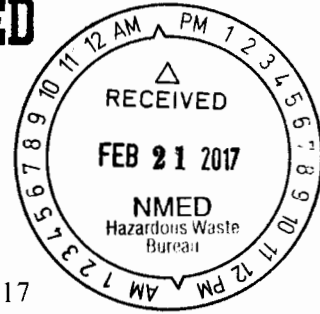




  
 DEPARTMENT OF THE AIR FORCE  
 HEADQUARTERS 49TH WING (ACC)  
 HOLLOWAN AIR FORCE BASE NEW MEXICO



9 February 2017

ADAM M. KUSMAK, GS-13, USAF  
 Chief, Installation Management Flight (49 CES/CEI)  
 49th Civil Engineer Squadron (49 CES)  
 Holloman Air Force Base, NM

New Mexico Environment Department  
 Attn: Mr. John Kieling, Chief  
 Hazardous Waste Bureau  
 2905 Rodeo Park Drive East, Building 1  
 Santa Fe, NM 87505-6063

Re: **RESPONSE TO COMMENTS – NOD Risk Assessment for SD-27 Pad 9 Drainage Pit (SWMU 141), Holloman Air Force Base, New Mexico (November 7, 2016)**  
**EPA ID# NM6572124422, HWB-HAFB-12-001**  
 Holloman Air Force Base, Alamogordo, NM  
 Contract No. FA8903-13-C-0008

Dear Mr. Kieling,

Attached are the Responses to Comments (RTCs) from the *Disapproval - Risk Assessment for SD-27 Pad 9 Drainage Pit (SWMU 141)* letter dated 7 November 2016. These RTCs are submitted based on direction provided in the disapproval letter.

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision according to a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

If you have any questions regarding this submittal, please contact me at (575) 572-6675 or by email at [adam.kusmak@us.af.mil](mailto:adam.kusmak@us.af.mil).

Sincerely,

**KUSMAK.ADAM.**  
**M.1263331806**

Digitally signed by KUSMAK.ADAM.M.1263331806  
 DN: c=US, o=U.S. Government, ou=DoD, ou=PKI,  
 ou=USAF, cn=KUSMAK.ADAM.M.1263331806  
 Date: 2017.02.14 16:33:25 -0700

ADAM M. KUSMAK, GS-13, USAF

Attachment(s): *Final Evaluation of Arsenic in Groundwater at SS-13 (AOC-J)*. Hard copy and CD.

- cc: Mr. Dave Strasser, NMED HWB (w/Atch)
- Mr. Cornelius Amindyas, NMED HWB (w/o Atch)
- Mr. Chuck Hendrickson, USEPA (w/CD)
- Mr. David Griffin, HAFB (w/Atch)
- Mr. Charles Schick, HAFB (w/Atch)
- Mr. Brian Renaghan, AFCEC (w/CD)
- Mr. Scott Clark, Kirtland AFB (w/CD)

Comment	Reviewer	page	paragraph/Sect	Comment	Response/Resolution (URS)
1	NMED	General		Concentrations of contaminants in groundwater monitoring well SD-MW05 have been observed to be increasing over time. Groundwater samples have not been collected in three years. Additional groundwater sampling and analysis is required to evaluate concentrations trends in well SD-MW05. In addition, a trend analysis shall be performed to provide a discussion of groundwater contaminant concentrations over time. Discuss the cause (or potential causes) for increasing concentrations in reference to the 2006 removal of contaminated sump sediments. A groundwater contamination plume map was not provided with the report. Provide contaminant plume maps for selected constituents.	<p>Concentrations of VOCs in well SD27-MW05 show some variability but no significant trends over the monitoring period of record (2010 to 2013). The ProUCL software was used for trend analysis in well MW-05 of the eight most commonly detected VOCs (BTEX; Naphthalene; 1,2,4-TMB; methylene chloride; and isopropylbenzene), using both the Mann-Kendall (M-K) and Theil-Sen testing. Seven of the chemicals had no significant trend (compared to the null hypothesis of zero) and one chemical (toluene) had a decreasing trend that was significant at the 95% confidence level (this finding held for both statistical trend testing methods). These results are consistent with findings of the 2011-2012 LTM Report [Long-Term Monitoring Report, April 2011 - January 2012, SD-27 (SWMU 141) and SS-39 (SWMUs 165, 167, 177, 179 &amp; 181), Tetra Tech, 2012], that concluded "no new contributions of contamination are entering the groundwater". Please refer to the RTC Supplemental Document for additional information on trends and trend testing for VOCs in well SD27-MW05.</p> <p>URS proposes to update the risk assessment in accordance with the responses provided herein, and present the updated conclusions and recommendations. An additional round of groundwater sampling will be conducted in 2017 (in accordance with the analytes and methods from the approved Final LTM (2012 - 2013) Report for SD-27 PAD 9 Drainage Pit (SWMU 141) (Tetra Tech, 2013). Updated plume maps will be generated and provided in the Report. Conclusions and recommendations of the groundwater trend analysis and risk assessment will be updated, as needed, based on results of the groundwater monitoring event. The updated Risk Assessment including the aforementioned components will be resubmitted to NMED in the estimated timeframe of August 2017.</p>
2	NMED	General		A complete ecological risk assessment was not conducted for this site. Since the depth of contamination is greater than 6.5 feet below ground surface (ft bgs), exclusion of non-burrowing receptors is acceptable. The NMED Soil Screening Guidance (SSG) only requires an ecological assessment to non-burrowing receptors exposed to contamination in the upper five feet of soil. Burrowing receptors must be evaluated for the soil exposure interval of 0-10 ft bgs. A qualitative discussion of the potential for burrowing receptors and deep rooted plants present at the site must be performed. If these receptors are or could be present, an ecological assessment is required per the NMED SSG.	<p>Acknowledged. An evaluation of deep-rooted plants will be added to Section 4.8 in the revised report and screening hazards discussed.</p> <p>A discussion of burrowing wildlife also will be added to Section 4.8. Specifically, NMED risk screening guidance includes the kit fox as a burrowing receptor for the screening evaluation. However, the guidance also indicates that the kit fox need only be evaluated if the site is greater than 267 acres. The combined size of the north and south EUs is approximately 2 acres. As a result, burrowing wildlife will not be included as receptors.</p>
3	NMED	General		The conclusion that no source(s) remain in soil cannot be made. The sump remains in place and the drain line has not been fully evaluated and could contain contamination leaching to groundwater. The material in and surrounding the pipe has not been defined. A camera survey or sampling should be conducted to confirm the integrity of the pipe between the wash rack and the pit. Samples SB27-05 and SB27-04 are located within 25 feet of the pipe, but there does not appear to be any specific rationale for the locations of these samples and the samples do not necessarily represent soils beneath the pipe. Soil samples were not collected from borings SB27-06 and SB27-07 and only radiological constituents were included for analyses of soil samples collected from BH-27-01. Further, no samples were collected at either the inlet (at the connection with the drainage trough) or outlet (into the drainage pit) locations. There are several data gaps with respect to the discharge pipe. Clarify what investigations have been conducted to date with respect to this feature and discuss data gaps.	Please refer to the attached RTC Supplemental document for the response to comment #3.
4	NMED			The risk assessments do not follow the intent of the initial screening assessment based on the NMED SSG. Site maximum concentrations were compared to the NMED soil screening levels (SSLs), as noted in Section 4.2.1 of the report. This procedure is based on NMED SSG Section 2.7.6, which allows this type of comparison to determine initial COPCs for site characterization purposes only. However, for purposes of determining COPCs for risk screening, the comparison should not be a point comparison but include a calculation of cumulative risk including all potential risk-COPCs. Further, for the screening level assessment, risks across all pathways must be evaluated.	<p>Section 4.2.1 will be retitled "Risk Screening Evaluation for Soils. This section will be revised to follow the NMED (2015) risk evaluation guidance for screening sites with multiple contaminants. All constituents will be included. Screening-level cumulative risks and screening hazard indices will be calculated and presented for the construction worker and future resident.</p> <p>Text regarding potential receptors (future resident/construction worker) from Section 4.3.1 will be included in the revised Section 4.2.1.</p> <p>A preliminary examination of the data suggests that evaluation of exposures to soils and vapors will not exceed a target screening-level cumulative risk of 1E-05, or a screening hazard index of 1. If this is confirmed in final examination of the data, then information presented in Section 4.4.1 of the draft report will be unnecessary and will be removed. Results of overall risks and hazards (including exposures to both soils and vapors) will be captured in the risk evaluation conclusions (Section 4.5).</p>
5	NMED			For the North EU, the comparison of maximum detected concentrations to the SSLs resulted in no soil COPCs (Table 4-7(a)). But, if cumulative risk is evaluated, and all chemicals listed in Table 4-7(a) were carried forward, per the NMED SSG, the risk to the residential receptor would be 2.82E-09 and the hazard index (HI) would be 1.49E-04. While the risks are less than the NMED target levels of 1E-05 and 1.0, respectively, these risks would be added to the predicted inhalation risks from groundwater and soil vapor.	Cumulative risks/hazards will be included in the revised report. Please see response to previous comment.

