



January 26, 2016

**Certified Mail**  
**Return Receipt Requested**

Jane Rael, PE – SWRP/Pretreatment  
Albuquerque Bernalillo County Water Utility Authority  
P.O. Box 568  
Albuquerque, New Mexico 87103-0568

RE: Semi-Annual Report  
Name: Intel Corporation  
Permit Number: 2021A  
Reporting Period: July 1, 2015 through December 31, 2015

Enclosed is Intel Corporation's Semi-Annual Report for the above stated reporting period as required in the Wastewater Discharge Permit for the facility noted above.

The following information is enclosed:

**Endorsement**

Ammonia Loading  
Cyanide Certification  
Average and Daily Effluent Flow Monitoring  
Grease Traps, Snad Traps and Oil/Water Separators  
Hazardous Air Pollutants Certification  
Hazardous Substances and Pretreatment Wastes for Permit # 2021A  
2021A pH Monitoring  
Reporting Certification  
Toxic Organic Management Plan Certification Statement  
Special Wastestream Pollutant Limitations  
Source Reduction and Waste Minimization Statement  
Attachments:  
Test America Outfall Analytical Reports  
Grease Trap Pump Out Documentation  
TOMP Update

**Code**

LOAD2  
CN  
FM6  
GS  
HAPS  
HZ3  
PH3  
RC  
TC3  
INGA  
WM

To clarify any information submitted, please contact Jeff Rudnik at (505) 893-1613.

Sincerely,

Mindy Koch  
NM Site Corporate Services Manager

Enclosures



Permit #: 2021A  
Permittee: Intel Corporation  
Address: 4100 Sara Road  
City: Rio Rancho  
State, Zip: NM 87124-1025

Reporting Requirements

<u>Code</u>	<u>Endorsement</u>
LOAD2	2021A AMMONIA LOADING
CN	CYANIDE CERTIFICATION
FM6	AVERAGE AND DAILY EFFLUENT FLOW MONITORING
GS	GREASE TRAPS, SAND TRAPS AND OIL/WATER SEPARATORS
HAPS	HAZARDOUS AIR POLLUTANTS CERTIFICATION
HZ3	HAZ WASTE PERMIT 2021A
PH3	PH MONITORING PERMIT 2021A
RC	REPORTING CERTIFICATION
TC3	TOMP CERTIFICATION STATEMENT
INGA	SPECIAL WASTESTREAM POLLUTANT LIMITATIONS
WM	WASTE MIN. PERMIT 2021A

**ENDORSEMENT LOAD2**

2021A AMMONIA LOADING

**COMPLIANCE REQUIREMENT:** The Permittee is required to discharge less than 2,200 lbs per day of Ammonia calculated on a monthly average. Industry sampling and Water Authority monitoring may be combined to calculate the monthly average. The Permittee is required to discharge less than 5,418 lbs per day of Ammonia as a maximum on any one day.

**MONITORING REQUIREMENT:** The Permittee shall monitor the discharge on a weekly basis using Hach Method 10031, or another method approved by the Industrial Pretreatment Engineer. Monitoring by the permittee may be increased at the discretion of the Industrial Pretreatment Engineer.

**REPORTING REQUIREMENT:** The Permittee shall notify the Industrial Pretreatment Engineer (289-3439) via telephone within 12 hours if any Ammonia load is greater than the monthly average limit. If the Industrial Pretreatment Engineer does not answer, the shift supervisor at the SWRP control room should be notified (289-3411). The Permittee shall report on the monthly bases all Ammonia monitoring and flows. The results and flow must be sent to the Industrial Pretreatment Engineer or her designate by the 10<sup>th</sup> of the month. Twice a year the Permittee shall conduct accuracy checks per the analytical method and submit the results with each semi-annual report.



