

Highmark Exploration Battery Flare Dispersion Model

The attached dispersion input information is based on company submitted data.

The H₂S concentration of 4.3% is based on recent gas analyses from Highmark wells.

The GOR of 8.0 m3 /m3 is a maximum measured value based on individual Highmark well tests.

As there will be no pressure vessels at this facility the model was based on 100% gas going to flare.

The dispersion modelling output indicates the maximum SO₂ concentration discharged from the proposed battery, under normal operating conditions, meets the requirements of Section 85.2(1) of the Manitoba Drilling and Production Regulation.

Flare stack = $8.46 \mu g / m3 SO_2$ at 126 m.

Prepared by: Bruce Dunning Dec 24, 2014