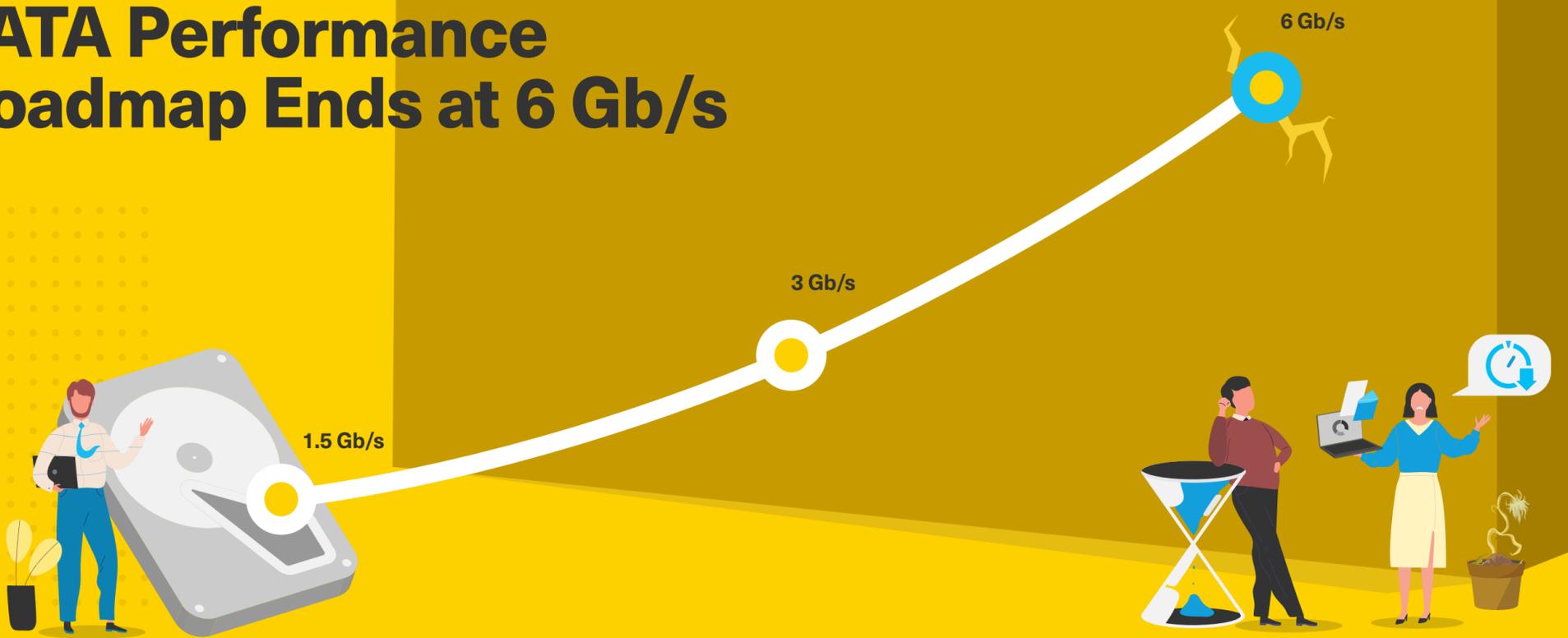


There is Life After SATA

KIOXIA

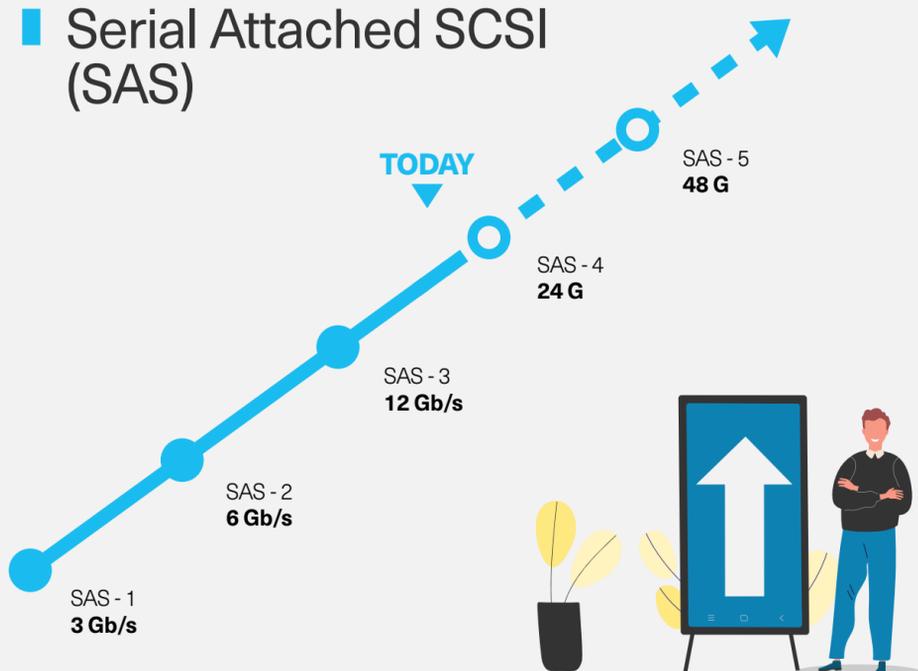
Upgrade application performance with
Value SAS and data center NVMe™ SSDs

