

To: Customers

Notification about firmware change of BiCS FLASH™ e-MMC Version 5.1 Memory Product

We are notifying our customers that we will change internal firmware implemented on BiCS FLASH™ e-MMC Ver.5.1 memory product as described below.

1. CHANGE CONTENTS

This change is due to read performance degradation (degraded to approximate 1% of default value) on the product in operation after storing under high temperature, which is caused by inappropriate firmware structure. The read performance degradation will be improved by the change of firmware structure, therefore Toshiba Memory Corporation requires to recall the unused samples submitted to customers, and will resubmit the new CS samples with revised firmware as following schedule described in Chapter.3.

Please be noticed that the CS samples with the inappropriate firmware cannot be used for customers' products.

2. APPLICABLE PRODUCTS REFLECTING THIS CHANGE

Density	Part Number	Identification of change by Firmware version EXT_CSD[261:254]	
		Old part	New part
16GB	THGAMRG7T13BAIL	0x01	0x02
32GB	THGAMRG8T13BAIL	0x01	0x02
64GB	THGAMRG9T23BAIL	0x01	0x02
128GB	THGAMRT0T43BAIL	0x01	0x02

3. SCHEDULE FOR NEW SAMPLES WITH THIS CHANGE

Due date for recalling old parts	September 13 th , 2019
Target date for resubmitting new parts	October 4 th , 2019

It would be greatly appreciated if you could approve this notice. If you have any inquiry, please don't hesitate to contact our sales representative.

Sincerely,

Keiichi Ryu
Senior Manager
Memory Application Engineering Department I
Memory Division, Toshiba Memory Corporation