



EcoLeaf

Type III Environmental Declaration (EPD)

Registration number : JR-AI-23286E

Japan EPD Program by SuMPO

Sustainable Management Promotion Organization
14-8, Uchikanda 1-chome, Chiyoda-ku, Tokyo Japan
<https://ecoleaf-label.jp/>



SHARP

Sharp Corporation

DIGITAL FULL COLOR MULTIFUNCTIONAL SYSTEM

BP-90C80 (US)

MULTI BYPASS TRAY and EXIT TRAY CABINET are optional,
their impact is not included.

Functional unit

Per unit of product

System boundary

■ final products □ intermediate products
Raw material acquisition, Production, Distribution,
Use & maintenance, End-of-Life

Main specifications of the product

Model name : BP-90C80
Marking technologies : Electrophotographic Printer (EP)
Print speed : Monochrome 80prints/minute (A4)
Full-color 80prints/minute (A4)

Maximum Paper Size : A3W
Duplex copying : Standard

Company Information

SHARP CORPORATION
Smart Business Solutions BU
E-mail : ECOLEAF-BS@sharp.co.jp

Registration#	JR-AI-23286E
PCR number	PA-590000-AI-07
PCR name	Imaging input and/or output equipment
Publication date	9/28/2023
Verification date	9/19/2023
Verification method	Product-by-product
Verification#	JV-AI-23286
Expiration date	9/18/2028
PCR review was conducted by:	
Approval date	4/24/2023
PCR review panel chair	Masayuki Kanzaki Sustainable Management Promotion Organization

Third party verifier*

Hiroyuki Nakamura

Independent verification of data & declaration in
accordance with ISO14025

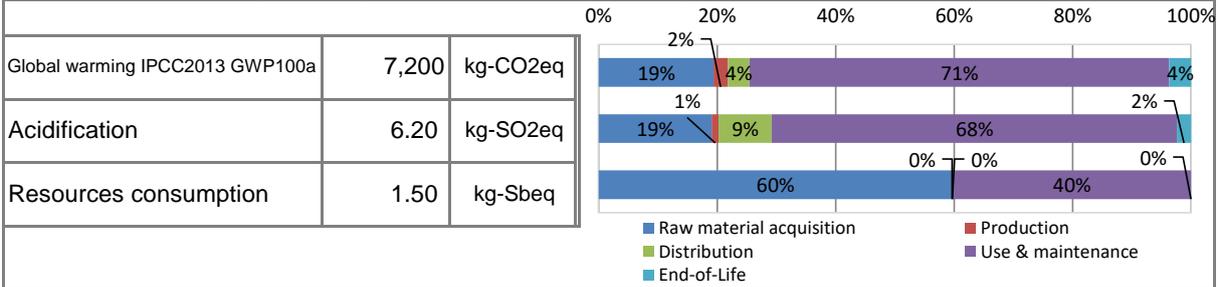
internal external

*Auditor's name is stated if system certification has been performed.

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1. Results of life cycle impact assessment (LCIA)



Parameter	stage	Unit	Total	Raw material acquisition	Production	Distribution	Use & maintenance	End-of-Life
Global warming IPCC2013 GWP100a		kg-CO ₂ eq	7.2E+03	1.4E+03	1.7E+02	2.6E+02	5.1E+03	2.7E+02
Acidification		kg-SO ₂ eq	6.2E+00	1.2E+00	7.1E-02	5.5E-01	4.2E+00	1.5E-01
Resources consumption		kg-Sbeq	1.5E+00	9.0E-01	5.2E-04	1.1E-03	6.1E-01	2.9E-04

2. Life cycle inventory analysis (LCI)

Parameter	Unit	Unit
Non-renewable material resources	3.6E+02	kg
Renewable material resources	5.1E+02	kg

3. Material composition

Material	Unit	Unit
Steel	1.4E+02	kg
SUS	5.2E+00	kg
Aluminium	2.9E+00	kg
Other metal	2.0E+00	kg
Plastic	5.2E+01	kg
Rubber	2.7E-01	kg
Glass	2.8E+00	kg
Paper · Wood	2.7E+01	kg
Circuit Board	5.1E+00	kg
Others	1.6E+01	kg

5. Additional explanation

- Product destination: North America
 - Calculation method of use stage (scenario)
 - Expected usage period: five years
 - Estimated number of use : 3,840,000 sheets
 $32 \text{ (Jobs/Day)} \times 100 \text{ (Sheets/Job)} \times 5 \text{ (Days/Week)} \times 4 \text{ (Weeks/Month)} \times 12 \text{ (Months/Year)} \times 5 \text{ (Years)}$
 $= 3,840,000 \text{ sheets}$
 - The impact of paper for printing is not included.
 - Products selected in the scenario used for inventory calculation : Multifunction device (EP)
- ※ Calculated according to the ENERGY STAR® Ver2.0 program.



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6-1. Supplementary environmental information

- Conforms to ENERGY STAR® Program Ver.3.2.(Professional)
- Compliant with European RoHS regulations.
- Assembly and production of this product, as well as production of the photoconductor and toner, which are the main components, are performed at ISO 14001-certified factories.

