DATA SHEETS



Product Compliance Datasheet

MARKETING NAME...... Dell EMC PowerEdge™ R740, Dell EMC PowerEdge™ 740XD

REGULATORY MODEL...... E38S

REGULATORY TYPE..... E38S001

EMC EMISSIONS CLASS.....: A

EFFECTIVE DATE...... February 24, 2021

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I. Statement of Compliance

This product has been determined to be compliant with the applicable standards, regulations, and directives for the countries where the product is marketed. The product is affixed with regulatory marking and text as necessary for the country/agency. Dell manufacturers and markets Multimedia Equipment (MME), Information Technology Equipment (ITE), Audio Visual Equipment (A/V), Industrial, Scientific, Medical Equipment (ISM) or combinations of these. Generally, products Electromagnetic Compatibility (EMC) and Product Safety compliance is based on International IEC and CISPR standards and their national equivalent along with national standards for Radio (wireless), Telecommunications (Modem) and Energy. Dell products have been verified to comply with the Restriction of Hazardous Substances (RoHS) Directive 2011/65/EU of the European Parliament and the Council. Dell product does not contain any of the restricted substances in concentrations and applications not permitted by the RoHS Directive.

EMC Emissions Class refers to one of the following use environments:

- EMC Class B product is intended for use in residential/domestic environments but may also be used in nonresidential/non-domestic environments.
- EMC Class A product is intended for use in non-residential/non-domestic environments. Class A product may also be utilized in residential/domestic environments but may cause interference and require the user to take adequate corrective measures.

For Product Safety and EMC compliance, this product has been assigned a unique regulatory model and regulatory type that is imprinted on the product regulatory labeling to provide traceability to the regulatory approvals noted on this datasheet. This datasheet applies to any product that utilizes the assigned regulatory model and type including marketing names other than those listed on this datasheet. Dell products with the CE marking have been verified to comply with Energy Related Products (ErP) Directive 2009/125/EC of the European Parliament and of the Council. https://www.dell.com/ErP User Information. REACH (Registration, Evaluation, Authorization and Restriction of Chemicals), Regulation (EC) 1907/2006 of the European Parliament and of the Council is the European Union's (EU) chemical substances regulatory framework. Dell complies with the REACH regulation. For information on SVHC (Substances of Very High Concern), see www.dell.com/REACH. This products compliance documentation, such as this datasheet and the European Union Declaration of Conformity are available on the product support page, manuals tab http://www.dell.com/support. Additional compliance documentation for the product is available upon submitting a request at http://www.dell.com/regulatory_compliance. Please include product identifiers such as marketing name, regulatory model, regulatory type and country that compliance information is needed in the email request.



II. Global Environmental Information

Environmental (Voluntary Marks)				
Country	Approval	Compliance		
Global	ENERGY STAR (Configuration Dependent)	3.0		
China	CEC	Yes		
China	CECP	Yes		
Varies by Country See <u>EPEAT.net</u>	EPEAT (Configuration Dependent)	Refer to EPEAT.net for specific registration levels and countries		

III. Declaration of Similarity

Object of the Declaration		
Product Type	2S Server	
Regulatory Model Number	E38S	
Regulatory Type Number	E38S001	
Trade Name/ Trade Mark	DELL EMC	
Marketing Name(s)	Dell EMC PowerEdge R740	
	Dell EMC PowerEdge R740XD	
	Dell EMC PowerEdge OEM R740xd	
	Dell EMC PowerEdge OEMR R740	
	Dell EMC PowerEdge R740 Telco	
	Dell EMC PowerEdge R740XD Telco	
	Dell EMC Integrated Data Protection	
	Appliance DP4400	
	Dell EMC VxRack SDDC	
	Dell EMC VxRail VXV570	
	Dell EMC VxRail VXV570F	
	Dell EMC VxRail VXS570	
	Dell EMC VxRail VXP570	
	Dell EMC VxRail VXP570F	
	Dell EMC PowerEdge R749	
	Dell EMC Storage NX3240	
	Dell EMC ECS EX300	
	Dell EMC Data Domain DD3300	

Dell Inc. herby declares that the products identified by the product designations listed in this declaration are strictly identical in design (shape, opening, etc.) components, materials, manufacturing process, and markings except for product designation – Trade Name and/or Trade Mark as specified in this declaration.



The products may have very minor differences which do not impact the level of conformity. All products identified by the product designations in this declaration have the same level of conformity according to the certificate(s) provided.

The Trade Name / Trade Mark and/or Marketing Name(s) are the property of Dell Inc. Any differences in the product designation are for marketing purposes only.

Date of Issue	February 24 ^{th,} 2021		Dell Inc.
Title	I Dell Global Product	Signature on behalf of Dell Inc.	Compliance and Environmental Affairs

IV. Power Cords and User Documentation

Dell products are provided with the power cord and user documentation suitable for the intended country of delivery. Products that are relocated to other countries should use nationally certified power cords and plugs to ensure safe operation of the product. Contact Dell to determine if alternate power cords or user documentation in other languages is available for your market.

V. Trade (Import/Export) Compliance Data

For any questions related to importing & exporting classification of Dell products, please obtain information from the following link: http://www.dell.com/learn/us/en/uscorp1/import-export or send email request to www.dell.com/learn/us/en/uscorp1/import-export or send email request as marketing name, regulatory model, regulatory type and country that compliance information is needed in the email request.

VI. Product Dimensions and Weight

2.5 inch hard drive systems

Depth,	Width,	Height,	Weight, kg
mm/cm	mm/cm	mm/cm	
760mm	482mm	87mm	26.3Kg Max

3.5 inch hard drive systems

Depth,	Width,	Height,	Weight, kg
mm/cm	mm/cm	mm/cm	
760mm	482mm	87mm	28.6Kg Max



VII. Performance Data

ErP Lot 9 information is in Appendices A.

For additional information on how Dell's commitment to energy efficiency benefits you go to: Reducing your Footprint

For additional information on ENERGY STAR models refer to the following database: ENERGY STAR Product Finder

VIII. Product Materials Information

Information on Dell's material use is available here. Dell's Restricted Material for Use guidance document is available at www.dell.com/restrictedsubstanceslist.

- The case material is Steel
- This product contains 31.0% post-consumer recycled plastic and /or closed loop recycled plastics (ITE-derived)*

(*Measured as a percentage of total amount of plastic (by weight) in the product as per guidance in EPEAT standard as applies to plastics parts)

Mechanical plastic parts ¹ > 25 g are BFR/PVC free	⊠ Yes □ No □ NA
Marking of plastics parts greater than 25 grams is in accordance with ISO 11469 (see below)	⊠ Yes □ No □ NA
Printed circuit boards (without components) >25g are BFR PVC free ²	☐ Yes ☒ No ☐ NA
Insulation materials of external electrical cables are PVC free	☐ Yes ☒ No ☐ NA
Insulation materials of internal electrical cables are PVC free	☐ Yes ⊠No ☐ NA
Product is BFR/PVC Free (Accessories & Options may not be BFR/PVC-Free, refer to spec ENV0199)	☐ Yes ☒ No

