

Universal Services SMP 2013

Solvent management plan for the surface cleaning activity

I/O reference

<p>I1 Solvent Input a Vapasol AMC</p>	<p>6 176.5 litre drums purchased 1.32 Specific gravity kg/litre 1397.9 kg solvent purchased</p>	<p>I1= 1397.9 kg</p>
<p>I2 Recovered solvent re-used in process Internal recycling</p>	<p></p>	<p>I2= 0.00 kg</p>
<p>O1 Solvent emitted via the stack a Monitoring during idling</p>	<p>23.4 g/h 0.39 g/min 8.19 g lost in 21 min idle</p> <p>b Monitoring during cleaning</p> <p>754.6 g/h 12.58 g/min 226.38 g lost in 18 min cleaning cycle</p> <p>539.90 g/h 9.00 g/min 179.97 g lost in 20 min cleaning cycle</p> <p>Average 203.17 g lost per cleaning cycle</p> <p>60 mins 24 hrs 7 days 10080 minutes in a week</p> <p>20 cleaning cycles 19 mins in a cycle 380 minutes cleaning =</p> <p>9700 minutes idling =</p>	<p>4063.466667 g solvent lost per week during cleaning</p> <p>3783 g solvent lost per week during idling</p> <p>7846.466667 g week 7.846466667 kg week 408.0162667 kg year</p> <p>up the stack</p>
		<p>O1= 408.02 kg</p>
<p>O2 Solvents lost in water to drain</p>	<p></p>	<p>O2= 0.00 kg</p>
<p>O3 Residual solvents in products</p>	<p></p>	<p>O3= 0.00 kg</p>
<p>O4 Stored solvent venting & uncaptured emissions</p>	<p></p>	<p>O4= 989.86 kg</p>
<p>O5 Solvents destroyed in abatement plant No VOC abatement plant in use</p>	<p></p>	<p>O5= 0.00 kg</p>
<p>O6 Solvents in waste not recovered (rags & containers) Not quantified, therefore included in O4</p>	<p></p>	<p>O6= 0.00 kg</p>
<p>O7 Solvents sold to third parties No solvent sold to third parties</p>	<p></p>	<p>O7= 0.00 kg</p>
<p>O8 Solvents collected in waste for external recycling a Waste collected</p>	<p>0 205 litre drums disposed of 1.32 Specific gravity kg/litre 0.0 kg solvent disposed of</p>	<p>O8= 0.00 kg</p>
<p>O9 Other uncontrolled releases</p>	<p></p>	<p>O9= 0.00 kg</p>
<p>C Consumption C=I1-O8</p>	<p></p>	<p>C= 1397.88 kg 1.40 Tonnes</p>
<p>F Fugitive emission</p>	<p></p>	<p>F= 989.86 kg</p>

70.81 %

Solvent allowance method

	g/hr	kg/hr
	100	0.1
degreasing hours per day		24
	kg/day	2.40
	kg/week (7 days)	16.80
	kg/year (52 weeks)	873.60 kg

Solvent Input		Actual losses
Vapasol AMC	1397.88 kg	
Fugitive maximum		
15% of solvent input	209.68 kg	989.86 kg
Contained maximum		
100g/hr	873.60 kg	408.02 kg
Allowable total loss	1083.282 kg	1397.88 kg
		-314.60 kg