



DS1073Z-10A 97MHz EconOscillator

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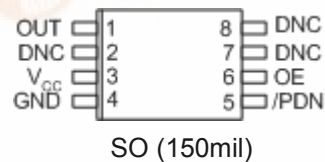
FEATURES

- 97Mhz (± 3 MHz) EconOscillator™
- 8-SO Package, 150mil
- Power-Down and Output-Enable Pin
- +2.7V to +3.6V Operation
- -40°C to +85°C Operation

FREQUENCY OPTION

97.000MHz (Nominal)

PIN ASSIGNMENTS



PIN DESCRIPTIONS

OUT	97MHz CMOS Output
DNC	Do Not Connect
V _{CC}	2.7V to 3.6V
GND	Ground
OE	Output Enable
$\overline{\text{PDN}}$	Power Down

ORDERING INFORMATION

DS1073Z-10A Bulk Parts in Tubes, 97 Parts per Tube

DS1073Z-10A/T&R Tape-and-Reel, 2500 Parts per Reel

DESCRIPTION

The DS10730-10A is a specially programmed and tested DS1073Z in an 8-pin SO (0.05in) package. The device is configured internally and specified like a standard DS1073Z with two exceptions. The divider chain is bypassed and the master oscillator is set to generate a 94MHz to 100MHz square-wave output on pin 1. For AC and DC characteristics and specifications for the device, refer to the data sheet for the standard DS1073Z. Exceptions to these specifications in this document hold precedence over the DS1073 data sheet specifications.

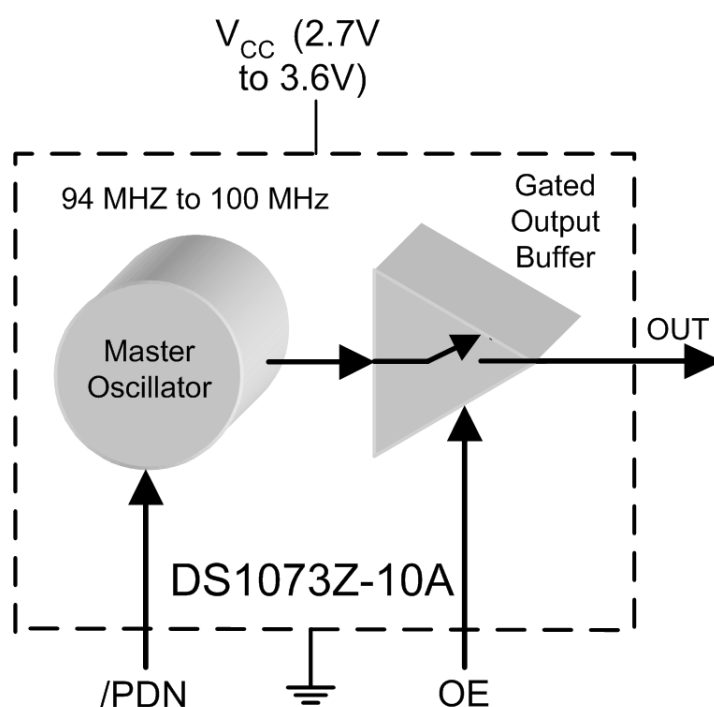
EconOscillator is a trademark of Dallas Semiconductor.



BLOCK DIAGRAM

The DS1073Z-10A is configured for a single, 97MHz output on pin 1 (OUT). The device is optimized for use with the Focus Enhancements FS-460 SDRAM clock input. The pin 2 reference output (OUT0 on the standard DS1073) is disabled. Pins 3 and 4 (V_{CC} and GND, respectively) provide inputs for power. Pin 5 ($\overline{PDN}$) is a control input that disables the master oscillator when low. Pin 6 (OE) is a control input, which disables the pin 1 (OUT) output buffer when low. Pins 5 and 6 should be tied to V_{CC} if not used. Pins 2, 7, and 8 should be left open.

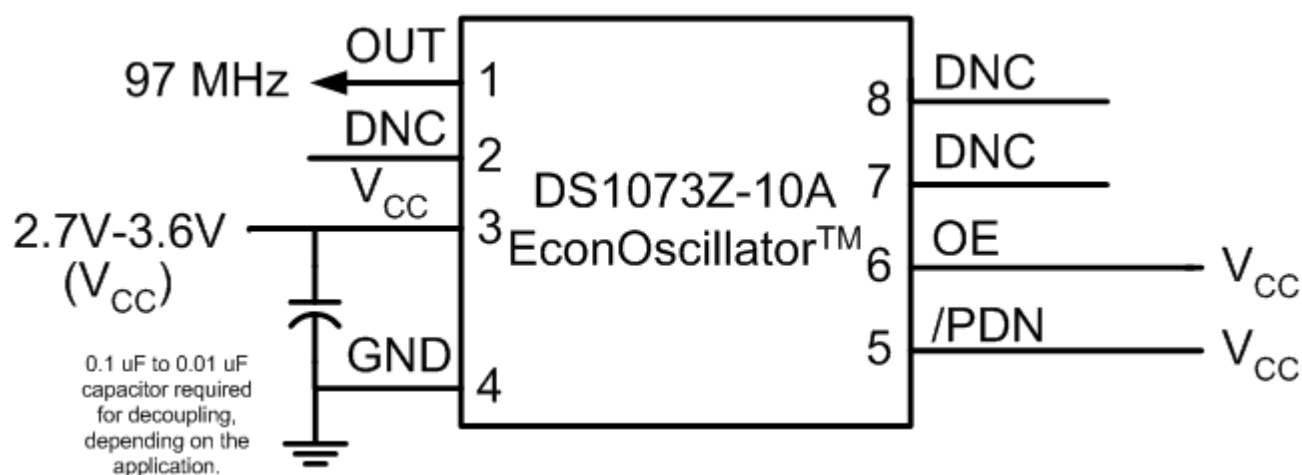
Figure 1. DS1073Z-10A Block Diagram



CONFIGURATION

Figure 2 shows a typical configuration for the DS1073Z-10A. If OE and $\overline{\text{PDN}}$ are not used, they should be tied to V_{CC} . All other unused pins (DNC) should be left open. A decoupling capacitor is required for the application and will vary in value depending on board layout and construction.

Figure 2. DS1073Z-10A Configuration



For further information on the DS1073, including AC, DC, and timing characteristics, a link to the data sheet can be found at:

http://dbserv.maxim-ic.com/quick_view2.cfm?qv_pk=2617

Application information for using the DS1073Z-10A can be found in App Note 180 at:

<http://pdfserv.maxim-ic.com/arpdf/AppNotes/app180.pdf>

Other possible frequency options for the standard DS1073 family of EconOscillators and an online frequency calculator can be found at:

<http://pdfserv.maxim-ic.com/arpdf/AppNotes/tb33.pdf>