Flame Retardants Used in Motherboard

Part	Flame Retardant
Motherboard	ТВВРА

² Dell will adopt the BFR/CFR/PVC-free definition as set forth in the "iNEMI Position Statement on the Definition of 'Low-Halogen' Electronics (BFR/CFR/PVC-Free)." Plastic parts contain <1000 ppm (0.1 percent) of bromine (if the Br source is from BFRs) and <1000 ppm (0.1 percent) of chlorine if the CI source is from CFRs, PVC or PVC copolymers. All printed circuit board (PCB) and substrate laminates contain bromine/chlorine totaling less than 1,500 ppm (0.15 percent), with maximum chlorine of 900 ppm (0.09 percent) and maximum bromine of 900 ppm (0.09 percent)



¹ Mechanical plastic part: plastic parts that do not internally carry an electrical signal such as housings, brackets, bezels, latches, etc. that form the basic structure of the product and/or have mechanical functions. Plastic parts such as fans, connectors, printer fuser assemblies, etc. are not considered "mechanical plastic parts" in the context of this specification. Plastics parts do not contain more than 0,1% weight (1000 ppm) bromine and 0,1% weight (1000 ppm) chlorine attributable to brominated flame retardants, chlorinated flame retardants, and polyvinyl chloride (Per Dell Spec ENV0424)

Flame Retardants Used in Mechanical Plastic Parts > 25 grams

Resin Material Name	Plastic Part Marking per ISO 11469:2016	Flame Retardant Marking per ISO 1043-4 (i.e. FR(16), FR(40), etc.)	Flame Retardant (i.e. TBBPA, triaryl phosphate ester, etc.)	List applicable R- Phrase(s) or Hazard Statement(s) per EU Directive 67/548/EEG or 1272/2008
Cycoloy- RCY6214	>PC+ABS<	FR40	V0	N/A
Cycoloy C6200	>PC+ABS<	FR40	V0	N/A
LEXAN HF 1130	>PC+ABS<	FR40	V-2	N/A

Mercury Information

Number of bulbs	Average per bulb
0	< mg

Additional information:

- Refer to Dell Technologies' Chemical Use Policy for more information on RoHS and REACH.
- Products MSDS (Material Safety Data Sheets):
 - o Batteries: <u>Battery MSDS Documentation and Declaration</u>
 - o Printer Toner and Ink: MSDS Documentation

IX. Packaging

Information on Dell's sustainable packaging effort available here. Additional materials restricted in Packaging as per Dell's Material Restricted for Use Standard document can be found at www.dell.com/restrictedsubstanceslist.

X. Batteries

Below is a listing of batteries that could be present in the product:

Battery Description – Batteries	Battery Type	Battery Weight (kg)	Rating
CR-2032 coin cell	Lithium Metal	0.003	3Vdc
NVDIMM Battery (optional)	Lithium Ion	0.284	9.8Vdc, 20Wh
PERC with Battery Pack (optional)	Lithium Ion	0.016	3.7Vdc, 1.8Wh



XI. Design for Environment

Dell systems are, when applicable, designed for easy assembly, disassembly, and servicing. For more information on Dell's Environmental product attributes please visit https://www.dell.com/learn/is/en/iscorp1/dell-environment-greener-products

XII. Recycling / End-of-Life Service Information

Take back and recycling services are offered for this product in certain countries. If you want to dispose of system components, please visit www.dell.com/recyclingworldwide and select the relevant country.

XIII. Helpful Links

- Environmental Policy
 - https://i.dell.com/sites/csdocuments/Corporate_corp-Comm_Documents/en/dell-global-environmental-policy.pdf
- Environment Website
 - https://www.dell.com/learn/ai/en/aicorp1/dell-environment
- Corporate Social Responsibility Report
 http://www.dell.com/Learn/us/en/uscorp1/report?c=us&l=en&s=corp&delphi:gr=true
- ISO 14001 Certification
 - http://i.dell.com/sites/content/corporate/corp-comm/en/Documents/dell-iso14001-worldwide.pdf
- Materials Restricted for Use
 - www.dell.com/restrictedsubstanceslist
- Chemical Use Policy
 - http://i.dell.com/sites/doccontent/corporate/environment/en/Documents/chemical-use-policy.pdf
- Product Carbon Footprint
 - https://www.dell.com/learn/us/en/uscorp1/corp-comm/environment_carbon_footprint_products
- RoHS Compliance
 - https://www.dell.com/learn/us/en/uscorp1/envt-info-materials
- REACH Compliance
 - www.dell.com/REACH
- Recycling Information
 - http://www.dell.com/recycling
- Supplier Responsibility
 - https://www.dell.com/learn/gy/en/gycorp1/cr-social-responsibility



Appendix A: ErP Lot 9 Servers and Data Storage Products: Information for end-users

The EU Commission Regulation (EU) 2019/424 (ErP Lot 9) ANNEX II Section 3.0 defines the information requirements to be provided by Manufacturers. This information is documented below or via a link is provided to a free access website where the information is maintained. A reference column is included to align the information with the format in the annex of the regulation. Where the information has already been recorded in the body of the Product Compliance Datasheet a note is made to avoid duplication.

For any follow up a request should be sent to: http://support.dellproductcompliance.com

Annex II	Reporting Requirement	Link to Firmware / Security Updates
Sect 3.0		
	Latest available version of firmware updates are available on the Product Page for the Marketing Model of the Server Solution	https://www.dell.com/support
	Latest available version of firmware updates are available on the Product Page for the Marketing Model of the Server Solution	https://www.dell.com/support/security/

High End Configuration:

Annex II	Reporting Requirement	Information Requirements /		
Sect 3.1		link to free access website		
a.	product type	reference product compliance datasheet r		
b.	manufacturer's name, registered trade name and registered trade address at which they can be contacted;	reference product compliance datasheet		
C.	product model number, and if applicable the low-end performance configuration and the high-end performance configuration model numbers;	reference product compliance datasheet		
d.	year of manufacture;	July 11 th , 2017		
e.	PSU efficiency at 10 % (if applicable), 20 %, 50 % and 100 % of rated output power,	reference ErP Lot 9 power supply table		
f.	power factor at 50 % of the rated load level, with the exception of direct current servers, rounded to three decimal places;	reference ErP Lot 9 power supply table		
g.	PSU rated power output (Watts), rounded to the nearest integer	reference ErP Lot 9 power supply table		
h. idle state power, expressed in Watts (rounded to the fire decimal place)		104.5W		
i.	product model number, and if applicable the low-end performance configuration and the high-end performance configuration model numbers;	1 additional 1100W PSU, 3.5" HDDx2, additional 380GB memory, Dual port 1G NIC Card		
j.	maximum power, expressed in Watts (rounded to the first decimal place);	638.9W		
k.	declared operating condition class,	Operating condition class A2 [reference user manual in documentation tab on https://www.dell.com/support]		
l.	idle state power (Watts) at the higher boundary temperature of the declared operating condition class,	132.8W [limit does not apply]		
m.	the active state efficiency and the performance in active state of the server;	33.123		
n.	secure data deletion	https://www.dell.com/support/manuals/idrac		
0.	list recommended combinations with compatible chassis	Applies to blade servers only		
p.	if a product model is part of a server product family, a list of all model configurations that are represented by the model shall be supplied.	All available configurations can be selected on https://www.dell.com for a particular product model		



Low End Configuration:

Annex II Reporting Requirement Sect 3.1		Information Requirement / link to free access website	
e.	PSU efficiency at 10 % (if applicable), 20 %, 50 % and 100 % of rated output power,	reference ErP Lot 9 server power supply table	
f. power factor at 50 % of the rated load level, with the exception of direct current servers, rounded to three decimal places;		reference ErP Lot 9 server power supply table	
g.	PSU rated power output (Watts), rounded to the nearest integer	reference ErP Lot 9 server power supply table	
h.	idle state power, expressed in Watts (rounded to the first decimal place)	80.4W	
i.	list of all components for additional idle power allowances, if any (additional PSU, HDDs or SSDs, additional memory, additional buffered DDR channels, additional I/O devices);	1 additional 495W PSU, 3.5" HDDx2, additional 92GB memory, Dual port 10G and Dual port 1G NIC card	
j.	maximum power, expressed in Watts (rounded to the first decimal place);	180.7W	
k.	declared operating condition class,	Operating condition class A2 [reference user manual in documentation tab on https://www.dell.com/support]	
l.	idle state power (Watts) at the higher boundary temperature of the declared operating condition class,	84.9W [limit does not apply]	
m.	the active state efficiency and the performance in active state of the server:	12.939	

ErP Lot 9 Server Power Supply Table (applicable for high end and low end configurations						
Power Supply Model Number						
D2000E-S0						
Z2000E-S1						
D1600E-S0						
D1100E-S0						
D1100E-S3						
D1100E-S4						
L1100E-S1						
E1100D-S0	https://www.plugloadsolutions.com/80PlusPowerSuppliesDetail.aspx?id=26&type=1					
D750E-S6						
D750E-S7						
E750E-S1						
L750E-S0						
D750E-S2						
E495E-S1						
D495E-S1						



Annex II Sect 3.2	Reporting Requirement	Information Requirements / link to free access website	
a.	product type	reference product compliance datasheet	
b.	manufacturer's name, registered trade name and registered trade address at which they can be contacted;	reference product compliance datasheet	
C.	product model number, and if applicable the low-end performance configuration and the high-end performance configuration model numbers;	reference product compliance datasheet	
d.	year of manufacture;	July 11 th , 2017	
e.	PSU efficiency at 10 % (if applicable), 20 %, 50 % and 100 % of rated output power,	o reference ErP Lot 9 storage power supply table	
f.	power factor at 50 % of the rated load level, with the exception of direct current servers, rounded to three decimal places;	reference ErP Lot 9 storage power supply table	
g.	declared operating condition class	Option 1) This product has been tested in order to verify that it will function within the boundaries of the declared operating condition class' A2 Option 2) ref. user manual in documentation tab on https://www.dell.com/support (delete option not selected)	
h.	secure data deletion	https://i.dell.com/media-sanitization	

Annex II	Reporting Requirement	Information Requirement / link to free access website	
Sect 3.3			
h.	indicative weight range of the following CRMs: (a) Cobalt in the batteries; (b) Neodymium in the HDDs	Contact: http://support.dellproductcompliance.com	
i.	instructions on the disassembly operations;	reference user manual in documentation tab on https://www.dell.com/support	





Product Compliance Datasheet

MARKETING NAME..... Regulatory Model Reference Information

REGULATORY MODEL...... E10J

REGULATORY TYPE..... E10J001

EMC EMISSIONS CLASS.....: A

EFFECTIVE DATE..... February 28, 2021

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I. Regulatory Model Reference Information

Dell EMC storage, data protection and converged infrastructure *systems* are configured-to-order from combinations of different storage *platforms* and/or *server* appliances. This Product Compliance Datasheet applies strictly to the single *platform* or *appliance* as designated in the Regulatory Model field on the title page. This datasheet does NOT apply to the parent *systems* that incorporate this Regulatory Model, nor does it apply to any other Regulatory Models that may be peers integrated alongside this Regulatory Model in parent *systems*.

For reference purposes, the table below provides a list of the Marketing Names of the systems that may incorporate this Regulatory Model. The listed systems may include one or more additional Regulatory Models. A Regulatory Model Reference Letter that lists all the Regulatory Models included in each system is available for each Marketing Name at https://support.dellproductcompliance.com/hc/en-us/requests/new.

Regulatory Model to Marketing Name Reference			
Platform or Appliance Type	Storage Array Enclosure		
Regulatory Model Number	E10J		
Regulatory Type Number	E10J001		
System Trade Name / Trademark	Dell EMC or DELL		
System Marketing Name(s) that	Dell EMC PowerVault OEMR ME4024, Dell		
incorporate this Regulatory Model	EMC PowerVault OEMR ME424, Dell		
	Storage SCv2020, Dell Compellent		
	SC2020		

II. Statement of Compliance

This product has been determined to be compliant with the applicable standards, regulations, and directives for the countries where the product is marketed. The product is affixed with regulatory marking and text as necessary for the country/agency. Dell manufacturers and markets Multimedia Equipment (MME), Information Technology Equipment (ITE), Audio Visual Equipment (A/V), Industrial, Scientific, Medical Equipment (ISM) or combinations of these. Generally, products Electromagnetic Compatibility (EMC) and Product Safety compliance is based on International IEC and CISPR standards and their national equivalent along with national standards for Radio (wireless), Telecommunications (Modem) and Energy. Dell products have been verified to comply with the Restriction of Hazardous Substances (RoHS) Directive 2011/65/EU of the European Parliament and the Council. Dell product does not contain any of the restricted substances in concentrations and applications not permitted by the RoHS Directive.

EMC Emissions Class refers to one of the following use environments:

• EMC Class B product is intended for use in residential/domestic environments but may also be used in nonresidential/non-domestic environments.



• EMC Class A product is intended for use in non-residential/non-domestic environments. Class A product may also be utilized in residential/domestic environments but may cause interference and require the user to take adequate corrective measures.

For Product Safety and EMC compliance, this product has been assigned a unique regulatory model and regulatory type that is imprinted on the product regulatory labeling to provide traceability to the regulatory approvals noted on this datasheet. This datasheet applies to any product that utilizes the assigned regulatory model and type including marketing names other than those listed on this datasheet. Dell products with the CE marking have been verified to comply with Energy Related Products (ErP) Directive 2009/125/EC of the European Parliament and of the Council. https://www.dell.com/ErP User Information. REACH (Registration, Evaluation, Authorization and Restriction of Chemicals), Regulation (EC) 1907/2006 of the European Parliament and of the Council is the European Union's (EU) chemical substances regulatory framework. Dell complies with the REACH regulation. For information on SVHC (Substances of Very High Concern), see www.dell.com/REACH. This products compliance documentation, such as this datasheet and the European Union Declaration of Conformity are available on the product support page, manuals tab http://www.dell.com/support. Additional compliance documentation for the product is available upon submitting a request at http://www.dell.com/regulatory compliance. Please include product identifiers such as marketing name, regulatory model, regulatory type and country that compliance information is needed in the email request.

III. NFPA 99 Conformity

Select Dell systems have been tested and found to comply with the touch current requirements as defined in 10.3.5 of National Fire Protection Association standard NFPA 99:2012. The touch current does not exceed 100 μ A with ground wire intact (if a ground wire is provided) and 500 μ A with ground disconnected at 127 V AC, 60 Hz when tested in accordance with 10.3.5 of NFPA 99: 2012. To determine if this product complies with the above requirements, send a request to Product_Compliance@Dell.com. Please include product identifiers such as marketing name, regulatory type and country for which compliance information is needed.