# Intel Semi-Annual Wastewater Report | H2'2015

Date	Check Results (10 ppm Standard)
7/1/2015	10.4
7/15/2015	10.3
7/22/2015	9
7/29/2015	10.3
8/5/2015	9.6
8/12/2015	9.7
8/19/2015	10.1
8/26/2015	9.7
9/2/2015	10
9/9/2015	9.9
9/16/2015	10.4
9/24/2015	10.5
10/8/2015	9.2
10/14/2015	10.7
10/22/2015	9.6
10/28/2015	10.2
11/4/2015	10.4
11/12/2015	9.9
11/18/2015	9.3
11/25/2015	10
12/2/2015	9.8
12/9/2015	10.5
12/16/2015	9.4
12/23/2015	10.8
12/30/2015	10

**ENDORSEMENT CN**

CYANIDE CERTIFICATION

COMPLIANCE REQUIREMENT: See below.

MONITORING REQUIREMENT: None required by the Permittee.

REPORTING REQUIREMENT: The Permittee shall report either the presence or absence of Cyanide compounds on the premises during the reporting period. Example CYANIDE CERTIFICATION STATEMENTS are shown below. The Permittee shall submit the appropriate certification statement shown below with each semi-annual report submittal.

\* \* \* \*

CYANIDE CERTIFICATION STATEMENT (CYANIDE NOT PRESENT)


I hereby certify that no cyanide compounds are stored or used on the premises at this time and that no cyanide compounds were stored or used on the premises during the current permit reporting period. I further certify that the presence of any cyanide compound on the premises shall be reported to the Industrial Waste Engineer (873-7047) within 24 hours of receipt of the compound, regardless of the intended use or disposition of the material.

Facility Name: \_\_\_\_\_  
Permit No.: \_\_\_\_\_ Date: \_\_\_\_\_  
Signature: \_\_\_\_\_ Title: \_\_\_\_\_  
Authorized Representative

\* \* \* \*

CYANIDE CERTIFICATION STATEMENT (CYANIDE PRESENT)

I hereby certify that cyanide compounds were stored or used on the premises during the current permit reporting period.

Facility Name: Intel Corporation  
Permit No.: 2021A Date: 1/26/16  
Signature:  Title: NM Corporate Services  
Authorized Representative Manager

# Intel Semi-Annual Wastewater Report | H2'2015

Cyanide compounds present on the NM site during this reporting period are listed below:

Product Name	Chemical Ingredient	CAS	Contribution %	Container	Size	Unit	Count	Total (Lbs)	Location
Ammonia Test Kits (Ammonia Cyanurate Reagent)	Sodium Dichloroisocyanurate	2893-78-9	2.5%	Packet	0.02	Kg	3	0.003	General Chemistry Lab
Ammonia Test Kits (Ammonia Salicylate Reagent)	Sodium Nitroferrocyanide	14402-89-2	1%	Packet	0.01	Kg	3	0.001	General Chemistry Lab
Super Glue	Ethyl Cyanoacrylate	7085-85-0	100%	Tube	2	Gram	1	0.004	FA Wet Lab
LC 29 Liquid Crystal	Hexylcyanobiphenyl	41122-70-7	100%	Bottle	1	mL	1	0.002	FA Wet Lab

**ENDORSEMENT FM6**

**AVERAGE AND DAILY EFFLUENT FLOW MONITORING**

**COMPLIANCE REQUIREMENT:** The holder of this Permit must meet the requirements of 40 CFR 403.12(e)(1), and shall submit to the Pretreatment Program, along with the semi-annual report during the months of January and July, a report which shall include a record of measured or estimated average and maximum daily flows for the reporting period of the effluent from this facility. The report shall also include a copy of this endorsement, with the relevant information filled in below.

The Pretreatment Section may allow for verifiable estimates of these flows, where justified by cost or feasibility considerations.

**MONITORING REQUIREMENT:** Average and maximum daily flows of all regulated process streams and, as necessary, other effluent streams from the facility.

**REPORTING REQUIREMENT:** The Permittee shall submit information showing the measured average daily and maximum daily flow, in gallons per day (gpd) to the Pretreatment Program from each of the following:

1. Regulated process streams; and
2. Other streams as necessary to allow use of the Combined Waste stream Formula.

The permit holder shall submit flowmeter calibration documentation with the semi-annual reports.

