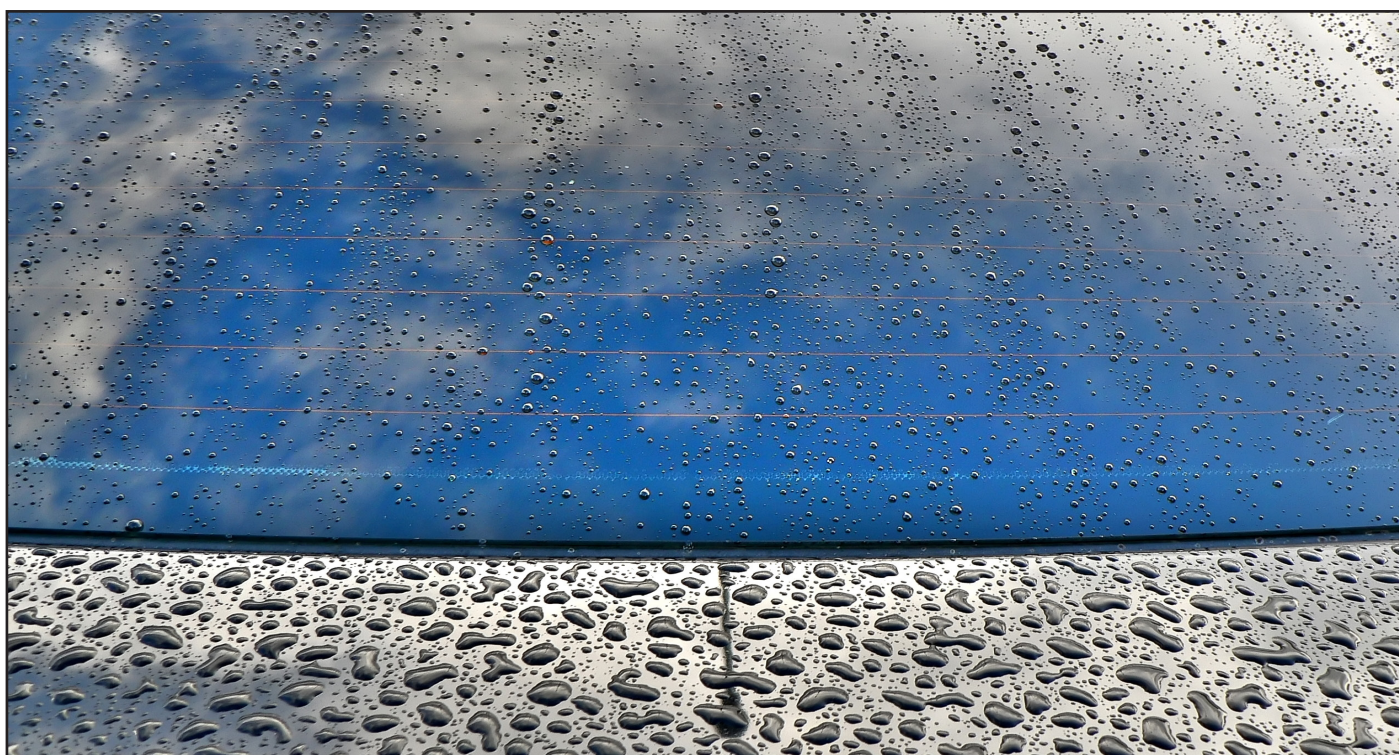


Nordic Ecolabelling of

Car and boat care products



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Nordic Ecolabelling

Content

What is a Nordic Ecolabelled car and boat care product?	3
Why choose the Nordic Ecolabel?	3
What can carry the Nordic Ecolabel?	4
How to apply?	4
What are the requirements of Nordic Ecolabelling?	6
1 Environmental requirements	6
1.1 General Requirements (for all product types)	6
1.2 Specific requirements (do not apply to washer fluids)	13
1.3 Specific requirements for washer fluids	15
1.4 Packaging and consumer information	16
1.5 Performance	17
2 Quality and regulatory requirements	18
Marketing	20
Design of the Nordic Ecolabel	20
Follow-up inspections	20
How long is the licence valid?	21
New criteria	21
Appendix 1 Conversion of requirements to CLP Regulations	
Appendix 2 Description of the product	
Appendix 3 Model prescription (R2)	
Appendix 4 Manufacturer Declarations	
Appendix 5 Declarations raw material supplier/manufacturer	
Appendix 6 Declarations from the fragrance manufacturer/supplier	
Appendix 7 The POCP factor of VOC substances (R16)	
Appendix 8 Dyes in professional products (R18)	
Appendix 9 Effectiveness – function test (R27)	
Appendix 10 Effectiveness – user test (R27)	
Appendix 11 Efficiency test washer fluids (R21)	
Appendix 12 Marketing of Nordic Ecolabelled car and boat care products	
Appendix 13 Analyses and control	

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This document is a translation of an original in norwegian. In case of dispute, the original document should be taken as authoritative.

Addresses

In 1989, the Nordic Council of Ministers decided to introduce a voluntary official ecolabel, the Swan. These organisations/companies operate the Nordic ecolabelling system on behalf of their own country's government. For more information, see the websites.

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What is a Nordic Ecolabelled car and boat care product?

A Nordic Ecolabelled car or boat care product contains substances that have as little negative influence on the environment as possible. There are strict environmental and health requirements set on constituent chemicals in the products.

After use, car and boat care products are released into the aquatic environment. Properties such as biodegradability, both aerobic and anaerobic, bioaccumulation and toxicity to aquatic organisms are accordingly important environmental parameters for all constituent substances.

Another important aspect in this regard is how and where the user handles the products, and whether the products are being used by private customers or in professional car wash systems. There are therefore different requirements for professional products and products for the private market. The user must be given recommendations and instructions for use for car or boat washing, e.g. in the form of dosing recommendations and choice of wash place. There are also requirements for the type of packaging.

It is important that Nordic Ecolabelled car or boat care products are at least as good as or better than other, competing products, and therefore, requirements are imposed on the performance of the products.

Why choose the Nordic Ecolabel?

- The car or boat care product may be marketed with the Nordic Ecolabel trademark. The Nordic Ecolabel, the Swan, is a very well-known and well-reputed trademark in the Nordic region.
- The Nordic Ecolabel is a cost-effective and simple way of communicating environmental work and commitment to customers, suppliers and retailers.
- Environmentally adapted products prepare the manufacturer for future environmental legislation.
- Environmental issues are complex. It can take a long time and extensive resources to gain an understanding of a specific area. Nordic Ecolabelling can be seen as guide in this work.
- The Nordic Ecolabel not only covers environmental issues but also quality requirements, since the environment and quality often go hand in hand. This means that a Nordic Ecolabel licence can also be seen as a mark of quality.

What can carry the Nordic Ecolabel?

Car and boat care products that have a cleaning function (e.g. degreasing agents, shampoos and windscreen washer fluids) and/or polishing function (e.g. wax or polishing agents) for caring of cars or boats can be Nordic Ecolabelled.

The criteria are not applicable to other cleaning or polishing products for other main purposes than car or boat care.

Run-off/rinsing agents, wax and combi waxes for automatic car wash installations can also be Nordic Ecolabelled, provided that they are included in a system of ecolabelled cleaning or polishing products for use in automatic wash installations. All products in the system must be ecolabelled.

A system consists of products intended to be used together in automatic wash installations.

Both consumer products and products for professional can be Nordic Ecolabelled. The term consumer product denotes products that are intended for use in individual households, whereas professional use relates to products that are used commercially and/or professionally.

Agents for special use, such as anti-corrosion agents, agents for removal of alga and shell, antifouling paint, oil and appliances for mechanical cleaning (such as washing sponges, brushes, clothes or equivalent) cannot be Nordic Ecolabelled in accordance with these criteria.

How to apply?

Manufacturers, importers and retailers of car and boat care products can apply for a license.

Each requirement is marked with the letter R (requirement) and a number. All requirements must be fulfilled to be awarded a licence.

Icons in the text

The text describes how the applicant shall demonstrate fulfilment of each requirement. There are various icons in the text to make this work easier. The symbols are:

☒ Enclose

🔗 The requirement is checked on site

Application

Applications are made to the national ecolabelling organisation and the application is valid for 12 months. Applications may be processed by another ecolabelling organisation according to agreement between the organisations. The applicant is notified of this. Companies located outside the Nordic countries make applications to the national ecolabelling organisation of the primary market.

The application must consist of a completed application form together with all of the documentation required to demonstrate compliance with the requirements specified in the criteria document (this is specified for each requirement). The application form must specify in which Nordic countries the products in question are to be sold and the estimated turnover from the products in each country.

Further information and assistance may be available. Visit the relevant national website for information.

Sales in the Nordic region

Once granted, a licence is valid throughout the Nordic region. The licence document specifies in which Nordic countries the products are sold according to the information provided on the application. The products are published on Nordic Ecolabelling's website(s). The licensee undertakes to inform Nordic Ecolabelling of any changes as to where the product is sold. If the product is to be sold in other Nordic countries than those initially specified in the application, the licensee must provide written notification of this and submit any extra documentation required to Nordic Ecolabelling in the country that issued the license.

