


## GA Series

### microSDHC Memory Card, MLC Model

■ **Product Outline**

GA series is comprised of microSDHC memory cards adopting MLC-type NAND flash memory, which support U1 speed grade of UHS-I. GA series is designed for logging small capacity files and greatly excels in retaining data in such applications as system controllers, data loggers, and handheld terminals. They are formatted to comply with the SD card specification.

■ **Product Specification** (specifications and appearances may be changed without notice.)

Appearance		<b>8GB</b>	
			
Part Number		<b>RP-SMGA08DA1</b>	
Capacity	Available user data area capacity *1)	7,960,756,224 bytes	
Compliant Specification	SD Physical Specification	Ver. 3.01	
	SD speed class	<b>CLASS 10</b>	
	UHS speed grade	<b>U1</b>	
	Speed mode	Default Speed mode, High Speed mode UHS-I (SDR12, SDR25, DDR50, SDR50, SDR104)	
Read/Write Performance (up to)	Read	85 MB/s (SDR104)	
	Write	12 MB/s (SDR104)	
Absolute Maximum Ratings	Supply Voltage	Min : -0.3 V ; Max : +4.6 V	
	Input Voltage	Min : -0.3 V ; Max : VDD +0.3 V	
	Output Voltage	Min : -0.3 V ; Max : VDD +0.3 V	
	Output Current	Min : -24 mA ; Max : +24 mA	
Environmental Specification	Operating Temperature	-25 °C to +85 °C	
	Storage Temperature	-40 °C to +85 °C	
	Humidity	5 % RH to 95 % RH	
	Vibration	15 Gp-p	
	Shock	1,000 G	
	Mating Cycles	10,000 cycles	

\*1) Free user area capacity after formatted.

Absolute Maximum Ratings are the values of limitation, which do not damage the card. So those values do not define the operational range.

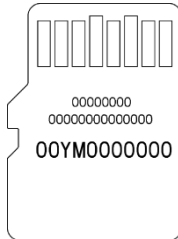
Products comply with EU RoHS directives.

## ■ Marking Specification



“8GB”  
“MADE IN TAIWAN”

Card Capacity  
Country of origin



“00YM0000000”  
Y  
M  
“000000000”,  
“000000000000000”

Serial Number  
Last digit of Manufacture year  
Manufacture month  
(January->A, February->B, )  
Internal control code  
Internal control code

## ■ System Reliability

- a. Error detect and corrective function
- b. Static wear leveling
- c. Bad block management

## ■ Notice and Caution

If you think about the usage for which special quality or reliability of the products is needed and failure or malfunction of the products may directly threaten life or injury for the special usage (aeronautic or cosmic usage, military usage, combustion machine, life support applications or safety applications), please counsel with our contacts in advance.

Write frequency and storage temperature will affect data retention time. Please make a backup for important data.

## ■ Warranty

If the product cannot be used because of failure which is determined as defect in design or in production of the product, it is replaced by same product or equivalent one within 12 months from the delivery date of product.

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