



Dear valued supplier,

Coherent recognizes that product-related environmental protection requires strict oversight in all phases of our product's life cycle – from conception, development, manufacture and use, to its end of life treatment.

To that end, Coherent is committed to doing business with environmentally responsible suppliers as we recognize their critical role as partners in our environmental compliance program.

The growing list of legislation such as REACH, EU/China RoHS and the US Conflict Minerals rule require manufacturers and suppliers to provide information about restricted substances that must be passed on through the supply chain. To that end, Coherent has established rules and requirements for suppliers to declare whether products delivered to Coherent contain any substance that may be restricted by any such legislation.

As a supplier to Coherent, you are requested to review this document (D126573) which outlines the supply chain requirements related to Coherent's compliance with these laws and regulations. You may be subject to any or all of the requirements outlined.

We thank you in advance for your support in this matter. You are encouraged to direct any questions or concerns to the Coherent Buyer.

Sincerely,

A handwritten signature in black ink that reads "Donald W. Ballard".

Donald Ballard,  
Corporate Environmental Compliance Manager  
Coherent, Inc.

Document D126573-AG

# Supplier Environmental Compliance Requirements

Coherent, Inc.  
May 2017

## Table of Contents

KEY REGULATIONS .....	4
EU RoHS .....	4
EU REACH .....	4
US CONFLICT MINERALS .....	4
CHINA ROHS.....	5
MATERIAL DECLARATIONS AND SUPPLIER CERTIFICATION.....	5
SUPPLIER REQUIREMENTS - SUBSTANCES .....	6
CATALOG PARTS.....	6
CUSTOM PARTS.....	6
COMPLEX CUSTOM PARTS.....	7
ROLLUP PARTS.....	7
GENERAL REQUIREMENTS AND DECLARATIONS .....	8

## Key Regulations

As a supplier to Coherent, you are required to ensure that certain regulated or hazardous substances are not present in parts and materials you supply to us or, for certain other substances, to notify Coherent if they are present.

Because the substance regulations are subject to frequent change, Coherent has chosen not to publish an extensive list of restricted substances and exemptions. Rather, we have listed some of the key substance laws that impact us. We expect our suppliers to familiarize themselves with these laws and to ensure that parts and materials they provide to us comply with the laws.

**EU RoHS:** The European RoHS Directive (2011/65/EU) restricts the use of 6 hazardous substances in electronic equipment sold in the EU. RoHS restricts Lead, Mercury, hexavalent Chromium, and flame retardants PBB and PBDE, to no more than 0.1% by weight in any “homogeneous material” in any part, and it restricts Cadmium to 0.01%. Some classes of electronic equipment are excluded from the scope of RoHS, and RoHS also allows exemptions for some very specific materials.

Coherent normally requires that all parts and materials supplied to us shall comply with the substance restrictions of the RoHS Directive, and that the supplier identify to us any exemptions that apply to those parts or materials.

**Please note:** On June 4th, 2015, the EU Commission published Delegated Directive EU 2015/863 in the EU Official Journal. This Directive adds four phthalates to the RoHS restricted substances, DEHP, BBP, DBP and DIBP which are primarily used as plasticisers to soften plastics. They will be restricted from 22 July 2019 for all electrical and electronic equipment apart from Category 8 (medical devices) and Category 9 (monitoring and control equipment) that will have an additional two years to comply by 22 July 2021.

**EU REACH:** The European REACH Regulation ((EC) No 1907/2006) regulates a large number of substances, better known as SVHC’s or “Substances of Very High Concern”. Note that more substances are added to the Candidate List approximately every 6 months.

In addition, certain SVHC’s are now subject to “Authorization”, meaning that only certain narrowly-defined uses are authorized, or they are subject “Restriction”, meaning that they are essentially banned from use. In order to meet requirements, Coherent must know whether any SVHC constitutes greater than 0.1% of the weight of any part or product supplied to us. Coherent also requires that parts and materials supplied to Coherent shall not contain SVHC’s that are subject to Authorization or Restriction.

**US Conflict Minerals:** In 2012, the U.S. Securities and Exchange Commission (“SEC”) published regulations implementing the Dodd-Frank Wall Street Reform Act. In order to meet the requirements of Section 1502 of that act, Coherent must determine the country of origin for all Gold, Tin, Tungsten, and Tantalum used in our products. If any of these materials are sourced from a conflicted region, Coherent must report this to the SEC.

If you are a supplier of any of these materials, or parts containing any of these materials, Coherent will contact you to obtain a Declaration for Conflict Minerals.

**China RoHS:** Chinese law “Management Methods for the Restriction of the Use of Hazardous Substances in Electrical and Electronic Products”,) requires Coherent’s products sold in mainland China to complete a hazardous substances table that indicates presence of any of the six substances and where in the product they are located, and providing information for handling end-of-life of those products. The substances involved are the same as EU RoHS, so Coherent must know about the presence of these substances in any parts supplied to us. In addition, we may require you to apply the “environmental protection use period” (EPUP) label if you supply a finished electronic product that is in scope for China RoHS.