IV. Declaration of Similarity

Dell Inc. herby declares that the platforms or appliances designated by the Regulatory Model listed in this declaration are strictly identical in design (shape, opening, etc.) components, materials, manufacturing process, and markings except for product designation – Trade Name and/or Trade Mark as specified in this declaration.

The platforms or appliances may have very minor differences which do not impact the level of conformity. All platforms or appliances identified by the Regulatory Model designations in this declaration have the same level of conformity according to the certificate(s) provided.

The Trade Name / Trade Mark and/or Marketing Name(s) are the property of Dell Inc. Any differences in the product designation are for marketing purposes only

Dell Inc. herby declares that the platforms or appliances identified by the Regulatory Model listed in this declaration are strictly identical in design (shape, opening, etc.) components, materials,



manufacturing process, and markings except for product designation – Trade Name and/or Trademark as specified in this declaration.

The platforms or appliances may have very minor differences which do not impact the level of conformity. All platforms or appliances identified by the Regulatory Model designations in this declaration have the same level of conformity according to the certificate(s) provided.

The Trade Name / Trademark and/or Marketing Name(s) are the property of Dell Inc. Any differences in the product designation are for marketing purposes only.

Date of Issue	February 28, 2021	Cianatura an hahalf	Dell Inc.
Title	IDEN GIODAL PRODUCT	Signature on behalf of Dell Inc.	Compliance and Environmental Affairs

V. Power Cords and User Documentation

Dell products are provided with the power cord and user documentation suitable for the intended country of delivery. Products that are relocated to other countries should use nationally certified power cords and plugs to ensure safe operation of the product. Contact Dell to determine if alternate power cords or user documentation in other languages is available for your market.

VI. Trade (Import/Export) Compliance Data

For any questions related to importing & exporting classification of Dell products, please obtain information from the following link: http://www.dell.com/learn/us/en/uscorp1/import-export or send email request to www.dell.com/learn/us/en/uscorp1/import-export or send email request to www.dell.com/learn/us/en/uscorp1/import-export or send email request to www.dell.com/. Please include product identifiers such as marketing name, regulatory model, regulatory type and country that compliance information is needed in the email request.

VII. Product Dimensions and Weight

Depth, mm/cm	Width, mm/cm	Height, mm/cm	Weight, kg
523 mm	482 mm	87.9 mm	24 Kg (depending upon installed options)

VIII. Performance Data

ErP Lot 9 information is in Appendices A.

For additional information on how Dell's commitment to energy efficiency benefits you go to: Reducing your Footprint



For additional information on ENERGY STAR models refer to the following database: <u>ENERGY</u> STAR Product Finder

IX. Product Materials Information

Information on Dell's material use is available here. Dell's Restricted Material for Use guidance document is available at www.dell.com/restrictedsubstanceslist.

The case material is > <u>Steel</u> <

Mechanical plastic parts ¹ > 25 g are BFR/PVC free	☑ Yes □ No □ NA
Marking of plastics parts greater than 25 grams is in accordance with ISO 11469 (see below)	⊠ Yes □ No □ NA
Printed circuit boards (without components) >25g are BFR PVC free ²	☐ Yes ☒ No ☐ NA
Insulation materials of external electrical cables are PVC free	☐ Yes ☒ No ☐ NA
Insulation materials of internal electrical cables are PVC free	☐ Yes ☒ No ☐ NA
Product is BFR/PVC Free (Accessories & Options may not be BFR/PVC-Free, refer to spec ENV0199)	☐ Yes ⊠ No

Flame Retardants Used in Motherboard

Part	Flame Retardant
Motherboard	ТВВРА

Flame Retardants Used in Mechanical Plastic Parts > 25 grams

Resin Material Name	Plastic Part Marking per ISO 11469:2016	Flame Retardant Marking per ISO 1043-4 (i.e. FR(16), FR(40), etc.)	Flame Retardant (i.e. TBBPA, triaryl phosphate ester, etc.)	List applicable R- Phrase(s) or Hazard Statement(s) per EU Directive 67/548/EEG or 1272/2008
PC+ABS	>PC+ABS FR(40)<	FR(40)	TPP (Triphenyl phosphate)	N/A

² Dell will adopt the BFR/CFR/PVC-free definition as set forth in the "iNEMI Position Statement on the Definition of 'Low-Halogen' Electronics (BFR/CFR/PVC-Free)." Plastic parts contain <1000 ppm (0.1 percent) of bromine (if the Br source is from BFRs) and <1000 ppm (0.1 percent) of chlorine if the CI source is from CFRs, PVC or PVC copolymers. All printed circuit board (PCB) and substrate laminates contain bromine/chlorine totaling less than 1,500 ppm (0.15 percent), with maximum chlorine of 900 ppm (0.09 percent) and maximum bromine of 900 ppm (0.09 percent)



Product Compliance Datasheet | ENV0023 | A19 Dell, Inc. www.dell.com

¹ Mechanical plastic part: plastic parts that do not internally carry an electrical signal such as housings, brackets, bezels, latches, etc. that form the basic structure of the product and/or have mechanical functions. Plastic parts such as fans, connectors, printer fuser assemblies, etc. are not considered "mechanical plastic parts" in the context of this specification. Plastics parts do not contain more than 0,1% weight (1000 ppm) bromine and 0,1% weight (1000 ppm) chlorine attributable to brominated flame retardants, chlorinated flame retardants, and polyvinyl chloride (Per Dell Spec ENV0424)

Mercury Information

Number of bulbs	Average per bulb
0	0 mg

Additional information:

- Refer to Dell Technologies' Chemical Use Policy for more information on RoHS and REACH.
- Products MSDS (Material Safety Data Sheets):
 - o Batteries: <u>Battery MSDS Documentation and Declaration</u>
 - o Printer Toner and Ink: MSDS Documentation

X. Batteries

Below is a listing of batteries that could be present in the product:

Battery Description – Batteries	Batte	гу Туре	Battery Weight (kg)	Rating
CR-2032 coin cell	Lithiu	m Metal	0.003	3Vdc

XI. Design for Environment

Dell systems are, when applicable, designed for easy assembly, disassembly, and servicing. For more information on Dell's Environmental product attributes please visit https://www.dell.com/learn/is/en/iscorp1/dell-environment-greener-products

XII. Recycling / End-of-Life Service Information

Take back and recycling services are offered for this product in certain countries. If you want to dispose of system components, please visit www.dell.com/recyclingworldwide and select the relevant country.



XIII. Helpful Links

• Environmental Policy

https://i.dell.com/sites/csdocuments/Corporate_corp-Comm_Documents/en/dell-global-environmental-policy.pdf

• Environment Website

https://www.dell.com/learn/ai/en/aicorp1/dell-environment

Corporate Social Responsibility Report

http://www.dell.com/Learn/us/en/uscorp1/report?c=us&l=en&s=corp&delphi:gr=true

• ISO 14001 Certification

http://i.dell.com/sites/content/corporate/corp-comm/en/Documents/dell-iso14001-worldwide.pdf

• Materials Restricted for Use

www.dell.com/restrictedsubstanceslist

Chemical Use Policy

http://i.dell.com/sites/doccontent/corporate/environment/en/Documents/chemical-use-policy.pdf

• Product Carbon Footprint

https://www.dell.com/learn/us/en/uscorp1/corp-comm/environment carbon footprint products

RoHS Compliance

https://www.dell.com/learn/us/en/uscorp1/envt-info-materials

• REACH Compliance

www.dell.com/REACH

Recycling Information

http://www.dell.com/recycling

• Supplier Responsibility

https://www.dell.com/learn/gy/en/gycorp1/cr-social-responsibility



Appendix A: ErP Lot 9 Servers and Data Storage Products: Information for end-users

The EU Commission Regulation (EU) 2019/424 (ErP Lot 9) ANNEX II Section 3.0 defines the information requirements to be provided by Manufacturers. This information is documented below or via a link is provided to a free access website where the information is maintained. A reference column is included to align the information with the format in the annex of the regulation. Where the information has already been recorded in the body of the Product Compliance Datasheet a note is made to avoid duplication.