Comment	Reviewer	page	paragraph/Sect	Comment	Response/Resolution (URS)
6	NMED			The screening assessment for groundwater eliminated both volatiles (methylene chloride and trichloroethylene) detected in groundwater associated with the North EU as the concentrations were less than the NMED vapor intrusion screening level (Table 4-10(a)). However, in accordance with the NMED SSG (Section 2.5.2.2), in order to eliminate the vapor intrusion pathway, the number of detections must be minimal, concentrations must be below vapor intrusion screening levels (VISLs), and no suspected source of volatiles should be present. In reviewing the data in Table 4-5 for North EU groundwater, a case can be made that the detections of methylene chloride and trichloroethylene are minimally detected. A case could also be made that the source(s) has been removed in that the site is no longer being used and contaminated sediments in the sump have been removed. However, this type of qualitative discussion must be included in the report.	The cumulative hazard for methylene chloride and trichloroethylene will be included to the revised report (the result is an HI of less than 0.1). This will be supplemented with a discussion that the known source(s) has been removed in that the site is no longer being used and contaminated sediments in the sump have been removed.
7	NMED			If the risks for direct/indirect contact with soil and the vapor intrusion risks from soil (Table 4- 21 (a)) are evaluated and added, the overall site risk to the residential receptor would be 2.82E-09 (cancer risk) and 5.37E-04 (HI); both are below target levels for clean closure. Based on the evaluation above, the North EU does meet closure without controls for the residential receptor. However, the report must be clarified to include a qualitative discussion of the vapor intrusion pathway for soil and a complete screening assessment for both the residential and construction worker scenarios to demonstrate additional corrective action is not warranted for this area. Section 4.5 should also be modified to include the cumulative risk across all pathways for both receptors.	Acknowledged. Results of overall risks and hazards (including exposures to both soils and vapors) will be captured in the risk evaluation conclusions (Section 4.5). Please see previous response.
8	NMED			Similar concerns are noted with the risk screen for the South EU. For the South EU, the comparison of maximum detected concentrations to the SSLs resulted in chromium being the only soil COPC (Table 4-7(b)). But, if cumulative risk is evaluated, and all chemicals listed in Table 4-7(b) were carried forward, per the NMED SSG, the risk to the residential receptor would be 1.03E-05 and the hazard index (HI) would be 2.5E-01. The soil risk is slightly above the target level of 1E-05. Risk is driven by low level risk from chromium and ethylbenzene detected in soil. However, when the risk/HI in soil is added to the vapor intrusion risks (Table 4-21(c)), the overall site risk and HI are 1.05E-05 and 1.04E+00, respectively; both slightly above the target levels of 1E-05 and 1.0. Based on the evaluation above, the South EU may meet closure without controls for the residential receptor with some additional evaluation and discussion. The report must be clarified to include a complete screening assessment for both the residential and construction worker scenarios to demonstrate additional corrective action is not warranted for this area. Section 4.5 should also be modified to include the cumulative risk across all pathways for both receptors.	Acknowledged. Please see previous response. Note that per USEPA guidance (RAGS 1989), cancer risks should be presented to one significant figure only.
9	NMED			A site attribution analyses was not conducted, and inorganics were eliminated as COPCs if the maximum concentration was less than the background level established at Holloman Air Force Base (Basewide Background Study Report, for Holloman Air Force Base (HAFB) on December 28, 2011 and as corrected in March 2012). Inclusion of the metals, regardless of presentation of background, is conservative. It is also noted that for the South EU, chromium would still be retained as a COPC due to the elevated concentration compared to background.	Evaluation of inorganic background concentrations will be included in the revised report. Inorganics that can be reasonably considered representative of natural background will not be included in the calculation of cumulative risks/hazards.
10				The Northern Exposure Unit primarily consists of the Pad 9 wash rack. Only three soil samples were collected to define nature and extent of contamination for this feature. Discuss whether there is any history of overflow of the wash rack and whether or not additional samples around the outer edge of the concrete pad are warranted to define the extent of contamination. While Section 1.2.2 states that the pad is in fairly good shape with only a few cracks and fractures, discuss whether or not any biased samples associated with the cracks are needed to assess potential contamination beneath the concrete pad.	<p>The North Exposure Unit was identified based on the previous findings (see previous responses) that the area was only minimally impacted by previous site operations, as evidenced by the conclusion "soil contamination is located solely within the former discharge pit between 6 and 17 feet bgs." From the approved Supplemental RFI Report (HGL, 2007). The 2006 soil borings (numbers SD27-01, -04 and -05) were all evaluated for VOCs, SVOCs, TPH-D, TPH-G, and RCRA metals, and had no exceedances of screening levels. In addition, RI sample BH-27-01 (0 to 2 ft, right off the edge of the pad) was evaluated for limited organics (BTEX and PCBs) and metals and found to not have any exceedances (1993 RI report). Above all, the groundwater sample from temporary well SB27-07 was free of any screening exceedances of VOC or SVOC chemicals, ruling out up-gradient (northern) sources.</p> <p>Additional samples around the outer edge of the concrete pad are not warranted as the pad is characterized as "slopes gently to the center toward the grate covered drainage gallery" (Long-Term Monitoring Report, April 2011 - January 2012, SD-27 (SWMU 141) and SS-39 (SWMUs 165, 167, 177, 179 &amp; 181), Tetra Tech, 2012).</p> <p>As aircraft washing operations at SD-27 were reported to have ceased in the 1950s, there is no more updated information available prior to information provided from the earliest noted investigation reports. There are no reports or otherwise indications of overflows or spills in the washrack area. Observed cracking of the pad were minimal and based on the weight of evidence there is no additional need for further investigation of this area.</p>
11				A response to the comments of this notice of disapproval must be submitted to NMED by February 19, 2017.	

