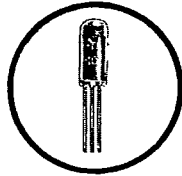
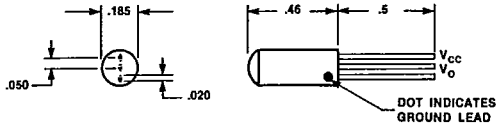
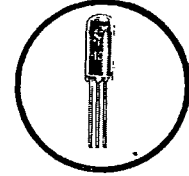
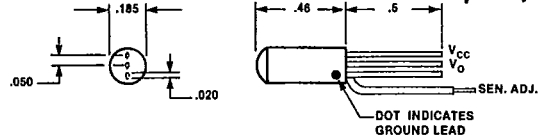


T-41-69  
OP-TEC  
T-41-73  
T-41-71



OT130S, OT131S, & OT132S



OT-115S & OT116S

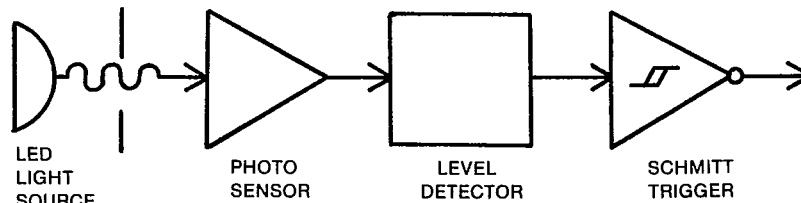
9-CHANNEL OPTICAL READERS — SERIES OT910S, OT911S / OTL911

DESCRIPTION:

The OT910S and OT911S/OTL911 are 9-channel integrated optical readers for use with paper tapes, edge-punched cards, photo-emulsion masked encoder code discs, etc. A clear gap between an IRED and its phototransistor will cause a low logic level output while an obstruction (transmissivity  $\leq 15\%$ ) in the gap will cause a high level output. Data holes in the tape should have a minimum dia. of .032 inch. The OT910S is a complete reader with both an LED emitter array and sensor array. The OT911S/OTL911 is a companion pair IRED emitter array and sensor array which requires customer mounting and is available as a matched pair.

FEATURES

- A ready to use Complete Subsystem
- Schmitt Trigger Conditioned LSTTL Output
- Low Nanosecond Rise and Fall Times
- Reliable GaAs LED Emitters
- High Operating Speeds
- Hybrid Construction
- Cost Effective



FUNCTIONAL BLOCK DIAGRAM — TYPICAL CIRCUIT (Each Channel)

ELECTRICAL CHARACTERISTICS (25°C unless otherwise noted)

PARAMETER	TEST CONDITIONS	MIN.	TYP.	MAX.	UNIT
$V_{OH}$ High-Level Output Voltage	$V_{CC} = 4.75 \text{ V}, I_{OH} = 400 \mu\text{A}$	2.7	3.4		V
$V_{OL}$ Low-level Output Voltage	$V_{CC} = 4.75 \text{ V}, I_{OL} = 8 \text{ ma}$		.35	.5	V
$I_{OH}$ High-Level Output Current				-400	$\mu\text{A}$
$I_{OL}$ Low-Level Output Current			1	8	mA
$t_r$ Rise Time*	$C_L = 15 \text{ pF}, R_L = 2 \text{ K}\Omega$		15	22	nS
$t_f$ Fall Time*	$C_L = 15 \text{ pF}, R_L = 2 \text{ K}\Omega$		15	22	nS
$V_{CC}$ Supply Voltage		4.75	5	5.25	V
$I_{CC}$ Supply Current	Total, All Outputs High	95		130	mA
	Total, All Outputs Low	160		225	

