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# EDFA232A2PF-GD-F

[DATA SHEETS \(1\)](#) | 
 [SPECS](#) | 
 [SIM MODELS & SOFTWARE](#) | 
 [ROHS CERTIFICATES](#) | 
 [DOCUMENTATION & SUPPORT](#) | 
 [PARTS WITH THE SAME DATA SHEET \(2\)](#) | 
 [WHERE TO BUY](#)

## Data Sheets (1)

Data Sheet



### Production Data Sheet: 168-Ball 2E0F Mobile LPDDR3 SDRAM

168-Ball, 12x12, DDP, 3DP, QDP, Single-Channel, LPDDR3 SDRAM

File Type: PDF

Updated: 10/2014

[DRAM](#)  
[Mobile LPDDR3](#)  
[Mobile Memory Solutions](#)

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## Specs

Orderable Parts for: EDFA232A2PF-GD-F

[SEE ALL LPDRAM PARTS](#)

	Status	Media	FBGA Code	SPD Data	Chipset Validation	PLP	Start Date	Alternative Part
EDFA232A2PF-GD-F-D	Production	Dry Pack	N/A	N/A	N/A	No		N/A
EDFA232A2PF-GD-F-R	Production	Tape & Reel	N/A	N/A	N/A	No		N/A

## Detailed Specifications

Technology	LPDDR3	Density	16Gb	Part Status	Production	RoHS	Yes
Depth	512Mb	Width	x32	Voltage	1.2V	Package	FBGA
Pin Count	168-ball	Clock Rate	800 MHz	Data Rate	DDR3-1600	Cycle Time	
Op. Temp.	-30C to +85C	Brand	Micron				

# Sim Models & Software

## Sim Models

Verilog



### Verilog: 4Gb Mobile LPDDR3 2E0F (ZIP)

DRAM  
Mobile LPDDR3

Verilog simulation model for 4Gb Mobile LPDDR3

File Type: ZIP

Updated: 09/07/2016

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IBIS



### IBIS: 168-Ball 2E0F QDP Mobile LPDDR3 SDRAM (Ball-Height/0.27) (ZIP)

DRAM  
Mobile LPDDR3  
Mobile Memory Solutions

Rev 1.0 168-Ball, QDP, Single-Channel, LPDDR3 SDRAM

File Type: ZIP

Updated: 08/23/2015

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## RoHS Certificates

RoHS Certificates

### RoHS Certificate of Compliance (PDF)

EDFA232A2PF-GD-F

Part-specific certification of how this product meets the requirements of the current DIRECTIVE 2002/95/EC, a.k.a. Restriction of Hazardous Substances (RoHS) Directive.

File Type: (PDF)

Updated: 01/2017

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RoHS Certificates

### China RoHS Certificate (PDF)

EDFA232A2PF-GD-F

Part-specific certification as required by China's Management Methods for Controlling Pollution by Electronic Information Products.

File Type: (PDF)

Updated: 01/2017

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## Documentation & Support

## Technical Notes

### Technical Note: Low-Power Function of Mobile RAM - Deep Power Down (DPD) (PDF)

DRAM  
LPDRAM

(E0598E21) This technical note describes Deep Power Down (DPD), one of the low-power functions that have been adapted to Mobile DRAM.

File Type: PDF

Updated: 02/26/2014

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## Technical Notes

### Technical Note: Low-Power Function of Mobile RAM - Partial Array Self Refresh (PASR) (PDF)

DRAM  
LPDRAM

(E0597E10) This technical note describes Partial Array Self Refresh (PASR), one of the low-power functions that have been adapted to Mobile DRAM.

File Type: PDF

Updated: 02/26/2014

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## Technical Notes

### Technical Note: Low-Power Function of Mobile RAM - Auto Temperature Compensated Self Refresh (ATCSR) (PDF)

DRAM  
LPDRAM

(E0599E20) This technical note describes Auto Temperature Compensated Self Refresh (ATCSR), one of the low-power functions that have been adapted to Mobile DRAM.

File Type: PDF

Updated: 02/26/2014

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## Technical Notes

### TN-00-01: Moisture Sensitivity of Plastic Packages (PDF)

DDR SDRAM  
DDR2 SDRAM  
DDR3 SDRAM  
DDR3L-RS  
[See More Tags](#)

(TN-00-01) This technical note describes shipping procedures for preventing memory devices from absorbing moisture and recommendations for baking devices exposed to excessive moisture.

File Type: PDF

Updated: 02/14/2013

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## Technical Notes

### TN-46-23: Backward Compatibility for Faster LPDDR SDRAM (PDF)

DRAM  
LPDRAM  
[Mobile Memory Solutions](#)

(TN-46-23) This technical note reviews the timing differences between the faster and slower LPDDR SDRAM speeds and explains how faster parts function compatibly with slower parts.

File Type: PDF

Updated: 02/04/2013

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### Parts with the same Data Sheet (2)

EDFA232A2PF-GD-F ( Current )		EDF8132A3PF-GD-F	EDFM432A1PH-GD-F
Part Status	Production	Production	Production
Technology	LPDDR3	LPDDR3	LPDDR3
Density	16Gb	8Gb	12Gb
RoHS	Yes	Yes	Yes
Depth	512Mb	256Mb	384Mb
Width	x32	x32	x32
Voltage	1.2V	1.2V	1.2V
Package	FBGA	VFBGA	VFBGA
Pin Count	168-ball	168-ball	168-ball
Clock Rate	800 MHz	800 MHz	800 MHz
Data Rate	DDR3-1600	DDR3-1600	DDR3-1600
Cycle Time			
Op. Temp.	-30C to +85C	-30C to +85C	-30C to +85C
Brand	Micron	Micron	Micron

### Where to Buy

#### Orderable Parts

	Status	Media	FBGA Code	SPD Data	Chipset Validation	PLP	Start Date	Alternative Part
EDFA232A2PF-GD-F-D	Production	Dry Pack	N/A	N/A	N/A	No		N/A


EDFA232A2PF-GD-F-R	<b>Production</b>	Tape & Reel	N/A	N/A	N/A	No	N/A
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