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Helsinki, 24 June 2021

Addressees
Registrant(s) as listed in the last Appendix of this decision

Date of submission of the dossier subject to this decision
21/01/2019

Registered substance subject to this decision ("the Substance")
Substance name: (+)-tartaric acid
EC number: 201-766-0
CAS number: 87-69-4

Decision number: Please refer to the REACH-IT message which delivered this communication (in format CCH-D-XXXXXXXXXX-XX-XX/F)

DECISION ON A COMPLIANCE CHECK

Under Article 41 of Regulation (EC) No 1907/2006 (REACH), you must submit the information listed in A.1, A.2., A.3. and B.2. below by ***29 September 2022*** and other information listed below by ***2 April 2024***.

Requested information must be generated using the Substance unless otherwise specified.

A. Information required from all the Registrants subject to Annex VII of REACH

1. Short-term toxicity testing on aquatic invertebrates (Annex VII, Section 9.1.1.; test method: EU C.2./OECD TG 202)

2. Growth inhibition study aquatic plants (Annex VII, Section 9.1.2.; test method: EU C.3./OECD TG 201)

3. Ready biodegradability (Annex VII, Section 9.2.1.1.; test method: OECD TG 301A/B/C/D/E/F or OECD TG 310)

B. Information required from all the Registrants subject to Annex VIII of REACH

1. Screening for reproductive/developmental toxicity (Annex VIII, Section 8.7.1.; test method: EU B.63/OECD TG 421 or EU B.64/OECD TG 422) by oral route, in rats

2. Short-term toxicity testing on fish (Annex VIII, Section 9.1.3.; test method: OECD TG 203)

Reasons for the request(s) are explained in the following appendices:

- Appendix entitled "Reasons common to several requests";
- Appendices entitled "Reasons to request information required under Annexes VII to VIII of REACH", respectively.

Information required depends on your tonnage band

You must provide the information listed above for all REACH Annexes applicable to you, and in accordance with Articles 10(a) and 12(1) of REACH:

- the information specified in Annexes VII and VIII to REACH, for registration at 10-100 tpa.

How to comply with your information requirements

To comply with your information requirements you must submit the information requested by this decision in an updated registration dossier by the deadline indicated above. You must also update the chemical safety report, where relevant, including any changes to classification and labelling, based on the newly generated information.

You must follow the general testing and reporting requirements provided under the Appendix entitled "Requirements to fulfil when conducting and reporting new tests for REACH purposes". For references used in this decision, please consult the Appendix entitled "List of references".

Appeal

This decision, when adopted under Article 51 of REACH, may be appealed to the Board of Appeal of ECHA within three months of its notification to you. Please refer to http://echa.europa.eu/regulations/appeals for further information.

Failure to comply

If you do not comply with the information required by this decision by the deadline indicated above, ECHA will notify the enforcement authorities of your Member State.

Authorised[1] under the authority of Christel Schilliger-Musset, Director of Hazard Assessment

[1] As this is an electronic document, it is not physically signed. This communication has been approved according to ECHA's internal decision-approval process.

Appendix on Reasons common to several requests

1. Assessment of (quantitative) structure-activity relationships estimations

You have provided information based on application of (quantitative) structure-activity relationships (QSAR) as supporting studies for the following standard information requirements:

1. Short-term toxicity testing on aquatic invertebrates (Annex VII, Section 9.1.1.)
2. Growth inhibition study aquatic plants (Annex VII, Section 9.1.2.)
3. Ready biodegradability (Annex VII, Section 9.2.1.1.)
4. Screening for reproductive/developmental toxicity (Annex VIII, Section 8.7.1)

Information generated by application of various QSARs applied by you raises the same deficiencies irrespective of the information requirement for which it is invoked. Accordingly, ECHA addressed these deficiencies in the present Appendix, before assessing the specific standard information requirements in the following appendices.

Annex XI, Section 1.3. states that results obtained from valid QSAR models may be used instead of testing when several cumulative conditions are met, in particular:

1. results are derived from a QSAR model whose scientific validity has been established;
2. the substance falls within the applicability domain of the QSAR model;
3. adequate and reliable documentation of the applied method is provided; and
4. the results are adequate for classification and labelling and/or risk assessment.