On-site checks

Before a licence is granted, Nordic Ecolabelling will conduct an on-site inspection to ensure that the requirements are fulfilled. During the inspection, the figures on which calculations are based, the original of submitted documents, measurement protocols, purchasing statistics etc. confirming fulfilment of the requirements must be available for examination

Costs

An application fee is charged to companies applying for a licence. There is also an annual fee based on the revenue of the Nordic Ecolabelled car and boat care products.

Enquiries

Please contact Nordic Ecolabelling if you have any queries or require further information. See page 2 for addresses.

What are the requirements of Nordic Ecolabelling?

For a car or boat care product to be awarded a Nordic Ecolabel licence all relevant requirements has to be fulfilled

- 1) Chapter 1 - Health and environmental requirements
 - a) General requirements (for all product types) 1.1
 - b) Specific requirements (do not apply to washer fluids) 1.2
 - c) Specific requirements for washer fluids 1.3
 - d) Packaging and Consumer Information 1.4 (for all product types)
 - e) Function 1.5 (for all product types)
- 2) Chapter 2 - Quality and regulatory requirements (for all product types)

1 Environmental requirements

Constituent substances are all substances in the product, including additives (for example preservatives and stabilisers) in the ingredients, but not contaminants from raw material production. Contaminants are defined as residues from raw material production present in the finished product in concentrations of less than 100 ppm (0.0100% by weight, 100 mg/kg), but not substances that are added to a raw material or product for a purpose, irrespective of quantity. Contaminants at raw material level in concentrations over 1.0% in the raw material are considered constituent substances. Known separation products from constituent substances are also considered constituent.

1.1 General Requirements (for all product types)

R1 Description of the product

The applicant shall provide detailed information about the products desired Nordic Ecolabelled, where the following shall be provided:

- Whether the products are intended for consumers and/or professional use
- Technical description of the products and what products can be used for (e.g. for machine wash, combined washing or manual cleaning)
- Whether the product/product system used for personal car washing, boat washing, etc.
- Whether the product is a super concentrate
(*Super Concentrates shall contain less than 10% by volume of water*).

☒ Statement in accordance with Appendix 2

R2 Formulation

A complete prescription for the product is to be sent to Nordic Ecolabelling. The prescription should include trade names, unambiguous chemical name, function, health and environmental classification, quantity, CAS-number and DID-number (if it exists) for each constituent substance. If a raw material consists of more than one substance, this shall be evident in the prescription. The active ingredient in the raw material shall also be stated.

A model prescription is in Appendix 3.

The DID-number is the number assigned to an ingredient on the DID-list (latest version was approved in January 2007) and shall be used for the valuation of chemical requirements. The DID-list is available from Nordic Ecolabelling. See page 2 for addresses.

DID-list: "Detergent Ingredient Database"-list, see Appendix 13 for a more detailed description.

- ☒ Complete formulation according to claim and model recipe in Appendix 3, and safety data sheet/product data sheet for the product and each constituent substance in accordance with current European legislation.

R3 Classification of the product

Products to be ecolabelled should not be classified as indicated in Table R3 in accordance with EU Directive 67/548/EEC with later changes and adaptations and/or CLP Regulation 1272/2008 as amended.

Requirements regarding super concentrates, see K4.

Table R3 Classification of the product

Classification	Associated hazard symbols and R-phrases in accordance with 67/548/EEC	CLP-regulation 1272/2008
Environmental hazard	N with R50, R50/53, R51/53, R59	Acute 1: H400 Chronic 1, 2: H410, H411 Ozone: EUH 059
	R52/53, R52, R53	Chronic 3, 4: H412, H413
Highly toxic	Tx (T+ in Norway) with R26, R27, R28 and/or R39	Acute 1, 2: H330, H310, H300 STOT SE 1: H370
Toxic	T with R23, R24, R25, R39 and/or R48	Acute 2, 3: H301, H311, H330, H331 STOT SE 1: H370 STOT RE 1: H372
Harmful	Xn with R20, R21, R22, R68, R48 and R65	Acute toxic 4: H332, H312, H302 STOT SE 2: H371 STOT RE 2: H373 Asp toxic 1: H304
Allergenic	Xn with R42 or Xi with R43	Resp. Sens. 1: H334 Skin Sens. 1: H317
Corrosive	C with R34 and R35	Skin corr. 1B: H314 Skin corr. 1A: H314
Explosive	E with R2 and R3	No direct translation possible
Extremely flammable	Fx with R12	H224 or H242
Highly flammable	F with R11, R15 and R17	No direct translation possible. See table.

Exempt from classification:

- Washer fluids can be classified R11 (Highly flammable) / H224 (Extremely flammable liquid and vapour) and H225 (Highly flammable liquid and vapour).
- Products for professional use can be classified:
 - R22 (Harmful if swallowed) / H302 (Harmful if swallowed)
 - R34 (Causes burns) / H314 (Causes severe burns to skin and eyes)
 - R65 (Hazardous: May cause lung damage if swallowed) / H304 (Can be fatal if swallowed and enters airways)

- ☒ Label and data sheet for the product. Data sheet for all constituent substances in accordance with current European legislation.

R4 Super-concentrates for professional use

Super-concentrates are defined as products containing < 10% by volume of water.

Super-concentrates are only allowed for professional use in washer systems.

Super-concentrates in concentrated form should not be classified as Environmental hazard.

Super-concentrates must otherwise meet all other requirements for classification in R3 in useable form (at the maximum recommended dosage).

The packaging must be designed in such a way that there is no risk that the user will come into contact with the product. For super-concentrates a technical instruction and user manual must ask available describing how to avoid contact with the product.

- ☒ Declaration for professional use in washer systems only (Appendix 2).

Declaration from the manufacturer according to Appendix 4 and safety data sheet in accordance with current European legislation.

Declaration on classification of the product in useable form (at the maximum recommended dosage) showing that the requirement is met.

Declaration from the manufacturer regarding packaging design, as well as a technical description and user manual describing how the user can avoid contact with the product.

R5 Environmentally Hazardous Substances

No constituent substances with the following hazard classifications must be present in the product in amounts exceeding the specified limits at the maximum recommended dosage (if the product can be used undiluted, this must be considered the maximum recommended dosage):

$$100 \cdot C_{R50/53} + 10 \cdot C_{R51/53} + C_{R52/53} < 1.5 \text{ g/l in use solution}$$

$$100 \cdot C_{H410} + 10 \cdot C_{H411} + C_{H412} < 1.5 \text{ g/l in use solution}$$

$$C_{R50/H400} < 1.2 \text{ g/l in use solution}$$

If no information is provided on the environmental, the substance with be considered environmentally hazardous R50/53, alternatively H410.

For super concentrates the permitted quantity is calculated on the super concentrate diluted to ready to use solution (at the maximum recommended dosage).

Surfactants classified with H411 or H412 are exempted from the requirement, provided that they are readily degradable* and anaerobically degradable**.

* In accordance to the DID-list or test method No. 301 A-F or No. 310 in OECD guidelines for testing of chemicals or other equivalent test methods.

** In accordance to the DID-list or ISO 11734, ECETOC No. 28 (June 1988) or other equivalent test methods, where a minimum of 60% degradability under anaerobic conditions is achieved.

- ☒ Declaration of surfactants that are exempted from the requirement (quantity, classification, degradability).
- ☒ Declaration from the manufacturer (Appendix 4), declaration from the raw material manufacturer/supplier (Appendix 5), safety data sheet according to current European legislation for all constituent substances (R2).

Calculation of the amount of substances classified as environmentally hazardous in the product in accordance with the requirement.

R6 Sensitising substances

Products must not contain substances classified as H334/R42 and/or H317/R43 in concentrations $\geq 0.10\%$ per substance. The classification is in accordance with Regulation 1272/2008 and Directive 67/548/EEC. See also requirement R13 for fragrances.

Professional products for use in automatic wash installations are exempt, provided that the packaging is designed in such a way that there is no risk that the user will come into contact with the product.

- ☒ Declaration from the manufacturer in accordance with Appendix 4, declaration from the raw material manufacturer/ supplier in accordance with Appendix 5, safety data sheet according to Directive 2001/58/EEC for all constituent substances (R2).

For professional products, which are to be exempt from the requirement, documentation must be submitted for the packaging design showing that the user does not risk coming into contact with the product.

R7 CMR substances

None of the included substances shall be classified as carcinogenic, mutagenic or reproductively toxic (CMR) with the following risk settings/hazard settings:

R40/H351	R60/H60F	R64/H362
R45/H350	R61/H360D	R68/H341
R46/H340	R62/H361f	
R49/H350i	R63/H361d	
Combination of the R-phrases / H360FD, H361fd, H360Fd.		

The requirements also concern substances which can liberate substances with the above classifications

NTA present in the product as an impurity in complex makers is exempt from the requirement. The concentration of NTA must not exceed 0.010% in the product.

- ☒ Declaration from the manufacturer of car or boat care product in accordance with Appendix 4, declaration from the raw material manufacturer/supplier in accordance with Appendix 5, safety data sheet according to current European legislation for all constituent substances (R2).

R8 Nano materials/particles

Nano materials/nanoparticles/nano fibres (such as nano-metals, nano-minerals, pure nano-carbon compounds and/or nano-fluorine compounds) should not contain actively added chemical products.