7. Assumptions of secondary data used

IDEA v2.1.3 and Japan EPD Program by SuMPO Registry data v1.13

8. Remarks

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- For data quantification, please refer to PCR and Rules on quantification and declaration.
- Comparative assertion is permitted only when Rules on quantification and declaration are satisfied.
(Reference URL : <https://ecoleaf-label.jp/regulation/>)

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Appendix

The following is a list of the intensity basic units used to calculate the LCA for this product. These intensity basic units can be obtained from the following URL.
https://ecoleaf-label.jp/entry/application_form.html#FB-01

Raw material acquisition

- felt and bonded fabrics
- cork goods
- paper and machine-made Japanese paper, 4 digit
- titanium oxide
- silica gel
- cyclic intermediates, synthetic dyes and organic pigments, 4 digit
- melamine resin
- polyethylene, high density (HDPE)
- low density polyethylene
- polystyrene
- acrylonitrile butadiene styrene resin
- acrylonitrile butadiene styrene resin, flame retardancy
- polypropylene
- methacrylic resin
- polyamide resin
- fluorocarbon resin
- polyethylene terephthalate
- epoxy resin
- polyacetal
- polycarbonate
- miscellaneous plastic
- polyimide
- polybutylene terephthalate
- polyphenylene ether resin
- polyphenylene sulfide
- silicone rubber, compound
- synthetic rubbers (including synthetic latex), 4 digit
- ethylene propylene diene terpolymer
- chloroprene rubber, butadiene
- organic chemistry industrial products which are not elsewhere classified, 4 digit
- acrylic long and short fibers
- packaging material, HDPE bag
- foamed plastic products (flexible and semi-rigid), 4 digit
- polyurethane, flexible
- polyurethane, foamed
- rigid polyurethane, foamed
- miscellaneous rubber belts
- ordinary steel, final, 4 digit
- ordinary steel cold rolled steel sheet and strips
- electrogalvanized steel sheet
- special steel pipes and tubes
- carbon steel for machine structural uses
- spring steel and bearing steel
- free cutting steel
- special steel wires
- stainless steels and heat resisting steels, 4 digit
- rolled and drawn copper products
- rolled aluminium products
- aluminium sheet for general use
- extruded aluminium products, include drawing products
- aluminium pipe
- aluminium foil
- electric wire and cable, except optical fiber cable , 4 digit
- aluminium and aluminium alloy die castings, 4 digit
- non-ferrous die castings, except aluminium and aluminium alloy die castings, 4 digit
- powder metallurgy products, 4 digit
- bolts and nuts
- wood screws, machine screws and set screws
- helical springs

photoelectric converter device
isotropic barium ferrite magnet, dry process
anisotropic barium ferrite magnet, wet process
plate glass, 4 digit
assembled circuit board
medium motor
machine press processing
injection molding
glass molding
expanded polystyrene (EPS)
boards less than 7.5cm depth of minimum cross section, with more than 4 times width larger than depth
corrugated board box
black pigment, for coloring recycled pallet
glass bulbs for electric lamps (including tubes and bars)
electric nickel, MCLE process
miscellaneous primary batteries
isopropylalcohol
tetrahydrofuran
polydimethylsiloxane
methanol

Production

electricity, Japan, 2014FY
energy, LNG combustion
tap water
sewerage treatment service
electricity, PR of China, IEA, 2011
energy, light oil combustion
electricity, Thailand, IEA, 2011
truck transportation, 2t truck, loading ratio default
ship transportation, container ship <4kTEU

Distribution

truck transportation, 10t truck, loading ratio default
ship transportation, container ship <4kTEU

Use & maintenance

corrugated board box
polypropylene
polyethylene terephthalate
polyethylene, high density (HDPE)
chloroprene rubber, butadiene
acrylonitrile butadiene styrene resin, flame retardancy
polyurethane, foamed
polyacetal
paper and machine-made Japanese paper, 4 digit
packaging material, HDPE bag
polycarbonate
stainless steels and heat resisting steels, 4 digit
aluminium pipe
free cutting steel
electrogalvanized steel sheet
miscellaneous plastic
wood screws, machine screws and set screws
helical springs
spring steel and bearing steel
special steel wires
felt and bonded fabrics
foamed plastic products (flexible and semi-rigid), 4 digit
polyimide
paperboard , 4 digit
painted printing paper
rolled aluminium products
synthetic rubbers (including synthetic latex), 4 digit
polyphenylene ether resin
rigid polyurethane, foamed
machine press processing
injection molding
electric wire and cable, except optical fiber cable , 4 digit
bolts and nuts
electric nickel, MCLC process
polyphenylene sulfide
carbon steel for machine structural uses
cyclic intermediates, synthetic dyes and organic pigments, 4 digit
organic chemistry industrial products which are not elsewhere classified, 4 digit
titanium oxide
polyamide resin
isopropylalcohol
methanol
tetrahydrofuran
polydimethylsiloxane
powder metallurgy products, 4 digit
black pigment, for coloring recycled pallet
silica gel
boards less than 7.5cm depth of minimum cross section, with more than 4 times width larger than depth
assembled circuit board
polystyrene
silicone rubber, compound
aluminium foil
electricity, Japan, 2014FY
energy, LNG combustion
tap water
sewerage treatment service
electricity, PR of China, IEA, 2011
energy, light oil combustion
electricity, Thailand, IEA, 2011
truck transportation, 2t truck, loading ratio default
ship transportation, container ship <4kTEU
truck transportation, 10t truck, loading ratio default
electricity, United States, IEA, 2011
high degree of intermediate treatment of used OA equipment (decomposition and dissection ~ crush and separation)
landfill, industrial wastes

incineration, industrial waste
landfill, domestic waste
incineration, domestic waste, waste plastics
incineration, domestic waste, waste paper

End-of-Life

truck transportation, 2t truck, loading ratio default
high degree of intermediate treatment of used OA equipment (decomposition and dissection ~ crush and separation)
landfill, industrial wastes
incineration, industrial waste
landfill, domestic waste
incineration, domestic waste, waste plastics
incineration, domestic waste, waste paper