**Supplier Declarations:** Upon request by Coherent, or a partner company operating on behalf of Coherent, the supplier shall declare, in timely fashion, the compliance of parts and materials supplied to Coherent.

**Material Declarations and Supplier Certification:** Material declarations and supplier certifications are the foundational elements of our effort to ensure the compliance of Coherent’s products. For this purpose we classify parts/assemblies as either custom or catalog. Custom parts are designed by Coherent and comprise materials entirely specified by Coherent. Catalog parts are manufactured using materials entirely specified by the manufacturer. Complex custom parts and assemblies, described on the following pages, are hybrids that may comprise both supplier and Coherent specified materials. In general Coherent will assume the responsibility for RoHS compliance of the materials and finishes it specifies, and expects our suppliers to do likewise. Parts that are compliant through the use of materials that employ EU RoHS-exemptions must be identified together with the specific material exemption from the RoHS Directive and the offending substance (e.g. EU RoHS exemption # 6(c): lead (Pb) in copper alloys, which covers certain compliant brass materials).

**Reference:** Coherent D120625 contains a listing of Coherent’s material specifications as well as additional information. It can be downloaded from Coherent's Supplier Portal webpage (visit [www.coherent.com](http://www.coherent.com), then follow the menu path under Company > Supplier Portal).

**Note on Environmental Legislation:** Coherent recognizes that the nature and complexity of environmental laws are constantly changing and require all suppliers to both understand and conform to those regulations that are appropriate for their operations and products supplied to Coherent. The following provides guidance for how a supplier can successfully comply with Coherent’s compliance requirements.

## Supplier Requirements - Substances

Coherent applies different methods of ensuring compliance with substance requirements, depending on which type of part or material is involved: As a supplier, you may need to determine which method applies to the parts you supply:

1. **Catalog Parts:** For catalog or “commercial-off-the-shelf” parts, Coherent requires the manufacturer to declare compliance with applicable regulations.
  - 1.1. Normally, Coherent only selects Catalog Parts that are RoHS-compliant, and for which REACH SVHC information is available.
  - 1.2. Coherent, or a partner company operating on behalf of Coherent, may contact the manufacturer and request the necessary compliance information. Whenever applicable regulations change significantly, Coherent will require updated declarations of compliance. If appropriate declarations cannot be obtained, Coherent may discontinue use of the part.
  - 1.3. Coherent orders Catalog Parts by specifying the Manufacturer’s Part Number (MPN). If the MPN ordered is valid, then Coherent requires the Manufacturer or Supplier to provide the MPN that has been specified, even if it is not compliant.
  - 1.4. If the Manufacturer offers both compliant and non-compliant options under the specified MPN, then Coherent requires that part shall be RoHS-compliant, and requests that it be free of REACH SVHCs.
  - 1.5. Parts that would be out of scope for the RoHS Directive, if sold by themselves, must nonetheless meet the substance restrictions of RoHS because they will be integrated into Coherent products, which are subject to RoHS.
  
2. **“Custom” Parts:** Custom fabricated parts, otherwise known as “make-to-spec” parts, generally use Coherent’s [MCX Method](#) to ensure compliance.
  - 2.1. Under the MCX Method, Coherent explicitly specifies all the materials and finishes for the part, with each material being identified by a unique Coherent “MCX Number”. Because we have pre-evaluated the compliance of these “MCX” materials, Coherent is able to determine the compliance of the finished parts without requiring suppliers to provide declarations for each part.
  - 2.2. Parts that use the MCX Method are identified by the fact that the drawings and specifications reference Coherent Document D120625, “Compliance Specification for MCX Materials”, and by the fact that MCX Numbers are used in the materials callouts. For example, you might see a callout like “Aluminum 5052-H32 per MCX1007”, where “MCX1007” is the MCX Number.
  - 2.3. For parts where the MCX Method applies, the supplier shall comply with the requirements of D120625, “Compliance Specification for MCX Materials”, which is available on the Coherent supplier portal at:  
<http://www.coherent.com/company/index.cfm?fuseaction=Forms.page&PageID=108>

3. **“Complex Custom” Parts:** These are custom fabricated parts or “make-to-spec” parts where the supplier must select one or more of the materials used in the part. He must do so either because Coherent did not specify all materials, or because some materials were incompletely specified. A typical example might be a custom transformer. Coherent would normally specify its electrical performance, external connections, and mechanical configuration, but the supplier must determine the construction materials.
  - 3.1. For each Complex Custom part, unless otherwise notified by Coherent in writing, the supplier shall:
    - 3.1.1. Ensure that the part complies with the EU RoHS Directive substance restrictions.
    - 3.1.2. Immediately notify Coherent, in writing, of the identity and amount of any REACH Candidate List SVHC that is present at greater than 0.1% by weight of the part.
    - 3.1.3. Ensure that the part is free of (contain less than 0.1% by weight) any REACH SVHC that is subject to Restriction or Authorization (found in REACH Annexes XIV and XVII).
    - 3.1.4. Coherent, or a partner company operating on behalf of Coherent, will contact the supplier and request the necessary compliance information. Whenever applicable regulations change significantly, Coherent will require updated declarations of compliance. If appropriate declarations cannot be obtained, Coherent may discontinue use of that supplier.
  
