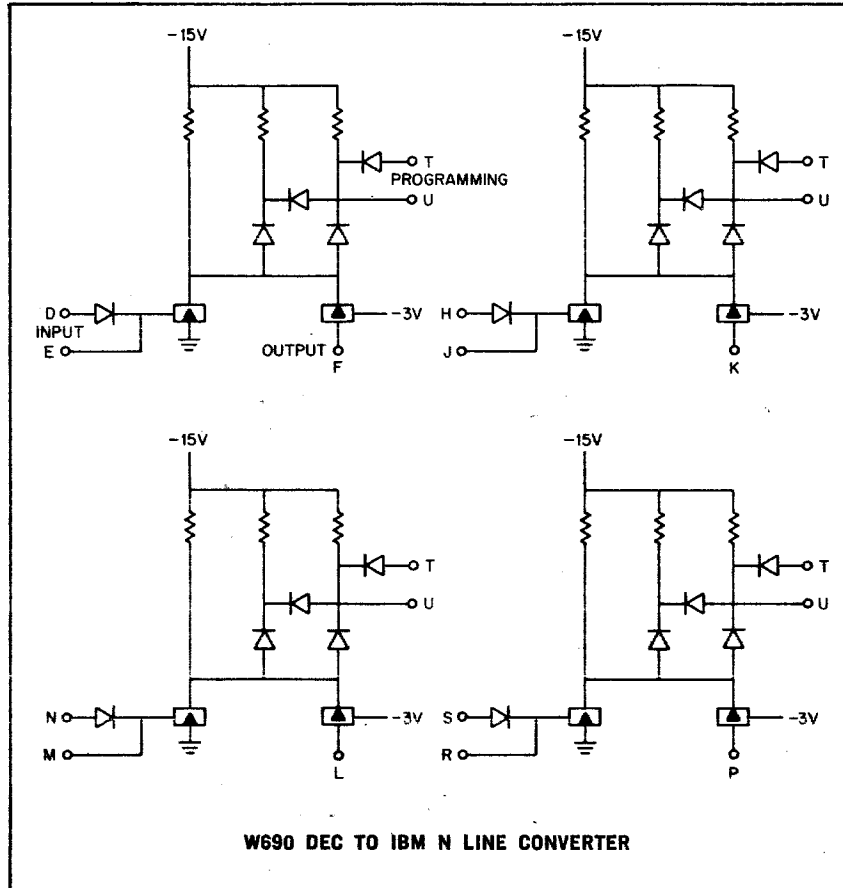


# DEC TO IBM N LINE CONVERTER

## TYPE W690

**W**  
**SERIES**



Each of the four inverting drivers on this module provides outputs compatible with the three types of IBM N lines, depending upon what output currents are programmed by grounds or open circuits at pins T and U. Node points are provided at each input. Maximum delay: 100 nanoseconds driving N transmission lines.

Outputs will drive loads returned to voltages as high as +12, so this module will also drive T, D, or Q lines with suitable biasing networks added.

**INPUTS:** 2 ma at ground, 0 ma at -3v in. Node input provided for connection to R001 or R002 diode gate expander cards.

**OUTPUTS:** Outputs are open for negative inputs. Table below shows nominal output currents for

grounded input. Maximum negative output excursions: -3.5v (clamped). Shorting outputs to ground will not cause damage.

**POWER:** +10v(A)/0 ma; -15v(B)/150 ma.

IBM LINE	NEGATIVE OUTPUT	OUTPUT PROGRAMMING
N Transmission	26 ma	T Open U Open
—	20 ma	T Ground U-Open
C Line	14 ma.	T Open U Ground
N Logic	8 ma	T Ground U Ground