For any follow up a request should be sent to: http://support.dellproductcompliance.com

Annex II Sect 1.2.3	Reporting Requirement	Link to Firmware / Security Updates
	Latest available version of firmware updates are available on the Product Page for the Marketing Model of the Storage Solution	https://www.dell.com/support
	Latest available version of firmware updates are available on the Product Page for the Marketing Model of the Storage Solution	https://www.dell.com/support/security/

Annex II	Reporting Requirement	Information Requirements /
Sect 3.2		link to free access website
a.	product type	reference product compliance datasheet
b.	manufacturer's name, registered trade name and registered trade address at which they can be contacted;	reference product compliance datasheet
C.	product model number, and if applicable the low-end performance configuration and the high-end performance configuration model numbers;	reference product compliance datasheet
d.	year of manufacture;	2015
e.	PSU efficiency at 10 % (if applicable), 20 %, 50 % and 100 % of rated output power,	reference ErP Lot 9 storage power supply table
f.	power factor at 50 % of the rated load level, with the exception of direct current servers, rounded to three decimal places;	reference ErP Lot 9 storage power supply table
g.	declared operating condition class	Option 1) This product has been tested in order to verify that it will function within the boundaries of the declared operating condition class' A2 Option 2) ref. user manual in documentation tab on https://www.dell.com/support (delete option not selected)
h.	secure data deletion	https://i.dell.com/media-sanitization

The following tables provide information on EU Lot9, Tier 1 compliant power supplies. Systems sold outside of markets where Lot 9 is in effect may utilize other power supplies not listed here.

Storage PSU Efficiency and Power Factor Requirements URL Link to Manufacturer's PSU Efficiency Data and Report https://www.clearesult.com/80plus/



Manufacturer Name	Model Number	Single/Multi- Output	Search Tab	Search Model Number
Seagate Systems (UK) Ltd	TDPS-580AB A	Single-Output	230V Internal	SP-PCM01-HE580- AC
Seagate Systems (UK) Ltd	FS580FS104G-00	Single-Output	230V Internal	SP-PCM02-HE580- AC-DELL

Annex II Sect 3.3	Reporting Requirement	Information Requirement / link to free access website
h.	indicative weight range of the following CRMs: (a) Cobalt in the batteries; (b) Neodymium in the HDDs	Contact: http://support.dellproductcompliance.com
i.	instructions on the disassembly operations;	reference user manual in documentation tab on https://www.dell.com/support





EU DECLARATION OF CONFORMITY

 $C \in$

Name and Address of the manufacturer:

Dell Inc. One Dell Way MS: PS4-30

Round Rock, Texas USA 78682

Name and address of the authorised representative:

Dell Products Europe BV

Raheen Business Park

Limerick, Ireland

Contact: http://support.dellproductcompliance.com

This declaration of conformity is issued under the sole responsibility of Dell, Inc.

OBJECT OF THE DECLARATION

Type of Object..... Storage

Regulatory Model..... E09J, E10J, E11J

Regulatory Type¹..... E09J001, E10J001, E11J001

Trade/Manufacturer name.: Dell EMC

The object of the declaration described above is in conformity with the following Directives:

- DIRECTIVE 2014/30/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 26 February 2014 on the harmonisation of the laws of the Member States relating to electromagnetic compatibility.
- DIRECTIVE 2014/35/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 26 February 2014 on the harmonisation of the laws of the Member States relating to the making available on the market of electrical equipment designed for use within certain voltage limits.
- DIRECTIVE 2011/65/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 8 June 2011 on the restriction of the use of certain hazardous substances in electrical and electronic equipment.
- DIRECTIVE 2009/125/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 21 October 2009 establishing a framework for the setting of eco design requirements for energy related products.

The object of the declaration is in compliance with the following European standards, regulations, and technical references:

SAFETY

EN 62368-1:2014 EN 62311:2008

EMC

EN 55024:2010 +A1:2015

EN 55032:2012 EN 55032:2015

EN 61000-3-2:2014 (Class D)

EN 61000-3-3:2013

RoHS

EN IEC 63000:2018

ENERGY

EN 50564:2011

Commission Regulation (EU) No. 2019/424

RADIO OUT OF SCOPE

 $^{^{}m I}$ Regulatory Type uniquely identifies the product ${\sf Tracking\ Number}$, radio, apparatus and EEE which is the object of this DoC.

SUPPLEMENTARY INFORMATION: The object of this declaration has been tested and found to comply with the electromagnetic compatibility (EMC) limits for a Class A digital device pursuant to the listed directives, regulations and standards. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial/business non-residential environment. Operation of this equipment in a residential area is likely to cause harmful interference, in which case you will be required to correct the interference at your own expense. The equipment was tested in a typical configuration.

CE Marking on the product indicates compliance with all applicable EU Directives. Some variations of the object have not been assessed in accordance with the EU Directives. Such products are not subject to this DoC, are not CE marked and are not intended for placing on the market in the European Union.

Round Rock, Texas, USA	Paul Melanson
Place of Issue	Full Printed Name
11/30/2020	Senior Director, Regulatory Engineering
Date of Issue	Position/Title
CE-E0SJ-2017-1	
Dell Document Control	

12/17/2020

Signed for and on behalf of Dell Inc. Signed by: MelanP1

Faul D. Welanson

Dell EMC PowerVault ME4 Series Storage Specification Sheet

Enterprise-class features in our most affordable entry level SAN/DAS storage array

Purpose-built and optimized for SAN/DAS

The affordable, simple, and fast Dell EMC PowerVault ME4 Series SAN/DAS Storage Series is optimized to run a variety of mixed workload applications – physical and virtual – for small businesses. Whether you need to consolidate your block storage, support the demands of data intensive applications, take advantage of intelligent data management, or optimize your virtual environments, the ME4 Series has been designed to meet your growing business needs. The flexibility of the ME4 Series let's you decide the protocol, supports a wide range of mixed drive types, scales to 4PB raw, is highly aligned with Dell PowerEdge Servers, and is delivered to you with all-inclusive software – everything you'll need to store, manage, and protect your data.

Powerful entry storage architecture

Based on the family of Intel "Broadwell-DE" processors, Dell EMC PowerVault ME4
Series storage implements a block architecture with VMware virtualization integration and
concurrent support for native iSCSI, Fibre Channel, and SAS protocols. Each system leverages
dual storage processors (single storage processor systems are available) and a full 12Gb SAS back-end.
Additional storage capacity is added via Disk Array Enclosures (DAEs) while Distributed RAID (ADAPT)
delivers faster drive re-build times and lowers opex. And all ME4 Series arrays are managed by an
integrated HTML5 web-based GUI.

