

# MILITARY HIGH SPEED 8K x 8 CMOS PROM/RPROM

#### **KEY FEATURES**

- Ultra-Fast Access Time
  - $t_{ACC} = 35 \text{ ns}$
  - $t_{CS} = 20 \text{ ns}$
- Low Power Consumption
- Fast Programming

- Pin Compatible with Bipolar PROMs
- Immune to Latch-UP
  - Up to 200 mA
- ESD Protection Exceeds 2000 V
- Available in 300 and 600 Mil DIP, CLLCC, and Flatpack

#### GENERAL DESCRIPTION

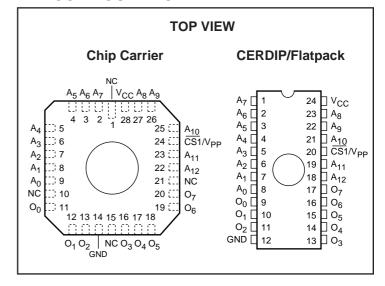
The WS57C49C is a High Performance 64K UV Erasable Electrically Re-Programmable Read Only Memory (RPROM). It is manufactured in an advanced CMOS technology which enables it to operate at Bipolar PROM speeds while consuming only 25% of the power required by its Bipolar counterparts. A further advantage of the WS57C49C over Bipolar PROM devices is the fact that it utilizes a proven EPROM technology. This enables the entire memory array to be tested for switching characteristics and functionality after assembly. Unlike devices which cannot be erased, every WS57C49C in a windowed package is 100% tested with worst case test patterns both before and after assembly.

The WS57C49C is configured in the standard Bipolar PROM pinout which provides an easy upgrade path for systems which are currently using Bipolar PROMs, or its predecessor, the WS57C49B.

#### **MODE SELECTION**

PINS	CS1/V <sub>PP</sub>	vcc	OUTPUTS	
Read	V <sub>IL</sub>	V <sub>CC</sub>	D <sub>OUT</sub>	
Output Disable	V <sub>IH</sub>	Vcc	High Z	
Program	V <sub>PP</sub>	Vcc	D <sub>IN</sub>	
Program Verify	V <sub>IL</sub>	<sup>∨</sup> cc	D <sub>OUT</sub>	

#### PIN CONFIGURATION



### PRODUCT SELECTION GUIDE

PARAMETER	WS57C49C-35	WS57C49C-45	WS57C49C-55	WS57C49C-70
Address Access Time (Max)	35 ns	45 ns	55 ns	70 ns
CS to Output Valid Time (Max)	20 ns	25 ns	25 ns	25 ns

## **ORDERING INFORMATION**

PART NUMBER	SPEED (ns)	PACKAGE TYPE	PACKAGE DRAWING	OPERATING TEMPERATURE RANGE	WSI MANUFACTURING PROCEDURE
WS57C49C-35CMB*	35	28 Pad CLLCC	C1	Military	MIL-STD-883C
WS57C49C-35TMB*	45	24 Pin CERDIP, 0.3"	T1	Military	MIL-STD-883C
WS57C49C-35DMB	45	24 Pin CERDIP, 0.6"	D1	Military	MIL-STD-883C
WS57C49C-45CMB*	45	28 Pad CLLCC	C1	Military	MIL-STD-883C
WS57C49C-45DMB*	45	24 Pin CERDIP, 0.6"	D1	Military	MIL-STD-883C
WS57C49C-45TMB*	45	24 Pin CERDIP, 0.3"	T1	Military	MIL-STD-883C
WS57C49C-55CMB*	55	28 Pad CLLCC	C1	Military	MIL-STD-883C
WS57C49C-55DMB*	55	24 Pin CERDIP, 0.6"	D1	Military	MIL-STD-883C
WS57C49C-55FMB*	55	24 Pin Ceramic Flatpack	F1	Military	MIL-STD-883C
WS57C49C-55TMB*	55	24 Pin CERDIP, 0.3"	T1	Military	MIL-STD-883C
WS57C49C-70CMB*	70	28 Pad CLLCC	C1	Military	MIL-STD-883C
WS57C49C-70TMB*	70	28 Pin CERDIP, 0.3"	T1	Military	MIL-STD-883C

NOTE: The actual part marking will not include the initials "WS."

# PROGRAMMING/ALGORITHMS/ERASURE/PROGRAMMERS

REFER TO PAGE 5-1

The WS57C49C is programmed using Algorithm D shown on page 5-9.

For complete data sheet and electrical specifications see page 2-39.

<sup>\*</sup>SMD product. See page 4-1 for DESC SMD numbers.