**NMED Comment #3:**

The conclusion that no source(s) remain in soil cannot be made. The sump remains in place and the drain line has not been fully evaluated and could contain contamination leaching to groundwater. The material in and surrounding the pipe has not been defined. A camera survey or sampling should be conducted to confirm the integrity of the pipe between the wash rack and the pit. Samples SB27-05 and SB27-04 are located within 25 feet of the pipe, but there does not appear to be any specific rationale for the locations of these samples and the samples do not necessarily represent soils beneath the pipe. Soil samples were not collected from borings SB27-06 and SB27-07 and only radiological constituents were included for analyses of soil samples collected from BH-27-01. Further, no samples were collected at either the inlet (at the connection with the drainage trough) or outlet (into the drainage pit) locations. There are several data gaps with respect to the discharge pipe. Clarify what investigations have been conducted to date with respect to this feature and discuss data gaps.

**Response to Comment #3:**

NMED previously requested further investigation of the sump/drainage gallery in review of the PA/SI Report (comments provided to Holloman AFB on March 5, 2001). The Phase II RI Work Plan included additional characterization of the drainage gallery/sump area, including: evaluation of the sump, sediment sampling, sediment removal, and DPT boring/sampling through the sump and around the drainage gallery. NMED approved this work plan (June 17, 2003) and also requested that the permittee should sample sediment from the "bottom of the drainage gallery" as it would most likely represent sediment that deposited at the time of operation of the unit. This work, originally planned for a Phase II RI, was completed under the Supplemental RFI in May and June 2006.

Boring SD27-01 was located under the sump and a sample was collected at 6-8 ft bgl, and evaluated for VOCs, SVOCs, TPH-GRO, TPH-DRO, and RCRA metals, with no exceedances of SSLs and no vapor intrusion screening level (VISL) exceedances per the methods used in the approved ACM Work Plan Addendum (Tetra Tech, 2012). Borings SD27-04 and -05 were sampled at 8-10 ft bgl and 7-8 ft bgl, respectively, and evaluated for VOCs, SVOCs, TPH-GRO, TPH-DRO, and RCRA metals. There were no exceedances of SSLs or VISLs in samples from borings 4 and 5, either. These two samples were located under the Pad in proximity to the drain pipe alignment, and were deep enough to reasonably detect impacts from a long-term leak in the drain pipe. Soil borings SD27-06 and -07 were only sampled for radiological contaminants; however, there was no noted visible staining and/or elevated PID readings from cuttings from these boreholes. Borehole -07 was completed as a temporary well and sampled in 2007 for VOCs, SVOCs, TPH-GRO, TPH-DRO, and RCRA metals. There were no detected values of any VOCs with exception of an estimated detection of TCE at a concentration of 0.22 J ug/L. Temporary well GW27-07 is near the drain pipe and down-gradient from the sump and pad areas, and provides strong evidence that there were no releases impacting groundwater from up-

gradient of that location. The Supplemental RFI Report (HGL, 2007) concluded that “soil contamination is located solely within the former discharge pit between 6 and 17 feet bgs.” The Supplemental RFI Report recommended a subsurface soil investigation to delineate the extent of impacted soils "In the vicinity of the discharge pit", as well as installation of five permanent monitoring wells. This report was approved by NMED (December 9, 2011).

The previous site contractor, Tetra Tech, conducted significant additional sampling (DPT borings) to characterize soil and groundwater contamination at the site, and installed the five permanent monitoring wells in accordance with the approved recommendations of the Supplemental RFI Report. Additionally, NMED approved a focused site investigation (Accelerated Corrective Measures) conducted in 2010 with no requirements for additional characterization in the up-gradient areas. Similarly, a previous work plan was approved by NMED for final remediation of the site (URS, 2015), with no additional sampling or remediation planned for the sump and pad areas, explicitly stating the intent to close the site (NFA). Likewise, the 2012 LTM Report (Tetra Tech) recommended suspension of LTM activities until after remediation of impacted soils "within and adjacent to the former drainage pit".

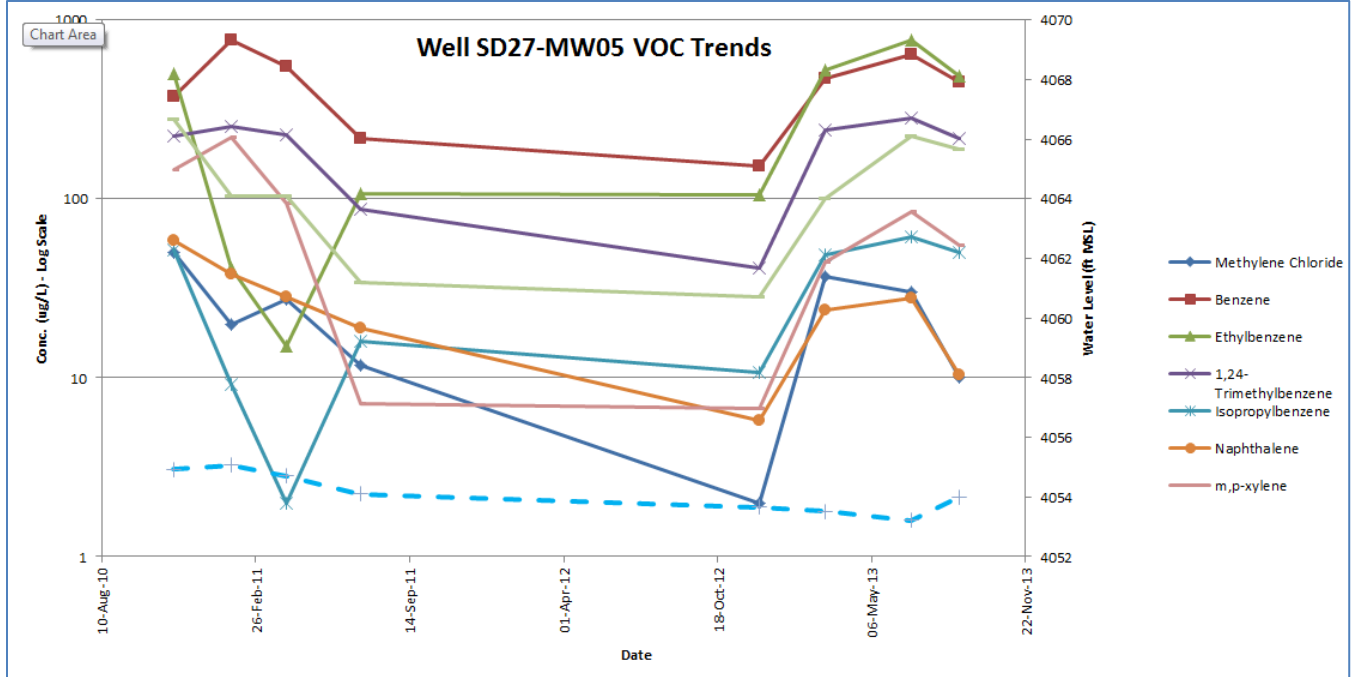
Regarding the reviewer’s statement “Further, no samples were collected at either the inlet (at the connection with the drainage trough) or outlet (into the drainage pit) locations. There are several data gaps with respect to the discharge pipe.” The inlet area was sampled (at the sump, in accordance with NMED’s prescribed request) for both sediment in the sump and in soils below the sump. The outlet of the pipe is the drainage pit area, which was sampled extensively (31 soil borings, 81 samples) in multiple phases of the aforementioned investigations.

