

# Mogden Sewage Treatment Works

**TW Site Inspection** 

Date of inspection: 25th of May 2021				
Attendees: Mr L Phillips and Mr Tom Costin (Thames Water)				
LB Hounslow Observation	Thames Water Action / Response			
Storm Water Storage Tanks (SWST)				
Tank 1A – Tank full Amajets working.				
Tank 1B – Tank full Amajets working.				
Tank 2A – Tank full Amajets working.				
Tank 2B – Tank full Amajets working.				
Tank 3A – Tank full Amajets working.				
Tank 3B – Tank full Amajets working.				
Tanks 4A, 4B, 5A & 5B which are covered and odour controlled were all in use - unable to gauge condition as lighting system still not working.				
Tank 6A – Tank full Amajets working.				
Tank 6B – Tank full Amajets working.				

Tank 7A – Tank full Amajets working.
Tank 7B – Tank full Amajets working.
Tank 8A – Tank full Amajets working.
Tank 8B – Tank full Amajets working.
<b>Feed Channel</b> - The level of effluent in both feed channels was approximately 20% capacity - no local odours.
<u>Complaints</u>
The Council directly received no complaints by telephone in the preceding week.
The Council directly received no complaints by email in the preceding week.
The Council received no complaints by email from MRAG.
Thames Water controller advised that they had received no direct complaints in the preceding week.
Odour Monitors
The odour readouts ( $H_2S$ ) for all monitors which were providing data at time of inspection: 25/05/2021
Monitor 1 0.003 ppm 13:31
Monitor 2 0.000 ppm 13:31
Monitor 3         0.000         ppm         13:31           Monitor 4         0.000         ppm         13:31
Monitor 4         0.000         ppm         13:31           Monitor 5         0.004         ppm         13:31

Monitor 6 0.000 ppm 13:31
Monitor 7 0.004 ppm 13:31
Monitor 8 0.000 ppm 13:31
Monitor 9 0.003 ppm 13:31
Monitor 10 0.000 ppm 13:31
Monitor 11 0.003 ppm 13:31
Monitor 12 0.004 ppm 13:31
Monitor 13 0.003 ppm 13:31
Wind Speed 5.8 mph 13:31
Wind Direction 84° 13:31
Odour Log (Thames):
Wednesday 19th May 2021: DAY SHIFT
Temp: Warm.
Weather: Sunny W/ Patch clouds.
All OMU's in use.
Time: 17:30:
Observations / Customer Complaint: No odour issues.
Operational issues / causes observed: Blank.
NIGHT SHIFT:
Temp: Cool.
Weather: Clear night.
All OMU's in use.
Time: 05:30.
Observations / Customer Complaint: No odour issues.
Operational issues / causes observed: Blank.
<u>Thursday 20<sup>th</sup> May 2021:</u> DAY SHIFT
Temp: Cool.
Weather: Cloudy W/ Sunny spells. All OMU's in use.
Time: 17:30:
Observations / Customer Complaint: No odour issues found.

Operational issues / causes observed: Sludge spill around PAS	
holding tanks requires cleaning up before it becomes an odour	
issue.	
NIGHT SHIFT:	
Temp: Cool.	
Weather: Overcast night.	
All OMU's in use.	
Time: 05:30.	
Observations / Customer Complaint: No odour issues.	
Operational issues / causes observed: Blank.	
Friday 21 <sup>st</sup> May 2021.	
<u>Friday 21<sup>st</sup> May 2021:</u> DAY SHIFT	
Temp: Cool.	
Weather: Rain/W sunny spells.	
All OMU's in use.	
Time: 17:30:	
<b>Observations / Customer Complaint:</b> No odour issues found or	
reported.	
Operational issues / causes observed: OM2 back in service form	
1050hrs.	
NIGHT SHIFT:	
Temp: Cool.	
Weather: Overcast night.	
All OMU's in use.	
Time: 05:30.	
Observations / Customer Complaint: No odour issues.	
Operational issues / causes observed: Blank	
Saturday 22 <sup>nd</sup> May 2021:	
DAY SHIFT	
Temp: Warm.	
Weather: Rain/W sunny spells.	
All OMU's in use.	
Time: 17:30:	
Observations / Customer Complaint: No odour issues found or	

reported. Operational issues / causes observed: Blank. NIGHT SHIFT: Temp: Cool. Weather: Overcast night. All OMU's in use. Time: 05:30. Observations / Customer Complaint: No odour issues. Operational issues / causes observed: Blank. Sunday 23<sup>rd</sup> May 2021: DAY SHIFT Temp: Cool. Weather: Rain/W sunny spells. All OMU's in use. Time: 17:30: Observations / Customer Complaint: No odour issues found or reported. Operational issues / causes observed: Blank. NIGHT SHIFT: Temp: Cool. Weather: Rain. All OMU's in use. Time: 05:30. Observations / Customer Complaint: No odour issues. Operational issues / causes observed: Blank. Monday 24<sup>th</sup> May 2021: DAY SHIFT Temp: Warm. Weather: Rain/W sunny spells. All OMU's in use. Time: 17:30: Observations / Customer Complaint: No odour issues. Operational issues / causes observed: Blank. **NIGHT SHIFT:** 