You have provided QSAR predictions by BIOWIN v.4.10. for the ready biodegradability and ECOSAR v1.10 for the aquatic toxicity endpoints listed above in order to comply with the REACH information requirements. Furthermore, you have provided QSAR predictions from VEGA models (Developmental Toxicity model (CAESAR) 2.1.7 and Developmental/ Reproductive Toxicity library (PG) 1.0.0) for developmental toxicity.

Lack of documentation of the model (QMRF)

Under Appendix C of the OECD Guidance document on the validation of (Q)SAR models (ENV/JM/MONO(2007)2) and ECHA Guidance R.6.1.6.3., adequate and reliable documentation must include a (Q)SAR Model Reporting Format document (QMRF) which reports, among others, the following information:

- the predicted endpoint, including information on experimental protocol and data quality for the data used to develop the model;
- an unambiguous definition of the algorithm, the descriptor(s) of the model and its applicability domain,
- an estimate of the goodness-of-fit and of the predictivity of the model, including information on training set and validation statistics.

You have not provided information about the models applied. In particular, you have not included QMRFs for BIOWIN v.4.10. and ECOSAR v1.10 in your technical registration dossier.

In absence of such information, ECHA cannot establish that the models can be used to meet these information requirement.

Inadequate documentation of the prediction (QPRF)

ECHA Guidance R.6.1.6.3 states that the information specified in or equivalent to the (Q)SAR Prediction Reporting Format document (QPRF) must be provided to have adequate and reliable documentation of the applied method. For a QPRF this includes, among others:

- the model prediction(s), including the endpoint,
- a precise identification of the substance modelled,
- the relationship between the modelled substance and the defined applicability domain,
- the identities of close analogues, including considerations on how predicted and experimental data for analogues support the prediction.

You have provided prediction reports for the ECOSAR v.1.10 and BIOWIN v.4.10. However, in these reports you have not provided information on the close analogues (including considerations on how predicted and experimental data for analogues support the prediction) for neither of the applied methods as well as no information provided about the relationship between the modelled substance and the defined applicability domain for the BIOWIN v.4.10.

Furthermore, you have provided prediction reports for the CAESAR and PG models. The results from these models are not adequate for the purpose of risk assessment under REACH. The predicted endpoint is not well specified and does not cover the same range of parameters as the standard test included in the standard information requirements. Furthermore, the result from the PG model is assigned a low reliability by the model and therefore considered outside the applicability domain of the model.

In absence of adequate documentation of the prediction, ECHA cannot establish that the prediction can be used to meet this information requirement.

Conclusion

Consequently, ECHA cannot verify that the cumulative conditions of Annex XI, Section 1.3 listed above are met. Therefore, provided information based on application of QSARs is rejected.

Appendix A: Reasons to request information required under Annex VII of REACH

1. Short-term toxicity testing on aquatic invertebrates

Short-term toxicity testing on aquatic invertebrates is an information requirement under Annex VII to REACH (Section 9.1.1.).

You have provided the following information:

i. Key experimental study, information from the secondary source - ECOTOXicology knowledgebase database; no test guideline identified, study conducted with tartaric acid.

ii. Key information, adaptation under Annex XI, Section 1.3. supported by the prediction of short-term toxicity to daphnids by ECOSAR v1.10.

We have assessed this information and identified the following issues:

Reliability of experimental study

To fulfil the information requirement, a study must comply with OECD TG 202 (Article 13(3) of REACH). Therefore, the following specifications must be met:

- the test duration is 48 hours or longer;
- the test design is reported (*e.g.* static or semi-static test, number of replicates);
- the test procedure is reported (*e.g.* composition of the test medium, loading in number of *Daphnia* per test vessel);
- the number of immobilised daphnids is determined at 24 and 48 hours. Data are summarised in tabular form, showing for each treatment group and control, the number of daphnids used, and immobilisation at each observation;
- the dissolved oxygen and pH measured at least at the beginning and end of the test is reported;
- adequate information on the analytical method (including performance parameters of the method) and on the results of the analytical determination of exposure concentrations are provided;

Your registration dossier provides an information on toxicity to daphnids from the secondary source showing that the test duration was 32 hours. This is critical methodological deficiency resulting in the rejection of the study results.

