Specifications

Two-piece type (Conforming to PCMCIA/JEIDA standards)

68-pin 16 bit bus system type conforming to PCMCIA Rel. 1.0/2.0

Part number	Memory type	Storage capacity (bytes)	Access time tACC (nS)	Current consumption (max.) Operating (mA)	Current consumption (max.) Stand-by (mA)	Operating temperature range (℃)	Storage temperature range (℃)	Battery back-up time (Year)	Erase units
WWB065ES20/40	Mixed CMOS SRAM with Sub Battery	64K	200	130	1.5	0~60	−20~65	10	–
WWB129ES20/40		128K						10	
WWB257ES20/40		256K						7.6	
WWB513ES20/40		512K						3.9	
WWB101ES20/40		1M						1.9	
WWB201ES20/40		2M						1.0	
LWB065ES20/40	Low power Mixed CMOS SRAM	64K	200	130	0.3	0~60	−20~65	10	
LWB129ES20/40		128K						10	
LWB257ES20/40		256K						7.6	
LWB513ES20/40		512K						3.9	
LWB101ES20/40		1M						1.9	
LWB201ES20/40		2M						1.0	
KWB257SDX0/Y0	CMOS Mask ROM	256K	250	100	1.0	0~60	−20~65	–	
KWB513SDX0/Y0		512K							
KWB101SDX0/Y0		1M							
KWB201SDX0/Y0		2M							
KWB401SDX0/Y0		4M							
KWB801SDX0/Y0		8M							
HWB257SDX0/Y0	CMOS Flash memor	256K	200	70	1.5	0~60	−20~65	–	Chip
HWB513SDX0/Y0		512K							
HWB101SDX0/Y0		1M							
HWB125SDX0/Y0		1.25M							
HWB201SDX0/Y0		2M							
HWB401SDX0/Y0		4M							
HWB201S8X0/Y0		2M		110					Block
HWB401S8X0/Y0		4M							
HWB801S8X0/Y0		8M							
HWB111S8X0/Y0		10M							
HWB161S8X0/Y0		16M							
OWB065SDX0/Y0	CMOS OTP	64K	200	70	1.5	0~60	−20~65	–	–
OWB129SDX0/Y0		128K							
OWB257SDX0/Y0		256K							
OWB513SDX0/Y0		512K							
OWB101SDX0/Y0		1M							
OWB201SDX0/Y0*		2M							
BWB065SDX0/Y0	CMOS OTP	64K	200	70	1.5	0~60	−20~65	–	
BWB129SDX0/Y0		128K							
BWB257SDX0/Y0		256K							
BWB513SDX0/Y0		512K							
BWB101SDX0/Y0		1M							
BWB201SDX0/Y0*		2M							

Notes: 1. AWB series (without sub battery) are also available.
2. Battery backup time is a reference value based on typical values at Ta = 25℃.
3. Sub battery backup time is 10 minutes at Ta = 25℃.
4. Stand-by current of WWB series is measured when sub battery is fully charged.
5. OWB : programmed
BWB : unprogrammed (for users development)

* : Under development

Attribute memory

Series name	Part code	Attribute information holding methods
WWB/LWB Series	20	2K bytes EEPROM
	40	Without attribute memory ("FF" output)
KWB/HWB/OWB/ BWB Series	X0	2K bytes EEPROM
	Y0	Without attribute memory ("FF" output)