Regarding the reviewer’s suggestion of possibly conducting an assessment of the drainage pipe (camera survey), we feel that such a survey would not add value since the facility has been out of operation for a period of 50 to 60 years. Damage, corrosion or pipe offsets would most likely have occurred in the period following aircraft/drone washing at the facility.

In summary, results from the previous soil borings within and near the pad, and the temporary well (GW27-07) at the edge of the pad and near the drain pipe alignment, provide very reasonable evidence that there had been no on-going releases impacting the vadose zone or groundwater in the area. Based on the weight of evidence obtained from Site SD-27 investigations, the conceptual site model (CSM) is still best described as contamination having been introduced through the sump and drainage pipe via discharges into the drainage pit. Impacts at well SD27-MW05 suggest that ponding and periods of higher hydraulic head (i.e., from excess rinse water during previous washing operations) has spread contamination slightly up-gradient of the pit, where residual contamination remains at and below the water table. Stable (but low) concentrations of organic contaminants continue to be detected in site wells.

URS recommends collection of an additional round of groundwater sampling to evaluate current concentrations, trends, gradients and to update the site CSM.

**Supplemental Information for NMED Comment #5:**



**Figure S-1. VOC trends in monitoring well SD27-MW05**

**PRO-UCL Output Follows for statistical trend testing for VOCs in SD27-MW05**

	A	B	C	D	E	F	G	H	I	J	K
1				<b>Mann-Kendall Trend Test Analysis</b>							
2	User Selected Options										
3	Date/Time of Computation			12/20/2016 8:39:53 AM							
4	From File			VOCs MW05_ProUCLInput.xls							
5	Full Precision			OFF							
6	Confidence Coefficient			0.95							
7	Level of Significance			0.05							
8											
9	<b>Conc (ug/L)-124-tmb</b>										
10											
11	<b>General Statistics</b>										
12	Number of Events Reported (m)			8							
13	Number of Missing Events			0							
14	Number or Reported Events Used			8							
15	Number Values Reported (n)			8							
16	Minimum			40.8							
17	Maximum			283							
18	Mean			197							
19	Geometric Mean			169.6							
20	Median			225							
21	Standard Deviation			85.54							
22											
23	<b>Mann-Kendall Test</b>										
24	Test Value (S)			0							
25	Tabulated p-value			0.548							
26	Standard Deviation of S			8.083							
27	Standardized Value of S			N/A							
28	Approximate p-value			N/A							
29											
30	<b>Insufficient evidence to identify a significant</b>										
31	<b>trend at the specified level of significance.</b>										
32	<b>Conc (ug/L)-benzene</b>										
33											
34	<b>General Statistics</b>										
35	Number of Events Reported (m)			8							
36	Number of Missing Events			0							
37	Number or Reported Events Used			8							
38	Number Values Reported (n)			8							
39	Minimum			152							
40	Maximum			776							
41	Mean			453.2							
42	Geometric Mean			403.9							
43	Median			461.5							
44	Standard Deviation			207.3							
45											
46	<b>Mann-Kendall Test</b>										
47	Test Value (S)			-2							
48	Tabulated p-value			0.452							
49	Standard Deviation of S			8.083							
50	Standardized Value of S			-0.124							
51	Approximate p-value			0.451							

	A	B	C	D	E	F	G	H	I	J	K
52											
53	<b>Insufficient evidence to identify a significant</b>										
54	<b>trend at the specified level of significance.</b>										
55	<b>Conc (ug/L)-ethylbenzene</b>										
56											
57	<b>General Statistics</b>										
58	Number of Events Reported (m)				8						
59	Number of Missing Events				0						
60	Number or Reported Events Used				8						
61	Number Values Reported (n)				8						
62	Minimum				15.1						
63	Maximum				775.5						
64	Mean				319.5						
65	Geometric Mean				169.8						
66	Median				295.5						
67	Standard Deviation				285.9						
68											
69	<b>Mann-Kendall Test</b>										
70	Test Value (S)				10						
71	Tabulated p-value				0.138						
72	Standard Deviation of S				8.083						
73	Standardized Value of S				1.113						
74	Approximate p-value				0.133						
75											
76	<b>Insufficient evidence to identify a significant</b>										
77	<b>trend at the specified level of significance.</b>										
78	<b>Conc (ug/L)-isopropylbenzene</b>										
79											
80	<b>General Statistics</b>										
81	Number of Events Reported (m)				8						
82	Number of Missing Events				0						
83	Number or Reported Events Used				8						
84	Number Values Reported (n)				8						
85	Minimum				2						
86	Maximum				61.5						
87	Mean				31.24						
88	Geometric Mean				19.85						
89	Median				32.35						
90	Standard Deviation				23.92						
91											
92	<b>Mann-Kendall Test</b>										
93	Test Value (S)				10						
94	Tabulated p-value				0.138						
95	Standard Deviation of S				8.083						
96	Standardized Value of S				1.113						
97	Approximate p-value				0.133						
98											
99	<b>Insufficient evidence to identify a significant</b>										
100	<b>trend at the specified level of significance.</b>										
101	<b>Conc (ug/L)-m,p-xylene</b>										
102											



	A	B	C	D	E	F	G	H	I	J	K
103	<b>General Statistics</b>										
104	Number of Events Reported (m)				8						
105	Number of Missing Events				0						
106	Number or Reported Events Used				8						
107	Number Values Reported (n)				8						
108	Minimum				6.7						
109	Maximum				221						
110	Mean				82.36						
111	Geometric Mean				48.47						
112	Median				70.08						
113	Standard Deviation				72.53						
114											
115	<b>Mann-Kendall Test</b>										
116	Test Value (S)				-10						
117	Tabulated p-value				0.138						
118	Standard Deviation of S				8.083						
119	Standardized Value of S				-1.113						
120	Approximate p-value				0.133						
121											
122	<b>Insufficient evidence to identify a significant</b>										
123	<b>trend at the specified level of significance.</b>										
124	<b>Conc (ug/L)-methylene chloride</b>										
125											
126	<b>General Statistics</b>										
127	Number of Events Reported (m)				8						
128	Number of Missing Events				0						
129	Number or Reported Events Used				8						
130	Number Values Reported (n)				8						
131	Minimum				2						
132	Maximum				50						
133	Mean				23.51						
134	Geometric Mean				17.05						
135	Median				23.8						
136	Standard Deviation				15.74						
137											
138	<b>Mann-Kendall Test</b>										
139	Test Value (S)				-8						
140	Tabulated p-value				0.119						
141	Standard Deviation of S				8.083						
142	Standardized Value of S				-0.866						
143	Approximate p-value				0.193						
144											
145	<b>Insufficient evidence to identify a significant</b>										
146	<b>trend at the specified level of significance.</b>										
147	<b>Conc (ug/L)-naphthalene</b>										
148											
149	<b>General Statistics</b>										
150	Number of Events Reported (m)				8						
151	Number of Missing Events				0						
152	Number or Reported Events Used				8						
153	Number Values Reported (n)				8						