Furthermore, none of the above listed details on test design, procedure, conditions, biological and analytical results is reported in the registration dossier. Therefore, the reporting of the study is not sufficient to conduct an independent assessment of its reliability.

Therefore, the requirements of OECD TG 202 are not met for the provided experimental study.

Predictions by application of (quantitative) structure-activity relationships

As explained above under Appendix on Reasons common to several requests the provided information based on application of QSAR is rejected. Consequently, the adaptation you submitted under Annex XI, Section 1.3. is rejected.

On this basis, the information requirement is not fulfilled.

There is a parallel dossier evaluation process to request the joint submission registrants concerned to generate and submit a long-term toxicity study on aquatic invertebrates.

Unnecessary animal testing must be avoided. Therefore, to fulfil the information requirement covered by this endpoint, a justification for an adaptation based on column 2 of the present information requirement should be considered instead of the standard test.

2. Growth inhibition study aquatic plants

Growth inhibition study aquatic plants is an information requirement under Annex VII to REACH (Section 9.1.2.).

You have provided the following information:

i. Key information, adaptation under Annex XI, Section 1.3. prediction of effect concentration to green algae by ECOSAR v1.10.

We have assessed this information and identified the following issue:
As explained above under Appendix on Reasons common to several requests, provided information based on application of QSAR is rejected. Consequently, your adaptation under Annex XI, Section 1.3. is rejected.

On this basis, the information requirement is not fulfilled.

3. Ready biodegradability

Ready biodegradability is an information requirement in Annex VII to REACH (Section 9.2.1.1.).

You have provided the following information:

i. Key information, adaptation under Annex XI, Section 1.3. prediction of ready biodegradability by BIOWIN v.4.10.

We have assessed this information and identified the following issue:
As explained above under Appendix on Reasons common to several requests, provided information based on application of QSAR is rejected. Consequently, your adaptation under Annex XI, Section 1.3. is rejected.

On this basis, the information requirement is not fulfilled.

Appendix B: Reasons to request information required under Annex VIII of REACH

1. Screening for reproductive/developmental toxicity

Screening for reproductive/developmental toxicity is a standard information requirement under Annex VIII to REACH. This information may take the form of a study record or a valid adaptation in accordance with either a specific adaptation rule under Column 2 of Annex VIII or a general adaptation rule under Annex XI.

You have provided an adaptation according to Annex VIII, Section 8.7., Column 2. To support your adaptation you provided

- four teratology studies performed with the Substance in rats, rabbits, mice and hamsters at doses < 300 mg/kg bw/day (1973).

In addition, you have provided an adaptation according to Annex XI, Section 1.3. To support your adaptation you provided

- QSAR predictions from VEGA models (Developmental Toxicity model (CAESAR) 2.1.7 and Developmental/Reproductive Toxicity library (PG) 1.0.0) for developmental toxicity.

We have assessed this information and identified the following issues:

Column 2 adaptation

According to Annex VIII, Section 8.7., Column 2, first paragraph, fourth indent, the study does not need to be conducted if a pre-natal developmental toxicity study (OECD TG 414) is already available. The criteria of the test guideline OECD TG 414 include e.g.

- highest dose level should aim to induce some developmental and/or maternal toxicity.

You justified the adaptation by stating that *"a screening study for reproductive / developmental toxicity does not need to be conducted because available data on developmental/teratogenic toxicity are adequate to support a robust risk assessment and classification and labelling"*.

The highest dose level in the studies you have submitted did not induce any developmental and/or maternal toxicity and you have not shown that the aim was to induce toxicity. Neither did they reach the limit dose level of 1000 mg/kg bw/day. Therefore, the dose level selection was too low, and the studies do not fulfil the criterion set in OECD TG 414.

Non-acceptable QSAR predictions

As explained above under Appendix on Reasons common to several requests, provided information based on application of QSAR is rejected.

Based on the above, your adaptations are rejected.

