

NJM2072

■ ABSOLUTE MAXIMUM RATINGS

(Ta=25°C)

PARAMETER	SYMBOL	RATINGS	UNIT
Supply Voltage	V ⁺	8	V
Power Dissipation	P _D	(DIP8) 500 (DMP8) 300	mW
Operating Temperature Range	T _{opr}	-40~+85	°C
Storage Temperature Range	T _{stg}	-40~+125	°C
Maximum Input Voltage	V _{imax}	V ⁺ -1	V

■ ELECTRICAL CHARACTERISTICS

(Ta=25°C, V⁺=3V)

PARAMETER	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Operating Voltage	V ⁺		0.9	-	7	V
Operating Current	I _{CC}	V _{in} =0mVrms, R _L =∞	0.2	0.55	1.5	mA
Input Sensitivity	V _{ins}	f=1kHz	-39	-36	-33	dBV
Attack Time (note1)	T _{atc}	f=1kHz, C _R =10μF	-	1	25	mSec
Recovery Time (note2)	T _{rec}	f=1kHz, C _R =10μF	-	2	-	Sec
Output Current at ON (OUT1)	I _{O1 on}	V _{in} =30mVrms, V _O =0.3V	1	3	-	mA
Output Current at ON (OUT2)	I _{O2 on}	V _{in} =0mVrms, V _O =0.3V	1	3	-	mA
Output Current at OFF (OUT1)	I _{O1 off}	V _{in} =0mVrms, V _O =8V	-	-	1	μA
Output Current at OFF (OUT2)	I _{O2 off}	V _{in} =30mVrms, V _O =8V	-	-	1	μA
Input Resistance	R _{in}		16	20	24	kΩ
Charge Current	I _{chg}		1.0	2.0	3.0	μA

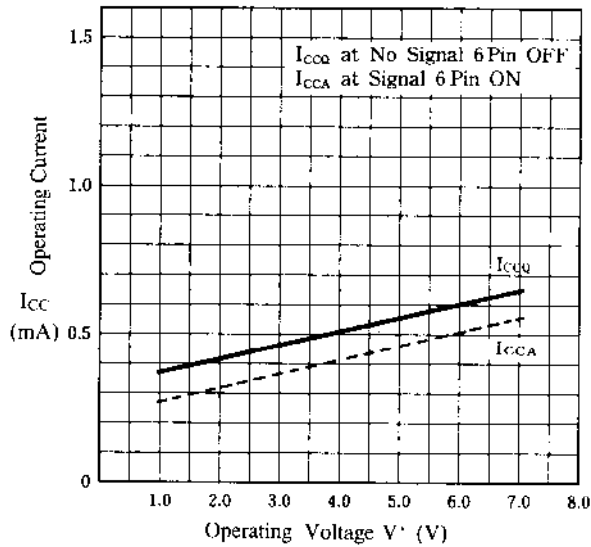
(note1) Attack Time: Period from putting input signal of more than minimum input sensitive signal to output level change.

(note2) Recovery Time: Period from input signal becoming lower than minimum input sensitive signal to output level change.

■ TYPICAL CHARACTERISTICS

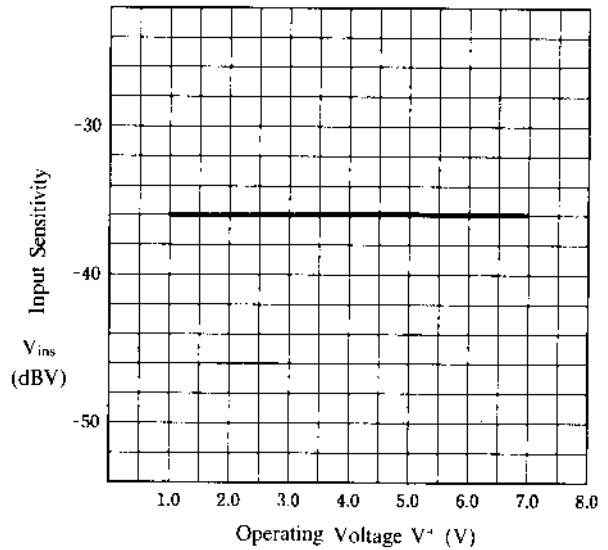
**Operating Current
vs. Operating Voltage**

(Ta=25°C)



