Product Compliance Datasheet

MARKETING NAME……: OptiPlex 7070 SFF

REGULATORY MODEL…..: D11S

REGULATORY TYPE……..: D11S004

EMC EMISSIONS CLASS…..: B

EFFECTIVE DATE……..….: May 31, 2019

Table of contents

I. Statement of Compliance 2
II. Global Environmental Information 3
III. NFPA 99 Conformity 3
IV. Declaration of Similarity 3
V. Power Cords and User Documentation 4
VI. Trade (Import/Export) Compliance Data 4
VII. Product Dimensions and Weight 4
VIII. Performance Data 4
IX. Product Materials Information 6
X. Packaging 7
XI. Batteries 8
XII. Design for Environment 8
XIII. Recycling / End-of-Life Service Information 8
XIV. Helpful Links 9
A Appendix A: ErP Lot 3 Product Energy Consumption Information 10
B Appendix B: ErP Lot 26 Network Standby Energy Consumption Information 12

Internal Use - Confidential

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 email request to product_compliance@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.

Internal Use - Confidential

II. Global Environmental Information

Environmental (Voluntary Marks)		
Country	**Approval**	**Compliance**
Global	ENERGY STAR (Configuration Dependent)	*Computer Version 7.1*
Global	TCO Certified	*TCO 8.0*
China	CECP	Yes
China	CEC	Yes
Japan	Green PC Label	Yes
Taiwan	Greenmark	Yes
Varies by Country See EPEAT.net	EPEAT (Configuration Dependent)	EPEAT 2018: Bronze

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 µA with ground wire intact (if a ground wire is provided) and 500 µA 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

Object of the Declaration	
Product Type	Desktop Computer
Regulatory Model Number	D11S
Regulatory Type Number	D11S004
Trade Name/ Trade Mark	DELL
Marketing Name(s)	OptiPlex 7070 SFF

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.

Internal Use - Confidential

Date of Issue	May 31, 2019	Signature on behalf of Dell Inc.	Dell Inc. Dell Global Product Compliance and Environmental Affairs
Title	Dell Global Product 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 WW_Export_Compliance@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
292/29.2	92.6/9.26	290/29	5.26(depending upon installed options)

VIII. Performance Data

ErP Lot 3 & Lot 26 information is in Appendices A and B, respectively.

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

Internal Use - Confidential

*__Energy Consumption__ results are based solely upon the laboratory testing of the __System Configuration__ and in accordance to the described service level. Energy consumption is tested at 230 Volts / 50 Hz.

Energy Consumption[1]

Energy efficiency benefits the environment and lowers the total cost of equipment ownership by reducing power consumption. Dell offers energy calculators that help estimate power needs, potential emissions avoidance and potential cost savings. Click here for Dell's Client Energy Savings Calculator, Data Center Capacity Planner, and Monitor Power Savings Calculator. Information on Energy Efficiency is available here.

Declared noise emission values in accordance with ISO 9296. Testing performed in compliance with ISO 7779 with operating modes defined by ECMA-74.

OptiPlex Desktop:
Declared noise emission values in accordance with ISO 9296. Testing performed in compliance with ISO 7779 with operating modes defined by ECMA-74.

SSD/Integrated Graphics Configuration		
Component	**Configuration**	
CPU	i7 - 9700	
Memory	4GB	
HDD/SSD (#, capacity)	1, 256GB	
RMSD (Removable Media Storage Device)	DVD+/-RW	
Graphic Adapter	I	
Power Supply Output Wattage & Efficiency	200W	0.82

	Sound Power Declared mean A-weighted level	**Sound Power Statistical adder for verification**	**Sound Pressure Declared mean A-weighted emission level $L_{pA,m}$ (dB)**	
Operating Mode	**$L_{WA,m}$ (bels)**	**K_V, (bels)**	**Operator**	**Bystander**
Idle	2.52	0.4	18	16.7
HDD Operating	2.53	0.4	18.1	16.7
CPU Stressed	3.71	0.4	30.9	26.1
ODD Operating	4.37	0.4	34.6	33.3

[1] This document is informational only and reflects laboratory performance. Your product may perform differently, depending on the software, components and peripherals you ordered. Accordingly, the customer should not rely upon this information in making decisions about electrical tolerances or otherwise. No warranty as to accuracy or completeness is expressed or implied.
For more details visit https://www.dell.com/learn/us/en/uscorp1/dell-environment