Nano particles are defined as microscopic particles, where at least one of the dimensions is smaller than 100 nm. Nano metals are for example nano silver, nano gold, nano copper, titanium dioxide, zinc oxide and silicon oxide.

- ☒ Declaration by the manufacturer in accordance with Appendix 4 and the declaration of the raw material manufacturer/supplier in accordance with Appendix 5.

R9 Organic substances, degradability

All organic substances and their degradation products shall be readily aerobically degradable in accordance with OECD Guidelines no. 301 A-F or other equivalent methods (surfactants are exempt from the requirements for the 10-day window) and anaerobically biodegradable in accordance with ISO 11734 or other similar method.

The following compounds are exempted from the degradability requirement:

- non-chlorinated polymers
- non-chlorinated natural and synthetic waxes
- preservatives
- iminodisuccinate
- fragrances (see requirements in R11, R12 and R13)
- dyes in washer fluids
- dyes in products for professional use (see separate requirement in R18)
- denaturing agents in ethanol

See Appendix 13 for test methods.

- ☒ Degradability for all organic substances in the car or boat care product shall be documented by referring to the DID-list. If the substance is not on the DID-list, other documentation in accordance with the chapter on degradability (Appendix 13) shall be submitted.

R10 Substances that must not be present in the product

The substances listed below must not be present in the product:

- halogenated and/or aromatic solvents
- organic chlorine compounds or reactive chlorine compounds
- dyes in non-professional products (washer fluids exempted)
- substances considered particularly problematic SVHC, "Substances of very high concern", which are on the candidate list: (<http://echa.europa.eu/web/guest/candidate-list-table>)
- substances meeting the PBT (persistent, bio accumulative and toxic substances) criteria and vPvB substances (very persistent and very bio accumulative substances) (according to the criteria in Appendix XIII of REACH).
- substances considered as potential endocrine disruptors (EDC), category I or II, according to EU reports on endocrine disruptors (http://ec.europa.eu/environment/endocrine/documents/final_report_2007.pdf) (Appendix L, page 238 and forward)
- linear alkyl benzene sulphonates (LAS)
- alkyl phenol ethoxylates (APEO) and alkylphenolderivates (APD)
- quaternary ammonium compounds which are not readily degradable
- benzalkonium chloride
- siloxans D4, D5 and HMDS
- EDTA, DTPA
- perfluorinated and polyfluorinated alkylated compounds (PFAS)

- ☒ Declaration by the manufacturer in accordance with Appendix 4 and the declaration of the raw material manufacturer/supplier in accordance with Appendix 5.

R11 Fragrances - IFRA

Fragrances used must comply with IFRA's recommendations.

IFRA's (International Fragrance Association) guidelines can be found at www.ifraorg.org/guidelines.asp

- Declaration from the manufacturer of the car and boat care product in accordance with Appendix 4, and declaration from the fragrance manufacturer in accordance with appendices 5 and 6.

R12 Musk compounds

Musk compounds and polycyclic musk compounds are not permitted in car or boat care products. This includes the following components:

Compound	CAS number
Musk xylene	81-15-2
Musk ambrette	83-66-9
Moskene	116-66-5
Musk tibetine	145-39-1
Musk ketone	81-14-1
HHCB	114109-62-5, 114109-63-6, 1222-05-5, 78448-48-3 and 78448-49-4
AHTN	1506-02-1 and 21145-77-7

- Declaration by the manufacturer of the car or boat care product in accordance with Appendix 4 and declaration of the fragrance manufacturer in accordance with Appendix 6.

R13 Allergenic fragrance substances

The following allergenic fragrance substances are not permitted in car and boat care products.

Fragrance substances	CAS number
Amyl cinnamal	122-40-7
Benzyl alcohol	100-51-6
Cinnamyl alcohol	104-54-1
Citral	5392-40-5
Eugenol	97-53-0
Hydroxycitronellal	107-75-5
Isoeugenol	97-54-1
Amylcinnamyl alcohol	101-85-9
Benzyl salicylate	118-58-1
Cinnamal	104-55-2
Coumarin	91-64-5
Geraniol	106-24-1
Hydroksyisoheksyl 3-sykloheksen karboksaldehyde	31906-04-4
Anisyl alcohol	105-13-5
Benzyl cinnamat	103-41-3
Farnesol	4602-84-0
Butylfenyl metylpropional	80-54-6
Linalool	78-70-6
Benzyl benzoate	120-51-4
Citronellol	106-22-9
Hexyl cinnamal	101-86-0
d-Limonene	5989-27-5
alpha isometyl ionone	127-51-5
metylheptinkarbonat (methyl 2-octynoat)	111-12-6
egemos extract	90028-68-5
tremos extract	90028-67-4

Other fragrance substances with classification R42/H334 and/or R43/H317 are not permitted in concentrations > 0.01% per substance in the product.

Fragrances in professional products for automatic washer systems are exempt from the requirements for R42/H334 and/or R43/H317 classification if the packaging is designed in such a way that there is no risk that the user will come into contact with the product.



Declaration by the manufacturer of the car or boat care product in accordance with Appendix 4 and declaration of the fragrance manufacturer in accordance with Appendix 6.

For professional products, which are to be exempt from the requirement for R42/H334 and/or R43/H317 classification, documentation must be submitted for the packaging design showing that the user does not risk coming into contact with the product.

1.2 Specific requirements (do not apply to washer fluids)

Separate requirements for washer fluids are found in R19-R21.

The following requirements apply to all constituent substances including known degradation products.

R14 CDV (Critical Dilution Volume)

The product's critical dilution volume (CDV) must not exceed the maximum values specified in the table below.

Product type	Maximum value for CDV _{acute} /litre in-use-solution
Engine wash	1,500,000
Degreaser	1,000,000
Shampoo	500,000
Runoff material	400,000
Car wax	300,000
Window wash	100,000
Other products	1,000,000

CDV_{acute} is calculated using the formula below. CDV_{acute} must be calculated for all substances in the product.

$$CDV_{acute} = \sum (\text{dose}_i \times DF_i \times 1000 / TF_{(acute)i}), \text{ where}$$

dose_i = the constituent quantity of substance i

DF_i = degradation factor of substance i as stated in the DID list

TF_{acute} = the toxicity factor of the substance i as stated in the DID list

Calculation of CDV using the highest recommended concentration at which the product may be used (gram per litre in-use solution)

- ☒ Calculation of CDV_{acute} for all substances in the product. A spread sheet for use in calculating CDV_{acute} is available on Nordic Ecolabelling's websites.

Data for calculation of CDV shall in general be taken from the DID-list, version January 2007 or later versions. For substances not on the DID-list, the parameters must be calculated using the guidelines contained in part B of the DID-list and the required documentation must be attached.

DID-list: "Detergent Ingredient Database"-list, see appendix 13 for further information.

R15 Preservatives

Preservatives included in products or in constituent substances must not be potentially bio-accumulative. Preservatives are not considered bio-accumulative if the following criteria are met:

Classification	OECD 107 or 117	OECD 305
Non-bio-accumulative	logK _{ow} < 4,0	BCF < 500

If there is information on both BCF and logK_{ow}, the value for the highest BCF measured shall be used. See further information on bio-accumulativity in appendix 13.

- ☒ Documentation for BCF or logK_{ow}.

R16 Volatile organic compounds

The product may contain a limited quantity only of volatile organic compounds (VOC) that may contribute to the formation of photochemical smog, measured as POCP.

Products with a VOC content of < 1.2% do not need to undergo POCP calculation since the requirement will be fulfilled even in a worst case scenario.

The maximum content of VOC in the product is 12 g ethylene equivalents/kilo of product.

$$\frac{\sum m_i \cdot \text{POCP}_i}{m_{\text{product}}} \leq 12 \text{ g C}_2\text{H}_2 \text{ equivalents/kg}$$

m_i = mass in grams of VOC $_i$ in the product

POCP_i = VOC $_i$ substance's factor in Table 1 in Appendix 7. Each constituent substance/raw material's POCP value must be entered into the formula.

m_{product} = product mass in kg

VOC: organic substances with a vapour pressure > 0.010 kPa at 20°C or boiling point < 250°C at 101,3 kPa (1 atm).

POCP: Photo Chemical Ozone Creation Potential (Potential for photochemical formation of ozone, which is a main ingredient in smog)

In the case of solvents not included on the list in Appendix 7, POCP values from experiments/tests may provide the basis for calculating the permitted VOC content, alternatively the worst case for the VOC group may be used.

In the case of super-concentrates, the POCP calculation must be performed using the useable form (at the maximum recommended dosage).

- Product formulation and declaration of fulfilment, including calculation of VOC content.

R17 Phosphorus

Boat care products may not contain phosphates and phosphonates.

The amount of phosphates and phosphonates must not be included in care v\ care products in amounts where the amount of phosphor (P) exceeds 2.5 g/l useable solution. The limit applies to the highest recommended concentration at which the product may be used.

In Norway, detergents containing phosphates are regulated by legislation (FOR 2004-06-01 no. 922). Thus the amount of phosphate in liquid detergents shall not exceed 0.2 weight % P.

- Calculation of the amount of phosphate and phosphonate (calculated as phosphor, P) in g/l useable solution. Documentation of the amount of phosphate (in weight % P of the product), showing that relevant products comply with Norwegian legislation.

