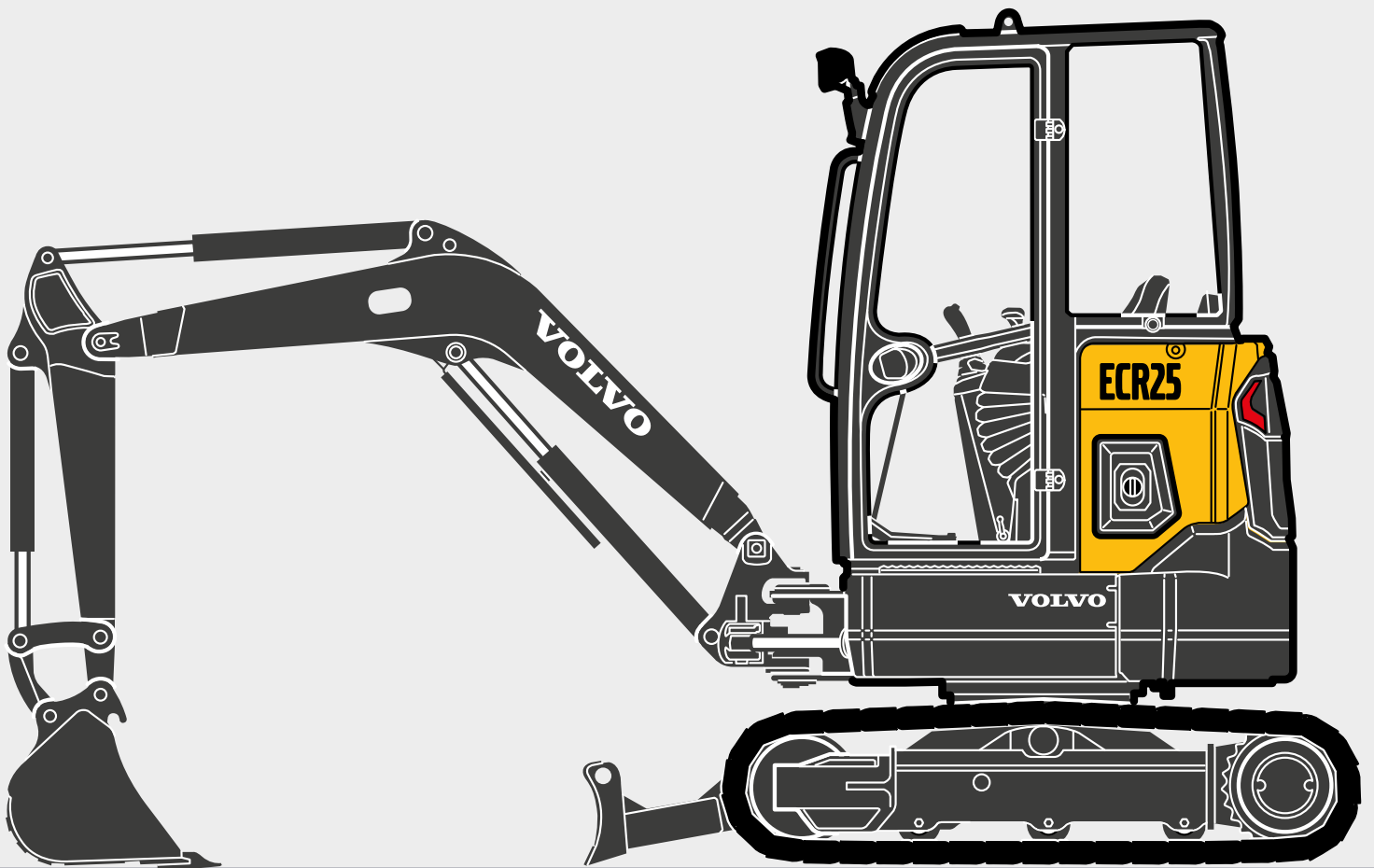


V O L V O

ENVIRONMENTAL DECLARATION

# VOLVO ELECTRIC COMPACT EXCAVATORS



# Environmental declaration

## COMPACT ELECTRIC EXCAVATORS

Environmental characteristics below specified by the manufacturer, relate to machines leaving the manufacturers production line.

For other technical specifications, see specification sheet and operator manual for the respective machine.

## MANUFACTURER

Volvo Compact Equipment sas  
Rue Pierre Pingon - 01300 Belley  
France

Model		EC18 Electric	ECR18 Electric	ECR25 Electric
Battery Nominal Voltage	V	48	48	48
Battery Nominal Capacity	kWh	20	16	20
	Ah	450	360	450
Motor power (Peak)	kW	18	18	18
Motor power (Continuous)	kW	12,5	12,5	14.7

## CORE VALUES

Quality, safety and environmental care are Volvo's core values. They are designed from the beginning into the product's entire service life. This includes design and engineering, material selection, manufacturing processes, use and recycling.

## MANUFACTURERS

The assembly of the complete machines takes place at one of Volvo Construction Equipment's production plants. Our production facilities are all certified according to ISO 14001.

Many of our components and parts are purchased from external suppliers. Volvo Construction Equipment works closely with these suppliers in order to safeguard the environmental requirements for purchased components and parts.

## DECLARATIONS

Upholstery and other materials in the cab do not contain mercury.