Average Daily Flow:                      1,270                      gallons per day

Peak Daily Flow:                          1,649                      gallons per day

Peak Daily Flow occurred on:         12/16/2015                 date

**DAILY EFFLUENT FLOW MONITORING**

Per 40 CFR 403.12(e)(1) Intel is submitting measured average and maximum flow data for regulated process streams and un-regulated streams.

**July 2015**

Date	Site Outfall flow Average (gpm)	AWN Unreg/Dil Flows (gpm)	Regulated Flows Average	Unreg/Dil Flows Average
7/1/2015	1,212	329	857	355
7/2/2015	1,450	189	1,235	215
7/3/2015	1,194	157	1,011	183
7/4/2015	1,208	153	1,029	179
7/5/2015	1,211	286	898	312
7/6/2015	1,052	185	842	211
7/7/2015	1,112	146	940	172
7/8/2015	1,156	282	848	308
7/9/2015	1,298	325	948	351
7/10/2015	1,144	188	931	214
7/11/2015	1,109	152	931	178
7/12/2015	1,091	143	922	169
7/13/2015	1,080	164	890	190
7/14/2015	1,134	308	801	334
7/15/2015	1,017	205	786	231
7/16/2015	1,058	176	856	202
7/17/2015	1,286	325	936	351
7/18/2015	1,269	219	1,024	245
7/19/2015	1,375	317	1,032	343
7/20/2015	1,374	216	1,132	242
7/21/2015	1,211	178	1,007	204
7/22/2015	1,273	180	1,067	206
7/23/2015	1,353	321	1,006	347
7/24/2015	1,266	348	892	374
7/25/2015	1,067	221	820	247
7/26/2015	1,062	173	863	199
7/27/2015	1,338	307	1,005	333
7/28/2015	1,105	209	869	235
7/29/2015	1,206	173	1,008	199
7/30/2015	1,257	195	1,036	221
7/31/2015	1,246	342	878	368
	<b>gpm</b>	<b>gpd</b>		
<b>Average</b>	<b>1,200</b>	<b>1,728,144</b>		
<b>Peak</b>	<b>1,450</b>	<b>2,088,420</b>	<b>Peak Date</b>	<b>7/2/2015</b>

August 2015

Date	Site Outfall flow Average (gpm)	AWN Unreg/Dil Flows (gpm)	Regulated Flows Average	Unreg/Dil Flows Average
8/1/2015	1,233	375	832	401
8/2/2015	1,038	241	771	267
8/3/2015	1,123	207	890	233
8/4/2015	1,221	206	989	232
8/5/2015	1,172	338	807	364
8/6/2015	1,030	224	780	250
8/7/2015	1,061	191	844	217
8/8/2015	1,033	182	825	208
8/9/2015	1,470	467	977	493
8/10/2015	1,009	259	724	285
8/11/2015	1,142	186	930	212
8/12/2015	1,201	189	986	215
8/13/2015	1,026	189	811	215
8/14/2015	1,194	328	840	354
8/15/2015	1,020	229	765	255
8/16/2015	1,113	196	891	222
8/17/2015	1,184	319	839	345
8/18/2015	1,111	337	747	363
8/19/2015	1,012	198	787	224
8/20/2015	1,139	165	948	191
8/21/2015	1,053	163	864	189
8/22/2015	1,157	176	955	202
8/23/2015	1,188	312	850	338
8/24/2015	1,027	202	799	228
8/25/2015	1,206	306	874	332
8/26/2015	1,088	201	860	227
8/27/2015	1,274	309	940	335
8/28/2015	1,206	210	970	236
8/29/2015	1,087	170	891	196
8/30/2015	1,087	169	892	195
8/31/2015	1,159	306	826	332
	<b>gpm</b>	<b>gpd</b>		
<b>Average</b>	<b>1,131</b>	<b>1,628,655</b>		
<b>Peak</b>	<b>1,470</b>	<b>2,116,404</b>	<b>Peak Date</b>	<b>8/9/2015</b>