R18 Dyes in professional products

Pigments in dyes must not contain lead, cadmium, mercury and chromium with oxidation level 6, aluminium or copper.

All dyes present in the product as ingredient or in a raw material must be approved for use in foodstuffs in any Nordic country. Alternatively the dye must not be bio-accumulative. Dyes are not considered bio-accumulative if the following criteria are met:

Classification	OECD 107 or 117	OECD 305
Non-bio-accumulative	$\log K_{ow} < 4,0$	BCF < 500

If there is information on both BCF and $\log K_{ow}$, the value for the highest BCF measured shall be used. See further information on bio-accumulativity in appendix 13.

Please note that manufacturers of dyes must also fill in appendix 5.

- Declaration that the requirement is fulfilled in accordance with appendix 8.
Specification of E-number (number assigned by approval of foodstuff), alternatively $\log K_{ow}$ or BCF.

1.3 Specific requirements for washer fluids

R19 Water content

The washer fluid may contain a maximum of 10% by volume of water.

- Complete formulation (R2).

R20 Vegetable raw materials

At least 80% by volume of the product must be based on vegetable raw materials.

- Details of proportion and type of vegetable raw material used in the product.

R21 Freeze protection of washer fluids

The recommended doses on the washer fluid packaging need to fulfil the promised level of freeze protection.

The washer fluid shall be at least as efficient as other washer fluids on the market. This shall be documented by a user test where at least 5 different users are to test the product for at least 2 months under relevant conditions (see more on test frames in Appendix 12). All test participants shall evaluate the washer fluid's effect as satisfactory.

- Results of the freezing-point test conducted in accordance with the methods ASTM D1177, ASTM D2386 or equivalent method.

Account of the result of the user test in the form of at least 5 completed questionnaires (Appendix 11).

1.4 Packaging and consumer information

R22 PVC and information on packaging

PVC and other halogenated plastic shall not be part of the packaging or packaging components (including capsules, lids, pumps and labels).

Plastic packaging (excluding caps and dosage pumps) shall be type marked in accordance with DIN 6120 part 2, ISO 11469:2000 Plastic generic identification and marking of plastic products or similar systems.

- Documentation regarding packaging material and the type of marking of plastic packaging.

R23 Information on the product

On the product label (professional products and consumer products) or information included with the product (professional products), the following information must be displayed:

- Clear indication of the product's area of use
- Clear and comprehensive instructions for dosing for products which must be diluted before use
- Information on the choice of a suitable site for washing (consumer products only)
Suggested wording: "To protect the environment, please choose a washing location where the water drains off into a sewage system connected to a public treatment facility."
- Information on whether the product is a car or boat care product
- Freezing point for recommended doses (washer fluids only)

- A copy of the label or leaflet.

R24 Dosage and packaging design

To avoid overdosing of concentrated products, the packaging must be designed so that correct dosage is facilitated.

The packaging of super-concentrates must be designed in such a way that there is no risk that the user will come into contact with the product, and must meet the requirements of K4.

- Details of how the packaging has been designed to facilitate correct dosage.

R25 Weight of the packaging

Packaging for concentrated washer fluids may not weigh more than 45 g per litre of concentrated product.

- Details of the weight of packaging material per litre of concentrated washer fluid.

R26 Aerosol packaging

Aerosol packaging (i.e. packaging using a propellant gas) may not be used.

- Declaration that the requirement is met. Appendix 4 can be used.

1.5 Performance

A car or boat care product which is marketed for a specific cleaning or care function must be tested for that specific function.

R27 Efficiency (does not apply to washer fluids)

The product should be at least as effective as other similar products on the market.

- For user/consumer products with a cleansing effect, the effectiveness shall be documented by function tests in accordance with Appendix 9. Dirt, washing object, water temperature, amount of product applied, acting time, mechanical processing, etc. shall reflect the conditions for which the product should be used.
- For products for professional use with a cleansing effect, the effectiveness shall be documented with either a functional test in accordance with Appendix 9, or user test in accordance with Appendix 10 where at least five professional organisations shall have tested the product with at least 10 washing cases under relevant conditions.
- For polishing products, there are standardized tests, including ASTM D 4955-89 "Standard Practice for Field Evaluation of Automotive Polish.
- For all other products with other purposes than a cleansing or polishing effect, the effectiveness shall be documented by a test in accordance with Appendix 10.

Efficiency tests shall be performed by a laboratory. Requirements for test laboratories, see Appendix 13.

☒ For user/consumer products with cleaning effect: Presentation of results and description of implemented function test that meets the requirements in Appendix 9.

For products for professional use with a cleaning effect: Presentation of results and description of implemented function test that meets the requirements in Appendix 9, or disclosure of user testing in accordance with Appendix 10. The latter also applies to products intended for consumer use and professional use.

For polishing products the effectiveness shall be documented with ASTM D 4955-89 or equivalent standardized test.

For all other products with other purposes than a cleansing effect, the effectiveness shall be documented by a user test in accordance with Appendix 10.

2 Quality and regulatory requirements

To ensure that Nordic Ecolabel requirements are fulfilled, the following procedures must be implemented.

If the producers environmental management system is certified to ISO 14 001 or EMAS, and the following procedures implemented, it is sufficient for the accredited auditor to certify that the requirements are implemented.

R28 Laws and regulations

The license holder must ensure adherence to current regulations of environmental legislation and conditions/concessions specific to the operations at all sites where the Nordic Ecolabelled product is manufactured.

R29 Nordic Ecolabel representative

There shall be one person appointed by the company responsible for fulfilling the Nordic Ecolabel's requirements as well as a contact person appointed for communications with Nordic Ecolabelling.

- A chart of the company's organisational structure detailing who is responsible for the above requirements.

R30 Documentation for the Nordic Ecolabel's requirements

The license holder shall be able to provide a copy of the application as well as factual and calculation data (including test reports, documents from suppliers and suchlike) supporting the documents submitted on application.

- Checked on site

R31 Quality of the car or boat care products

The license holder must guarantee that the quality of the production of the Nordic Ecolabelled product is maintained throughout the validity period of the licence.

- Procedures for collating and, where necessary, accounting for claims and complaints regarding the quality of the Nordic Ecolabelled car and boat care products.

R32 Planned changes

Written notice must be given to Nordic Ecolabelling of planned changes in products and markets that have a bearing on the Nordic Ecolabel requirements.

- Procedures detailing how planned changes in products and markets are handled.

R33 Unplanned non-conformities

Unplanned non-conformities that have a bearing on Nordic Ecolabel requirements must be reported to Nordic Ecolabelling in writing and journalled.

- Procedures detailing how unplanned non-conformities are handled.

R34 Traceability

The license holder must have a traceability system for the production of the Nordic Ecolabelled car or boat care product.

- Description of/procedures for the fulfilment of the requirement.

R35 Recycling and return system

Relevant national regulations, legislation and/or industry agreements regarding the recycling and return systems for products and packaging shall be met in the Nordic countries in which the Nordic Ecolabelled products are marketed.

- Declaration from the applicant regarding adherence to existing recycling/return agreements.

R36 Marketing

Marketing of the Nordic Ecolabelled car or boat care products must comply with "Regulations for the Nordic Ecolabelling of products".

- Appendix 12 duly completed and signed.

Marketing

The Nordic Ecolabel is a very well-known and well-reputed trademark in the Nordic region. Nordic Ecolabelled products may be marketed using the Nordic Ecolabel as long as the associated licence is valid.

The label must be positioned so that there is no doubt as to what the label refers to and so that it is clear that the car or boat care product is ecolabelled.

More information on marketing can be found in "Regulations for the Nordic Ecolabelling of products".

Design of the Nordic Ecolabel

The Nordic Ecolabel has the following design:



Each license has a unique license number which must be used with the label.

It must be clearly stated that the product is a car or boat care product. The Nordic Ecolabel shall have one of the following sub-texts: "Car care product" or "Boat care product". Other texts may be used upon prior approval by Nordic Ecolabelling.

Each license has a unique six figure license number which must be used with the label.

More information on the design of the label can be found in "Regulations for the Nordic Ecolabelling of products" 22 June 2011 or later versions.

Follow-up inspections

Nordic Ecolabelling may decide to check whether the product fulfils the Nordic Ecolabel requirements even after the licence is granted. This may for example involve a site visit or a random sampling.

The licence may be revoked if it is evident that the product does not meet the requirements.

Random samples may also be taken in-store and analysed by an independent laboratory. If the requirements are not met, Nordic Ecolabelling may charge the analysis costs to the license holder.

How long is the licence valid?

Version 5 of the criteria for car and boat care products was approved by the Nordic Ecolabelling Board in March 2012 and is valid until 31 March 2016.

On 12 December 2012 the Nordic Ecolabelling Board decided to adopt a change in R5. In addition minor alterations have been made in R3 and in appendixes. The new version is called 5.1.

The ecolabelling license is valid as long as current criteria are met and until the criteria expire. Criteria may be extended or adjusted. In these cases the license will be automatically extended and the license holder notified.

At least one year before the criteria expire, the Nordic Ecolabelling Board shall communicate which criteria are valid after the criteria's last expiry date. The license holder will then be able to renew the license or is offered the opportunity to extend the license.