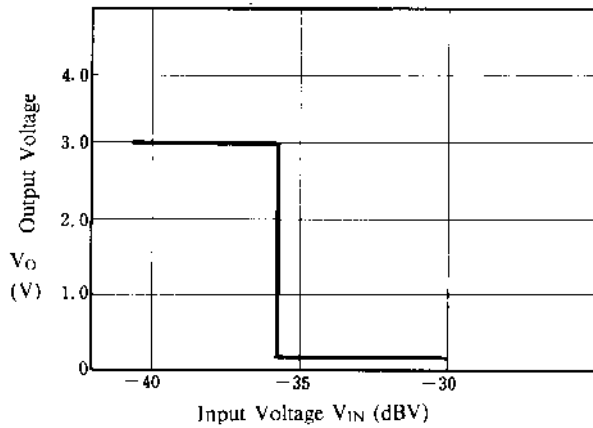
**Input Sensitivity
vs. Operating Voltage**

(Ta=25°C, f=1kHz)

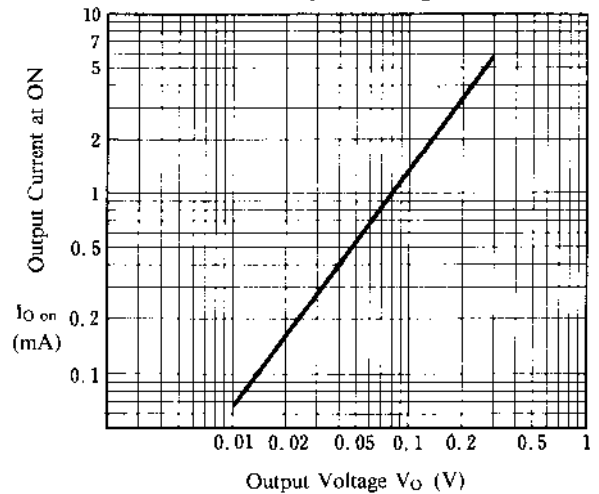


**Output Voltage
vs. Input Voltage**

(V+=3V, f=1kHz, 6 Pin, Ta=25°C)

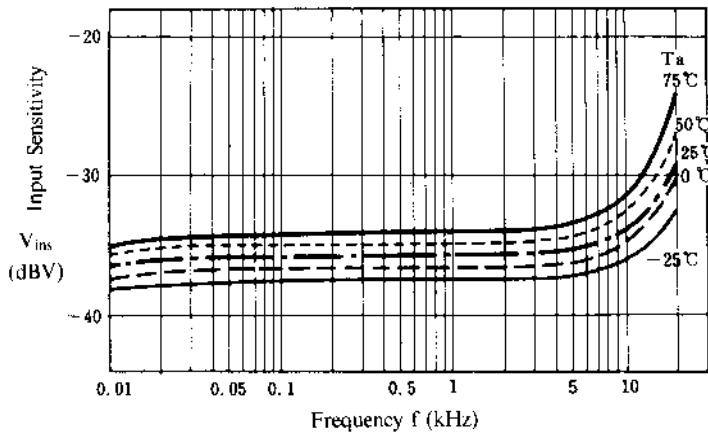


**Output Current at ON
vs. Output Voltage**



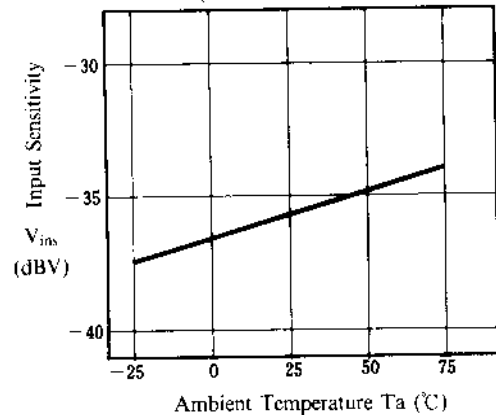
**Input Sensitivity
vs. Frequency**

(V+=3V)



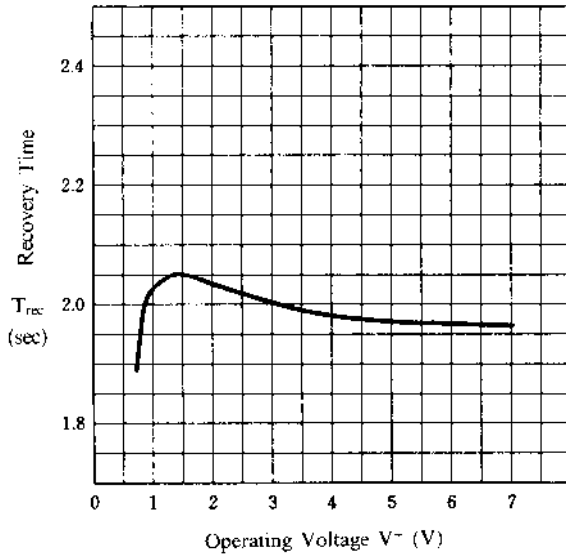
**Input Sensitivity
vs. Ambient Temperature**