PowerVault ME4 Series Base System and Expansion Models

The two non-dense ME4 base arrays start at 2U and the dense ME4 array starts at 5U. Both models include dual controllers with Dual-core Intel Xeon processors, 8GB per controller and 4x10Gb iSCSI, 4x12Gb SAS, and 4x16Gb FC network connections (auto-negotiation supported on iSCSI and FC).



(12 drive) 3.5" drive slots, 2U



ME4024 SAN/DAS ARRAY (24 drive) 2.5" drive slots, 2U



ME4084 SAN/DAS ARRAY (84 drive) 2.5" drive slots,5U

Optional ME4 Series expansion enclosures let you scale up to 336 drives or 4PB. PowerVault ME412 and ME424 expansion enclosures can only be used with either ME4012 or ME4024 base arrays.

The ME484 dense expansion enclosure is supported behind any ME4 base array. All array and expansion enclosure models support a variety of SSD, 15K, 10K and NLSAS drives (including FIPS-certified SEDs)



ME412 Expansion Enclosure (12 drive) 3.5" drive slots, 2U



ME424 Expansion Enclosure (24 drive) 2.5" drive slots, 2U



ME484 Expansion Enclosure (84 drive) 3.5" drive slots, 5U

PowerVault ME4 S	Series Specifications
Chassis Overview	
Chassis format	All-in-one (single/dual controllers, internal drive bays, networking) with expansion options
Rack size	2U or 5U
Controllers	2 hot-swappable per chassis (dual active) Single/dual controller support for 2U Dual controller support for 5U
Processor	Intel® Processor 2 cores 2.2GHz
Internal storage	ME4012: 12 x 3.5" drive bays (2.5" drive carriers supported) ME4024: 24 x 2.5" drive bays ME4084: 84x 3.5" drive bays (2.5" drive carriers supported)
System memory	8GB per controller
Expansion Capacity	
Expansion enclosures	ME412: 12 x 3.5" drive bays (12Gb SAS) ME424: 24 x 2.5" drive bays (12Gb SAS) ME484: 84 x 3.5" drive bays (12Gb SAS)
JBOD	MD 1400: High density MD 1420: Performance-optimized ME484: Performance & density-optimized
Min/Max drive count	ME4012: 2/264 ME4024: 2/276 ME4084: 28/336
Max raw capacity	ME4012: 3.1PB (with ME484 expansion) ME4024: 3PB (with ME484 expansion) ME4084: 4PB
NAS Support	Supported with NX Series Windows NAS appliance
Storage media	SAS and NL-SAS drives; different drive types, transfer rates, rotational speeds can be mixed in the same system: NLSAS 7.2K 3.5" – 4TB, 8TB, 12TB, 12TB SED, 16TB NLSAS 7.2K 2.5" – 2TB, 2TB SED SAS 10K 2.5" – 1.2TB, 1.8TB, 2.4TB, 2.4TB SED SAS 15K 2.5" – 900GB, 900GB SED SAS SSD – 480GB, 960GB, 1.92TB, 1.92TB SED, 3.84TB SDD and HDD: FIPS-certified SEDs

Network and Expansion I/O

Host interface FC, iSCSI, SAS (supports simultaneous multiprotocol FC/iSCSI)

Max 16Gb FC ports	8 per array (support auto-negotiate to 8Gb)
Max 10Gb iSCSI ports	8 SFP+ or BaseT ports per array (BaseT only support auto negotiate to 1Gb)
Max 12Gb SAS ports	8 12Gb SAS ports
Max multi-protocol ports	4 ports 16Gb FC SFP+ 4 ports 10Gb iSCSI SFP+
Max management ports	2 per array (1Gb BASE-T)
Disk expansion protocol	12Gb SAS
Disk interface expansion ports	2 12Gb SAS (wide-Port) per array (1 port per controller) Up to 9 2U expansion enclosures per 2U base array Up to 3 5U expansion enclosures per 2U base array Up to 3 5U expansion enclosures per 5U base array
Functional	
Array configurations	All-flash, hybrid or all HDD arrays
Storage format	Native SAN or DAS

Data Optimization		
Auto-tiering	Up to 3 primary (media-based) tiers	
RAID support	RAID 0, 1, 5, 6, 10, 50 or Adapt; any combination of RAID levels can exist in single array	
Adapt	Distributed erasure coding that reduces rebuild times when drive failures occur	
Thin provisioning	Active by default on all volumes, operates at full performance across all features	
Snapshots	1024 maximum snapshots per array	
Data Mobility and Migration		
Replication	Replicates with other ME4 Series Arrays Asynchronous block via FC or iSCSI Target/source relationships may be one-to-many or many-to-one	
Volume copy	Copy complete standalone volumes	
Data Protection, Disaster Recovery, Security		
Business continuity	VMware Site Recovery Manager	
Data-at-rest encryption	Self-encrypting drives (SEDs) in SSD or HDD formats Full Disk Encryption (FCE) based on AES-256 Drives certified to FIPS 140-2 Level 2	
Key manager	Internal controller key management	

Management		
Management	PowerVault Manager HTML5 GUI, CLI, REST, OME 3.2	
VMware vCenter	Support VMware vCenter 6.7 plugin to manage the ME4 arrays through vCenter.	
Scripting	CLI Microsoft PowerShell API RESTful API	
Supported host OS	Windows 2019, 2016 and 2012 R2 RHEL 8.0, 7.4 and 6.9 SLES 12.3 VMware 6.7 U2, 6.5 and 6.0	
Virtualization integration	VMware vSphere (ESXi) vCenter; SRM 8.1.x Microsoft Hyper-V XenDesktop 7.1	
Physical Base System	1	
Rack size	ME4012 (2U), ME4024 (2U), ME4084 (5U)	
Base system height	ME4012: 8.79 cm (3.46 inches) ME4024: 8.79 cm (3.46 inches) ME4084: 22.23 cm (8.75 inches)	
Base system width	ME4012: 48.30 cm (19.01 inches) ME4024: 48.30 cm (19.01 inches) ME4084: 48.30 cm (19.01 inches)	
Base system depth	ME4012: 60.29 cm (23.74 inches) ME4024: 60.29 cm (23.74 inches) ME4084: 97.47 cm (38.31 inches)	
Weight (max configuration)	ME4012: 32.00 kg (71.00 lbs) ME4024: 30.00 kg (66.00 lbs) ME4084: 135.00 kg (298.00 lbs)	
Weight (empty)	ME4012: 4.80 kg (10.56 lbs) without drives ME4024: 4.80 kg (10.56 lbs) without drives ME4084: 64.00 kg (141.00 lbs) without drives	
Physical Expansion E	nclosure	
Rack size	ME412 (2U), ME424 (2U), ME484 (5U)	
Expansion height	ME412: 8.79 cm (3.46 inches) ME424: 8.79 cm (3.46 inches) ME484: 22.23 cm (8.75 inches)	
Expansion width	ME412: 48.30 cm (19.01 inches) ME424: 48.30 cm (19.01 inches) ME484: 48.30 cm (19.01 inches)	
Expansion depth	ME412: 60.29 cm (23.74 inches) ME424: 60.29 cm (23.74 inches) ME484: 97.47 cm (38.31 inches)	
Weight (max configuration)	ME412: 28.00 kg (62.00 lbs) ME424: 25.00 kg (55.00 lbs) ME484: 130.00 kg (287.00 lbs)	
Weight (empty)	ME412: 4.80 kg (10.56 lbs) without drives ME424: 4.80 kg (10.56 lbs) without drives ME484: 64.00 kg (141.00 lbs) without drives	
Base System Power		
Power/wattage	ME4012: 580W ME4024: 580W ME4084: 2200W	

