

Regulators, V/F Converters and IC for LED Panel Drive

Regulators

Shunt regulator	Model No.	Reference voltage (V)	Output voltage (V)	Shunt current (mA)MAX.	Package	Equivalent
	IR9431/N	2.495 ± 0.037	Vref to 36	100	8DIP/8SOP	TL431

DC/DC converter	Model No.	Control system	Oscillation frequency (kHz)	Peak current (mA)MAX.	Package	Equivalent
	IR3M03A/AN	V/F	0.1 to 100	1 800/1 500	8DIP/8SOP	MC34063P1
	IR3M09N	PWM	40 to 1 200	100	12SSOP	—

Switching regulator	Model No.	Control system	Oscillation frequency (kHz)	Output current (mA)MAX.	Package	Equivalent
	IR9494/N	PWM	1 to 300	250	16DIP/16SOP	TL494
	IR3M01	PWM	5 to 200	100	16DIP	—
	IR3M02A/AN	PWM	1 to 300	250	16DIP/16SOP	MB3759
	IR3M04/N	PWM	100 to 500	± 20	8DIP/14SOP	—

Divided voltage generator for LCD drive	Model No.	No. of circuits	Supply voltage (V)MAX.	Bias ratio	Supply current (mA)MAX.	Package	Remark
	IR3E05	5	42	1/5 to 1/20	0.7	20MFP	Output current limiting circuit
	IR3E05A*	5	42	1/5 to 1/20	0.7		

* Low power consumption type

V/F Converters

Application	Model No.	Linearity (%)MAX.	Input voltage (V)	Full-scale frequency (kHz)MAX.	Output circuit	Supply voltage (V)	Package
General purpose	IR9331/N	0.01	Vcc – 2	100	NPN open collector	4 to 40	8DIP/8SOP

IC for LED Panel Drive

Model No.	Function	Clock (MHz)MAX.	Output current (mA)MAX.	Supply voltage (V)	Package
IR2C53	Serial input, for 16-dot LED panel, constant-current sink output	5	30	4.5 to 5.5	30SDIP