New criteria

In the upcoming criteria (next revision), the following items should be considered:

- Further requirements for super-concentrates, especially with regard to definition and classification.
- Stricter requirements for phosphor.
- Substances in the packaging and their effects on environment and health.
- Reformulate the CDV requirement so that CDV is calculated on chronic CDV and tighten the requirements.
- Better efficiency tests.
- VOC requirements. Consider tightening the requirements.
- Consider tightening the fragrance requirement.
- Evaluate pre-diluted washer liquids if it turns out to be products on the market which have a different chemical composition which is better for the environment than the current products on the market.
- Evaluate the possibility for further limitation of silicones and siloxans.
- Make requirements for raw material manufacturing
- Improve the function efficiency test
- Consider the possibilities of making VNF requirements to the packaging
- Tighten the requirements to environmentally hazardous substances
- Changing the requirement for anaerobic degradability, so that there is a maximum limit for anaerobically degradable substances, and remove exceptions to the requirement.

Appendix 1 Conversion of requirements to CLP Regulations

The classification applies in accordance with EU substance directive 67/548/EEC with later changes and adjustments, and/or CLP regulation 1272/2008 with later changes. In the transfer period, i.e. until 1 June 2015, classification in accordance with the EU substance directive or the CLP regulation can be used. After the transfer period, only classification in accordance with the CLP regulation will apply.

Hazard symbols and R-phrases in accordance with 67/548/EEC		CLP-regulation 1272/2008	
Environmentally hazardous			
R50	Very toxic to aquatic organisms.	H400	Very toxic to aquatic life.
R50/53	Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.	H400/H410	Very toxic to aquatic life with long lasting effects.
R51/53	Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.	H411	Toxic to aquatic life with long lasting effects.
R52/53	Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.	H412	Harmful to aquatic life with long lasting effects.
R52	Harmful to aquatic organisms.	No direct translation	
R53	May cause long-term adverse effects in the aquatic environment.	H413	May cause long lasting harmful effects to aquatic life.
R59	Dangerous to the ozone layer.	EUH 059	Dangerous to the ozone layer.
Very toxic, toxic			
R2	Explosion hazard on impact, friction, fire or other ignition sources.	No direct translation possible.	
R3	High explosion hazard on impact, friction, fire or other ignition sources.	No direct translation possible.	
R11	Highly flammable - Liquid	No direct translation possible	
	Highly flammable - Liquid	H224	if initial boiling point ≤ 35°C
	Highly flammable - Liquid	H225	if initial boiling point > 35°C
	Highly flammable - Solid	No direct translation possible	
R12	Extremely flammable - Gas	No direct translation possible	
	Extremely flammable - Liquid	No direct translation possible	
R15	Reacts with water during formation of extremely flammable gases.	No direct translation possible.	
R17	Self-igniting in air.	H250	Self-ignites on contact with air.
R23	Vap.	H330	Fatal if inhaled.
R23	Toxic if inhaled.	H331	Toxic if inhaled.
R24	Toxic in contact with skin.	H311	Toxic in contact with skin.
R25	Toxic if swallowed.	H301	Toxic if swallowed.

R26	Very toxic if inhaled.	H330	Fatal if inhaled.
R27	Very toxic in contact with skin.	H310	Fatal in contact with skin.
R28	Very toxic if swallowed.	H300	Fatal if swallowed.
R39	Danger of serious, permanent damage to health.	No direct translation possible	
R48	Serious damage to health by prolonged exposure.	No direct translation possible	
R39/ 23-25	Toxic: danger of serious irreversible effects through inhalation, in contact with skin and if swallowed.	H370	Causes damage to organs.
R39/ 26-28	Very toxic: danger of serious irreversible effects through inhalation, in contact with skin and if swallowed.	H370	Causes damage to organs.
R48/ 23-25	Toxic: danger of serious damage to health by prolonged exposure through inhalation, in contact with skin and if swallowed.	H372	May cause damages to organs.
R42	May cause allergy if inhaled.	H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.
R43	May cause allergy in contact with skin.	H317	May produce an allergic skin reaction.
Cancer, birth defects			
R40	May possibly cause cancer.	H350	May cause cancer.
R45	May cause cancer.	H351	Suspected of causing cancer.
R49	May cause cancer if inhaled.	No direct translation possible	
R46	May cause genetic defects.	H340	May lead to genetic defects.
R60	May damage fertility.	H360	May damage fertility or the unborn child.
R61	May cause birth defects.		
R62	Possible danger of damaging fertility.	H361	Suspected of damaging fertility or the unborn child.
R63	May possibly cause birth defects.		
R64	May cause harm to breast-fed children.	H362	May cause harm to breast-fed children.
R68	Possible risk of irreversible damage to health.	H341	Suspected of causing genetic defects

Appendix 2 Description of the product

Relates to the product/product system with the following name:

Product name:
Manufacturer:
Supplier/importer:

The product is intended for:

- consumers
 professional use (washer systems)

Is the product part of a series?

Yes No

Is the product a super-concentrate?

Yes No

Super-concentrates contain < 10% water

The product / product system is used for:

- personal car wash
 truck wash
 boat wash
 other wash, which: _____
 polishing or care of car or boat, description: _____

The product / products can be used in the following types of washer systems:

- automatic brush cleaning/polishing
 automatic high pressure washing/polishing
 manual washing/polishing
 combined washing/polishing
 other wash/care: _____

Dosage (g/litre use solution): _____

Manufacturer's signature:

Date	Company name
Telephone	Case officer responsible (capital letters)
email	Case officer responsible (signature)

Appendix 3 Model prescription (R2)

The table below shows which information must be stated in a complete prescription for a product.

Trade name	Chemical name	Distributor	Classification	CAS no	DID no	Amount	Active content	Function
Butyldeglykol	Diethylene glycol monobutyl ether	Chemicals Co	R36-H319	112-34-5	172	x%	100%	Solvent
Ungerol N2-70	Natrium lauryl ether sulphate	Chemicals Int	R38-H315	3088-31-1	8	x%	90%	Surfactant
Dipropylene-glycol	Dipropylene-glykol monomethyl-ether	ABC Chemicals	R41-H318	34590-94-8	178	x%	70%	Solvent
Water			Xi; R36/38	7732-18-5		60%		Solvent

Appendix 4 Manufacturer Declarations

This statement is required by the manufacturer of the car or boat care and can be used by applicants when applying for a license for the Nordic Ecolabel for car and boat care, version 5.

Statements are given to the best of our knowledge and the information we have at this time, based on tests and/or declarations from raw material manufacturers/suppliers. The statement is subjected to development and new information. Should such information be available, the undersigned is obligated to submit an updated statement to Nordic Ecolabelling.

The statement applies to the product with the following name:

Car care product / boat care product:
Manufacturer:

The following definition shall be used on "constituent": Constituent substances are all substances in the product, including additives (for example preservatives and stabilisers) in the ingredients, but not contaminants from raw material production. Contaminants are defined as residues from raw material production present in the finished product in concentrations of less than 100 ppm (0.01 weight %, 100 mg/kg), but not substances that are added to a raw material or product for a purpose, irrespective of quantity. Known separation products from constituent substances are also considered constituent.

Is the car/boat care product a super-concentrate? (R4) Yes No

If yes,

Is the super-concentrate in concentrated form classified as Hazardous according to K3 in the criteria for car and boat care products version 5 in the table below? Yes No

Is the super-concentrate in use form (at the highest recommended dosage) classified in one of the risk categories below in K3 in the criteria for car and boat care products version 5? Yes No

Does the product contain substances classified according to one of the following hazard classes (R5) ?

Environmentally hazardous	R50	Acute 1: H400	Yes <input type="checkbox"/>	No <input type="checkbox"/>
	R50/53	Acute 1: H400	Yes <input type="checkbox"/>	No <input type="checkbox"/>
		Chronic 1: H410	Yes <input type="checkbox"/>	No <input type="checkbox"/>
	R51/53	Chronic 2: H411	Yes <input type="checkbox"/>	No <input type="checkbox"/>
	R52/53	Chronic 3: H412	Yes <input type="checkbox"/>	No <input type="checkbox"/>

If yes, please indicate the following:

Which ingredients: _____

Amount (weight %): _____

Classification: _____

Total content of substances classified as hazardous (in weight %): _____

Does the product contain substances classified with R42/H334 and/or R43/H317 (R6)? Yes No

If yes, please indicate the following:

Which ingredients: _____

Amount (weight %): _____

Does the product contain substances classified as carcinogenic, mutagenic and/or toxic to reproduction according to requirements K7 in car and boat care products version 5 (R7)? Yes No

Does the product contain remnants of NTA (R7)? Yes No

(NTA can only be present in the product as an impurity in complex makers, and must not exceed 0,010% of the product)

If yes, please indicate amount (weight %): _____

Does the product contain nano materials/particles (R8)? Yes No

Nano particles are defined as microscopic particles, where at least one of the dimensions is smaller than 100 nm.

Does the product contain one of the following substances (R10)?