Heat dissipation	ME4012: 1980 BTU ME4024: 1980 BTU ME4084: 7507 BTU
Voltage	ME4012: 100-240 VAC ME4024: 100-240 VAC ME4084: 200-240 VAC
Frequency	50/60 Hz
Amperage	ME4012: 7.6-3.0A (x2) ME4024: 7.6-3.0A (x2) ME4084: 11.07-9.23A (x2)
Expansion Power	
Power/wattage	ME412: 580W ME424: 580W ME484: 2200W
Heat dissipation	ME412: 1980 BTU ME424: 1980 BTU ME484: 7507 BTU
Voltage	ME412: 100-240 VAC ME424: 100-240 VAC ME484: 200-240 VAC
Frequency	50/60 Hz
Amperage	ME412: 7.6-3.0A (x2) ME424: 7.6-3.0A (x2) ME484: 11.07-9.23A(x2)
Environmental Operat	ing Conditions
Operating temperature	41 - 95°F (5 - 35°C)
Non-operating temperature	-40 - 149°F (-40 - 65°C)
Operating humidity ranges (non-condensing)	10% to 80% with 29°C (84.2°F) maximum dew point
Non-operating humidity (non-condensing)	5% to 95% with 33°C (91°F) maximum dew point
Service & Warranty	
Services	Dell ProSupport with deployment and consulting services. Optional ProSupport Plus is available offering proactive and preventative services to improve performance and stability. Dell Optimize is available for additional ongoing strategic counsel and guidance from a highly-trained system analyst.
System sizing	Dell EMC Midrange Sizer Tool
Drive warranty	All SSDs and HDDs are warrantied for full lifetime wear-out replacement with valid service agreement
Maintenance	SupportAssist for automated maintenance operations
OEM-Ready	
From bezel to BIOS to packagir Dell.com/OEM	ng, your storage arrays can look and feel as if they were designed and built by you. For more information, visit

DELL EMC POWERVAULT



Learn more about Dell EMC Unity solutions



Contact a Dell EMC expert





R740 SPEC SHEET



POWEREDGE R740

Optimized for workload acceleration

The PowerEdge R740 was designed to accelerate application performance leveraging accelerator cards and storage scalability. The 2-socket, 2U platform has the optimum balance of resources to power the most demanding environments.

Expand and optimize application performance

The scalable business architecture of the R740 can scale up to three 300W or six 150W GPUs, or up to four FPGAs. With up to 16 2.5" drives or 8 3.5" drives the R740 provides the versatility to adapt to virtually any application and provides the perfect platform for VDI deployments.

- Scale your VDI deployments with 3 double-width GPUs, supporting up to 50% more users when compared to R730.
- Free up storage space using internal M.2 SSDs optimized for boot.
- Scale compute resources with Intel® Xeon® Scalable delivering a 27% increase in processing cores and 50% increase in bandwidth over previous generation of Xeon processors.

Automate systems management with OpenManage

The Dell EMC OpenManage™ portfolio helps deliver peak efficiency for PowerEdge servers, delivering intelligent, automated management of routine tasks. Combined with unique agent-free management capabilities, the R740 is simply managed, freeing up time for high profile projects.

- Simplify management with the New OpenManage Enterprise™ console, with customized reporting and automatic discovery.
- Take advantage of QuickSync 2 capabilities and gain access to your servers easily through your phone or tablet.

Rely on PowerEdge with built-in security

Every PowerEdge server is designed as part of a cyber resilient architecture, integrating security into the full server lifecycle. The R740 leverages new security features built-into every new PowerEdge server strengthening protection so you can reliably and securely deliver accurate data to your customers no matter where they are. By considering each aspect of system security, from design to retirement, Dell EMC ensures trust and delivers a worry-free, secure infrastructure without compromise.

- Rely on a secure component supply chain to ensure protection from factory to the data center.
- Maintain data safety with cryptographically signed firmware packages and Secure Boot.
- Prevent unauthorized or malicious change with Server Lockdown.
- Wipe all data from storage media including hard drives, SSDs and system memory quickly and securely with System Erase.

PowerEdge R740

 Persistent Memory NVDIMM-N can increase database performance by 10x

PowerEdge R740			
Features	Technical Specification		
Processor	Up to two Intel® Xeon® Scalable processors, up to 28 cores per processor		
Memory	24 DDR4 DIMM slots, Supports RDIMM /LRDIMM, speeds up to 2666MT/s, 3TB max Up to 12 NVDIMM, 192 GB Max Supports registered ECC DDR4 DIMMs only		
Storage controllers	Internal controllers: PERC H330, H730p, H740p, Software RAID (SWRAID) S140 Boot Optimized Storage Subsystem: HWRAID 2 x M.2 SSDs 120GB, 240 GB External PERC (RAID): H840 12Gbps SAS HBAs (non-RAID): External- 12 Gbps SAS HBA (non-RAID), Internal- HBA330 (non-RAID)		
Drive bays	Front drive bays: Up to 16 x 2.5" SAS/SATA (HDD/SSD) max 61TB or up to 8 x 3.5" SAS/SATA HDD max 96TB Optional DVD-ROM, DVD+RW		
Power supplies	Titanium 750W, Platinum 495W, 750W, 1100W, 1600W, and 2000W	48VDC 1100W, 380HVDC 1100W, 240HVDC 750W (China/Japan) Hot plug power supplies with full redundancy Up to 6 hot plugs fans with full redundancy	
Dimensions	Form factor: Rack (2U)	Max depth: 715.5 mm	
Embedded management	IPMI 2.0 compliant iDRAC9 with Lifecycle Controller (Express, Enterprise) Quick Sync 2 wireless module optional		
Bezel	Optional LCD Bezel or Security bezel		
OpenManage™ Software	OpenManage Enterprise OpenManage Essentials	OpenManage Mobile OpenManage Power Center	
Integrations and connections	Integrations: Microsoft® System Center, VMware® vCenter™, BMC Software Connections: Nagios & Nagios XI, Oracle Enterprise Manager,	HP Operations Manager, IBM Tivoli Netcool/OMNIbus, IBM Tivoli® Network Manager, CA Network and Systems Management	
Security	TPM 1.2/2.0 optional Cryptographically signed firmware Secure Boot	System Lockdown Secure erase	
I/O & Ports	Network daughter card options 4 x 1GE or 2 x 10GE + 2 x 1GE or 4 x 10GE or 2 x 25GE Front ports: Video, 2 x USB 2.0, available USB 3.0, dedicated IDRAC Direct Micro-USB Rear ports: Video, serial, 2 x USB 3.0, dedicated iDRAC network port Video card: VGA Riser options with up to 8 PCIe Gen 3 slots, maximum of 4 x 16 slots		
Accelerator options	Up to three 300W or six 150W GPUs, or up to four FPGAs. Nvidia Tesla P100, K80, K40, Grid M60, M10, P4, Quadro P4000, NVIDIA V100, or Intel Arria® 10GX FPGA	See <u>Dell.com/GPU</u> for latest information.	
Supported operating systems	Canonical® Ubuntu® LTS Citrix® XenServer® Microsoft Windows Server® with Hyper-V Red Hat® Enterprise Linux SUSE® Linux Enterprise Server VMware® ESXi	For specifications and interoperability details, see <u>Dell.com/OSsupport</u> .	
OEM-ready version available	From bezel to BIOS to packaging, your servers can look and feel as if they were designed and built by you. For more information, visit <u>Dell.com/OEM</u> .		
Recommended support	Dell ProSupport Plus for critical systems or Dell ProSupport for premium hardware and software support for your PowerEdge solution. Consulting and deployment offerings are also available. Contact your Dell representative today for more information. Availability and terms of Dell Services vary by region. For more information, visit <u>Dell.com/ServiceDescriptions</u> .		

