Khangisa Waste
CONSULTING

PULP SLUDGE CLASSIFICATION REPORT

Prepared for
MPACT PAPER – SPRINGS MILL

CLIENT NAME	**MPACT PAPER – SPRINGS MILL**
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The stream is a mixture, the stream is thus subject the harmonised criteria for the classification of such mixtures, as detailed within the scope of the GHS.

A desktop study has indicated that such process streams, as a whole, have not been classified to determine their intrinsic physical, health and environmental hazards, as defined within the scope of the SANS 10234 (GHS) document.

Research has also indicated the non-existence of test data for similar mixtures or streams. The implication is the Bridging Principles established as relevant for each hazard class, as defined within the scope of SANS 10234 (GHS), will be inapplicable. An ingredient-based approach to the classification of the stream is, therefore, requisite. Analysis of a representative composite sample was mandatory.

In lieu of the previous statement, only ingredients that are quantifiable can be utilised in the classification process to assign the hazard associated with the ingredient, as identified within the scope of the GHS, to the mixture as a whole; and only ingredients present in a mixture at or above a predetermined concentration cut-off limit will trigger classification of the mixture itself towards the specific health and environmental hazard endpoints ascribed to the ingredient.

Per Talbot analytical report W01612/22 (1), no hazardous stream component is present at a concentration ≥ 0.1%; no stream component will therefore contribute to the classification of the stream as a whole.

The pH of the stream, per W01612/22, is 7.3. Given the pH of the stream is > 2 but < 11.5, the stream is not considered to possess inherent corrosive properties.

Classification Proposal for the Stream:

Classification is proposed for none of the physical, health and environmental hazards currently defined within the scope of SANS 10234 (GHS).

Proposed GHS Classification for the Stream:

Non-hazardous within the scope of SANS 10234.

Proposed Classification for the Stream per SANS 10228:

The stream is not classified, per SANS 10234, as an Acute Toxicity Hazard of a specific Category, via any identified route. Since acute toxicity values primarily for hazard category 1 are used by the transport sector to allocate packing groups, classification of the waste as Class 6.1: Toxic Substances is not possible as the assignment of a packing group for division 6.1, in accordance with the degree of toxic hazard posed during transport, is inapplicable.

The stream is not classified as a Flammable Liquid. The stream thus cannot be classified under SANS 10228 Class 3: Flammable Liquid.

The stream is not classified to the Skin Corrosion and Serious Eye Damage endpoints as dictated per SANS 10234. The stream thus cannot be classified under SANS 10228 Class 8: Corrosives.

The stream is also not classified, per SANS 10234, as an acute or chronic aquatic environmental hazard. Note; the acute aquatic environmental toxicity would have represented the crucial attribute in defining the hazard where the transport of the waste may give rise to short-term dangers from potential accidents or spillages of said waste.

Hazardous streams that cannot be classified under one of the other SANS 10228 classes but that are of such dangerous character as to be considered environmentally hazardous, are included in class 9 of SANS 10228. This is, however, not possible and inclusion under Class 9 of the SANS 10228 document is inapplicable.

Per 15.2.3.5.1 of the SANS 10228, Liquid substances or mixtures dangerous to the aquatic environment not otherwise classified under classes 2 to 6 and class 8; shall be designated:
UN 3082 Environmentally Hazardous Substance, Liquid, N.O.S.
Per 15.2.3.5.2 of the SANS 10228 document, environmentally hazardous substances (UN 3082), shall be assigned to packing group III.

Assigning of UN 3082 and packing group III to the waste stream will be unbefitting in this instance as the stream cannot be classified to the acute aquatic environmental hazard endpoint. The stream is, therefore, considered non-hazardous and safe to travel by road. The stream thus is not classified as dangerous in the context of transport regulations.

UN NUMBER: NOT REGULATED

References:

1 – W01612/22 (Talbot Laboratories analytical report)