- halogenated and/or aromatic solvents Yes No
- organic chlorine compounds or reactive chlorine compounds Yes No
- dyes in non-professional products (washer fluids exempted) Yes No
- SVHC substances (Substances of Very High Concern)
<http://echa.europa.eu/web/guest/candidate-list-table>
- PBT (persistent, bio accumulative and toxic substances according to the criteria of annex XIII of REACH
<http://esis.jrc.ec.europa.eu/index.php?PGM=pbt>) Yes No
- vPvB substances (very persistent and very bio accumulative substances) Yes No
- substances considered as endocrine disrupters, category I or II, according to EU reports on endocrine disrupters
http://ec.europa.eu/environment/endocrine/documents/final_report_2007.pdf (appendix L, page 238 and forward) Yes No
- linear alkyl benzene sulphonates (LAS) Yes No
- alkyl phenol ethoxylates (APEO) and alkylphenolderivates (APD) Yes No
- quaternary ammonium compounds which are not readily degradable Yes No
- benzalkonium chloride Yes No
- siloxans D4, D5 and HMDS Yes No
- EDTA, DTPA Yes No
- perfluorinated and polyfluorinated alkylated compounds (PFAS) Yes No

Does the product contain fragrance? Yes No

If yes, is the fragrance employed in accordance with IFRA's guidelines? (R11) Yes No

IFRA – International Fragrance Association – www.ifraorg.org/guidelines.asp

Does the product contain the following musk compounds and polycyclic musk compounds? (R12)

- Musk xylene (CAS no 81-15-2) Yes No
- Musk ambrette (CAS no 83-66-9) Yes No
- Moskene (CAS no 116-66-5) Yes No
- Musk tibetene (CAS no 145-39-1) Yes No
- Musk ketone (CAS no 81-14-1) Yes No
- HHCB (CAS no 114109-62-5, 114109-63-6, 1222-05-5, 78448-48-3 and 78448-49-4) Yes No
- AHTN (CAS no 1506-02-1 and 21145-77-7) Yes No

If yes, which compound?

Name: _____

CAS no.: _____

Does the product contain any fragrance specified in R13? Yes No

Is aerosol packages used (i.e. packaging with aerosol propellant)? (R26) Yes No

The fragrance manufacturer/supplier shall also declare in accordance with R11, R12 and R13 in appendix 6.

Manufacturer's signature:

Date	Company name
Telephone	Case officer responsible (capital letters)
email	Case officer responsible (signature)

Changes in the composition of the product require a new declaration to be submitted to Nordic Ecolabelling.

Appendix 5 Declarations raw material supplier/manufacturer

This statement is required by the raw materials supplier/manufacturer in connection with ecolabelling according to the criteria for car and boat care products, version 5.

Statements are given to the best of our knowledge and the information we have at this time. The statement is subjected to development and new information. Should such information be available, the undersigned is obligated to submit an updated statement to Nordic Ecolabelling.

It must be stated in this declaration whether any of the substances below are part of the raw material, regardless of whether they are pollutants or not, and regardless of amount. This must then be explained in more detail on page 2 of this declaration.

Declaration applies to the following ingredients:

Product name raw materials:
Raw material manufacturer:
Raw manufacturer supplier:

The following definition shall be used for "constituent": Constituent substances are all substances in the product, including additives (for example preservatives and stabilisers) in the ingredients, but not contaminants from raw material production. Contaminants are defined as residues from raw material production present in the finished product in concentrations of less than 100 ppm (0.01 weight %, 100 mg/kg), but not substances that are added to a raw material or product for a purpose, irrespective of quantity. Known separation products from constituent substances are also considered constituent.

The undersigned hereby declares the following about the above raw materials:

Does the raw material contain substances classified as hazardous according to one of the following hazard classes? (R5)

R 50/53	Aquatic acute 1: H400	Yes <input type="checkbox"/>	No <input type="checkbox"/>
	Aquatic chronic 1: H410	Yes <input type="checkbox"/>	No <input type="checkbox"/>
R51/53	Aquatic chronic 2: H411	Yes <input type="checkbox"/>	No <input type="checkbox"/>
R52/53	Aquatic chronic 3: H412	Yes <input type="checkbox"/>	No <input type="checkbox"/>
R50	Aquatic acute 1: H400	Yes <input type="checkbox"/>	No <input type="checkbox"/>

If yes, please indicate the following:

Which ingredients: _____

Amount (weight %): _____

Classification: _____

Total content of substances classified as hazardous (in weight %): _____

Is the raw material or substances included in the raw material classified as allergenic with R42/H334, R43/H317 or combinations of these? (R6) Yes No

If yes, please indicate the following:

Which ingredients: _____

Amount (weight %): _____

Is the raw material or substances included in the raw material classified as carcinogenic, mutagenic and/or toxic to reproduction? (R7) Yes No

If yes, please indicate the following:

Which ingredients: _____

Amount (weight %): _____

Does the raw material contain remnants of NTA? (R7) Yes No

NTA can only be present in the product as an impurity in complex makers, and must not exceed 0,010% of the product)

If yes, please indicate amount (weight %): _____

Does the raw material contain nano materials/particles? (R8) Yes No

Nano particles are defined as microscopic particles, where at least one of the dimensions is smaller than 100 nm.

Does the raw material contain one of the following substances (R10)?

- halogenated and/or aromatic solvents Yes No
- organic chlorine compounds or reactive chlorine compounds Yes No
- dyes in non-professional products (washer fluids exempted) Yes No
- SVHC substances (Substances of Very High Concern) Yes No
<http://echa.europa.eu/web/guest/candidate-list-table>
- PBT (persistent, bio accumulative and toxic substances according to the criteria of annex XIII of REACH) Yes No
<http://esis.jrc.ec.europa.eu/index.php?PGM=pbt>
- vPvB substances (very persistent and very bio accumulative substances) Yes No
- substances considered as endocrine disrupters, category I or II, according to EU reports on endocrine disrupters Yes No
http://ec.europa.eu/environment/endocrine/documents/final_report_2007.pdf (appendix L, page 238 and forward)
- linear alkyl benzene sulphonates (LAS) Yes No
- alkyl phenol ethoxylates (APEO) and alkylphenolderivates (APD) Yes No
- quaternary ammonium compounds which are not readily degradable Yes No
- benzalkonium chloride Yes No
- siloxans D4, D5 and HMDS Yes No
- EDTA, DTPA Yes No
- perfluorinated and polyfluorinated alkylated compounds (PFAS) Yes No

Does the raw material contain fragrance? Yes No

If yes, is the fragrance employed in accordance with IFRA's guidelines? (R11) Yes No

IFRA – International Fragrance Association – www.ifraorg.org/guidelines.asp

If the answer is yes to any of the above questions (excluding R14 and R17), specify the name, CAS number, concentration and purpose of adding each substance in question:

Signature of the raw materials supplier/manufacturer:

Date	Company name
Telephone	email
Name (contact person, capitals)	Signature (contact person)

Appendix 6 Declarations from the fragrance manufacturer/ supplier

This statement is required by the supplier/manufacturer of fragrance in which is part of Nordic Ecolabelled car or boat care products according to the criteria for car and boat care products, version 5.

Statements are given to the best of our knowledge and the information we have at this time. The statement is subjected to development and new information. Should such information be available, the undersigned is obligated to submit an updated statement to Nordic Ecolabelling.

It must be stated in this declaration whether any of the substances below are part of the raw material, regardless of whether they are pollutants or not, and regardless of amount. This must then be explained in more detail on page 2 of this declaration.

The following definition shall be used for "constituent": Constituent substances are all substances in the product, including additives (for example preservatives and stabilisers) in the ingredients, but not contaminants from raw material production. Contaminants are defined as residues from raw material production present in the finished product in concentrations of less than 100 ppm (0.01 weight %, 100 mg/kg), but not substances that are added to a raw material or product for a purpose, irrespective of quantity. Known separation products from constituent substances are also considered constituent.

Please note that the fragrance manufacturer/supplier shall also declare in accordance with Appendix 5.

Fragrance (name and CAS no):
Fragrance manufacturer (name):
Supplier/importer:

IFRA (R11)

Is the fragrance manufactured in accordance with IFRA's guidelines?
International Fragrance Association – www.ifraorg.org/guidelines.asp

Yes No

Musk compounds (R12)

Do any of the following musk compounds and polycyclic musk compounds contain the fragrance?

- Musk xylene (CAS no 81-15-2) Yes No
- Musk ambrette (CAS no 83-66-9) Yes No
- Moskene (CAS no 116-66-5) Yes No
- Musk tibetene (CAS no 145-39-1) Yes No
- Musk ketone (CAS no 81-14-1) Yes No
- HHCB (CAS no 114109-62-5, 114109-63-6, 1222-05-5, 78448-48-3 and 78448-49-4) Yes No
- AHTN (CAS no 1506-02-1 and 21145-77-7) Yes No

Allergenic fragrances (R13)

Does the fragrance contain one or more substances which are classified R42/H334 and/or R43/H317?

Yes No

If yes, please indicate the following:

Name: _____

Weight %: _____

Does the fragrance contain one or more of the following substances in the table?

Yes No

If yes, please indicate the concentration in weight% of the substances that are above the detection limit.