Internal Use - Confidential

OptiPlex Desktop: SSD/Integrated Graphics Configuration [1]			
Service Level	**Energy Consumption (Wattage)**	**BTU Calculation**	**Description of Service Level**
CPU stressed	55.33	0.00	System is running programs to maximize CPU utilization.
Short Idle	12.65	0.00	As specified EPA Energy Star Computers
Long Idle	11.57	0.00	
Sleep	1.62	0.00	Suspend-to-RAM (low-power/sleep mode) or Modern Standby
Off	0.38	0.00	System is turned off but still connected to its AC power source.
E-TEC	0.00	0.00	Calculated annual energy consumption in kWh using conventional duty cycle

[1] This document is informational only and reflects laboratory performance. Your product may perform differently, depending on the software, components and peripherals you ordered. Accordingly, the customer should not rely upon this information in making decisions about electrical tolerances or otherwise. No warranty as to accuracy or completeness is expressed or implied.
For more details visit https://www.dell.com/learn/us/en/uscorp1/dell-environment

IX. Product Materials Information

Information on Dell's material use is available here.
Dell's Restricted Material for Use guidance document is available here.

- The case material is > ABS <
- This product contains 37.1% 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[2] > 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 [3]	☐ **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**

[2] 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 no 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)

[3] 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 Cl 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)

Internal Use - Confidential

Flame Retardants Used in Motherboard

Part	Flame Retardant
Motherboard	BFR(TBBP-A)

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
ABS	>ABS<	N/A	N/A	N/A
PC/ABS	>PC+ABS-FR(40)<	FR(40)	Organo Phosphate	R43

Mercury Information

Number of bulbs	Average per bulb
0	0 mg

Additional information:

- RoHS and REACH declaration - see *Materials – Restricted Material Compliance* section at: **www.dell.com/environmental_information**
- Products MSDS (Material Safety Data Sheets)**:**
  Batteries: Battery MSDS Documentation and Declaration
  Printer Toner and Ink: MSDS Documentation

X. 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 here.

Packaging Materials	Total Weight, (g)	Sustainable Material Content[1] (e.g Recycled content *,bio-based, Sustainable Forested materials)	% Sustainable Material		
			APJ region	DAO region	EMEA region
Corrugated Fiberboard	910	Recycled Content	Min 35%	Min 35%	Min 35%
Molded paper pulp	360	Recycled content	100%	100%	100%
LDPE Bags	23	Recycled content	0%	0%	0%

Internal Use - Confidential

XI. 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	0.0032	10mA

XII. 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/us/en/uscorp1/dell-environment?s=corp.

XIII. 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.

Internal Use - Confidential

XIV. Helpful Links

- **Environmental Policy**
  http://i.dell.com/sites/content/corporate/corp-comm/en/Documents/dell-global-environmental-policy.pdf
- **Environment Website**
  https://www.dell.com/learn/us/en/uscorp1/dell-environment?s=corp
- **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**
  http://www.dell.com/downloads/global/corporate/environ/restricted_materials_guid.pdf
- **Chemical Use Policy**
  http://i.dell.com/sites/doccontent/corporate/environment/en/Documents/chemical-use-policy.pdf
- **Product Carbon Footprint**
  http://content.dell.com/us/en/corp/d/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**
  http://content.dell.com/us/en/corp/d/corp-comm/standards-for-suppliers.aspx

Internal Use - Confidential

A Appendix A: ErP Lot 3 Product Energy Consumption Information

European Union (EU) ErP Lot 3 (Commission Regulation (EC) No. 617/2013)
The ErP Lot 3 regulation includes requirements for certain product specific information to be provided by the manufacturer. This is applicable to Desktops, Integrated Desktops (All-in-One), Notebooks, Tablets, Slates, Notebook Thin Clients, Desktop Thin Clients, Workstations, Mobile Workstations, Computer Servers, and Small-Scale Servers.

ErP Lot 3 provides certain exclusions based upon product type, screen size, and/or the amount of power consumed in idle mode. Product energy and acoustic information might be reported for products that are out of scope of ErP Lot 3 for informational purposes only.