Information on study design

A study according to the test method EU B.63/OECD TG 421 or EU B.64/OECD TG 422 must be performed in rats with oral[2] administration of the Substance.
There is a parallel dossier evaluation process to request the joint submission registrants concerned to generate and submit an extended one-generation reproductive toxicity study (EOGRTS). Unnecessary animal testing must be avoided. Therefore, to fulfil the information

[2] ECHA Guidance R.7a, Section R.7.6.2.3.2.

requirement covered by this endpoint, a justification for an adaptation based on column 2 of the present information requirement should be considered instead of the standard test.

2. Short-term toxicity testing on fish

Short-term toxicity testing on fish is an information requirement under Annex VIII to REACH (Section 9.1.3.).

You have provided the following information:

i. Key study with the tartaric acid (Fish, acute toxicity test, [redacted], 2010).

We have assessed this information and identified the following issues:

Reliability of experimental studies

To fulfil the information requirement, a study must comply with OECD TG 203 (Article 13(3) of REACH). Therefore, the following specifications must be met:

- the test design is reported (*e.g.* static, semi-static or flow-through, number of test animals);
- the test procedure is reported (*e.g.* composition of the test medium, fish loading);
- in static tests, the results of at least daily measurements of dissolved oxygen, pH, salinity (if relevant) and temperature measured daily in each test vessel are reported. The results of hardness and TOC determinations at the beginning of the exposure in the dilution water are reported;
- for semi-static tests, dissolved oxygen, pH, salinity (if relevant) and temperature measured prior to and after each water renewal are reported. The results of hardness and TOC determinations in the dilution water are reported;
- adequate information on the analytical method (including performance parameters of the method) and on the results of the analytical determination of exposure concentrations are provided;
- mortalities and sub-lethal effects (*e.g.* with regard to equilibrium, appearance, ventilator and swimming behaviour) are reported. The frequency of observations includes at least 2 observations within the first 24 hours and at least two observations per day from day 2 to 4.

We observe that there is only a reference for the study and 96 hours lethal concentration (LC50) is reported in the registration dossier. However, there is no information on the specifications listed above reported in the registration dossier.

Based on the above, the reporting of the study is not sufficient to conduct an independent assessment of its reliability.

Therefore, the requirements of OECD TG 203 are not met.

On this basis, the information requirement is not fulfilled.

There is a parallel dossier evaluation process to request the joint submission registrants concerned to generate and submit a long-term toxicity study on fish. Unnecessary animal testing must be avoided. Therefore, to fulfil the information requirement covered by this endpoint, a justification for an adaptation based on column 2 of the present information requirement should be considered instead of the standard test.

Appendix C: Requirements to fulfil when conducting and reporting new tests for REACH purposes

A. Test methods, GLP requirements and reporting

1. Under Article 13(3) of REACH, all new data generated as a result of this decision must be conducted according to the test methods laid down in a European Commission Regulation or to international test methods recognised by the Commission or ECHA as being appropriate.

2. Under Article 13(4) of REACH, ecotoxicological and toxicological tests and analyses must be carried out according to the GLP principles (Directive 2004/10/EC) or other international standards recognised by the Commission or ECHA.

3. Under Article 10(a)(vi) and (vii) of REACH, all new data generated as a result of this decision must be reported as study summaries, or as robust study summaries, if required under Annex I of REACH. See ECHA Practical Guide on How to report robust study summaries[3].

B. Test material

1. Selection of the Test material(s)

   The Test Material used to generate the new data must be selected taking into account the following:
   - the impact of each constituent/ impurity on the test results for the endpoint to be assessed. For example, if a constituent/ impurity of the Substance is known to have an impact on (eco)toxicity, the selected Test Material must contain that constituent/ impurity.

2. Information on the Test Material needed in the updated dossier
   - You must report the composition of the Test Material selected for each study, under the "Test material information" section, for each respective endpoint study record in IUCLID.
   - The reported composition must include all constituents of each Test Material and their concentration values and other parameters relevant for the property to be tested.

This information is needed to assess whether the Test Material is relevant for the Substance

Technical instructions on how to report the above is available in the manual on How to prepare registration and PPORD dossiers[4].

