

Date code

Month of production	
Month	Mark
1	1
2	2
3	3
4	4
5	5
6	6
7	7
8	8
9	9
10	X
11	Y
12	Z

Model code	Year of production (Christian year)
D	Even year
d	Odd year

Country of origin

Japan, Indonesia or Philippines
(Indicated on the packing case)

■ Absolute Maximum Ratings (T_a=25°C)

	Parameter	Symbol	Rating	Unit
Input	*1 Forward current	I _F	50	mA
	*1, 2 Peak forward current	I _{FM}	1	A
	Reverse voltage	V _R	6	V
	Power dissipation	P	75	mW
Output	Supply voltage	V _{CC}	-0.5 to +17	V
	Output current	I _O	50	mA
	Power dissipation	P _O	250	mW
	Operating temperature	T _{opr}	-25 to +85	°C
	Storage temperature	T _{stg}	-40 to +100	°C
	*3 Soldering temperature	T _{sol}	260	°C

*1 Refer to Fig. 1, 2, 3

*2 Pulse width ≤ 100μs, Duty ratio=0.01

*3 For 5s or less

■ Electro-optical Characteristics (T_a=25°C)

	Parameter	Symbol	Condition	MIN.	TYP.	MAX.	Unit	
Input	Forward voltage	V _F	I _F =5mA	-	1.1	1.4	V	
	Reverse current	I _R	V _R =3V	-	-	10	μA	
Output	Operating supply voltage	V _{CC}	-	4.5	-	17	V	
	Low level output voltage	V _{OL}	V _{CC} =5V, I _{OL} =16mA, I _F =5mA	-	0.15	0.4	V	
	High level output voltage	V _{OH}	V _{CC} =5V, I _F =0	4.9	-	-	V	
	Low level supply current	I _{CCL}	V _{CC} =5V, I _F =5mA	-	1.7	3.8	mA	
	High level supply current	I _{CCH}	V _{CC} =5V, I _F =0	-	0.7	2.2	mA	
Transfer characteristics	*3 "Low→High" threshold input current	I _{FHL}	V _{CC} =5V	-	1	5	mA	
	*4 Hysteresis	I _{FLH} /I _{FHL}	V _{CC} =5V	0.55	0.75	0.95	-	
	*6 Response time	"High→Low" Propagation delay time	t _{PHL}	V _{CC} =5V, I _F =5mA, R _L =280Ω	-	3	9	μs
		"Low→High" Propagation delay time	t _{PLH}		-	5	15	
		Rise time	t _r		-	0.1	0.5	
Fall time		t _f	-		0.05	0.5		

*4 I_{FHL} represents forward current when output goes from "High" to "Low".

*5 I_{FLH} represents forward current when output goes from "Low" to "High".

*6 Test circuit for response time is shown in Fig.12.