

Evaluation Report for Category B, Subcategory 2.3, 2.4 Application

Application Number: 2017-7385

Application: B.2.3: New EP: Product Chemistry - Identity of Formulants

B.2.4: New EP: Product Chemistry - Proportion of Formulants

Product: NALCO 7639S

Registration Number: 33344 **Active ingredients (a.i.):** Bronopol

PMRA Document Number (English PDF): 2959164

Purpose of Application

The purpose of this application was to register a slimicide end-use product, Nalco 7639S, based on the active ingredient bronopol. It is for use in cooling waters, including recirculating cooling towers, evaporative condensers, air washers and air conditioning and humidifying systems.

Chemistry Assessment

Nalco 7639S is formulated as soluble granules containing bronopol at a concentration of 99 %. This end-use product has a density of 1.22 g/mL. The required chemistry data for Nalco 7639S have been provided, reviewed and found to be acceptable.

Health Assessments

NALCO 7639S is considered to be of high acute toxicity via the oral and dermal routes in rats and rabbits respectively, slight acute toxicity via the inhalation route in rats, extremely corrosive to the eyes and skin of rabbits, and is considered to be a dermal sensitizer in laboratory animals.

The use of the end-use product Nalco 7639S in water cooling water and towers, evaporative condensers, industrial process waters and industrial/commercial air washers is not expected to result in potential occupational or bystander exposure over the registered use of bronopol. No risks of concern are expected when workers follow label directions and wear personal protective equipment as stated on the label.

Environmental Assessment

The uses of Nalco 7639S are within the currently registered use pattern of the active ingredient bronopol, and therefore, no additional risk is expected from the use of Nalco 7639S. The label includes the required environmental precautions and hazards statements, which adequately mitigates risks to the environment.

Value Assessment



Laboratory trials evaluating biocide performance against a variety of relevant bacteria within three different representative cooling water samples were provided in support of Nalco 7639S. Data was also provided from two operational trials within recirculating cooling water systems in which Nalco 7639S was used to replace the current biocide regime. The data showed that the active ingredient, bronopol was effective at reducing the bacterial numbers to acceptable levels for recirculating cooling water. The product remained effective at elevated temperatures and pH's. While other bronopol-based end-use products are already registered for recirculating cooling water, most of these products are formulated as solutions. This product is a solid formulation that is intended to reduce worker exposure.

Conclusion

The PMRA has reviewed the information submitted in support of the end use product. Based on the results of this review, Nalco 7639S is acceptable for registration.

References

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2827318	2016, Research Report, DACO: 10.2.3.2(F),10.2.3.4(E)
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2827321	2017, Survey of Alternatives, DACO: 10.5.1

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