SATA Performance Roadmap Ends at 6 Gb/s

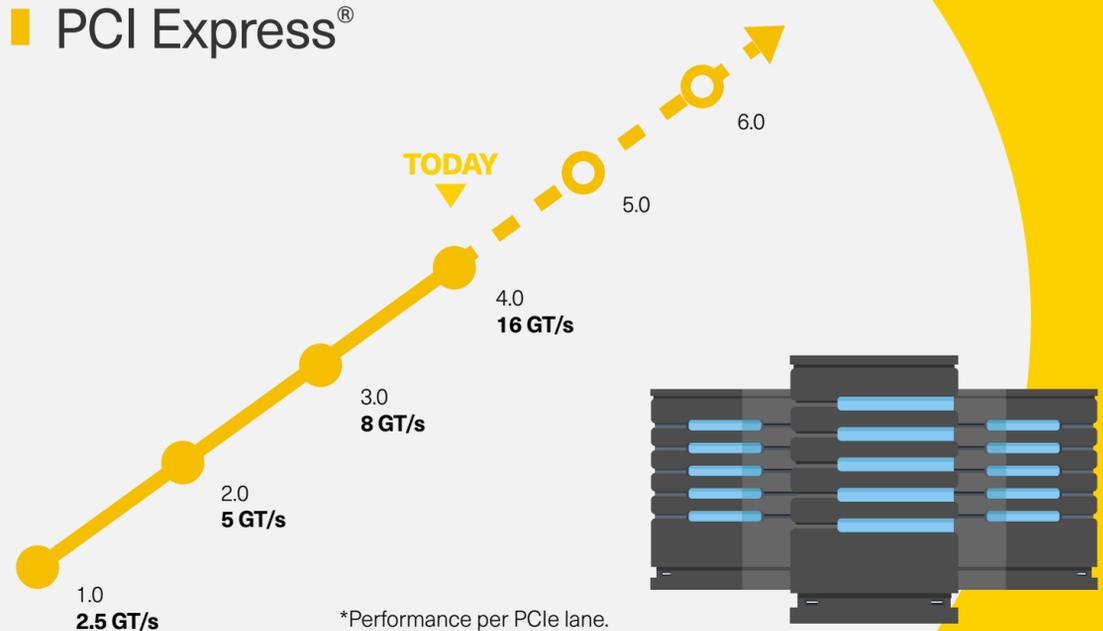


SAS & NVMe/PCIe® Technology Longevity

■ Serial Attached SCSI
(SAS)



■ PCI Express®



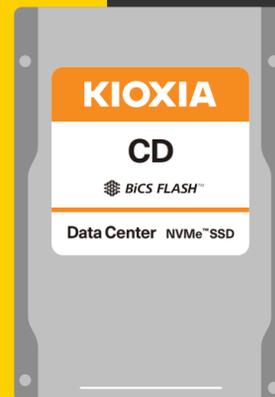
*Performance per PCIe lane.

SAS and NVMe/PCIe interface roadmaps
continue for years to come.

KIOXIA

A Better Life with KIOXIA Next Gen Solutions

Value SAS SSDs



Data Center NVMe SSDs

Priced to Replace SATA



Excellent Cost/Performance Compared to SATA

Single-Port 12Gb/s SAS Interface



Single-Port NVMe Interface

RM5 Series Performance

Sequential reads up to **838 MB/s**
Random reads up to **150,000 IOPS**



CD5 Series (PCIe 3.0) Performance

Sequential reads up to **3,140 MB/s**
Random reads up to **550,000 IOPS**

CD6 Series (PCIe 4.0) Performance

Sequential reads up to **6,200 MB/s**
Random reads up to **1,000,000 IOPS**



Easy Replacement in SAS-Enabled Servers



When Ready to Deploy NVMe SSDs



Real World Application Benefits of Value SAS and Data Center NVMe SSDs

Transactional Database

With RM5 Series over SATA in a Dell EMC PowerEdge™ MX server.

40%

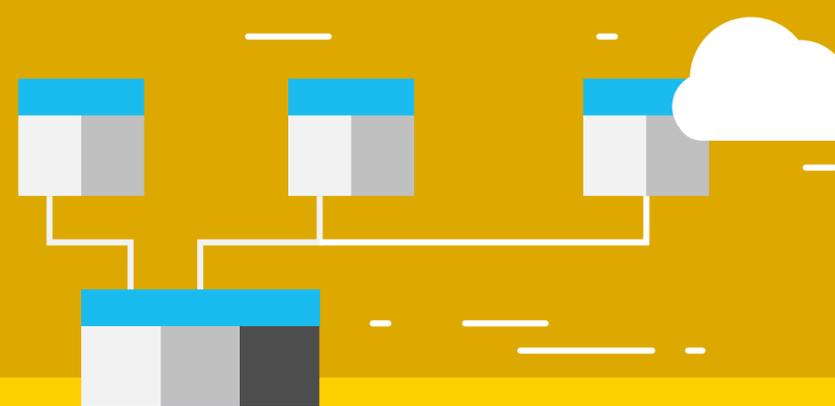
More Orders per Minute¹

Data Analytics

With RM5 Series over SATA in an HPE ProLiant™ DL 385 server.

2.4x

More Operations per Minute²



MongoDB® Analytics

With CD5 Series over SATA in a Dell EMC PowerEdge™ R840 server.

2.37x

More Operations per Minute³

SQL Server Database

With CD5 Series over SATA in an HPE ProLiant™ DL385 server.

57%

More Transactions per Minute⁴

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¹Principled Technologies report: Dell-EMC-PowerEdge-MX-transactional-database-1019-v5.pdf

²Principled Technologies report: RM5-Series-value-SAS-and-CD5-NVMe-mainstream-vs-SATA-data-analytics-1019.pdf

³Principled Technologies report: Dell-EMC-PowerEdge-R840-database-analytics-1019-v5.pdf

⁴Principled Technologies report: RM5-Series-value-SAS-CD5-NVMe-mainstream-vs-SATA-OLTP-0120.pdf