Name	CAS no.	Weight %
Amyl cinnamal	122-40-7	
Amylcinnamyl alcohol	101-85-9	
Anisyl alcohol	105-13-5	
Benzyl alcohol	100-51-6	
Benzyl benzoate	120-51-4	
Benzyl cinnamate	103-41-3	
Benzyl salicylate	118-58-1	
Cinnamal	104-55-2	
Cinnamyl alcohol	104-54-1	
Citral	5392-40-5	
Citronellol	106-22-9	
Coumarin	91-64-5	
d-Limonene	5989-27-5	
Eugenol	97-53-0	
Farnesol	4602-84-0	
Geraniol	106-24-1	
Hexyl cinnamaldehyde	101-86-0	
Hydroxy-citronellal	107-75-5	
Hydroxymethylphenyl cyclohexenecarboxaldehyde	31906-04-4	
Isoeugenol	97-54-1	
2-(tert-Butylbenzyl) propionaldehyde	80-54-6	
Linalool	78-70-6	
Methyl heptyn carbonate	111-12-6	
Cetone Alpha	127-51-5	
Oak moss extract	90028-68-5	
Tree moss extract	90028-67-4	

If the answer is yes to any of the above questions (excluding R14 and R17), specify the name, CAS number, concentration and purpose of adding each substance in question:

Signature of the fragrance manufacturer/supplier:

Date	Company name
Telephone	email
Name (contact person, capitals)	Signature (contact person)

Appendix 7 The POCP factor of VOC substances (R16)

In the case of solvents not included on the list, POCP values from tests may provide the basis for calculating the permitted VOC content, alternatively the “worst case” for the VOC group may be used. The list below is not synonymous with substances approved for use in Nordic Ecolabelled products.

The calculation is based on the UMIP2003 method from the LCA Centre in Denmark. The figures in the table are taken from “the British trajectory model”.

Alkanes	0,4 +/-0,1 (worst case = 0,5)
Methane	0,007
Ethane	0.1
Propane	0.5
n-butane	0.5
i-butane	0.4
n-pentane	0.3
i-pentane	0.3
n-hexane	0.5
2-methylpentane	0.5
3-methylpentane	0.4
2,2-dimethyl-butane	0,3
2,3-dimethyl-butane	0,4
n-heptane	0.5
2-methylhexane	0,5
3-methylhexane	0,5
n-octane	0.5
2-methylheptane	0.5
n-nonan	0.4
2-metyloctane	0.5
n-decane	0.4
2-methylnonane	0.4
n-undecane	0.4
n-dodecane	0.3
methylcyklo-hexane	0.5

Alkenes	0,5+/- 0,2
Ethylene	1.0
Propylene	0.6
1-butene	0.5
2-butene (trans)	0.4
2-pentene (trans)	0.4
2-methylbut-1-en	0.2
2-methylbut-2-en	0.5
3-methylbut-1-en	0.5
Isobutene	0.6
Isoprene	0.6

Alkynes	0.4
Acetylene	0.4

Aromatics	
benzene	0.4
toluene	0.5
o-xylene	0.2
m-xylene	0.5
p-xylene	0.5
ethyl benzene	0.5
1,2,3-trimethylbenzene	0.3
1,2,4-trimethylbenzene	0.3
1,3,5-trimethylbenzene	0.3
o-ethyl toluene	0.4
m-ethyl toluene	0.4
p-ethyl toluene	0.4
n-propyl benzene	0.5
isopropyl benzene	0.5

Aldehydes	0,3 +/- 0,2
formaldehyde	0.3
acetaldehyde	0.2
propionaldehyde	0.2
butyraldehyde	0.2
isobutyraldehyde	0.3
valeraldehyde	0.3
acroleine	0.8
benzaldehyde	-

Ketones	0,2 +/- 0,1
acetone	0.1
methyl ethyl ketone	0.2
methyl i-butyl ketone	0.3

Ethers	0,4 +/- 0,1
dimethyl ether	0.3
propylene glycolmethyl ether	0.5

Esthers	0,2 +/- 0,1
methyl acetate	0.1
ethyl acetate	0.3
isopropyl acetate	0,2
n-butyl acetate	0.3
isobutyl acetate	0.4
propylene glycol metylether acetate	0.2

Alcohols	0,2 +/- 0,02
methanol	0.2
ethanol	0.2
isopropanol	0.2
butanol	0.2
isobutanol	0.3
butane-2-diol	0.3

Chlorinated alkanes	0,01 +/- 0,01
methylene chloride	0.02
chloroform	0.004
methyl chloroform	0.002

Chlorinated alkenes	0,2 +/- 0,3
trichlorethylene	0.1
tetrachlorethylene	0.01
allyl chloride	0.5

Source: LCA Centre Denmark (2007): EDIP characterisation factors for photochemical ozone formation (High NO_x).

Appendix 8 Dyes in professional products (R18)

This statement is required by the manufacturer of pigment dyes in which is part of Nordic Ecolabelled car or boat care products according to the criteria for car and boat care products, version 5.

Statements are given to the best of our knowledge and the information we have at this time. The statement is subjected to development and new information. Should such information be available, the undersigned is obligated to submit an updated statement to Nordic Ecolabelling.

The following definition shall be used for "constituent": Constituent substances are all substances in the product, including additives (for example preservatives and stabilisers) in the ingredients, but not contaminants from raw material production. Contaminants are defined as residues from raw material production present in the finished product in concentrations of less than 100 ppm (0.01 weight %, 100 mg/kg), but not substances that are added to a raw material or product for a purpose, irrespective of quantity. Known separation products from constituent substances are also considered constituent.

Please note that the dye manufacturer/supplier shall also declare in accordance with Appendix 5.

The statement applies to pigments/dyes which are included in the product with the following names:

Car care product / boat care product:
Manufacturer:
Supplier/importer:
Name of pigment/dye:

Does the product contain pigments based on heavy metals (i.e. lead, cadmium, mercury and chromium with oxidation level 6), aluminium or copper.

Yes No

Is the dye in the product approved for use in foodstuffs in any Nordic country?

Yes No

If yes, please indicate:

E-number: _____

Alternative to approval for foodstuffs:

Is the dye non-bio accumulative?

Yes No

Dyes are not considered bio accumulative if $\log K_{ow} < 4,0$ or $BCF < 500$. If there is information on both BCF and $\log K_{ow}$, the value for the highest BCF measured shall be used.

If yes, please submit documentation for BCF and/or $\log K_{ow}$

Appendix no. _____

The declaration is completed by:

Date	Company name (manufacturer)
Telephone	Case officer responsible (capital letters)
email	Case officer responsible (signature)

Changes in the composition of the product require a new declaration to be submitted to Nordic Ecolabelling.

Appendix 9 Effectiveness – function test (R27)

The statement applies to the product/product system:

Product name:
Manufacturer:
Supplier/importer:

Testing shall be performed in such a way that the tests are representative.

For requirements for analysis laboratories, see Appendix 13.

To show the product function/effectiveness, the following is required for the method the applicants choose to document this:

- 1) The method should be representative of how the product is used in real life. This means that dirt, wash object, water temperature, amount of product applied, acting time, mechanical processing, etc. shall be equivalent to the conditions for which the product is intended to be used.
- 2) The product shall in the test method be compared with a similar product that is already established in the market. It is important that the products in the same category are compared with each other so that no water-based products are compared with solvent-based products, or degreasers are compared with shampoo, etc.
- 3) The product is to be tested in the concentration that is recommended on the label/packaging.
- 4) The result should be evaluated visually and/or measured with instruments, and photographs or other report is to be submitted to Ecolabelling.
- 5) The Ecolabelling Secretariat shall approve the test method.
- 6) The test report is to be submitted to Nordic Ecolabelling.

The product has been tested under the following conditions:	
Dirt type: (description)	
Wash object: (Hood, wheels, car parts, boat part, etc.)	
Water temperature:	
Amount of product used: (g/L)	
Recommended dosage of the test product:	
Acting time: (number of minutes)	
Mechanical processing: (sponge, cloth, etc.)	
The product is compared with: (name of product and manufacturer)	
Concentration of reference product: (g/L)	
Recommended dosage of the reference product: (stated on the label)	
Evaluation:	<input type="checkbox"/> Visual (photo) <input type="checkbox"/> Measured with instrument
The result is considered to be:	<input type="checkbox"/> Not satisfactory <input type="checkbox"/> Satisfactory <input type="checkbox"/> Very satisfactory

For polishing products, there are standardized tests, including ASTM D 4955-89 "Standard Practice for Field Evaluation of Automotive Polish.

For products for professional use, the declaration in accordance with Appendix 10 may also be used.

The declaration is completed by:

Date:	Company name:
Telephone:	Address:
Contact person:	e-mail:

Changes in the composition of the product require a new declaration to be submitted to Nordic Ecolabelling.

Appendix 10 Effectiveness – user test (R27)

The statement applies to the product/product system:

Product name:
Product system:
Manufacturer:
Supplier/importer:

The product is intended for:

- Professional use
- Consumers

Type of product: _____

The product/products can be used in the following types of washer systems:

- Automatic brush cleaning
- Automatic high pressure washing
- Manual washing
- Combination wash
- Other wash: _____

The product/product system is used for:

- Personal car wash
- Truck wash
- Boat wash
- Other wash: _____

Dosage (g/litre use solution): _____
(dosage used during the test)

Recommended dosage:
(dosage recommended on the packaging)

May - September: _____

October - April: _____

Is the product/product system used in combination with other chemicals?