Operational issues / causes observed: Blank. Tuesday 25 <sup>th</sup> May 2021: DAY SHIFT Temp: Cool. Weather: Cloudy W/ Sunny spells. All OMU's in use. Time: 17:30: Observations / Customer Complaint: No odour issues found. Operational issues / causes observed: Blank. NIGHT SHIFT: Temp: Cool. Weather: Overcast night. All OMU's in use. Time: 05:30. Observations / Customer Complaint: No odour issues found or reported. Operational issues / causes observed: Blank.	Temp: Cool. Weather: Rain. All OMU's in use. Time: 05:30. Observations / Customer Complaint: No odour issues.	
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<b>Observations / Customer Complaint:</b> No odour issues found or reported.		
reported.	Time: 05:30.	
Operational issues / causes observed: Blank.	-	
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## Sludge Dip Records

Date	West PSTs 1	West PSTs 2	West PSTs 3	West Total	East PSTs	Grand Total
	All units in m <sup>3</sup>					
OMP limit	500					
19/05/21	0	1007	2156	3163	1720	4883
21/05/21	0	1007	1594	2601	2594	5195
24/05/21	0	946	1304	2250	2418	4668

The sludge stock levels for the West side circular primary settlement tank 1 were **compliant** with the OMP trigger level (500m<sup>3</sup>) for all of the dates for which data has been provided.

There are no limits for the East side primary settlement tanks as these are covered and odour controlled. Thames is required by the terms of the abatement notice agreed in 2005 to notify LBH on the next working day of any such exceedance and notify LBH within three working days of any appropriate remedial measure taken.

#### **Digesters**

**Digesters 1-4** Out of use (permanent).

Thames advised of a long term project currently initiated to bring these units back into service that will require significant investment.

Digester 5 was out of service.

Digester 6 was in service had a weak seal. No evidence of spill.

Digester 7 was in service had a weak seal. No evidence of spill.

Digostor	8 was in service had a weak seal. No evidence of spill.
Jugester	• was in service had a weak seal. NO evidence of spill.
<b>Digester</b> spill.	9 was in service had good thick seal. No evidence of
Digester	10 was in service had a weak seal. No evidence of spill.
Digester	11 was in service had a weak seal. No evidence of spill.
Digester	12 was in service had a weak seal. No evidence of spill.
Digester	13 was in service had a weak seal. No evidence of spill.
Digester	14 was in service had a weak seal. No evidence of spill.
Digester	15 was out of service.
Digester	16 was in service had a weak seal. No evidence of spill.
Digester	17 was in service had a weak seal. No evidence of spill.
Digester	18 was out of service.
Digester	<b>19</b> was out of service.
Digester	20 was in service had a weak seal. No evidence of spill.
<u>GENERA</u>	L
Sludge S	creening House
All doors of	closed at the time of inspection.
Imported	<u>Sludge</u>

No imports daily for preceding seven days.

# Final Settlement Tanks East Side of Works

The 8 circular tanks previously used as PSTs are now being used as final tanks (71-78).

# <u>Skips</u>

1x 16yard grit/rag skip (full) - covered with tarpaulin & 1x 8 yard general waste in Service Road at rear of Sludge Screen House.

#### East Side Raw Sludge Screen House

Doors closed at time of inspection.

#### West Side Aeration Lanes (Old)

Battery C aeration feed channel 100% obstructed in one channel (left) – requires jetting (TW advise that there is continuing flow below surface).

## West side primary settlement tanks (PST)

Rectangular PSTs – no issues

Circular PST's 9, 10 & 11 in use, PST 12 drained down and out of use.

#### **Pasteurisation Plant**

Six streams running.

# New Works (West Side)

# Odour Control Unit (OCU) performance monitoring – 25/05/21

Plant	Reading (ppm)	Action Level (ppm)	Compliant
Main pumping station inlet	No data	Unknown	Unknown
Main pumping station outlet	0.00 0.00 0.00	0.2	Yes
East OCU	23.33 24.28 21.06	0.05	No
West inlet OCU	0.00 0.00 0.00	0.05	Yes
Sludge reception inlet	No data	Unknown	Unknown
Sludge reception outlet	No data	0.8	Unknown
Thickening plant inlet	No data	Unknown	Unknown
Thickening plant outlet	0.016 0.014 0.013	0.6	No
Transfer PS inlet	0.010 0.021 0.098	Unknown	Unknown
Transfer PS outlet	0.00 0.00 0.00	0.5	Yes
New West inlet (OCU11)	0.00 0.00 0.00	0.5	Yes

Pasteurisation Plant (OCU12)	0.101 0.083 0.072	0.5	Yes
GBT Plant OCU Outlet	0.00 0.00 0.00	Unknown	Unknown