TMS320C6000
CPU and Instruction Set

Reference Guide

Literature Number: SPRU189G
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TEXAS INSTRUMENTS

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About This Manual

This document has been separated into 3 documents to support the digital signal processors (DSPs) of the TMS320C6000™ DSP family. The new CPU and Instruction Set Reference Guides are:

- SPRU731 (TMS320C62x DSP)
- SPRU732 (TMS320C64x/C64x+ DSP)
- SPRU733 (TMS320C67x/C67x+ DSP)

Related Documentation From Texas Instruments

The following documents describe the C6000™ devices and related support tools. Copies of these documents are available on the Internet at www.ti.com. *Tip:* Enter the literature number in the search box provided at www.ti.com.

The current documentation that describes the C6000 devices, related peripherals, and other technical collateral, is available in the C6000 DSP product folder at: www.ti.com/c6000.

SPRU731 —***TMS320C62x DSP CPU and Instruction Set Reference Guide.*** Describes the CPU architecture, pipeline, instruction set, and interrupts for the TMS320C62x digital signal processors (DSPs) of the TMS320C6000 DSP family. The C62x DSP generation comprises fixed-point devices in the C6000 DSP platform.

SPRU732 —***TMS320C64x/C64x+ DSP CPU and Instruction Set Reference Guide.*** Describes the CPU architecture, pipeline, instruction set, and interrupts for the TMS320C64x and TMS320C64x+ digital signal processors (DSPs) of the TMS320C6000 DSP family. The C64x/C64x+ DSP generation comprises fixed-point devices in the C6000 DSP platform. The C64x+ DSP is an enhancement of the C64x DSP with added functionality and an expanded instruction set.

SPRU733 —***TMS320C67x/C67x+ DSP CPU and Instruction Set Reference Guide.*** Describes the CPU architecture, pipeline, instruction set, and interrupts for the TMS320C67x and TMS320C67x+ digital signal processors (DSPs) of the TMS320C6000 DSP family. The C67x/C67x+ DSP generation comprises floating-point devices in the C6000 DSP platform. The C67x+ DSP is an enhancement of the C67x DSP with added functionality and an expanded instruction set.

SPRU190 —***TMS320C6000 DSP Peripherals Overview Reference Guide.*** Provides an overview and briefly describes the peripherals available on the TMS320C6000 family of digital signal processors (DSPs).

SPRU197 —***TMS320C6000 Technical Brief.*** Provides an introduction to the TMS320C62x and TMS320C67x digital signal processors (DSPs) of the TMS320C6000 DSP family. Describes the CPU architecture, peripherals, development tools and third-party support for the C62x and C67x DSPs.

SPRU395 —***TMS320C64x Technical Overview.*** Provides an introduction to the TMS320C64x digital signal processors (DSPs) of the TMS320C6000 DSP family.

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Mailing Address: Texas Instruments
Post Office Box 655303 Dallas, Texas 75265