

## EPROM for Flat Piggyback

X44

Type	Structure	Max. Access Time (ns)	Supply Voltage (V)	Write Voltage (V)	Max. Power Dissipation (mA)		Package
					Active	Stand-by	
T4773	32768 x 8	250	4.5~5.5	12.5	30	0.1	LCC32

Notes) EPROM writer connection adapter (BM1101) required, LCC: Leadless Chip Carrier.

## Serial E<sup>2</sup>PROM

X44

Type	I/O Format	Memory Size (bit)	Structure (bit)	Power Supply Voltage (V)	Operating Frequency	Cell Structure	Package
TC89101P	Serial I/O	1K	64 x 16/128 x 8	4.5~5.5	0 ~ 1MHz	Floating gate type	DIP8
TC89102P		2K	128 x 16/256 x 8				
*TC89112P	I <sup>2</sup> C bus I/O	2K	256 x 8	2.7~5.5	0 ~ 100KHz		
*TC89113P		4K	512 x 8				
TC89121P/M	Serial I/O	1K	128 x 8	2.7~5.5	0 ~ 1 MHz		DIP8
TC89122P/M		2K	256 x 8				
TC89121AP/AM		1K	128 x 8	1.8~5.5	0 ~ 1 MHz	SOP8	
TC89122AP/AM		2K	256 x 8				

Notes) Postfix P: Plastic standard DIP (DIP), M: Plastic small outline package (SOP).

## LL-Micon-Series CPU (CMOS)

J2

TYPE	RAM (bit)		ROM (bit)	PORT			LCD DRIVER		Instruction Execution Time (µs)	Supply Voltage (V)	Supply Current (µA)	Package
	WORK	DATA		I	O	I/O	Column	Row				
T20	1024	—	8KW x 14	4	10	12	8/10/16	40/38/32	8 (at 5V)	2.5 ~ 5.5	10 (at 3V)	100-QFP
T21	1024	16K	8KW x 14	4	12	12	8/10/16	46/44/32	8 (at 5V)	2.5 ~ 5.5	10 (at 3V)	100-QFP
T22	1024	64K	8KW x 14	4	2	12	8/10	62/60	4 (at 5V)	2.5 ~ 5.5	15 (at 3V)	100-QFP
T31	1024	16K	16KW x 14	4	15	12	8/10/16/18/-40	40/38/32/30/-	2.7 (at 5V)	2.5 ~ 5.5	40 (at 5V)	100-QFP
T25	1024	—	4KW x 14	4	18	12	8/10/16	40/38/32	2.7 (at 5V)	2.5 ~ 5.5	10 (at 3V)	100-QFP
T27	1024	16K	8KW x 14	4	12	12	8/10	60/58	20 (at 3V)	2.4 ~ 3.6	1 (at 3V)	120 pin CHIP
T29	512	—	2KW x 14	4	—	10	4	32	2.7 (at 5V)	2.5 ~ 5.5	15 (at 3V)	60-QFP
T33	1024	—	4KW x 14	4	6	12	8/10/16	40/38/32	2.7 (at 5V)	2.5 ~ 5.5	10 (at 3V)	80-QFP
TMC17A	1052	6K	4KW x 27	8	—	—	9	60	8 (at 3V)	2.6 ~ 3.4	16 (at 3V)	92-QFP
TMC17B	1052	6K	8KW x 27	8	—	—	9	60	9 (at 3V)	2.6 ~ 3.4	9 (at 3V)	92-QFP
TMC17C	1564	14.5K	8KW x 29	8	—	15	9	60	8 (at 3V)	2.6 ~ 3.4	13 (at 3V)	100-QFP