	A	B	C	D	E	F	G	H	I	J	K
154				Minimum	5.8						
155				Maximum	58.7						
156				Mean	26.44						
157				Geometric Mean	21.6						
158				Median	25.9						
159				Standard Deviation	16.57						
160											
161				<b>Mann-Kendall Test</b>							
162				Test Value (S)	-16						
163				Tabulated p-value	0.031						
164				Standard Deviation of S	8.083						
165				Standardized Value of S	-1.856						
166				Approximate p-value	0.0317						
167											
168				<b>Statistically significant evidence of a decreasing</b>							
169				<b>trend at the specified level of significance.</b>							
170				<b>Conc (ug/L)-toluene</b>							
171											
172				<b>General Statistics</b>							
173				Number of Events Reported (m)	8						
174				Number of Missing Events	0						
175				Number or Reported Events Used	8						
176				Number Values Reported (n)	8						
177				Minimum	28.1						
178				Maximum	279						
179				Mean	133.1						
180				Geometric Mean	102.7						
181				Median	104						
182				Standard Deviation	90.02						
183											
184				<b>Mann-Kendall Test</b>							
185				Test Value (S)	-3						
186				Tabulated p-value	0.452						
187				Standard Deviation of S	8.021						
188				Standardized Value of S	-0.249						
189				Approximate p-value	0.402						
190											
191				<b>Insufficient evidence to identify a significant</b>							
192				<b>trend at the specified level of significance.</b>							

	A	B	C	D	E	F	G	H	I	J	K
1				<b>Theil-Sen Trend Test Analysis</b>							
2	User Selected Options										
3	Date/Time of Computation			12/20/2016 8:43:04 AM							
4	From File			VOCs MW05_ProUCLInput.xls							
5	Full Precision			OFF							
6	Average Replicates			Replicates at sampling events will be averaged!							
7	Confidence Coefficient			0.95							
8	Level of Significance			0.05							
9											
10	<b>Time_EB(d)-124-tmb</b>										
11											
12	<b>General Statistics</b>										
13	Number of Events			8							
14	Number of Values Reported (n)			8							
15	Number of Values After Averaging			8							
16	Number of Replicates			0							
17	Minimum			0							
18	Maximum			1021							
19	Mean			506.5							
20	Geometric Mean			0							
21	Median			501.8							
22	Standard Deviation			429.4							
23											
24	<b>Mann-Kendall Statistics</b>										
25	Test Value (S)			0							
26	Tabulated p-value			0.548							
27	Standard Deviation of S			8.083							
28	Standardized Value of S			N/A							
29											
30	<b>Approximate inference for Theil-Sen Trend Test</b>										
31	Number of Slopes			28							
32	Theil-Sen Slope			-0.13							
33	Theil-Sen Intercept			531							
34	M1			6.079							
35	M2			21.92							
36	95% LCL of Slope (0.025)			-6.377							
37	95% UCL of Slope (0.975)			5.866							
38											
39	<b>Insufficient evidence to identify a significant</b>										
40	<b>trend at the specified level of significance.</b>										
41	<b>Time_EB(d)-benzene</b>										
42											
43	<b>General Statistics</b>										
44	Number of Events			8							
45	Number of Values Reported (n)			8							
46	Number of Values After Averaging			8							
47	Number of Replicates			0							
48	Minimum			0							
49	Maximum			1021							

	A	B	C	D	E	F	G	H	I	J	K
50				Mean	506.5						
51				Geometric Mean	0						
52				Median	501.8						
53				Standard Deviation	429.4						
54											
55				<b>Mann-Kendall Statistics</b>							
56				Test Value (S)	-2						
57				Tabulated p-value	0.452						
58				Standard Deviation of S	8.083						
59				Standardized Value of S	-0.124						
60				Approximate p-value	0.451						
61											
62				<b>Approximate inference for Theil-Sen Trend Test</b>							
63				Number of Slopes	28						
64				Theil-Sen Slope	-0.293						
65				Theil-Sen Intercept	636.9						
66				M1	6.079						
67				M2	21.92						
68				95% LCL of Slope (0.025)	-3.432						
69				95% UCL of Slope (0.975)	1.64						
70											
71				<b>Insufficient evidence to identify a significant</b>							
72				<b>trend at the specified level of significance.</b>							
73				<b>Time_EB(d)-ethylbenzene</b>							
74											
75				<b>General Statistics</b>							
76				Number of Events	8						
77				Number of Values Reported (n)	8						
78				Number of Values After Averaging	8						
79				Number of Replicates	0						
80				Minimum	0						
81				Maximum	1021						
82				Mean	506.5						
83				Geometric Mean	0						
84				Median	501.8						
85				Standard Deviation	429.4						
86											
87				<b>Mann-Kendall Statistics</b>							
88				Test Value (S)	10						
89				Tabulated p-value	0.138						
90				Standard Deviation of S	8.083						
91				Standardized Value of S	1.113						
92				Approximate p-value	0.133						
93											
94				<b>Approximate inference for Theil-Sen Trend Test</b>							
95				Number of Slopes	28						
96				Theil-Sen Slope	1.052						
97				Theil-Sen Intercept	191						
98				M1	6.079						

	A	B	C	D	E	F	G	H	I	J	K
99				M2	21.92						
100			95% LCL of Slope (0.025)		-0.586						
101			95% UCL of Slope (0.975)		2.049						
102											
103	<b>Insufficient evidence to identify a significant</b>										
104	<b>trend at the specified level of significance.</b>										
105	<b>Time_EB(d)-isopropylbenzene</b>										
106											
107	<b>General Statistics</b>										
108			Number of Events		8						
109			Number of Values Reported (n)		8						
110			Number of Values After Averaging		8						
111			Number of Replicates		0						
112			Minimum		0						
113			Maximum		1021						
114			Mean		506.5						
115			Geometric Mean		0						
116			Median		501.8						
117			Standard Deviation		429.4						
118											
119	<b>Mann-Kendall Statistics</b>										
120			Test Value (S)		10						
121			Tabulated p-value		0.138						
122			Standard Deviation of S		8.083						
123			Standardized Value of S		1.113						
124			Approximate p-value		0.133						
125											
126	<b>Approximate inference for Theil-Sen Trend Test</b>										
127			Number of Slopes		28						
128			Theil-Sen Slope		11.18						
129			Theil-Sen Intercept		140						
130			M1		6.079						
131			M2		21.92						
132			95% LCL of Slope (0.025)		-6.654						
133			95% UCL of Slope (0.975)		22.5						
134											
135	<b>Insufficient evidence to identify a significant</b>										
136	<b>trend at the specified level of significance.</b>										
137	<b>Time_EB(d)-m,p-xylene</b>										
138											
139	<b>General Statistics</b>										
140			Number of Events		8						
141			Number of Values Reported (n)		8						
142			Number of Values After Averaging		8						
143			Number of Replicates		0						
144			Minimum		0						
145			Maximum		1021						
146			Mean		506.5						
147			Geometric Mean		0						

