

JEDEC STANDARD

Universal Flash Storage (UFS) File Based Optimizations (FBO) Extension

Version 1.01

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JEDEC SOLID STATE TECHNOLOGY ASSOCIATION



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UFS HOST FILE BASED OPTIMIZATION (FBO) EXTENSION, VERSION 1.01

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UFS FBO (FILE BASED OPTIMIZATION) EXTENSION, VERSION 1.01

Foreword

This standard has been prepared by JEDEC. The purpose of this standard is to define a UFS File Based Optimization (FBO) Extension specification. This document is an extension of the UFS Standard.

Introduction

The UFS device is a universal data storage and communication media. It is designed to cover a wide area of applications as smart phones, VR(virtual reality) device, AR(augmented reality) device, Drone, 3D games, surveillance system, cameras, organizers, PDAs, digital recorders, MP3 players, internet tablets, electronic toys, etc.

This extension specification describes the File Based Optimization (FBO) feature for UFS to improve device performance by utilizing file base information which is transferred to the device.

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UFS FBO (FILE BASED OPTIMIZATION) EXTENSION, VERSION 1.01

(From JEDEC Board Ballot JCB-23-30, formulated under the cognizance of the JC-64.1 Subcommittee on Electrical Specifications and Command Protocols (Item 147-01))

1 Scope

This standard specifies the extension specification of the UFS electrical interface and the memory device. This document describes the extended feature, called File Based Optimization (FBO), in UFS specification. It also provides some details in how to utilize the FBO for gaining higher performance in UFS devices.

2 Normative References

The following normative documents contain provisions that, through reference in this text, constitute provisions of this standard. For dated references, subsequent amendments to, or revisions of, any of these publications do not apply. However, parties to agreements based on this standard are encouraged to investigate the possibility of applying the most recent editions of the normative documents listed. For undated references, the latest edition of the normative document referred to applies.

[UFS], JEDEC JESD220D, Universal Flash Storage (UFS), Version 3.1