

Notes

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●Electrical characteristics (Unless otherwise specified Ta=25°C, V_{CC}=9V, and P=38.9MHz)

Parameter	Symbol	Min.	Typ.	Max.	Unit	Conditions
(PLL)						
PLL capture range 1	f _{CU}	0.5	+0.9	—	MHz	CW=80dB μ frequency variation
PLL capture range 2	f _{CL}	—	-0.9	-0.5	MHz	
PLL lock range 1	f _{LU}	0.6	+2.0	—	MHz	
PLL lock range 2	f _{LL}	—	-2.0	-0.6	MHz	
VCO control sensitivity	β	0.5	1.3	—	kHz/mV	
(SIF) P=38.9MHz/80dB μ S=33.4MHz/70dB μ -12dB (SAW Filter Loss)						
Input sensitivity	V _{SMin}	—	24	33	dB μ	f _m =400Hz, Δ f=50kHz
SIF maximum allowable input level	V _{SMax}	80	90	—	dB μ	5% distortion
FM detector output level	V _{SO}	350	520	700	mVrms	f _m =400Hz, Δ f=50kHz
Audio output S/N	SN _{AF}	52	64	—	dB	f _m =400Hz, Δ f=50kHz
Audio output distortion	THD	—	0.3	1.5	%	f _m =400Hz, Δ f=50kHz
AMR	AMR	40	56	—	dB	Δ f=25kHz, AM30%
MUTE video output voltage	V _{VMUTE}	—	0.7	1.2	V	V _{PIO} =GND
MUTE audio output voltage	V _{SMUTE}	2.3	2.9	3.5	V	V _{PIO} =GND
MUTE start voltage	V _{VMUTE}	—	—	0.3	V	
Intermode switch voltage	V _{9INT}	0.1	—	1.0	V	
VO4.5M output level	V _{VO4.5M}	10	20	40	mV _{PP}	Intermode P=80dB μ , P/S=20dB (use FET probe)
(MODE)						
MODE voltage range (M)	V _{15M}	—	0	0.5	V	REF—OSC=5MHz
MODE voltage range (B/G)	V _{15BG}	6.0	V _{REG}	—	V	REF—OSC=6MHz
MODE voltage range (D/K)	V _{15DK}	2.20	2.40	2.60	V	REF—OSC=6MHz
MODE voltage range (I)	V _{15I}	4.10	4.30	4.50	V	REF—OSC=6.5MHz

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Parameter	Symbol	Min.	Typ.	Max.	Unit	Conditions
(PLL)						
PLL capture range 1	f _{CU}	0.6	+1.2	—	MHz	CW = 80dB μ frequency variation
PLL capture range 2	f _{CL}	—	-1.2	-0.6	MHz	
PLL lock range 1	f _{LU}	0.6	+2.0	—	MHz	
PLL lock range 2	f _{LL}	—	-2.0	-0.6	MHz	
VCO control sensitivity	β	0.5	1.3	—	kHz / mV	
(SIF) P=38.9MHz / 80dB μ S=33.4MHz / 70dB μ -12dB (SAW Filter Loss)						
Input sensitivity	V _{SMin}	—	24	33	dB μ	f _m =400Hz, Δ f=50kHz
SIF maximum allowable input level	V _{SMax}	80	90	—	dB μ	5% distortion
FM detector output level	V _{SO}	350	520	700	mVrms	f _m =400Hz, Δ f=50kHz
Audio output S/N	SN _{AF}	52	64	—	dB	f _m =400Hz, Δ f=50kHz
Audio output distortion	THD	—	0.3	1.5	%	f _m =400Hz, Δ f=50kHz
AMR	AMR	40	56	—	dB	Δ f=25kHz, AM30%
MUTE video output voltage	V _{VMUTE}	—	0.7	1.2	V	V _{PI0} =GND
MUTE audio output voltage	V _{SMUTE}	2.3	2.9	3.5	V	V _{PI0} =GND
MUTE start voltage	V _{VIOMUTE}	—	—	0.3	V	
Intermode switch voltage	V _{9INT}	0.1	—	1.0	V	
VO4.5M output level	V _{VO4.5M}	10	20	40	mV _{PP}	Intermode P = 80dB μ , P/S = 20dB (use FET probe)
(MODE)						
MODE voltage range (M)	V _{15M}	—	0	0.5	V	REF-OSC=5MHZ
MODE voltage range (B/G)	V _{15BG}	6.0	V _{REG}	—	V	REF-OSC=6MHZ
MODE voltage range (D/K)	V _{15DK}	2.20	2.40	2.60	V	REF-OSC=6MHZ
MODE voltage range (I)	V _{15I}	4.10	4.30	4.50	V	REF-OSC=6.5MHZ

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