

Dsp fixed-point 16-bit 500mhz 500mips 160-pin csp-bga

Manufacturers	<a href="#">Analog Devices, Inc</a>
Package/Case	BGA-160
Product Type	Embedded Processors & Controllers
RoHS	
Lifecycle	



Images are for reference only

Please submit RFQ for ADSP-BF533SBBC500 or [Email to us: sales@ovaga.com](mailto:sales@ovaga.com) We will contact you in 12 hours.

[RFQ](#)

## General Description

ADSP-BF533SBBC500 is a digital signal processor (DSP) chip from Analog Devices, Inc., a semiconductor company specializing in signal processing technology. The ADSP-BF533SBBC500 is a member of the Blackfin family of processors, which are designed for embedded systems and applications that require real-time signal processing.

## Features

**Processor Core:** The ADSP-BF533SBBC500 features a 16-bit/32-bit dual-core fixed-point DSP processor with a performance of up to 600 MHz.

**Memory:** It has 64 KBytes of internal SRAM and supports external memory interfaces including SDRAM, DDR, and flash memory.

**Connectivity:** The ADSP-BF533SBBC500 has various communication interfaces such as UART, SPI, I2C, and GPIO, which allow it to connect with other devices and peripherals.

**Instruction Set Architecture:** It supports a dual-instruction set architecture (ISA) consisting of both DSP and RISC instructions, making it versatile for a wide range of signal processing applications.

**Multimedia Capabilities:** The ADSP-BF533SBBC500 has built-in hardware accelerators for video and audio processing, including support for video codecs, audio codecs, and image processing functions.

## Application

**Audio and Speech Processing:** The ADSP-BF533SBBC500 is widely used in applications that require audio and speech processing, such as audio codecs, speech recognition, voice-over-IP (VoIP) systems, and audio effects processing.

**Video Processing:** It can be used in video processing applications, such as video codecs, video surveillance, and video analytics.

**Industrial Control and Automation:** The ADSP-BF533SBBC500 can be used in industrial control and automation systems, such as motor control, robotics, and process control.

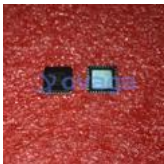
**Medical Devices:** It can be used in medical devices, such as medical imaging systems, patient monitoring, and biomedical signal processing.

**Communications:** The ADSP-BF533SBBC500 can be used in communication systems, such as modems, wireless base stations, and network switches.





## Related Products



### [ADUC7022BCPZ62](#)

Analog Devices, Inc  
LFCSP-40



### [ADUC7020BCPZ62](#)

Analog Devices, Inc  
LFCSP-40



### [ADUC841BSZ62-5](#)

Analog Devices, Inc  
QFP-52



### [ADUC841BSZ62-3](#)

Analog Devices, Inc  
QFP-52



### [ADUC831BSZ](#)

Analog Devices, Inc  
QFP-52



### [ADSP-BF527BBCZ-5A](#)

Analog Devices, Inc  
BGA-208



### [ADSP-21369BBPZ-2A](#)

Analog Devices, Inc  
SBGA-256



### [ADSP-BF561SBBCZ-5A](#)

Analog Devices, Inc  
CSPBGA-256