(V+=3V, f=1kHz)

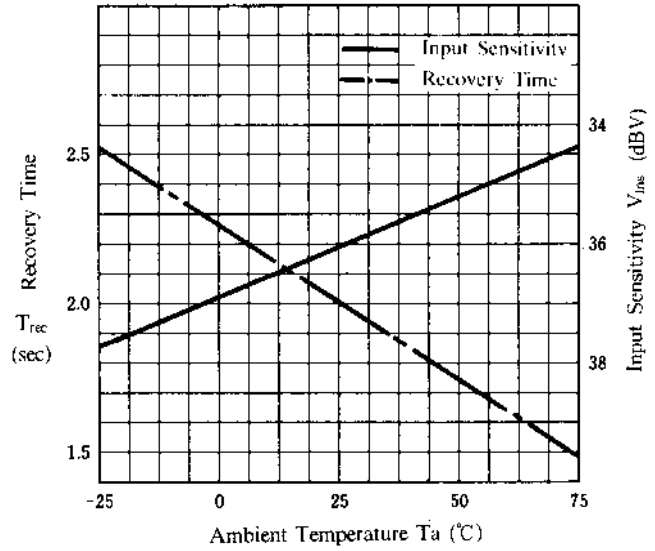


■ TYPICAL CHARACTERISTICS

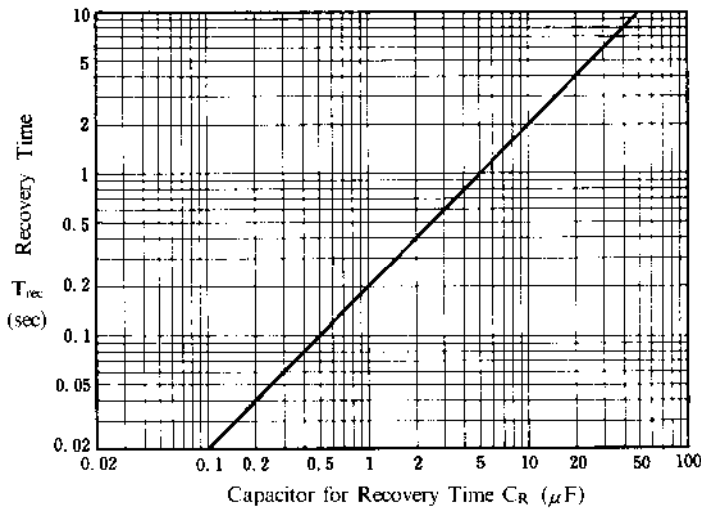
Recovery Time vs. Operating Voltage
($T_a = 25^\circ\text{C}$, $C_R = 10\mu\text{F}$)



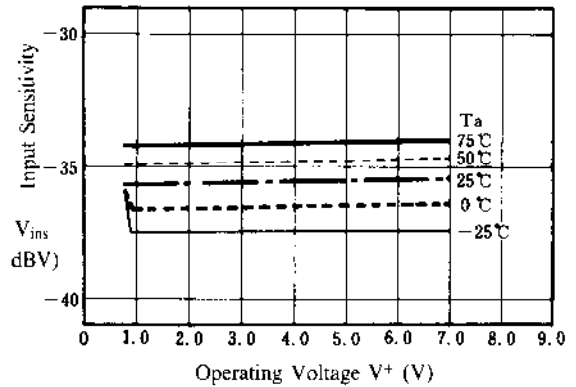
Input Sensitivity Recovery Time vs. Ambient Temperature
($V^+ = 3\text{V}$, $C_R = 10\mu\text{F}$)



