

# 8-INPUT DIGITAL **MULTIPLEXER**

B.F PACKAGES

82S31 82S32

# DIGITAL 8000 SERIES SCHOTTKY TTL/MSI

### DESCRIPTION

The 8-Input Digital Multiplexer is the logical equivalent of a single-pole, 8 position switch whose position is specified by a 3-bit input address.

The 82S31 is a variation of the 82S30 that provides open collector output f for expansion of input terms. The 82S32 is similar to the 82S30 except in the effect of the INHIBIT input on the f output. With the INHIBIT low, the selected input appears at the f output and, in complement, on the f output. With the INHIBIT input high, both the f and the f output are unconditionally low.

#### **FEATURES**

- SCHOTTKY-CLAMPED TTL STRUCTURE
- PNP INPUTS
- OPEN COLLECTOR OUTPUT (82S31)
- DIRECT OUTPUT INHIBIT (82\$32)

# **ELECTRICAL CHARACTERISTICS**

Propagation Delay (Typ)

	82632	82S31
A <sub>n</sub> to <del>T</del>	12ns	14ns
In to f	7ns	9ns
Input Load Current (Max)		
(In"0"		400μΑ
l <sub>ln"1"</sub>		10μΑ
Output Current		

20mA @ 0.5V lout"0" 1mA @ 2.7V for 82S31 lout"1"

f output only

## **LOGIC DIAGRAMS**