Plastics and other interior materials are fire-classed according to Volvo standard 104-0001.

Brake pads do not contain cadmium or asbestos.

The complete machine does not contain any mercury, cadmium or asbestos.

Refrigerant of the type R134a is used when this machine is equipped with air conditioning.

Contains fluorinated greenhouse gas R134a, Global Warming Potential 1.430 t CO<sub>2</sub>-eq.

## PAINT AND SURFACE TREATMENT

In order to reduce solvent emissions, the machines are painted using high solid paints. To reduce consumption of water and chemicals, cleaning and recirculation takes place during the pre-treatment processes in the factories.

### Specification of paint

Main components	Paint type	Heavy metals	Chlorine	Pre-treatment
Frame	High solid two components	no	no	Phosphatised
Cab	High solid two components	no	no	Water and alkaline wash
Arm with bushings	High solid two components	no	no	Phosphatised
Boom with equipment	High solid two components	no	no	Phosphatised

## SOUND LEVELS

Noise emission of the machine is tested by International Standards.

Model	EC18 Electric	ECR18 Electric	ECR25D Electric
External sound power level, dB(A)	80	80	84
Internal sound power level, dB(A)	74	74	74

## OPERATOR'S ENVIRONMENT (ENCLOSED CAB)

Incoming air for the cab first passes through a pre-filter which separates coarser particles, and then through the main filter in to the cab. Up to 90% of all air can be recirculated through the main filter.

This creates an overpressure in the cab, which results in a cleaner work environment.

## SERVICE

To facilitate draining and to reduce the risk of spilling hydraulic oil, there are special hoses supplied with each machine. For bleeding air from axles, transmission and hydraulic oil tank there is a breather filter to reduce appearance of any oil mist. The hydraulic tank has a protective valve in the breather filter, minimizing leakage in case of machine turn-over/rollover.

For service intervals and other maintenance, see applicable operator's manuals for each respective machine model.

## OILS AND FLUIDS

Biologically degradable oil for the hydraulic system is available as an option. We recommend the following oils; these are also available as options. Besides we refer to the respective operator's manual.

## ZERO EMISSIONS

Volvo Electric Compact Excavators are powered by battery supply, with no exhaust emissions. Electrically-driven moving parts in the driveline also result in a more silent machine, qualifying Volvo Electric Compact Excavators for applications in low noise and low emission zones (LEZ).

## RECYCLING

Volvo Compact Excavators are designed from the beginning for recycling at the end of their useful life cycle. The recycling rate is according to ISO 16714:2008. Materials can be reused in new Volvo Construction Equipment or other products. Most of our plastic parts are marked for recycling according to Volvo Standards 5052,41, 5052,411 as well as 5052,412. Materials included in the machine are distributed according to the table below. Weights are approximate. The calculation of the weights is based on defined machines. Variations are caused by different equipment. These material fractions can be recycled (material and energy recycling) where such recycling possibilities are available.

Machine model	Units (rounded)	EC18 Electric	ECR18 Electric	ECR25D Electric
Steel and iron	kg	1 410	1 320	2 047
Lead (auxiliary batteries)	kg	7	7	13
Batterie Lithium ion	kg	175	140	156
Cobalt oxide < 20 %				
Manganese dioxide < 20 %				
Nickel oxide < 60 %				
Carbon 10 - 30 %				
Polyvinylidene fluoride (PVdF) 10 - 30 %				
Aluminium foil 2 - 10 %				
Copper foil 2 - 10 %				
Aluminium and inert materials 5 - 10 %				
Other non-iron metals	kg	0	0	0
Glass	kg	35	0	35
Polymer and rubber	kg	36	36	36
Tires	kg	0	0	0
Oil and fluids	kg	30	30	33
Others Non-recyclable	kg	190	170	251
Total recyclable material	kg	1 650	1 500	2 359
Total weight of machine (MUC*)	kg	1 840	1 680	2 610
Steel and iron	lbs	3 108	2 910	4 513
Lead (batteries)	lbs	15	15	29
Batterie Lithium ion	lbs	386	307	344
Cobalt oxide < 20 %				
Manganese dioxide < 20 %				
Nickel oxide < 60 %				
Carbon 10 - 30 %				
Polyvinylidene fluoride (PVdF) 10 - 30 %				
Aluminium foil 2 - 10 %				
Copper foil 2 - 10 %				
Aluminium and inert materials 5 - 10 %				
Other non-iron metals	lbs	0	0	0
Glass	lbs	77	0	77
Polymer and rubber	lbs	79	79	79
Tires	lbs	0	0	0
Oil and fluids	lbs	66	66	73
Others Non-recyclable	lbs	419	375	553
Total recyclable material	lbs	3 638	3 307	5 201
Total weight of machine (MUC*)	lbs	4 056	3 704	5 754
Recycling quota	%	90	90	90

\* MUC = Most Usual Configuration

## PRODUCER RESPONSIBILITY

In most countries today, there is a producer responsibility for our products, applicable to components such as batteries, tires etc. There are special regulations for these components. For further information, please contact your dealer.

Not all products are available in all markets. Under our policy of continuous improvement, we reserve the right to change specifications and design without prior notice. The illustrations do not necessarily show the standard version of the machine.

Machine model

Delivery date

Machine's serial number

Engine's manufacturing number

Place for stamp

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