

TimeSys® Linux SDK

Dy 4 CHAMP-AV II DSP board



Combine TimeSys Linux with a powerful processor for defense and aerospace applications

Get control with Linux.

TimeSys Linux provides all of the software and utilities needed for complete development and configuration of Dy 4's commercial off-the-shelf CHAMP-AV II Quad PowerPC Digital Signal Processor (DSP). With TimeSys Linux, you can control timing to the system clock level. The CHAMP-AV II provides timing resources that facilitate precise timing and control of system events.

Get immediate benefits.

- Complete, open operating system, driver environment, and board packaging, affording freedom from expensive proprietary tools
- Simple, royalty-free path to commercial development.
- TimeSys reservations products for allocating processor and network resources to critical processes.
- True real-time performance and all of the benefits of Linux.
- Complete graphical IDE for Linux and Windows development.

Open the box and start.

Dy 4's CHAMP-AV II supports four high-speed/high-performance PowerPC G4 Altivec™ microprocessors from Motorola. Its PowerPC processing core is coupled with an unmatched I/O architecture that enables very high data flow rates and throughput. Additionally, the CHAMP-AV II architecture is suited to applications that place a high premium on processor-to-memory, processor-to-processor, and PMC I/O-to-memory bandwidth.

Get more flexibility with Linux on the CHAMP-AV II.

With TimeSys Linux on the CHAMP-AV II, you get the level of performance and functionality required of a commercial DSP. TimeSys Linux enables you to fine-tune your application for true performance.

You can enhance the TimeSys Linux kernel with TimeSys Linux RTOS to energize embedded and real-time application

development; and TimeSys Linux Reservations to guarantee that needed processor time and network resources are always available.

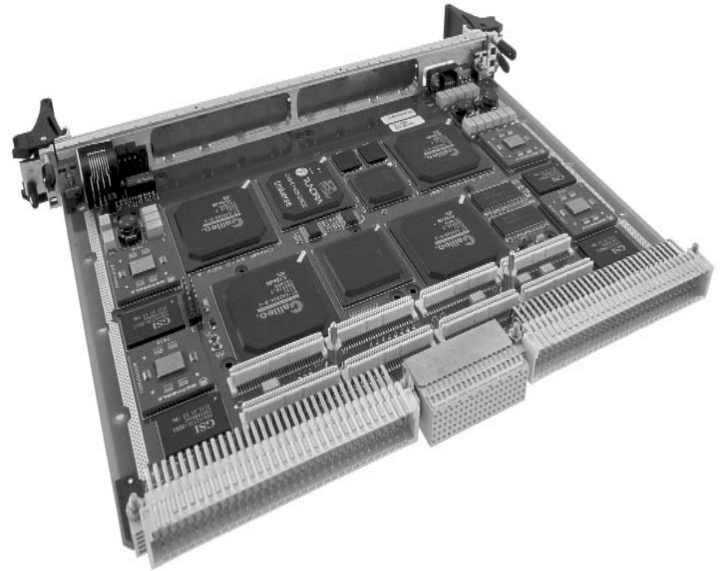
Get better application performance.

The CHAMP-AV II is ideally suited to defense and aerospace systems such as radar, sonar, and signal intelligence. What makes the board unique is that its Quad processor architecture supports two industry standard, PCI-based Mezzanine Cards (PMC), providing flexible I/O to the backplane. Combined with the expansive nature of TimeSys Linux, you can grow the CHAMP-AV II with extensions as your development project evolves.

TimeSys: The Ideal Embedded Linux and Java Solution.

As a full Open Source community member, TimeSys is plugged into mainstream Linux, Eclipse, and Java development. Whether you need to build new software, port Linux to a board, extend performance to real-time, or get application mobility with Linux and Java, TimeSys is your solution.

The Dy 4 CHAMP-AV II DSP board



With any TimeSys SDK, you get:

- Complete support for all hardware interfaces so you can focus on application development.
- Certified Windows or Linux SDKs to help you cross-compile, debug, and build reusable code.
- True Linux kernel that is compatible with all Linux APIs.
- Root filesystem (RFS) that contains all of the applications, utilities, and libraries you need for application development and system configuration.
- Bootloader that simplifies loading and executing different kernels and examining memory and device status.
- The ability to transform Linux into a true RTOS.
- TimeSys optional loadable performance modules for easily adding advanced real-time and reservations capabilities.

Get more information at
www.timesys.com or call
1-888-432-8463.