Learn more at DellEMC.com/PowerEdge

End-to-end technology solutions

Reduce IT complexity, lower costs and eliminate inefficiencies by making IT and business solutions work harder for you. You can count on Dell EMC for end-to-end solutions to maximize your performance and uptime. A proven leader in Servers, Storage and Networking, Dell EMC Services deliver innovation at any scale. And if you're looking to preserve cash or increase operational efficiency, Dell Financial Services™ has a wide range of options to make technology acquisition easy and affordable. Contact your Dell Sales Representative for more information.*







R740xd SPEC SHEET



POWEREDGE R740xd

Maximize storage performance and scalability

The PowerEdge R740xd delivers a perfect balance between storage scalability and performance. The 2U two-socket platform is ideal for software defined storage, service providers or as virtual desktop infrastructure.

Maximize performance and capacity

The scalable system architecture behind the R740xd with up to 24 NVMe drives creates the ideal balance between scalability and performance. The R740xd versatility is highlighted with the ability to mix any drive type to create the optimum configuration of NVMe, SSD and HDD for either performance, capacity or both. The R740xd is the platform of choice for software defined storage and is the foundation for ScaleIO, VSAN or the PowerEdge XC.

- Maximize storage performance with up to 24 NVMe drives and ensure application performance scales to meet demands.
- Free up storage space using internal M.2 SSDs optimized for boot.
- Simplify and accelerate ScaleIO or VMware vSAN™ deployments with validated, pre-bundled and tailored Ready Nodes.
- Accelerate workloads with up to 3 double-width 300W GPUs, up to 6 single-width 150W GPUs or up to 4 FPGAs.

Automate systems management with OpenManage

Dell EMC PowerEdge servers with OpenManage[™] technology work at peak efficiency for PowerEdge servers, delivering intelligent, automated management of routine tasks. Combined with unique agent-free management capabilities, the R740xd is simply managed, freeing up time for high profile projects.

- Simplify management with the New OpenManage Enterprise console, with customized reporting and automatic discovery.
- Take advantage of QuickSync 2 capabilities and gain access to your servers easily through your phone or tablet.

Ensure server security from factory to you

Every PowerEdge server is designed as part of a cyber resilient architecture, integrating security into the full server life cycle. The R740xd leverages new security features built-into every new PowerEdge server strengthening protection so

you can reliably and securely deliver accurate data to your customers no matter where they are. By considering each aspect of system security, from design to retirement, Dell EMC ensures trust and delivers a worry-free, secure infrastructure without compromise.

- Rely on a secure component supply chain to ensure protection from factory to the data center.
- Maintain data safety with cryptographically signed firmware packages and Secure Boot.
- Prevent unauthorized or malicious change with Server Lockdown.
- Wipe all data from storage media including hard drives, SSDs and system memory quickly and securely with System Erase.

PowerEdge R740xd

 Choose the right resources to power your workloads with NVMe, GPU or FPGA options

PowerEdge R740xd				
Features	Technical Specification			
Processor	Up to two Intel® Xeon® Scalable processors, up to 28 cores per processor			
Memory	24 DDR4 DIMM slots, Supports RDIMM /LRDIMM, speeds up to 2666MT/s, 3TB max Up to 12 NVDIMM, 192 GB Max Supports registered ECC DDR4 DIMMs only			
Storage controllers	Internal controllers: PERC H730P, H740P, Software RAID (SWRAID) S140 Boot Optimized Storage Subsystem: HWRAID 2 x M.2 SSDs 120GB or 240 GB External PERC (RAID): H840 12Gbps SAS HBAs (non-RAID): External-12Gbps SAS HBA (non-RAID): Internal- HBA330 (non-RAID)			
Drive bays	Front bays: Up to 24 x 2.5" SAS/SATA (HDD/SSD), NVMe SSD max 153TB or up to 12 x 3.5" SAS/SATA HDD max 144TB Mid bay: Up to 4 x 2.5", max 25TB SAS/SATA (HDD/SSD), NVMe SSD max 25TB or up to 4 x 3.5", max 48TB Rear bays: Up to 4 x 2.5", max 25TB SAS/SATA (HDD/SSD), NVMe SSD or up to 2 x 3.5" max 24TB SAS/SATA HDD			
Power supplies	Titanium 750W, Platinum 495W, 750W, 1100W, 1600W, and 2000W	7, 750W, 1100W, Hot plug power supplies with full redundancy		
Dimensions	Form factor: Rack (2U) Max depth: 715.5 mm			
Embedded management	IPMI 2.0 compliant iDRAC9 with Lifecycle Controller (Express, Enterprise) Quick Sync 2 wireless module optional			
Bezel	Optional LCD Bezel or Security bezel			
OpenManage™ Software	OpenManage Enterprise OpenManage Essentials	OpenManage Mobile OpenManage Power	Center	
Integrations and connections	Integrations: Microsoft® System Council Number Num	re	HP Operations Manager, IBM Tivoli Netcool/OMNIbus, IBM Tivoli® Network Manager, CA Network and Systems Management	
Security	TPM 1.2/2.0 optional Cryptographically signed firmware Secure Boot		System Lockdown Secure erase	
I/O & Ports	Network daughter card options 4 x 1GE or 2 x 10GE + 2 x 1GE or 4 x 10GE or 2 x 25GE Front ports: VGA, 2 x USB 2.0, dedicated IDRAC Direct Micro-USB Rear ports: VGA, Serial, 2 x USB 3.0, dedicated iDRAC network port Video card: VGA Riser options with p to 8 PCIe Gen 3 slots, maximum of 4 x 16 slots			
Accelerator options	GPU and FPGA options are available only on 24 x 2.5" drive chassis. Nvidia Tesla P100, K80, K40, Grid M60, M10, P4, Quadro P4000, NVIDIA V100 or Intel Arria® Some configurations support up to 2 GPUs with NVMes. 10 GX			
Supported operating systems	Canonical® Ubuntu® LTS Citrix® XenServer® Microsoft Windows Server® with H Red Hat® Enterprise Linux SUSE® Linux Enterprise Server VMware® ESXi	lyper-V	For specifications and interoperability details see Dell.com/OSsupport	
OEM-ready version available	From bezel to BIOS to packaging, your servers can look and feel as if they were designed and built by you. For more information, visit <u>Dell.com/OEM</u> .			
Recommended support	Dell ProSupport Plus for critical systems or Dell ProSupport for premium hardware and software support for your PowerEdge			

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