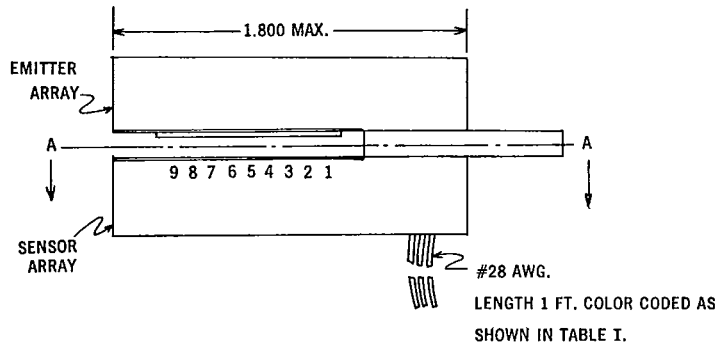
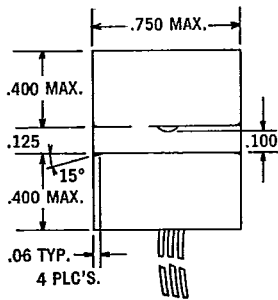
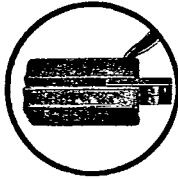
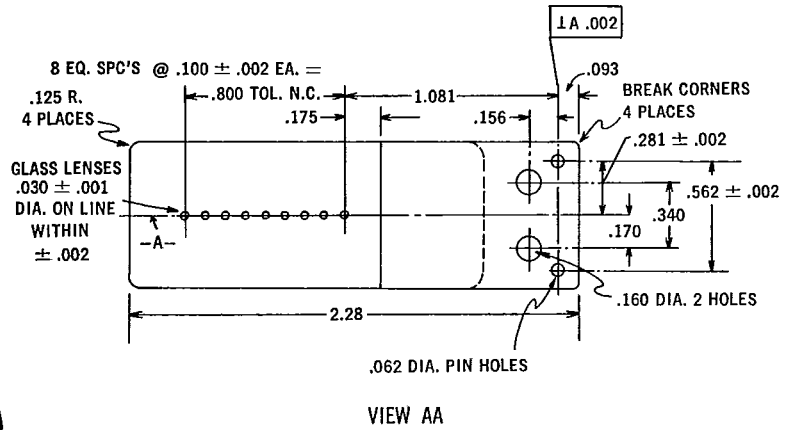
\*Output to Ground

ABSOLUTE MAXIMUM RATINGS

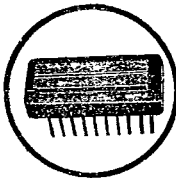
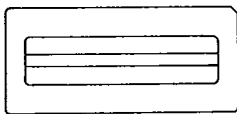
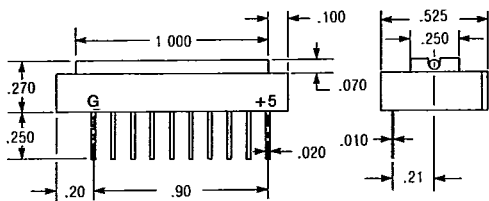
Supply Voltage,  $V_{CC}$  ..... -0.5V to 7V  
 Operating Temperature Range ..... 0°C to 70°C  
 Storage Temperature Range ..... -55°C to 100°C

TABLE I

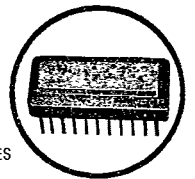
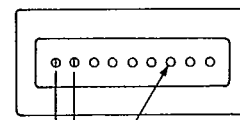
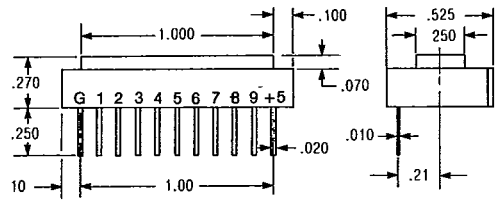
Ch. No.	Wire Color
1	BROWN
2	RED
3	ORANGE
4	YELLOW
5	GREEN
6	BLUE
7	VIOLET
8	GREY
9	WHITE
+5V	RED/WHITE
GND	BLACK/WHITE



OT910S



OTL911



OT911S

**SPECIAL HYBRID CIRCUITS AND PACKAGING**

OPTO TECHNOLOGY is in the business of solving light sensing problems. As one of the leading producers of hybrid photo sensitive devices and circuits, we have the technical know-how and ability to provide solutions to your opto-electronic problems. Our standard products presented in this catalogue are designed to cover a broad range of applications. Often one of them can be adapted to fit your special needs. We are also a producer of custom designed circuits and packaging to fit particular requirements. Call us! Our Applications Department is ready to help you solve your problems.