

April 7, 2022

Registration, Evaluation, and Authorization of Chemicals (REACH) – SVHC Disclosure

EU REACH (EC 1907/2006) is the regulatory system for chemicals management and their safe use in the European Union (EU). In accordance with the requirements of REACH Article 33, this document is to inform you of the presence of the following “substances of very high concern” (SVHC) as defined by REACH, contained in articles in concentrations above 0.1% weight by weight (w/w).

Lenovo Intelligent Devices Group (IDG):

Product Type	Article	Substance	CAS no.
➤ Notebook	Glass in camera module, and glass in chip resistor on PCB	Diboron trioxide	1303-86-2
	External plastic in keyboard and mechanical part	1,3,5-Tris(oxiran-2-ylmethyl)-1,3,5-triazinane-2,4,6-trione (TGIC)	2451-62-9
➤ Desktop	Glass in LCD, touch panel and resistor	Boric acid	10043-35-3
➤ Workstation	Mixture between electronic components in SSD	Hexahydromethylphthalic anhydride	25550-51-0
➤ AIO	Electrolyte in battery	1,3-propanesultone	1120-71-4
	Chip in integrated circuit and HDD	4,4'-isopropylidenediphenol(BPA)	80-05-7
➤ Monitor	Film on flexible printed circuit	1,2-dimethoxyethane,ethylene glycol dimethyl ether (EGDME)	110-71-4
➤ Accessory	Varistor of power supply, Inductor of SSD and ODD	Benzene-1,2,4-tricarboxylic acid 1,2 anhydride	552-30-7
➤ Lenovo branded phone	Mechanical metal alloys and solder alloys	Lead	7439-92-1
	Film or rubber in keyboard, label adhesive	Octamethylcyclotetrasiloxane	556-67-2
➤ Tablet	Ceramic element, glass element	Lead titanium trioxide	12060-00-3
	Sensor in hard drive, resonator in ODD	Lead titanium zirconium oxide	12626-81-2
➤ Other smart devices	PCB solder mask or ink used in storage, power supply and keyboard	2-methyl-1-(4-methylthiophenyl)-2-morpholinopropan-1-one	71868-10-5
	Epoxy colophony used in power supply, ink used in keyboard	2-methylimidazole	693-98-1
	PCB Solder used in keyboard, panel, speaker and camera	Bis(2-(2-methoxyethoxy)ethyl)ether	143-24-8
	Cable, glue in antenna	tris(2-methoxyethoxy)vinylsilane	1067-53-4
	Silica gel in ODD, plastic or rubber in mechanical parts	6,6'-di-tert-butyl-2,2'-methylenedi-p-cresol	119-47-1

Lenovo Intelligent Devices Group (IDG)-Motorola:

Product Type	Article	Substance	CAS no.
➤ Motorola branded phone	USB Cable	Tris(2-chloroethyl)phosphate	115-96-8
	Glass in camera and EE components	Diboron trioxide	1303-86-2
	Copper 3604	Lead	7439-92-1
	Electronic components	Lead monoxide	1317-36-8

Lenovo Global Technology / Data Center Group (DCG):

Product Type	Article	Substance	CAS no.
➤ Server ➤ Storage ➤ Switch ➤ Network	Glass in chip resistor on PCB	Diboron trioxide	1303-86-2
	Chip in integrated circuit and HDD	4,4'-isopropylidenediphenol(BPA)	80-05-7
	Film on flexible printed circuit	1,2-dimethoxyethane,ethylene glycol dimethyl ether (EGDME)	110-71-4
	HDD	Dicyclohexyl phthalate	84-61-7
	Organic Materials or Insulator on PCBA	Octamethylcyclotetrasiloxane	556-67-2
	Varistor of power supply, Inductor of SSD	Benzene-1,2,4-tricarboxylic acid 1,2-anhydride	552-30-7
	Mechanical metal alloys and solder alloys	Lead	7439-92-1
	Chip resistor in SSD	Lead monoxide	1317-36-8
	Ceramics or Glass on PCBA	Lead titanium trioxide	12060-00-3
	Ceramics in HDD	Lead titanium zirconium oxide	12626-81-2
	Glass in resistor of cardpop	Orange lead	1314-41-6
	Resistive layer of RAID_CARD	Silicic acid, lead salt	11120-22-2
	Contact point of UPS product	Cadmium oxide	1306-19-0
	Electrolyte in battery	1,3-propanesultone	1120-71-4
	Plating in electrical card, antenna	Boric acid	10043-35-3
	Tape in cable, chassis	Tris(2-chloroethyl) phosphate	115-96-8
	Solder used in storage device, electrical card.	2-ethoxyethyl acetate	111-15-9
	Molding compound in storage device, power supply, console device	Hexahydromethylphthalic anhydride	25550-51-0
	Solder used in storage device, ODD, power supply, electrical card.	1,3,5-Tris(oxiran-2-ylmethyl)-1,3,5-triazinane-2,4,6-trione (TGIC)	2451-62-9
	PCB solder mask or ink used in storage, power supply and keyboard	2-methyl-1-(4-methylthiophenyl)-2-morpholinopropan-1-one	71868-10-5
Epoxy colophony in power supply and UPS product.	2-methylimidazole	693-98-1	