[3] https://echa.europa.eu/practical-guides
[4] https://echa.europa.eu/manuals

Appendix D: Procedure

This decision does not prevent ECHA from initiating further compliance checks at a later stage on the registrations present.

ECHA followed the procedure detailed in Articles 50 and 51 of REACH.

The compliance check was initiated on 17 March 2020.

ECHA notified you of the draft decision and invited you to provide comments.

ECHA did not receive any comments within the notification period.

ECHA notified the draft decision to the competent authorities of the Member States for proposals for amendment.

As no amendments were proposed, ECHA adopted the decision under Article 51(3) of REACH.

Appendix E: List of references - ECHA Guidance[5] and other supporting documents

Evaluation of available information
Guidance on information requirements and chemical safety assessment, Chapter R.4 (version 1.1., December 2011), referred to as ECHA Guidance R.4 where relevant.

QSARs, read-across and grouping
Guidance on information requirements and chemical safety assessment, Chapter R.6 (version 1.0, May 2008), referred to as ECHA Guidance R.6 where relevant.

Read-across assessment framework (RAAF, March 2017)[6]

RAAF - considerations on multiconstituent substances and UVCBs (RAAF UVCB, March 2017)[7]

Physical-chemical properties
Guidance on information requirements and chemical safety assessment, Chapter R.7a (version 6.0, July 2017), referred to as ECHA Guidance R.7a in this decision.

Toxicology
Guidance on information requirements and chemical safety assessment, Chapter R.7a (version 6.0, July 2017), referred to as ECHA Guidance R.7a in this decision.

Guidance on information requirements and chemical safety assessment, Chapter R.7c (version 3.0, June 2017), referred to as ECHA Guidance R.7c in this decision.

Environmental toxicology and fate
Guidance on information requirements and chemical safety assessment, Chapter R.7a (version 6.0, July 2017), referred to as ECHA Guidance R.7a in this decision.

Guidance on information requirements and chemical safety assessment, Chapter R.7b (version 4.0, June 2017), referred to as ECHA Guidance R.7b in this decision.

Guidance on information requirements and chemical safety assessment, Chapter R.7c (version 3.0, June 2017), referred to as ECHA Guidance R.7c in this decision.

PBT assessment
Guidance on information requirements and chemical safety assessment, Chapter R.11 (version 3.0, June 2017), referred to as ECHA Guidance R.11 in this decision.

Guidance on information requirements and chemical safety assessment, Chapter R.16 (version 3.0, February 2016), referred to as ECHA Guidance R.16 in this decision.

Data sharing
Guidance on data-sharing (version 3.1, January 2017), referred to as ECHA Guidance on data sharing in this decision.

OECD Guidance documents[8]

[5] https://echa.europa.eu/guidance-documents/guidance-on-information-requirements-and-chemical-safety-assessment
[6] https://echa.europa.eu/support/registration/how-to-avoid-unnecessary-testing-on-animals/grouping-of-substances-and-read-across
[7] http://www.oecd.org/chemicalsafety/testing/series-testing-assessment-publications-number.htm
[8] http://www.oecd.org/chemicalsafety/testing/series-testing-assessment-publications-number.htm

Guidance Document on aqueous–phase aquatic toxicity testing of difficult test chemicals – No 23, referred to as OECD GD 23.

Guidance document on transformation/dissolution of metals and metal compounds in aqueous media – No 29, referred to as OECD GD 29.

Guidance Document on Standardised Test Guidelines for Evaluating Chemicals for Endocrine Disruption – No 150, referred to as OECD GD 150.

Guidance Document supporting OECD test guideline 443 on the extended one-generation reproductive toxicity test – No 151, referred to as OECD GD 151.

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Appendix F: Addressees of this decision and the corresponding information requirements applicable to them

You must provide the information requested in this decision for all REACH Annexes applicable to you.

Registrant Name	Registration number	Highest REACH Annex applicable to you
[redacted]	[redacted]	[redacted]

Where applicable, the name of a third party representative (TPR) may be displayed in the list of recipients whereas ECHA will send the decision to the actual registrant.