	A	B	C	D	E	F	G	H	I	J	K
148				Median	501.8						
149				Standard Deviation	429.4						
150											
151				<b>Mann-Kendall Statistics</b>							
152				Test Value (S)	-10						
153				Tabulated p-value	0.138						
154				Standard Deviation of S	8.083						
155				Standardized Value of S	-1.113						
156				Approximate p-value	0.133						
157											
158				<b>Approximate inference for Theil-Sen Trend Test</b>							
159				Number of Slopes	28						
160				Theil-Sen Slope	-2.509						
161				Theil-Sen Intercept	677.7						
162				M1	6.079						
163				M2	21.92						
164				95% LCL of Slope (0.025)	-11.14						
165				95% UCL of Slope (0.975)	2.495						
166											
167				<b>Insufficient evidence to identify a significant</b>							
168				<b>trend at the specified level of significance.</b>							
169				<b>Time_EB(d)-methylene chloride</b>							
170											
171				<b>General Statistics</b>							
172				Number of Events	8						
173				Number of Values Reported (n)	8						
174				Number of Values After Averaging	8						
175				Number of Replicates	0						
176				Minimum	0						
177				Maximum	1021						
178				Mean	506.5						
179				Geometric Mean	0						
180				Median	501.8						
181				Standard Deviation	429.4						
182											
183				<b>Mann-Kendall Statistics</b>							
184				Test Value (S)	-8						
185				Tabulated p-value	0.119						
186				Standard Deviation of S	8.083						
187				Standardized Value of S	-0.866						
188				Approximate p-value	0.193						
189											
190				<b>Approximate inference for Theil-Sen Trend Test</b>							
191				Number of Slopes	28						
192				Theil-Sen Slope	-6.41						
193				Theil-Sen Intercept	654.4						
194				M1	6.079						
195				M2	21.92						
196				95% LCL of Slope (0.025)	-47.13						

	A	B	C	D	E	F	G	H	I	J	K
197	95% UCL of Slope (0.975)				22.93						
198											
199	<b>Insufficient evidence to identify a significant</b>										
200	<b>trend at the specified level of significance.</b>										
201	<b>Time_EB(d)-naphthalene</b>										
202											
203	<b>General Statistics</b>										
204	Number of Events				8						
205	Number of Values Reported (n)				8						
206	Number of Values After Averaging				8						
207	Number of Replicates				0						
208	Minimum				0						
209	Maximum				1021						
210	Mean				506.5						
211	Geometric Mean				0						
212	Median				501.8						
213	Standard Deviation				429.4						
214											
215	<b>Mann-Kendall Statistics</b>										
216	Test Value (S)				-16						
217	Tabulated p-value				0.031						
218	Standard Deviation of S				8.083						
219	Standardized Value of S				-1.856						
220	Approximate p-value				0.0317						
221											
222	<b>Approximate inference for Theil-Sen Trend Test</b>										
223	Number of Slopes				28						
224	Theil-Sen Slope				-13.69						
225	Theil-Sen Intercept				856.3						
226	M2'				20.65						
227	One-sided 95% upper limit of Slope				-4.028						
228	95% LCL of Slope (0.025)				-48.23						
229	95% UCL of Slope (0.975)				-3.58						
230											
231	<b>Statistically significant evidence of a decreasing</b>										
232	<b>trend at the specified level of significance.</b>										
233	<b>Time_EB(d)-toluene</b>										
234											
235	<b>General Statistics</b>										
236	Number of Events				8						
237	Number of Values Reported (n)				8						
238	Number of Values After Averaging				7						
239	Number of Replicates				1						
240	Minimum				0						
241	Maximum				1021						
242	Mean				563						
243	Geometric Mean				0						
244	Median				761.3						
245	Standard Deviation				430.1						

	A	B	C	D	E	F	G	H	I	J	K
246											
247	<b>Mann-Kendall Statistics</b>										
248			Test Value (S)		-1						
249			Tabulated p-value		0.5						
250			Standard Deviation of S		6.658						
251			Standardized Value of S		0						
252			Approximate p-value		0.5						
253											
254	<b>Approximate inference for Theil-Sen Trend Test</b>										
255			Number of Slopes		21						
256			Theil-Sen Slope		-0.635						
257			Theil-Sen Intercept		827.3						
258			M1		3.975						
259			M2		17.03						
260			95% LCL of Slope (0.025)		-11.57						
261			95% UCL of Slope (0.975)		3.757						
262											
263	<b>Insufficient evidence to identify a significant</b>										
264	<b>trend at the specified level of significance.</b>										



	A	B	C	D	E	F	G	H	I	J	K
1				<b>Mann-Kendall Trend Test Analysis</b>							
2	User Selected Options										
3	Date/Time of Computation			12/20/2016 8:39:53 AM							
4	From File			VOCs MW05_ProUCLInput.xls							
5	Full Precision			OFF							
6	Confidence Coefficient			0.95							
7	Level of Significance			0.05							
8											
9	<b>Conc (ug/L)-124-tmb</b>										
10											
11	<b>General Statistics</b>										
12	Number of Events Reported (m)			8							
13	Number of Missing Events			0							
14	Number or Reported Events Used			8							
15	Number Values Reported (n)			8							
16	Minimum			40.8							
17	Maximum			283							
18	Mean			197							
19	Geometric Mean			169.6							
20	Median			225							
21	Standard Deviation			85.54							
22											
23	<b>Mann-Kendall Test</b>										
24	Test Value (S)			0							
25	Tabulated p-value			0.548							
26	Standard Deviation of S			8.083							
27	Standardized Value of S			N/A							
28	Approximate p-value			N/A							
29											
30	<b>Insufficient evidence to identify a significant</b>										
31	<b>trend at the specified level of significance.</b>										
32	<b>Conc (ug/L)-benzene</b>										
33											
34	<b>General Statistics</b>										
35	Number of Events Reported (m)			8							
36	Number of Missing Events			0							
37	Number or Reported Events Used			8							
38	Number Values Reported (n)			8							
39	Minimum			152							
40	Maximum			776							
41	Mean			453.2							
42	Geometric Mean			403.9							
43	Median			461.5							
44	Standard Deviation			207.3							
45											
46	<b>Mann-Kendall Test</b>										
47	Test Value (S)			-2							
48	Tabulated p-value			0.452							
49	Standard Deviation of S			8.083							
50	Standardized Value of S			-0.124							
51	Approximate p-value			0.451							

