

## Product Data Sheet

## Matrix Grid I/O Board



ACXIO8-GRID

### OVERVIEW

The Matrix Grid I/O Board is used with the DKM Modular KVM Matrix Switches, which provide a high-performance, modular enterprise routing system for complete in-band signal distribution of high-definition video, audio, and data over CATx, multimode or single-mode fiberoptic cable, supporting up to 576 I/O ports in a single frame.

### FEATURES

- ◆ Using the Grid I/O Boards significantly reduces the cabling effort between DKM Modular KVM Matrix Switches. Instead of single grid lines for interconnections using standard I/O boards, the specific grid board enables one 10G fiber connection to handle up to eight grid lines.
- ◆ Based on Ethernet Layer 2 standards, the board enables you to combine DKM Modular KVM Matrix Switches via a direct connection spanning up to 1.4 or 10 km (depending on SFPs used).

### FEATURES (CONTINUED)

- ◆ Using access to a carrier network of 10G network switches and repeaters allows you to connect matrices that can be hundreds of kilometers apart.
- ◆ Reduces cabling costs and efforts.
- ◆ In a setup based on two matrices, the grid I/O boards can be directly connected via the fiber port.
- ◆ In a setup using multiple matrices, the second fiber port on each grid I/O board enables you to set up a ring topology with four grid connections on each port. Each matrix connects to two other matrices.
- ◆ No specific firmware configuration is required, so existing installations are easy to expand.

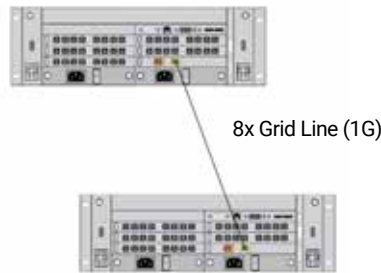
# Matrix Grid I/O Board Data Sheet

## SPECIFICATIONS

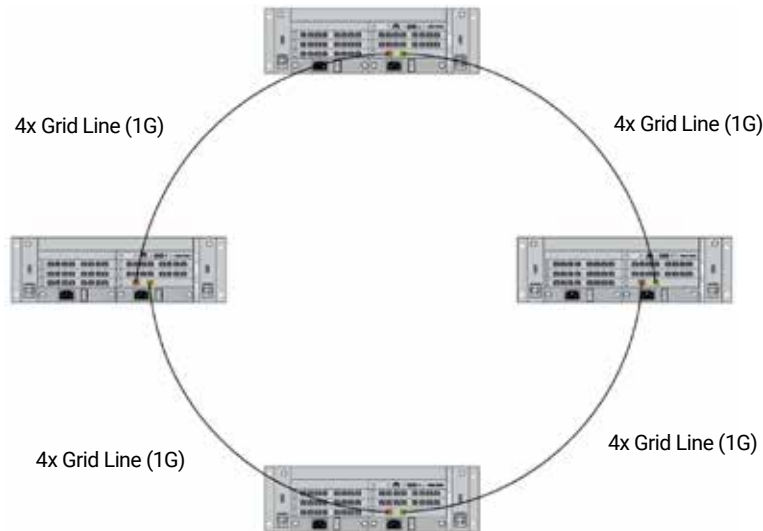
**TABLE 1. SPECIFICATIONS**

SPECIFICATION	DESCRIPTION
Input and Output Interface	Fiber (LC duplex)
Distance per connection (max.)	Single-mode fiber (9- $\mu$ ): 4593 feet (0.87 mi.) or 6.2 mi. (1.4 km or 10 km), depends on SFPs
System Requirement	Already configured matrix grid
Dimensions	0.75"H x 5.8"W x 7.5"D (1.9 x 14.7 x 19 cm)

## DIRECT TOPOLOGY SETUP



## RING TOPOLOGY SETUP



## ORDERING INFORMATION

**Item**

Matrix Grid, 8 to 1 port I/O board, fiber (up to 1.4 km, 10 km upon request), 10G, includes 1 ACXSFPGRID

**Code**

**ACXIO8-GRID**

## DISCLAIMER

Black Box Corporation shall not be liable for damages of any kind, including, but not limited to, punitive, consequential or cost of cover damages, resulting from any errors in the product information or specifications set forth in this document and Black Box Corporation may revise this document at any time without notice.

## ABOUT BLACK BOX

Black Box is a world leading technology solutions provider specializing in complete high-performance KVM, professional A/V signal distribution and extension and switching solutions for mission-critical applications. Black Box is dedicated to delivering superior project engineering, technical support, and 24/7 customer service you can rely on for your most critical operations. Every day, our customers trust us to design, integrate, and maintain reliable control room solutions for broadcasting, post-production, stadiums & arenas, medical, air traffic control, oil & gas, government & military, and utility industries. Leave the tech to us and our comprehensive technology solutions will deliver secure connections, fast-response times, real-time collaboration and more.

© Copyright 2017. Black Box Corporation. All rights reserved. Black Box and the Black Box logo type and mark are registered trademarks of Black Box Corporation. Any third-party trademarks appearing in this publication are acknowledged to be the property of their respective owners.