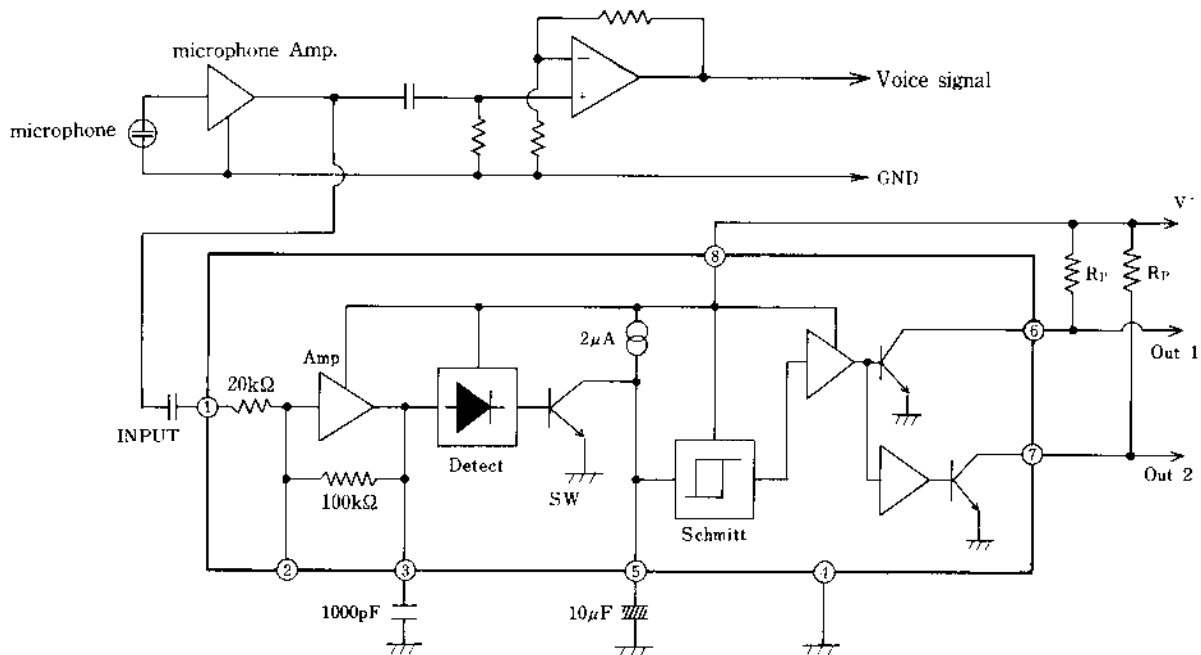
Recovery Time Characteristics
($f = 1\text{kHz}$)



Input Sensitivity vs. Operating Voltage
($f = 1\text{kHz}$)



■ TYPICAL APPLICATIONS

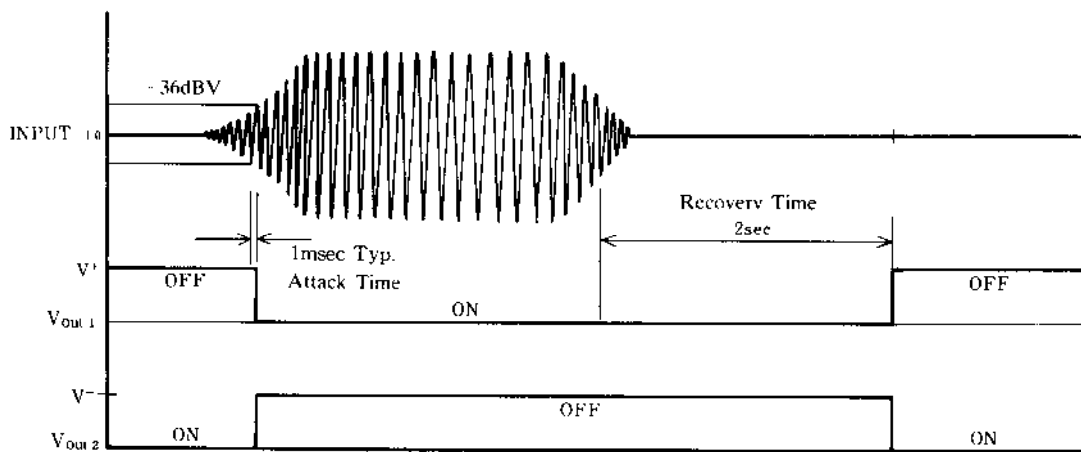


Pins 6 and 7 show an open collector. Mount resistor R_P shown by the following equation.

$$R_P = (V_{MIN}^+ - 0.2) / 0.3 \text{ (k}\Omega\text{)}$$

Resistor R_P to pin 7 is omissible, if pin 6 only is used. But resistor R_P to pin 6 should be put when Out2 only is used.

V_{MIN}^+ is minimum supply voltage.



[CAUTION]
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