	A	B	C	D	E	F	G	H	I	J	K
52											
53	<b>Insufficient evidence to identify a significant</b>										
54	<b>trend at the specified level of significance.</b>										
55	<b>Conc (ug/L)-ethylbenzene</b>										
56											
57	<b>General Statistics</b>										
58	Number of Events Reported (m)				8						
59	Number of Missing Events				0						
60	Number or Reported Events Used				8						
61	Number Values Reported (n)				8						
62	Minimum				15.1						
63	Maximum				775.5						
64	Mean				319.5						
65	Geometric Mean				169.8						
66	Median				295.5						
67	Standard Deviation				285.9						
68											
69	<b>Mann-Kendall Test</b>										
70	Test Value (S)				10						
71	Tabulated p-value				0.138						
72	Standard Deviation of S				8.083						
73	Standardized Value of S				1.113						
74	Approximate p-value				0.133						
75											
76	<b>Insufficient evidence to identify a significant</b>										
77	<b>trend at the specified level of significance.</b>										
78	<b>Conc (ug/L)-isopropylbenzene</b>										
79											
80	<b>General Statistics</b>										
81	Number of Events Reported (m)				8						
82	Number of Missing Events				0						
83	Number or Reported Events Used				8						
84	Number Values Reported (n)				8						
85	Minimum				2						
86	Maximum				61.5						
87	Mean				31.24						
88	Geometric Mean				19.85						
89	Median				32.35						
90	Standard Deviation				23.92						
91											
92	<b>Mann-Kendall Test</b>										
93	Test Value (S)				10						
94	Tabulated p-value				0.138						
95	Standard Deviation of S				8.083						
96	Standardized Value of S				1.113						
97	Approximate p-value				0.133						
98											
99	<b>Insufficient evidence to identify a significant</b>										
100	<b>trend at the specified level of significance.</b>										
101	<b>Conc (ug/L)-m,p-xylene</b>										
102											

	A	B	C	D	E	F	G	H	I	J	K
103	<b>General Statistics</b>										
104	Number of Events Reported (m)				8						
105	Number of Missing Events				0						
106	Number or Reported Events Used				8						
107	Number Values Reported (n)				8						
108	Minimum				6.7						
109	Maximum				221						
110	Mean				82.36						
111	Geometric Mean				48.47						
112	Median				70.08						
113	Standard Deviation				72.53						
114											
115	<b>Mann-Kendall Test</b>										
116	Test Value (S)				-10						
117	Tabulated p-value				0.138						
118	Standard Deviation of S				8.083						
119	Standardized Value of S				-1.113						
120	Approximate p-value				0.133						
121											
122	<b>Insufficient evidence to identify a significant</b>										
123	<b>trend at the specified level of significance.</b>										
124	<b>Conc (ug/L)-methylene chloride</b>										
125											
126	<b>General Statistics</b>										
127	Number of Events Reported (m)				8						
128	Number of Missing Events				0						
129	Number or Reported Events Used				8						
130	Number Values Reported (n)				8						
131	Minimum				2						
132	Maximum				50						
133	Mean				23.51						
134	Geometric Mean				17.05						
135	Median				23.8						
136	Standard Deviation				15.74						
137											
138	<b>Mann-Kendall Test</b>										
139	Test Value (S)				-8						
140	Tabulated p-value				0.119						
141	Standard Deviation of S				8.083						
142	Standardized Value of S				-0.866						
143	Approximate p-value				0.193						
144											
145	<b>Insufficient evidence to identify a significant</b>										
146	<b>trend at the specified level of significance.</b>										
147	<b>Conc (ug/L)-naphthalene</b>										
148											
149	<b>General Statistics</b>										
150	Number of Events Reported (m)				8						
151	Number of Missing Events				0						
152	Number or Reported Events Used				8						
153	Number Values Reported (n)				8						

	A	B	C	D	E	F	G	H	I	J	K
154				Minimum	5.8						
155				Maximum	58.7						
156				Mean	26.44						
157				Geometric Mean	21.6						
158				Median	25.9						
159				Standard Deviation	16.57						
160											
161				<b>Mann-Kendall Test</b>							
162				Test Value (S)	-16						
163				Tabulated p-value	0.031						
164				Standard Deviation of S	8.083						
165				Standardized Value of S	-1.856						
166				Approximate p-value	0.0317						
167											
168				<b>Statistically significant evidence of a decreasing</b>							
169				<b>trend at the specified level of significance.</b>							
170				<b>Conc (ug/L)-toluene</b>							
171											
172				<b>General Statistics</b>							
173				Number of Events Reported (m)	8						
174				Number of Missing Events	0						
175				Number or Reported Events Used	8						
176				Number Values Reported (n)	8						
177				Minimum	28.1						
178				Maximum	279						
179				Mean	133.1						
180				Geometric Mean	102.7						
181				Median	104						
182				Standard Deviation	90.02						
183											
184				<b>Mann-Kendall Test</b>							
185				Test Value (S)	-3						
186				Tabulated p-value	0.452						
187				Standard Deviation of S	8.021						
188				Standardized Value of S	-0.249						
189				Approximate p-value	0.402						
190											
191				<b>Insufficient evidence to identify a significant</b>							
192				<b>trend at the specified level of significance.</b>							

	A	B	C	D	E	F	G	H	I	J	K
1				<b>Theil-Sen Trend Test Analysis</b>							
2	User Selected Options										
3	Date/Time of Computation			12/20/2016 8:43:04 AM							
4	From File			VOCs MW05_ProUCLInput.xls							
5	Full Precision			OFF							
6	Average Replicates			Replicates at sampling events will be averaged!							
7	Confidence Coefficient			0.95							
8	Level of Significance			0.05							
9											
10	<b>Time_EB(d)-124-tmb</b>										
11											
12	<b>General Statistics</b>										
13	Number of Events			8							
14	Number of Values Reported (n)			8							
15	Number of Values After Averaging			8							
16	Number of Replicates			0							
17	Minimum			0							
18	Maximum			1021							
19	Mean			506.5							
20	Geometric Mean			0							
21	Median			501.8							
22	Standard Deviation			429.4							
23											
24	<b>Mann-Kendall Statistics</b>										
25	Test Value (S)			0							
26	Tabulated p-value			0.548							
27	Standard Deviation of S			8.083							
28	Standardized Value of S			N/A							
29											
30	<b>Approximate inference for Theil-Sen Trend Test</b>										
31	Number of Slopes			28							
32	Theil-Sen Slope			-0.13							
33	Theil-Sen Intercept			531							
34	M1			6.079							
35	M2			21.92							
36	95% LCL of Slope (0.025)			-6.377							
37	95% UCL of Slope (0.975)			5.866							
38											
39	<b>Insufficient evidence to identify a significant</b>										
40	<b>trend at the specified level of significance.</b>										
41	<b>Time_EB(d)-benzene</b>										
42											
43	<b>General Statistics</b>										
44	Number of Events			8							
45	Number of Values Reported (n)			8							
46	Number of Values After Averaging			8							
47	Number of Replicates			0							
48	Minimum			0							
49	Maximum			1021							

	A	B	C	D	E	F	G	H	I	J	K
50				Mean	506.5						
51				Geometric Mean	0						
52				Median	501.8						
53				Standard Deviation	429.4						
54											
55				<b>Mann-Kendall Statistics</b>							
56				Test Value (S)	-2						
57				Tabulated p-value	0.452						
58				Standard Deviation of S	8.083						
59				Standardized Value of S	-0.124						
60				Approximate p-value	0.451						
61											
62				<b>Approximate inference for Theil-Sen Trend Test</b>							
63				Number of Slopes	28						
64				Theil-Sen Slope	-0.293						
65				Theil-Sen Intercept	636.9						
66				M1	6.079						
67				M2	21.92						
68				95% LCL of Slope (0.025)	-3.432						
69				95% UCL of Slope (0.975)	1.64						
70											
71				<b>Insufficient evidence to identify a significant</b>							
72				<b>trend at the specified level of significance.</b>							
73				<b>Time_EB(d)-ethylbenzene</b>							
74											
75				<b>General Statistics</b>							
76				Number of Events	8						
77				Number of Values Reported (n)	8						
78				Number of Values After Averaging	8						
79				Number of Replicates	0						
80				Minimum	0						
81				Maximum	1021						
82				Mean	506.5						
83				Geometric Mean	0						
84				Median	501.8						
85				Standard Deviation	429.4						
86											
87				<b>Mann-Kendall Statistics</b>							
88				Test Value (S)	10						
89				Tabulated p-value	0.138						
90				Standard Deviation of S	8.083						
91				Standardized Value of S	1.113						
92				Approximate p-value	0.133						
93											
94				<b>Approximate inference for Theil-Sen Trend Test</b>							
95				Number of Slopes	28						
96				Theil-Sen Slope	1.052						
97				Theil-Sen Intercept	191						
98				M1	6.079						

