



LEGRAND'S ENVIRONMENTAL COMMITMENTS

• **Incorporate environmental management into our industrial sites**

Of all Legrand sites worldwide, over 85% are ISO 14001-certified (sites belonging to the Group for more than five years).

• **Offer our customers environmentally friendly solutions**

Develop innovative solutions to help our customers design more energy efficient, better managed and more environmentally friendly installations.


• **Involve the environment in product design and provide informations in compliance with ISO 14025**

Reduce the environmental impact of products over their whole life cycle.

Provide our customers with all relevant information (composition, consumption, end of life, etc.).



REFERENCE PRODUCT

| | |
|--------------------------|--|
| Function | Connect a connection point for 10 years (reference life) with a 25 % utilization rate for a copper telecom accessory for a Tertiary LAN application. |
| Reference Product |  |
| | Cat.Nos 7 645 73 - 6 650 01 |
| | RJ 45 CAT.6 / Cat5e UTP SOCKET NILOÉ. |

The company reserves the right to change specifications and designs without notice. All illustrations, descriptions, dimensions and weights in the document are for guidance and cannot be held binding on the company.



PRODUCTS CONCERNED

The environmental data is representative of the following products:

| Catalogue Numbers |
|-------------------|
| • 7 646 73 |
| • 7 645 71 |
| • 7 646 71 |
| • 7 645 74 |
| • 7 646 74 |
| • 6 650 11 |



■ CONSTITUENT MATERIALS

This Reference Product contains no substances prohibited by the regulations applicable at the time of its introduction to the market. It respects the restrictions on use of hazardous substances as defined in the RoHS directive 2011/65/EU.

| Total weight of Reference Product | | 94 g (all packaging included) | | | |
|--|-------------------|--------------------------------------|-------------------|----------------------|---------------|
| Plastics as % of weight | | Metals as % of weight | | Other as % of weight | |
| PC | 25.7 % | Steel | 6.7 % | Electronic card | 0.9 % |
| ABS | 18.6 % | Copper alloys | 0.7 % | | |
| PBT | 1.3 % | Other metal | < 0.1 % | | |
| PA | 0.5 % | | | | |
| PP | < 0.1 % | | | | |
| PP | < 0.1 % | | | | |
| Packaging as % of weight | | | | | |
| PET | 3.1 % | | | Paper | 27.4 % |
| PE | 0.6 % | | | Wood | 14.5 % |
| Total plastics | 49.8 % | Total metals | 7.4 % | Total others | 42.8 % |

Estimated recycled material content: 24 % by mass.



■ MANUFACTURE

The Reference Product comes from sites that, in their majority, have received ISO14001 certification.



■ DISTRIBUTION

Products are distributed from logistics centres located with a view to optimize transport efficiency. The Reference Product is therefore transported over an average distance of 780 km by lorry from our warehouse to the local point of distribution into the market in Europe. Packaging is compliant with applicable regulation. At their end of life, its recyclability rate is 90 % (in % of packaging weight).



■ INSTALLATION

For the installation of the product, only standard tools are needed.



■ USE

Under normal conditions of use, this product requires no servicing, no maintenance or additional products.



END OF LIFE

The product end-of-life factors are taken into account during the design phase. Dismantling and sorting of components or materials is made as easy as possible with a view to recycling or failing that, another form of reuse. For European market, this product falls within the scope of the WEEE directive (2012/19/EU). Therefore it must be processed through local WEEE recycling/recovery channels.

• **Extended producer responsibility:**

The sale of this product is subject to a contribution to eco-organisations in each country responsible for managing end-of-life products in the field of application of the European Waste Electronic and Electrical Equipment Directive.

• **Recyclability rate:**

Calculated using the method described in technical report IEC/TR 62635, the recyclability rate of the product is estimated at 92 %. This value is based on data collected from a technological channel operating on an industrial basis. It does not pre-validate the effective use of this channel for the end of life of this product.

Separated into:

- plastic materials (excluding packaging) : 44 %
- metal materials (excluding packaging) : 7 %
- other materials (excluding packaging) : 0 %
- packaging (all types of materials) : 41 %



ENVIRONMENTAL IMPACTS

The evaluation of environmental impacts examines the stages of the Reference Product life cycle: manufacturing, distribution, installation, use and end-of-life. It is representative from products marketed and used in Europe, in compliance with the local current standards.

For each phase, the following modelling elements were taken in account:

| | |
|-----------------------------------|--|
| Manufacture | Materials and components of the product, all transport for the manufacturing, the packaging and the waste generated by the manufacturing. |
| Distribution | Transport between the last Group distribution centre and an average delivery point in the sales area. |
| Installation | The end of life of the packaging. |
| Use | <ul style="list-style-type: none"> • Product category: Socket RJ 45 - PSR-0005-ed2-EN-2016 03 29 - 3.8.1.2. Copper Telecom accessories. • Use scenario: Socket RJ 45 - PSR-0005-ed2-EN-2016 03 29 - 3.8.2.2. - Usage scenario: LAN tertiary, non continuous operation for 10 years, cat 6 for 25 % of the time. This time modeling is not requirement of minimum durability. • Energy model: Electricity Mix; Europe 27 - 2008. |
| End of life | The default end of life scenario maximizing the impacts. |
| Software and database used | EIME & database CODDE-2018-11 |



