller

- 32-Kbyte C51 on-chip Flash MCUs:
  - T89C51AC2: with on-chip A/D converter
  - T89C51CC01: with on-chip CAN bus and A/D

### @Web Evaluation Kit Software

- @Web TCP/IP Stack Library for Keil V 6.20C
- FLIP Software (FLexible In-system Programming)
- Quick Start Examples
- Demonstration Software Source Code
- User Guide and Application Notes

### Cables and Power Supply

- Null-modem Cable
- 9V Battery

### Ordering Information

Two versions of the kit are available:

- Internet Protocols
  - PPP, LCP, IPCP, PAP, SLIP, TCP/IP, UDP, ICMP protocols
  - Low Level Dial-up or direct connectivity interface drivers

- Speed up to 33.6-Kbit/sec
- Toll-free call back system
- Standard RJ-11C Jack
- CAN 2.0B Interface (with T89C51CC01 only)
  - On-board CAN transceiver
  - 1-Mbit/sec transfer rate
  - 3-pin connector

- 3V or 5V In-System Programming (ISP)
- 1-Mbit External Optional RAM
- 0°C - 70°C Temperature Sensor

- @Web Flash Configuration Monitor
  - Hayes commands and ISP dial string
  - ISP login and password
  - e-mail address
  - IP address for the SMTP server

- 9V - 12V Power Supply Connector (no supply unit included)

### Kits Part Numbers

ATWebEVK-01 (including T89C51AC2)  
ATWebEVK-02 (including T89C51CC01)