Yes No

If yes, which ones: _____

Has the product/product system been the cause of malfunctions/comments in any washer and/or cleaning facilities?

Yes No

Number of wash cases the product is tested under relevant conditions: _____
(Minimum 10 times)

In an overall assessment of the product/product system's goal to clean the vehicle and/or boats, the result is considered to be:

Not satisfactory

Satisfactory

Very satisfactory

The declaration is completed by:

Date:	Company name:
Telephone:	Address:
Contact person:	e-mail:

The information is based on experience from the following business:

Date:	Place:
Company name:	
Signature:	

Changes in the composition of the product require a new declaration to be submitted to Nordic Ecolabelling.

Appendix 11 Efficiency test washer fluids (R21)

The statement applies to the product/product system:

Product name:
Manufacturer:
Supplier/importer:

To show the product function/effectiveness, the following is required for the method the applicants choose to document this:

- 1) The test is to be performed by at least 5 independent users.
- 2) Each user shall have used the washer fluid for a minimum of 2 months under relevant conditions before the questionnaire is filled in.
- 3) The user shall have had experience with other washer fluids on the market before the test is performed.
- 4) The product is to be tested with the dosage recommended on the label/packaging.
- 5) The user shall evaluate the result visually.

The product has been tested under the following conditions: _____

Period (date) the test took place (minimum 2 months)

The test person's experience with other washer fluids.

- No experience
- Experience with 1-2 other washer fluids
- Experience with 3 or more other washer fluids

For products the user dilutes himself, please state product dosage: _____

The product's efficiency is considered to be:

- Not satisfactory
- Satisfactory
- Very satisfactory

The declaration is completed by:

Name of user:
Address / company:

Changes in the composition of the product require a new declaration to be submitted to Nordic Ecolabelling.

Appendix 12 Marketing of Nordic Ecolabelled car and boat care products

We hereby certify that we are well acquainted with the regulations governing the use of the Nordic Ecolabel, as detailed in “Regulations for the Nordic Ecolabelling of products” and we agree to follow these regulations when marketing the Nordic Ecolabelled car or boat care product.

Further, we confirm that we are familiar with the criteria document regarding the Nordic Ecolabelling of car and boat care products.

We undertake to advise those individuals within the company involved in marketing the Nordic Ecolabelled products of the criteria for the Nordic Ecolabelling car and boat care products and “Regulations for the Nordic Ecolabelling of products.”

Date:	Place:
Company:	
Contact person:	Telephone:
Marketing Manager:	Telephone:

In case of a change in personnel, a new declaration must be submitted to the Ecolabelling organisation.

Appendix 13 Analyses and control

1 Requirements for the analysis laboratory

Testing shall be performed in such a way that the tests are representative. The analysis laboratory and/or testing institution must be impartial and competent. Raw data must be available for inspection by the ecolabelling organisation.

The analysis laboratory for chemical analysis must meet the general requirements in EN ISO 17025 or have an official GLP approval (concerns only laboratories for chemical analyses) or be certified in accordance with the ISO 9000 series.

The manufacturer's laboratory may be approved to carry out analyses and testing if:

- The manufacturer has a quality system where testing and analysis are included and which is certified in accordance with the ISO 9000 series.
- The test method for the efficiency test is part of the quality management system.
- Nordic Ecolabelling has access to raw data for the quality test.

The applicant bears the documentation and analysis costs.

2 Ecotoxicological test methods

International test methods (OECD Guidelines for Testing of Chemicals, ISBN 92-64-1222144) or equivalent test methods must be used for documentation. If equivalent test methods are used, these must be evaluated by an external body in order to ensure that the results also are equivalent. The relevant test methods to be used are given below. The methods can be found at:

http://puck.sourceoecd.org/vl=31948566/cl=20/nw=1/rpsv/periodical/p15_about.htm?jnlissn=1607310x

3 Acute/chronic aquatic toxicity

For acute aquatic toxicity test methods no. 201, 202 and 203 in the OECD Guidelines for testing of chemicals (ISBN 92-64-1222144), or other similar methods, are to be used.

For chronic aquatic toxicity, test methods no. 210, 211, 215, 229 in the OECD Guidelines for testing of chemicals, or other similar methods, are to be used.

4 Bio accumulation

In order to obtain an assessment of a substance's ability to accumulate in organisms, the bio concentration factor (BCF) for fish or the octanol/water distribution factor (P_{ow} or K_{ow}) can be determined.

Some of the following methods are to form the basis for the assessment: OECD 107, 117 or 305, and classification shall take place in accordance with the following:

Classification	OECD 107 or 117	OECD 305
Non-bio-accumulative	$\log K_{ow} < 4,0$	$BCF < 500$
Bio-accumulative	$\log K_{ow} > 4,0$	$BCF \geq 500$

OECD test method 107 is not applicable to surface active components capable to dissolve in both lipids and water. Based on current knowledge, evidence must be presented for such components which demonstrate to a high degree of certainty that the components or their degradation products do not represent a long-term or delayed hazard to the organisms in the aquatic environment.

Data models (such as BIOWIN) are accepted, but if the results of the model calculations are close to the limit values, or if Nordic Ecolabel has contrary data, more accurate information can be required.

If there is information on both BCF and $\log K_{ow}$, the value for the highest BCF measured shall be used.

5 Aerobic degradability

Test methods 301 A - F in the OECD Guidelines or 310 in the OECD Guidelines (ISBN 92-64-1222144) are used for determining whether an organic substance is readily aerobically biodegradable.

Other scientifically approved methods can also be used. Test results from such methods shall be produced by an impartial entity.

6 Anaerobic degradability

Anaerobic degradability can be tested in accordance with ISO 11734, OECD 311, ECOTOC no. 28 (June 1988) or similar test methods. For a substance to be regarded as anaerobically degradable in the ISO test, >60% degradability under anaerobic conditions during 56 days (ECETOC no. 28, June 1988), 60 days (ISO 11734) and 60 days (OECD 311) is required.

Substances that are not surfactants and not available on the DID-list are exempted from the analysis requirements with regard to anaerobic degradability if they are not toxic to aquatic organisms ($E/LC_{50} > 10$ mg/l), are easily anaerobically degradable and at the same time:

- have low absorption ($A < 25\%$) or
- have high desorption ($D < 25\%$) or
- are not potentially bio accumulative

Method 106 in the OECD Guidelines or ISO CD 18749 “Water quality – Absorption of substances on activated sludge” is used for determining the adsorption/desorption.

7 Potential degradability

For potential (inherent) degradability, test method no. 302 (A to C) in the OECD guidelines for testing of chemicals (ISBN 92-64-1222144) is used. In order to consider a constituent substance potentially degradable, it must obtain at least 70% mineralisation in the test (> 70 % BOD/ DOC/COD reduction) after 28 days.

Other scientifically approved test methods can also be used. Test results from such tests must be evaluated by an impartial entity.

8 (Potentially) endocrine disrupting substances

A (potentially) endocrine disrupting substance is an exogenous substance or combination of substances which changes the function(s) of the endocrine system and thus causes serious health effects on an unaffected organism, its offspring or populations.

Nordic Ecolabelling considers all substances which are considered (potentially) endocrine disrupting in the EU (categories 1 and 2: 'Category 1 - evidence of endocrine disrupting activity in at least one species using intact animals'; 'Category 2 - at least some in vitro evidence of biological activity related to endocrine disruption'). In the event of changes to the EU lists, the most current reports apply. The most current reports can be found at http://ec.europa.eu/environment/endocrine/strategy/short_en.htm and the Access database where all evaluated substances are listed, can be downloaded at http://ec.europa.eu/environment/endocrine/strategy/short_en.htm.

9 The DID-list

The DID-list is a joint list for the EU ecolabelling scheme and Nordic Ecolabelling. The list was developed in co-operation with interested parties both from consumer and environmental organisations and the industry, and contains information on the toxicity and degradability of a number of substances in the chemical/technical field. The substances contained in the DID-list do not express the substances found in ecolabelled products.

The DID-list cannot be used for documenting the toxicity of individual substances for the purposes of the classification regulations. Information regarding classification must be taken from product safety data sheets, from the literature or obtained from raw material manufacturers.

The separate DID list is available from the ecolabelling organisation or via each country's website, see page two. It can also be found on the EU Ecolabelling website http://ec.europa.eu/environment/ecolabel/ecolabelled_products/categories/did_list_en.htm

If a substance is not on the DID-list, the method in part B of the DID list is to be used: http://ec.europa.eu/environment/ecolabel/ecolabelled_products/categories/pdf/did_list/didlist_part_b_sv.pdf

For these criteria the DID list adopted in January 2007 or later versions will apply.

10 Exceptions from the analysis requirements

The following substances are exempted from the analysis requirements with regard to aquatic toxicity, bio degradability and bio accumulativity:

- Substances with a short life span (< 1 hour for the analysis of potential for bio accumulation and < 24 hour for other tests). Degradation products are analysed as required.
- Substances known to be dangerous to the environment and listed by the authorities.
- Substances which one can conclude are analogous to tested substances through scientific references and reasoning.
- High-molecular substances (molecular weight > 700, minimum calculated diameter > 9.5 Å or length >5.5 nm) are exempt from the bio accumulation test requirement.