

Differential Amplifiers

Type	Description	Features	Freq. Range DC to MHz	A (typ.) dB	BW (3dB Point) (typ.) kHz	I/F, NF (typ.) dB	AGC Range (typ.) dB	Pkg. No. of Pins*
CA3000	DC Amplifier	- Balanced differential-amplifier configuration with controlled constant-current source - RF, if, and video frequency capability - Balanced agc capability - Operation from dc to 500MHz - CA3028B is controlled for input offset voltage, current, and input bias current, and is intended for "balance" requirements - Push-pull inputs and outputs - CA3005 and CA3006 are identical except for input offset voltage - CA3028 and CA3053 are identical except for 100-MHz noise specification - CA3051 and CA3050 are identical except for package - CA3054 and CA3026 are identical except for package and substrate connection	30	37	650	-	90	10T
CA3001	Video & Wideband Amplifier		29	19	29■	5	60	12T
CA3002	IF Amplifier		20	24	11■	4#	-	10T
CA3026	Dual Independent		120	32□	550†	3.25	75	12T
CA3028A	Differential /Cascode Amplifiers		120	40□	-	7.2#	62	8C, S, T
CA3028B			120	40	8	7.2#	62	
CA3040	Amplifier		55	37	5.5	7.5	-	12T
CA3049	Dual High Frequency		500	22	1.35▲	53	75	12T
CA3050	Dual Differential Amplifiers		20	-	4.3°/600†	-	60	14, D, E
CA3051			20	-	4.3°/600†	-	60	
CA3053	Differential /Cascode Amplifier		120	40	Recommended for IF Amplifier Applications			8E, S, T
CA3054	Dual Independent		120	32	550†	3.25	75	14E
CA3102	Dual High-Frequency		500	22	1.35▲	1.5	7.5	14E

°Min ■RMS ▲GHz #NF °Transistor Array †f_T (MHz) □G_p Min. at 100MHz Cascode. 16dB. Diff Ampl. 14dB

V_{OUT} (p-p V): CA3000, 6.4; CA3001, 5; CA3002, 5.5; CA3028B, 11.5; CA3040, 05. (RMS). T_A Range: -55 to +125°C except for types CA3051, CA3054 (-40 to +85°C)

* See interpretation guide and packaging section

Sample-and-Hold Amplifiers

Type	Sample/Hold Type	Temperature Range	Package*	Acquisition Time (to 0.01%) Typ, +25°C	Charge Transfer Typ, +25°C	Aperture Time Typ, +25°C	Gain Bandwidth Product Typ, +25°C
HA1-2420-2 HA1-2425-5 HA1-2420/883 HA3-2425-5 HA4-2420-8 HA4P2425-5	Low droop rate	-55°C to +125°C 0°C to +75°C -55°C to +125°C 0°C to +75°C -55°C to +125°C 0°C to +75°C	14-pin cerdip 14-pin cerdip 14-pin cerdip 14-pin epoxy 20-pin LCC ceramic 20-pin PLCC epoxy	3.2μs (C _H = 1,000pF)	10pC	30ns	2.5MHz
HA1-5320-2 HA1-5320-5 HA1-5320-8 HA4-5320-8	High speed Low charge transfer Precision Complete-includes hold capacitor	-55°C to +125°C 0°C to +75°C -55°C to +125°C -55°C to +125°C	14-pin cerdip 14-pin cerdip 14-pin cerdip 20-pin LCC ceramic	1μs (C _H = Internal)	0.1pC	25ns	2.0MHz C _H = 100pF
HA1-5330-5 HA1-5330-4 HA1-5330-2 HA1-5330/883 HA4-5330/883	Very high speed Precision monolithic Complete-includes hold capacitor	0°C to +75°C -25°C to +85°C -55°C to +125°C -55°C to +125°C -55°C to +125°C	14-pin cerdip 14-pin cerdip 14-pin cerdip 14-pin cerdip 20-pin LCC ceramic	500ns (C _H = Internal)	0.05pC	20ns	4.5MHz

* See interpretation guide and packaging section