Safe Use:

The SVHC used in these products do not pose a safety risk to customers under normal use conditions. In many geographies, Lenovo offers recycling programs for our customers to help ensure these products are recycled appropriately. For more information about our recycling programs, please visit:

<https://www.lenovo.com/us/en/compliance/recycling>

Lenovo Expectations for its Suppliers

Lenovo expects its suppliers to understand and comply with EU REACH. Suppliers must pre-register or register

their substances or preparations as required by the Regulation (Article 7). Suppliers must assess whether the products and parts they supply to Lenovo contain "substances of very high concern" (SVHC) in a concentration of more than 0.1% w/w at article level. If this is the case, this information must be communicated to Lenovo prior to supply of parts. If the total weight of the SVHC exceeds one ton (per producer or importer) per year, the supplier must ensure the substance is registered for use with the European Chemicals Agency (ECHA). Lenovo's aims to eliminate REACH SVHC substances. This objective is dependent upon the identification and availability of safe, environmentally proven alternative materials that do not compromise product safety, reliability or performance. Suppliers are encouraged to take measures to reduce the use of SVHC substances in accordance with our chemical policy.

Lenovo reserves the right to update and modify this communication, as it believes necessary or appropriate.

For more information about REACH, please access the European Chemical Agency (ECHA) website:

<https://echa.europa.eu/>

The Candidate List can be found at: ECHA Website - [Candidate list](#)

A handwritten signature in black ink, appearing to read "Rob J. Taylor". The signature is fluid and cursive, with a horizontal line extending from the end of the name.

Rob J. Taylor

Director Environmental, Sustainability and Compliance

Registrierung, Bewertung, Zulassung und Beschränkung chemischer Stoffe (REACH) Information

REACH ist die Chemikalienverordnung der Europäischen Gemeinschaft (EG) und regelt die sichere Verwendung von Chemikalien. (EG Nr. 1907/2006).

In Übereinstimmung mit den Anforderungen von REACH informieren wir hiermit über die Verwendung von besonders besorgniserregenden Stoffen (Substances of Very High Concern, SVHC) in einer Konzentration von mehr als 0,1 Massenprozent (w/w) in Artikeln, um eine sichere Verwendung des Erzeugnisses zu ermöglichen.

Information de restrictions relatives aux substances chimiques (REACH)

REACH est l'acronyme de "Registration, Evaluation and Authorisation of Chemicals", que l'on peut traduire en français par système d'enregistrement, d'évaluation et d'autorisation des substances chimiques. C'est un système de réglementation proposé par la commission européenne (EC 1907/2006) pour une utilisation sûre des produits chimiques, visant à ce que les producteurs et importateurs de produits chimiques précisent les substances mises sur le marché.

En accord avec REACH, nous vous informons que les produits suivants contiennent des substances chimiques dangereuses classées SVHC "substances of very high concern" dans une proportion supérieure à 0,1% de la masse du produit fini.

Dichiarazione sulla registrazione, la valutazione, l'autorizzazione e la restrizione delle sostanze chimiche (REACH)

La normativa europea REACH (EC 1907/2006) è un sistema integrato di registrazione, valutazione e autorizzazione delle sostanze chimiche che mira ad assicurare un maggiore livello di protezione della salute umana e dell'ambiente.

Per assicurare un utilizzo sicuro, e conformemente agli obblighi e alle definizioni della normativa REACH, si indicano le "sostanze estremamente preoccupanti" (Substances of Very High Concern, SVHC) presenti nel prodotto in misura maggiore a 0,1% in termini di peso.

Registración, Evaluación y Autorización de Sustancias Químicas en la Union Europea (REACH)

Divulgación

REACH es la abreviación de "Registration, Evaluation and Authorisation of Chemicals" que se puede traducir como sistema de registraci3n, evaluaci3n e autorizaci3n de sustancias qu3micas. Es un sistema regulador propuesto por la Comisi3n Europea (EC 1907/2006) para la gesti3n y el uso seguro de productos qu3micos (EC 1907/2006). El productor y el importador tienen que precisar las sustancias que ponen en el mercado.

De conformidad con los requisitos de REACH y para permitir el uso seguro del producto, esto es para informarle de la presencia de las siguientes "sustancias extremadamente preocupantes" (SEP / Substances of Very High Concern, SVHC) seg3n la definici3n de REACH, contenido en los art3culos en concentraciones superiores al 0,1% peso en peso (w/w).