



Hazardous Substances Declaration of Non-Use - JIG 101, Level A

Semtech certifies that the product material information provided below is representative and accurate as of the date of disclosure. Semtech's products numbered with a "T" or "LF" suffix are compliant with the requirements of the European Union's Restriction on Use of Hazardous Substances (RoHS) Directive, 2002/95/EC. This declaration is in alignment with the Joint Industry Guide: Material Composition Declaration for Electronic Products (JIG-101) as it applies to Level A Materials and Substances.

Certain Semtech products which maintain a "T" or "LF" suffix within the product number may contain lead in RoHS exempt applications such as high-temperature solder die attach, noted as exemption 7a, and flip-chip solder bumps, noted as exemption 14. This is commonly referred to as "5 of 6" compliant. Please refer to our Pb-Free search engine within our website at www.semtech.com.

JIG Level-A Banned Substances	Examples of Potential Use	Legal Reference	RoHS banned substances	Threshold, Homogeneous Level⁽¹⁾
Asbestos and its Compounds	Insulator, pigment, paint, fillers ⁽²⁾	European Community: Directive 76/769/EEC	No	Not intentionally added
Azo colorants	Textile dyes, plastic colorant	European Community: Directive 76/769/EEC	No	Not intentionally added
Cadmium and its compounds	Plastic stabilizers, packaging, dyes/pigments, paints or surface coating/plating treatments	European Community: 2002/95/EC RoHS Directive	Yes, RoHS	< 25 ppm, RoHS threshold = 100 ppm Not intentionally added
Chloroparaffins, short-chained (10-13 carbon chain)	Softener or plasticizer in plastics (cables), paints, coatings, flame retardants in plastics, rubbers	European Community: 76/769/EEC	No	Not intentionally added
Hexavalent Chromium and its compounds	Anti-corrosion surface treatment, stabilizers, colorants, dyes, pigments	European Community: 2002/95/EC RoHS Directive	Yes, RoHS	< 25 ppm, RoHS threshold = 1000 ppm Not intentionally added
Lead / Lead Compounds	Packaging, dyes/pigments, paints or surface coating/plating treatments Metal alloys, glass & ceramic curing agent, solders, plating materials	European Community: 2002/95/EC RoHS Directive	Yes, RoHS	< 1000 ppm, RoHS threshold = 1000 ppm Not intentionally added
Mercury and its compounds	Relays, switches, electrical contacts, lamps and bulbs, resin stabilizer	European Community: 2002/95/EC RoHS Directive	Yes, RoHS	< 25 ppm, RoHS threshold = 1000 ppm Not intentionally added

JIG Level-A Banned Substances	Examples of Potential Use	Legal Reference	RoHS banned substances	Threshold, Homogeneous Level ⁽¹⁾
Ozone Depleting Substances (CFCs, HCFCs)	Cleaning agents, foam plastics, solvents	Int'l Treaty: Montreal Protocol, Annex A, B & C ----- US: 1990 Clean Air Act; European Community: Directive 76/769/EEC	No	Not intentionally added
Polybrominated Biphenyls (PBBs)	Flame- rated plastics (e.g. ABS, HIPS) ⁽²⁾ .	European Community: 2002/95/EC RoHS Directive (exempts deca-BDE)	Yes, RoHS	< 1000 ppm, RoHS threshold = 1000 ppm. Not intentionally added
Polybrominated Diphenyl Ethers (PBDEs)	Flame- rated plastics (e.g. ABS, HIPS)	European Community: 2002/95/EC RoHS Directive (exempts deca-BDE)	Yes, RoHS	< 1000 ppm, RoHS threshold = 1000 ppm. Not intentionally added
Polychlorinated Biphenyls (PCBs) and Terphenyls (PCTs)	Transformers, capacitors, printed circuit board components ⁽²⁾	European Community: 76/769/EEC, 91/173/EEC	No	Not intentionally added
Polychlorinated Naphthalenes (PCN) (>3 Chlorine atoms)	Additive to rubber, lubricants and paints ⁽²⁾	Japan Law Concerning the Examination and Regulation of the Manufacture of Chemical substances (Class I)	No	Not intentionally added
Radioactive Substances	Optical Properties (Thorium)	Japan Law Concerning the Regulation of Nuclear Source Material, Nuclear Fuel Material and Reactors; 1986	No	Not intentionally added
Tributyl Tin (TBT), Triphenyl Tin (TPT), and Tributyl Tin Oxide (TBTO)	Inks, paints, pigments, preservatives and fungicides ⁽²⁾	Japan Law Concerning the Examination and Regulation of the Manufacture of Chemical substances (Class I and Class II)	No	Not intentionally added

Note(s):

- (1) Threshold does not apply to applications covered by a RoHS substance exemption
- (2) Use not expected in electronics

Semtech has relied on information provided by our suppliers in making this declaration and has taken and continues to take commercially reasonable steps to provide representative and accurate information. Semtech's standard Sales Terms and Conditions, including warranty and limitations of liability, apply to the declarations made herein unless otherwise provided by a written contract or other agreement signed by the parties.



A handwritten signature in black ink, appearing to read 'Pat Sanchez', is written over a light gray rectangular background.

Signed: _____
Pat Sanchez, Manager, Corporate Quality

Date: 11/15/11