	A	B	C	D	E	F	G	H	I	J	K
99				M2	21.92						
100			95% LCL of Slope (0.025)		-0.586						
101			95% UCL of Slope (0.975)		2.049						
102											
103	<b>Insufficient evidence to identify a significant</b>										
104	<b>trend at the specified level of significance.</b>										
105	<b>Time_EB(d)-isopropylbenzene</b>										
106											
107	<b>General Statistics</b>										
108			Number of Events		8						
109			Number of Values Reported (n)		8						
110			Number of Values After Averaging		8						
111			Number of Replicates		0						
112			Minimum		0						
113			Maximum		1021						
114			Mean		506.5						
115			Geometric Mean		0						
116			Median		501.8						
117			Standard Deviation		429.4						
118											
119	<b>Mann-Kendall Statistics</b>										
120			Test Value (S)		10						
121			Tabulated p-value		0.138						
122			Standard Deviation of S		8.083						
123			Standardized Value of S		1.113						
124			Approximate p-value		0.133						
125											
126	<b>Approximate inference for Theil-Sen Trend Test</b>										
127			Number of Slopes		28						
128			Theil-Sen Slope		11.18						
129			Theil-Sen Intercept		140						
130			M1		6.079						
131			M2		21.92						
132			95% LCL of Slope (0.025)		-6.654						
133			95% UCL of Slope (0.975)		22.5						
134											
135	<b>Insufficient evidence to identify a significant</b>										
136	<b>trend at the specified level of significance.</b>										
137	<b>Time_EB(d)-m,p-xylene</b>										
138											
139	<b>General Statistics</b>										
140			Number of Events		8						
141			Number of Values Reported (n)		8						
142			Number of Values After Averaging		8						
143			Number of Replicates		0						
144			Minimum		0						
145			Maximum		1021						
146			Mean		506.5						
147			Geometric Mean		0						

	A	B	C	D	E	F	G	H	I	J	K
148				Median	501.8						
149				Standard Deviation	429.4						
150											
151				<b>Mann-Kendall Statistics</b>							
152				Test Value (S)	-10						
153				Tabulated p-value	0.138						
154				Standard Deviation of S	8.083						
155				Standardized Value of S	-1.113						
156				Approximate p-value	0.133						
157											
158				<b>Approximate inference for Theil-Sen Trend Test</b>							
159				Number of Slopes	28						
160				Theil-Sen Slope	-2.509						
161				Theil-Sen Intercept	677.7						
162				M1	6.079						
163				M2	21.92						
164				95% LCL of Slope (0.025)	-11.14						
165				95% UCL of Slope (0.975)	2.495						
166											
167				<b>Insufficient evidence to identify a significant</b>							
168				<b>trend at the specified level of significance.</b>							
169				<b>Time_EB(d)-methylene chloride</b>							
170											
171				<b>General Statistics</b>							
172				Number of Events	8						
173				Number of Values Reported (n)	8						
174				Number of Values After Averaging	8						
175				Number of Replicates	0						
176				Minimum	0						
177				Maximum	1021						
178				Mean	506.5						
179				Geometric Mean	0						
180				Median	501.8						
181				Standard Deviation	429.4						
182											
183				<b>Mann-Kendall Statistics</b>							
184				Test Value (S)	-8						
185				Tabulated p-value	0.119						
186				Standard Deviation of S	8.083						
187				Standardized Value of S	-0.866						
188				Approximate p-value	0.193						
189											
190				<b>Approximate inference for Theil-Sen Trend Test</b>							
191				Number of Slopes	28						
192				Theil-Sen Slope	-6.41						
193				Theil-Sen Intercept	654.4						
194				M1	6.079						
195				M2	21.92						
196				95% LCL of Slope (0.025)	-47.13						



	A	B	C	D	E	F	G	H	I	J	K
197	95% UCL of Slope (0.975)				22.93						
198											
199	<b>Insufficient evidence to identify a significant</b>										
200	<b>trend at the specified level of significance.</b>										
201	<b>Time_EB(d)-naphthalene</b>										
202											
203	<b>General Statistics</b>										
204	Number of Events				8						
205	Number of Values Reported (n)				8						
206	Number of Values After Averaging				8						
207	Number of Replicates				0						
208	Minimum				0						
209	Maximum				1021						
210	Mean				506.5						
211	Geometric Mean				0						
212	Median				501.8						
213	Standard Deviation				429.4						
214											
215	<b>Mann-Kendall Statistics</b>										
216	Test Value (S)				-16						
217	Tabulated p-value				0.031						
218	Standard Deviation of S				8.083						
219	Standardized Value of S				-1.856						
220	Approximate p-value				0.0317						
221											
222	<b>Approximate inference for Theil-Sen Trend Test</b>										
223	Number of Slopes				28						
224	Theil-Sen Slope				-13.69						
225	Theil-Sen Intercept				856.3						
226	M2'				20.65						
227	One-sided 95% upper limit of Slope				-4.028						
228	95% LCL of Slope (0.025)				-48.23						
229	95% UCL of Slope (0.975)				-3.58						
230											
231	<b>Statistically significant evidence of a decreasing</b>										
232	<b>trend at the specified level of significance.</b>										
233	<b>Time_EB(d)-toluene</b>										
234											
235	<b>General Statistics</b>										
236	Number of Events				8						
237	Number of Values Reported (n)				8						
238	Number of Values After Averaging				7						
239	Number of Replicates				1						
240	Minimum				0						
241	Maximum				1021						
242	Mean				563						
243	Geometric Mean				0						
244	Median				761.3						
245	Standard Deviation				430.1						

	A	B	C	D	E	F	G	H	I	J	K
246											
247	<b>Mann-Kendall Statistics</b>										
248			Test Value (S)		-1						
249			Tabulated p-value		0.5						
250			Standard Deviation of S		6.658						
251			Standardized Value of S		0						
252			Approximate p-value		0.5						
253											
254	<b>Approximate inference for Theil-Sen Trend Test</b>										
255			Number of Slopes		21						
256			Theil-Sen Slope		-0.635						
257			Theil-Sen Intercept		827.3						
258			M1		3.975						
259			M2		17.03						
260			95% LCL of Slope (0.025)		-11.57						
261			95% UCL of Slope (0.975)		3.757						
262											
263	<b>Insufficient evidence to identify a significant</b>										
264	<b>trend at the specified level of significance.</b>										