TimeSys Corporation
 925 Liberty Avenue
 Pittsburgh, PA 15222

Phone: 412-232-3250
 Fax: 412-232-0655

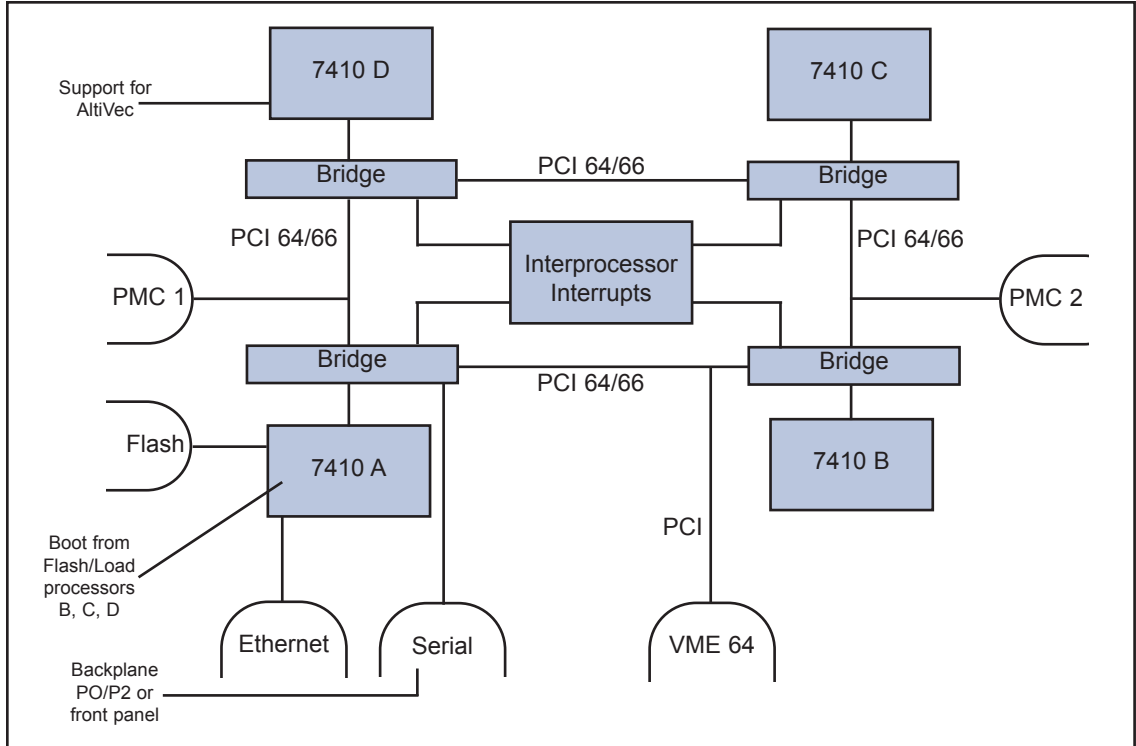
www.timesys.com

Dy 4 Systems
 333 Palladium Dr. M/S 252
 Kanata, Ontario, Canada
 K2V 1A6

Phone: 613-599-9191
sales@dy4.com

www.dy4.com

Implement applications to the edge-of-the-board with confidence.



Features available out of the box:

PowerPC	<input checked="" type="checkbox"/>	500MHz with Altivec support
PMC	<input checked="" type="checkbox"/>	64-bit/66 MHz
Crossbar Bridge	<input checked="" type="checkbox"/>	Non-blocking GT64260
PCI	<input checked="" type="checkbox"/>	64-bit/66MHz
Ethernet Comm	<input checked="" type="checkbox"/>	10/100Base Tx ports
Serial Comm	<input checked="" type="checkbox"/>	RS-232/422
OBIC	<input checked="" type="checkbox"/>	Interrupt mapping, synchronized timer
<input checked="" type="checkbox"/> Standard board feature <input type="checkbox"/> Option with board <input checked="" type="checkbox"/> Not available		

TimeSys Operating Systems

TimeSys Linux RTOS is a hardware-specific, ready-to-run, royalty-free real-time operating system (RTOS) and software development environment for real-time and embedded applications that provides a core Linux open source kernel and binary technology.

TimeSys Reservations extend the power of TimeSys operating systems to guarantee CPU and network response, even in overload conditions.

TimeSys Development Tools

TimeStorm® is an Eclipse-based Integrated Development Environment (IDE) that enables you to build, download, and debug C/C++/Java applications for Linux and Windows development hosts.

TimeTrace® is a profiling environment that pinpoints and diagnoses timing problems within your system and displays fine-grained information about system performance so you can quickly find a solution.

TimeWiz® enables you to model your application and execution environment before you buy and build hardware and software components; simulate how your system will operate without having to write the entire program up front; and perform analysis to help you design a better system.

Copyright © 2003 TimeSys Corporation®, 925 Liberty Avenue, Pittsburgh, PA 15222. All rights reserved under U. S. copyright law and international treaties. TimeSys, the TimeSys logo, and all TimeSys software product names are trademarks or registered trademarks of TimeSys Corporation in the U.S. and other countries. Java and all Java-based trademarks and logos are trademarks or registered trademarks of Sun Microsystems, Inc. in the U.S. and other countries. All other trademarks are the property of their respective owners.