SELECTION OF ENVIRONMENTAL IMPACTS

| | Total for Life cycle | | Raw material and manufacture | | Distribution | | Installation | | Use | | End of life | |
|--|----------------------|--|------------------------------|-------|--------------|-------|--------------|-------|----------|-------|-------------|-------|
| | Value | Unit | Value | % | Value | % | Value | % | Value | % | Value | % |
| Global warming | 4.27E-01 | kgCO ₂ eq. | 3.90E-01 | 91 % | 3.64E-03 | < 1 % | 2.69E-03 | < 1 % | 2.47E-02 | 6 % | 5.73E-03 | 1 % |
| Ozone depletion | 1.90E-08 | kgCFC-11 eq. | 1.72E-08 | 91 % | 7.37E-12 | < 1 % | 2.29E-11 | < 1 % | 1.61E-09 | 8 % | 1.38E-10 | < 1 % |
| Acidification of soils and water | 9.52E-04 | kgSO ₂ eq. | 7.98E-04 | 84 % | 1.64E-05 | 2 % | 1.25E-05 | 1 % | 1.03E-04 | 11 % | 2.20E-05 | 2 % |
| Water eutrophication | 1.39E-03 | kg(PO ₄) ³⁻ eq. | 1.34E-03 | 97 % | 3.76E-06 | < 1 % | 1.09E-05 | < 1 % | 6.22E-06 | < 1 % | 2.61E-05 | 2 % |
| Photochemical ozone formation | 8.77E-05 | kgC ₂ H ₄ eq. | 7.83E-05 | 89 % | 1.16E-06 | 1 % | 8.92E-07 | 1 % | 5.66E-06 | 6 % | 1.71E-06 | 2 % |
| Depletion of abiotic resources - elements | 3.15E-05 | kgSb eq. | 3.15E-05 | 100 % | 1.46E-10 | < 1 % | 1.23E-10 | < 1 % | 2.14E-09 | < 1 % | 3.59E-10 | < 1 % |
| Total use of primary energy | 7.88E+00 | MJ | 7.24E+00 | 92 % | 5.15E-02 | < 1 % | 3.60E-02 | < 1 % | 4.93E-01 | 6 % | 6.32E-02 | < 1 % |
| Net use of fresh water | 1.40E-01 | m ³ | 5.02E-02 | 36 % | 3.26E-07 | < 1 % | 9.27E-07 | < 1 % | 8.95E-02 | 64 % | 4.77E-06 | < 1 % |
| Depletion of abiotic resources - fossil fuels | 5.68E+00 | MJ | 5.25E+00 | 93 % | 5.11E-02 | < 1 % | 3.49E-02 | < 1 % | 2.80E-01 | 5 % | 5.69E-02 | 1 % |
| Water pollution | 1.24E+02 | m ³ | 1.21E+02 | 98 % | 5.99E-01 | < 1 % | 4.05E-01 | < 1 % | 1.02E+00 | < 1 % | 6.61E-01 | < 1 % |
| Air pollution | 3.67E+01 | m ³ | 3.45E+01 | 94 % | 1.49E-01 | < 1 % | 2.79E-01 | < 1 % | 1.06E+00 | 3 % | 6.52E-01 | 2 % |

The values of the 27 impacts defined in the PCR-ed3-EN-2015 04 02 are available in the digital database of pep-ecopassport.org website.



SELECTION OF ENVIRONMENTAL IMPACTS (CONTINUED)

To know the values of the environmental impacts of the products concerned other than the reference product, multiply the values of environmental indicators by the following corresponding factors:

| The Reference Product: 7 645 73 | | | | | | | |
|--|---|--------|---------------|--------------|--------------|-----|-------------|
| RJ 45 Cat.6 UTP socket Niloé - white | | | | | | | |
| Coefficient of extrapolation of environmental indicators | | | | | | | |
| Associated References | Impact indicator | Abrev. | Manufacturing | Distribution | Installation | Use | End of Line |
| 7 646 73 | Tous les indicateurs | | 1 | 1 | 1 | 1 | 1 |
| 7 645 71 | | | | | | | |
| 7 746 71 | | | | | | | |
| 7 645 74 7 646 74 | Global warming | GWP | 1.3 | 1.1 | 1 | 2 | 1.2 |
| | Ozone depletion | ODP | | | | | |
| | Acidification of soils and water | A | | | | | |
| | Water eutrophication | EP | | | | | |
| | Photochemical ozone formation | POCP | | | | | |
| | Depletion of abiotic resources - elements | ADPe | 1.8 | | | | |
| | Total use of primary energy | PE | 1.3 | | | | |
| | Net use of fresh water | FW | | | | | |
| | Depletion of abiotic resources - fossil fuels | ADPf | | | | | |
| | Water pollution | WP | | | | | |
| Air pollution | AP | | | | | | |

| | |
|---|---|
| Registration N°: LGRP-01098-V01.01-EN | Drafting rules: «PEP-PCR-ed3-EN-2015 04 02» Supplemented by «PSR-0005-ed2-2016 03 29» |
| Verifier accreditation N°: VH02 | Information and reference documents: www.pep-ecopassport.org |
| Date of issue: 10-2019 | Validity period: 5 years |
| Independent verification of the declaration and data, in compliance with ISO 14025 : 2010 Internal <input checked="" type="checkbox"/> External <input type="checkbox"/> | |
| The PCR review was conducted by a panel of experts chaired by Philippe Osset (SOLINNEN) | |
| PEP are compliant with XP C08-100-1 : 2014 The elements of the present PEP cannot be compared with elements from another program | |
| Document in compliance with ISO 14025 : 2010: «Environmental labels and declarations. Type III environmental declarations» | |
| Environmental data in alignment with EN 15804: 2012 + A1 : 2013 | |