4. **“Rollup” Parts:** Rollup parts are Coherent-designed assemblies or products where Coherent controls the entire Bill of Materials (BoM), the Approved Manufacturer Parts (AML), and the Approved Suppliers (ASL) for each part on the BoM.
  - 4.1. Because Coherent controls the BoM, AML, and ASL, compliance of these assemblies is determined by Coherent, through a process of “rolling-up” the compliances of the individual parts on the BoM.
  - 4.2. Individual parts on the BoM may utilize any of the different compliance methods described above, and Coherent takes responsibility to obtain that compliance information, so that the rollup becomes possible.
  - 4.3. The supplier or “Contract Manufacturer” of a Rollup part is generally not required to provide a declaration of compliance for the entire assembly. However, in order to ensure compliance of the assembly, the supplier is required to:
    - 4.3.1. Adhere to the BoM, AML, and ASL exactly as specified. Substitution of “equivalent” parts is not permitted, nor is sourcing from other Suppliers, not listed in the ASL. Changes to the BoM, AML, or ASL are only authorized via the Coherent ECO process.
    - 4.3.2. If any material, not specified on the BoM, is added by the supplier (“added material” such as solder paste, flux, etc.), and the material remains in the finished product, then the supplier must ensure it is compliant with the RoHS Directive substance restrictions.

- 4.3.3. Immediately notify Coherent, in writing, of the identity and amount of any REACH Candidate List SVHC found in any added material, which is present at greater than 0.1% by weight of the finished assembly.
- 4.3.4. Ensure that any REACH SVHC found in any added material, and which is subject to Restriction or Authorization (found in REACH Annexes XIV and XVII) is not present in the finished assembly at a concentration greater than 0.1% by weight.

## General Requirements and Declarations

1. As part of Coherent’s supplier qualification process, suppliers of Custom, Complex Custom, and Rollup parts are required to complete and return a Compliance with Coherent’s Environmental Policy letter (Coherent Document D126572). Instructions for returning the Compliance with Coherent’s Environmental Policy letter are included within the document. The document is available on Coherent’s Supplier Portal at the following url:  
[https://edge.coherent.com/assets/pdf/D126572RevAI\\_Supplier\\_Environmental\\_Certificate\\_of\\_Compliance.pdf](https://edge.coherent.com/assets/pdf/D126572RevAI_Supplier_Environmental_Certificate_of_Compliance.pdf)
2. Suppliers signing the Compliance with Coherent’s Environmental Policy letter must agree to the following:
  - 2.1. Where parts, materials and finishes are specified by Coherent, the supplier shall manufacture the parts in strict adherence to these specifications. The supplier shall not make any additions or substitutions without prior written approval by Coherent.
  - 2.2. Some Coherent specifications or drawings explicitly specify materials by “MCX” number. In these cases, the supplier agrees to strictly abide by the substance definitions and requirements for each MCX Number, as provided in Coherent Document D120625. Supplier agrees not to substitute materials and not to include any materials other than those specified.
  - 2.3. The supplier shall maintain an adequate working knowledge of the EU RoHS Directive and the substance requirements for Articles as specified in the EU REACH Regulation.
  - 2.4. The supplier shall employ inventory control measures that ensure configuration and compliance status of all parts and materials supplied to Coherent.
  - 2.5. The supplier shall ensure that any subcontractor engaged in the manufacture of parts or materials for Coherent products shall abide by these same requirements.
  - 2.6. The supplier shall obtain and retain, for a minimum of 10 years from the date of shipment to Coherent, all records necessary to demonstrate the compliance of all parts and materials delivered to Coherent. The supplier shall review the quality and reliability of these records to ensure that claims of compliance are valid. The supplier is encouraged to incorporate the methods of standard EN 50581:2012 for this purpose.
  - 2.7. The supplier agrees to Coherent audit of the supplier’s compliance assurance measures and records upon request, or a part of a regular supplier audit.



- 2.8. The supplier agrees to provide, upon request by Coherent or a partner company operating on behalf of Coherent, declarations of compliance for parts and materials provided to Coherent, and covering the applicable requirements specified in this document.
- 2.9. If Coherent has reason to question the reliability of a declaration, then the supplier agrees to make available to Coherent any test reports, supplier declarations, and other evidence of compliance, available to the supplier, that help establish the validity of the declaration.
- 2.10. If Coherent determines that material provided by a supplier is not compliant, but the supplier has declared it to be compliant, then the supplier agrees to exercise commercially reasonable efforts to help Coherent establish the root cause of the non-compliance, to remedy that root cause, and to replace any non-compliant material at no charge to Coherent.
3. If specified on a Coherent Drawing or Purchase Order, the supplier shall evaluate his product for conformity with the requirements of China RoHS and label the product in accordance with those requirements.
4. Upon request by Coherent, a supplier shall provide, in timely fashion, a Conflict Minerals declaration for all parts and materials provided to Coherent, using the EICC/GeSi declaration format. Coherent, or a partner company operating on behalf of Coherent, will provide guidance and a blank EICC/GeSi declaration template at the time of request.