Category	Category B	Category D
Processor Speed in GHz	3.1	3.7
Number of Cores	2	4
Total Installed System Memory in GB	4	4
Graphics	G3(with FB Data Width <= 128-bit)	G3(with FB Data Width <= 128-bit)
WOL enabled in "Sleep" Mode	No	No
WOL enabled in "Off" Mode	No	No
As Tested: Lowest Power State	0.38	0.38
As Tested: Poff(W) WOL Disabled	0.38	0.38
As Tested: Poff(W) WOL Enabled		
As Tested: Psleep(W) WOL Disabled	1.64	1.68
As Tested: Psleep(W) WOL Enabled		
As Tested: Pidle(W)	21.40	21.65
Base TEC Limit (kWh)	112	150.00
TEC Adders Limit (kWh)	40.00	38.00
Base + Adders TEC Limit (kWh)	152.00	188.00
Results TEC	77.53	78.43

Power Supply Model #	Internal or External	Link to efficiency report
AC200EBS-00	Internal	https://clearesult5.sharepoint.com/:b:/s/PLS/EV4d1OqMxJFIrYZB6ilrSp8B0s0Aw26jQQPlJkJ1u1X1gA
H200EBS-00	Internal	https://clearesult5.sharepoint.com/:b:/s/PLS/EenCw3hTaw5HuncqZjy5OZsBX81SNWjiVfFt1TRstw2Nmw
H200EPS-00	Internal	https://clearesult5.sharepoint.com/:b:/s/PLS/EX6uqKbT5ipBn998IsSFOwAB8cD9KcKEkAgb8SvTWzYPew
H300EGS-00	Internal	https://clearesult5.sharepoint.com/:b:/s/PLS/EfUwgVE7k79BoyWllDJAOaQBPHt3yengCFcS0OMvnFT24Q
HU200EBS-00	Internal	https://clearesult5.sharepoint.com/:b:/s/PLS/Ee-lwxUz5mZNkwipZHnqsAkBzHx1DD7TrPvDIP56fdTkVQ
HU300EGS-00	Internal	https://clearesult5.sharepoint.com/:b:/s/PLS/EXXSyPQ1ORdOkIwZ_MgeyA4B7frkOGS9_iufwZNdYjXR_g

Internal Use - Confidential

L200EBS-00	Internal	https://clearesult5.sharepoint.com/:b:/s/PLS/EcQ-FdXuNIRMqBmLloOgEssBekcyvao7Q29Bf21pdLg_Tg
L200EPS-00	Internal	https://clearesult5.sharepoint.com/:b:/s/PLS/ERyax59lNKxMtJdSQyTeTiUBLnimD08h-RGbjUOFLkSBfw
D200EPS-00	Internal	https://clearesult5.sharepoint.com/:b:/s/PLS/ETiHLFFlVMRJrCsicAreIy8BfceC4dwDfcwldZf6ccizEA

* **Energy Consumption** results are based solely upon the laboratory testing of the **System Configuration** listed above. Energy consumption is tested at 230 Volts / 50 Hz.

Energy Consumption[4]

Energy efficiency benefits the environment and lowers the total cost of equipment ownership by reducing power consumption. Dell offers energy calculators that help estimate power needs, potential emissions avoidance and potential cost savings. Click here for Dell's Client Energy Savings Calculator, Data Center Capacity Planner, and Monitor Power Savings Calculator. Information on Energy Efficiency is available here.

Declared Noise Emissions in accordance with ISO 9296. Testing performed in accordance with ISO 7779 at operating modes defined by ECMA 74. Your product may perform differently, depending on the software, components and peripherals you ordered. No warranty as to accuracy or completeness is expressed or implied.

Computers Category B:

Service Level	Sound Power Declared mean A-weighted level	Statistical adder for verification	Sound Pressure Declared mean A-weighted emission level
	$L_{WA,m}$ (B)	K_V (B)	$L_{pA,m}$ (dB)
HDD Accessing	2.74	0.4	18.4
ODD Accessing	4.34	0.4	32.2
Idle	2.71	0.4	15.6

Computers Category D:

Service Level	Sound Power Declared mean A-weighted level	Statistical adder for verification	Sound Pressure Declared mean A-weighted emission level
	$L_{WA,m}$ (B)	K_V (B)	$L_{pA,m}$ (dB)
HDD Accessing	2.88	0.4	19.2
ODD Accessing	4.30	0.4	33.1
Idle	2.87	0.4	18.9

[4] This document is informational only and reflects laboratory performance. Your product may perform differently, depending on the software, components and peripherals you ordered. Accordingly, the customer should not rely upon this information in making decisions about electrical tolerances or otherwise. No warranty as to accuracy or completeness is expressed or implied. For more details visit https://www.dell.com/learn/us/en/uscorp1/dell-environment

Internal Use - Confidential

B Appendix B: ErP Lot 26 Network Standby Energy Consumption Information

European Union (EU) ErP Lot 26 (Commission Regulation (EC) No 801/2013)
The ErP Lot 26 regulation includes Network Standby power requirements to be provided by the manufacturer. This is applicable to multiple product categories. If no information is reported, it's assumed it is out of scope of ErP Lot 26.

Internal Use - Confidential