



STANDARD GAS SG NO.1 LIMITED

BRIEFING NOTE – HMEB Summary

SCOTTOW ENTERPRISE PARK

Parameters ¹	Value
Feed Flow (kg/hr)	6000
Dry Feed - Biogenic	40
Dry Feed - Plastic	13
Dry Feed - RDF	47
Moisture	25
Feed LHV - Wet (MJ/kg)	14.89
HHV (MJ/kg)	16.65
Ash Flow (kg/hr)	482.05
Ash Density (kg/m ³)	481.00
Char Flow (kg/hr)	353.77
Char Density (kg/m ³)	128.00
Char / Ash Mixture Flow (kg/hr)	835.82
Char / Ash Mixture Density (kg/m ³)	221.94
Char / Ash Cooling (kW)	163.63
F2001 Heat (MW)	2.53
Electrical (MW) based on 38% Conversion - Min	6.3
Electrical (MW) based on 38% Conversion - Max	6.5
Export Mass Flow (kg/hr)	2601
Export Volume Flow (m ³ /hr)	2503
Export - Energy Content (MJ/m ³)	24.7
Export - Total Thermal (MW)	17.2
Export - Gross Capacity (MW)	6.3
Calculated pH	6.9
pH Control - Required NaOH (kg/hr)	0.0 ²

¹ Based on 8,000 hours, 6 tonnes per hour, 48,000 tonnes per annum.

² Based on 25% w/w aqueous solution



H ₂ S Removal - Hydrogen Peroxide (l/hr)	2.7 ³
Comp Mole Frac (Oxygen)	0.03%
Comp Mole Frac (CO)	24.33%
Comp Mole Frac (CO ₂)	15.07%
Comp Mole Frac (Nitrogen)	0.61%
Comp Mole Frac (Hydrogen)	17.22%
Comp Mole Frac (Methane)	21.02%
Comp Mole Frac (Acetylene)	3.44%
Comp Mole Frac (Ethylene)	7.65%
Comp Mole Frac (Ethane)	0.76%
Comp Mole Frac (Propene)	0.64%
Comp Mole Frac (Propane)	0.23%
Comp Mole Frac (n-Butane)	1.18%
Comp Mole Frac (Cyclopentane)	0.51%
Comp Mole Frac (i-Pentane)	0.02%
Comp Mole Frac (n-Pentane)	0.17%
Comp Mole Frac (Benzene)	0.06%
Comp Mole Frac (Cyclohexane)	0.17%
Comp Mole Frac (n-Hexane)	0.30%
Comp Mole Frac (n-Octane)	0.01%
Comp Mole Frac (M-PH-Ketone)	0.01%
Comp Mole Frac (H ₂ O)	6.40%
Comp Mole Frac (SO ₂)	0.18%
Comp Mole Frac (H ₂ S)	0.00%

³ Based on 35% w/w aqueous solution