September 2015

Date	Site Outfall flow Average (gpm)	AWN Unreg/Dil Flows (gpm)	Regulated Flows Average	Unreg/Dil Flows Average
9/1/2015	995	201	768	227
9/2/2015	1,229	302	901	328
9/3/2015	990	202	763	228
9/4/2015	1,048	158	864	184
9/5/2015	1,187	304	858	330
9/6/2015	1,245	206	1,013	232
9/7/2015	952	163	762	189
9/8/2015	1,054	167	860	193
9/9/2015	1,180	185	969	211
9/10/2015	1,345	446	873	472
9/11/2015	1,348	280	1,042	306
9/12/2015	1,354	220	1,108	246
9/13/2015	1,276	213	1,037	239
9/14/2015	1,398	359	1,013	385
9/15/2015	1,203	262	915	288
9/16/2015	1,234	230	978	256
9/17/2015	1,328	335	967	361
9/18/2015	1,133	337	770	363
9/19/2015	977	197	754	223
9/20/2015	1,026	160	839	186
9/21/2015	1,147	165	956	191
9/22/2015	1,155	171	958	197
9/23/2015	1,208	302	879	328
9/24/2015	1,081	206	850	232
9/25/2015	1,183	173	984	199
9/26/2015	1,144	305	812	331
9/27/2015	1,050	205	819	231
9/28/2015	1,198	309	863	335
9/29/2015	1,181	205	950	231
9/30/2015	1,081	174	882	200
	<b>gpm</b>	<b>gpd</b>		
<b>Average</b>	<b>1,170</b>	<b>1,685,044</b>		
<b>Peak</b>	<b>1,398</b>	<b>2,012,825</b>	<b>Peak Date</b>	<b>9/14/2015</b>

October 2015

Date	Site Outfall flow Average (gpm)	AWN Unreg/Dil Flows (gpm)	Regulated Flows Average	Unreg/Dil Flows Average
10/1/2015	1,058	171	861	197
10/2/2015	1,179	306	848	332
10/3/2015	1,131	201	904	227
10/4/2015	1,176	305	844	331
10/5/2015	1,090	201	862	227
10/6/2015	1,146	169	951	195
10/7/2015	1,239	167	1,046	193
10/8/2015	1,277	304	947	330
10/9/2015	1,075	200	849	226
10/10/2015	1,051	165	861	191
10/11/2015	1,082	167	889	193
10/12/2015	1,308	441	841	467
10/13/2015	1,100	241	832	267
10/14/2015	1,079	170	883	196
10/15/2015	1,273	175	1,073	201
10/16/2015	1,193	180	987	206
10/17/2015	1,390	321	1,044	347
10/18/2015	1,223	217	980	243
10/19/2015	1,418	322	1,070	348
10/20/2015	1,308	220	1,062	246
10/21/2015	1,464	318	1,120	344
10/22/2015	1,393	218	1,149	244
10/23/2015	1,356	187	1,143	213
10/24/2015	1,257	181	1,050	207
10/25/2015	1,343	186	1,131	212
10/26/2015	1,440	320	1,094	346
10/27/2015	1,368	356	985	382
10/28/2015	1,358	221	1,111	247
10/29/2015	1,477	188	1,263	214
10/30/2015	1,608	325	1,257	351
10/31/2015	1,294	218	1,050	244
	<b>gpm</b>	<b>gpd</b>		
<b>Average</b>	<b>1,263</b>	<b>1,818,684</b>		
<b>Peak</b>	<b>1,608</b>	<b>2,315,367</b>	<b>Peak Date</b>	<b>10/30/2015</b>



November 2015

Date	Site Outfall flow Average (gpm)	AWN Unreg/Dil Flows (gpm)	Regulated Flows Average	Unreg/Dil Flows Average
11/1/2015	1,277	182	1,069	208
11/2/2015	1,438	322	1,090	348
11/3/2015	1,429	225	1,177	251
11/4/2015	1,468	324	1,118	350
11/5/2015	1,397	225	1,146	251
11/6/2015	1,555	185	1,344	211
11/7/2015	1,456	322	1,108	348
11/8/2015	1,319	217	1,076	243
11/9/2015	1,326	182	1,118	208
11/10/2015	1,535	322	1,187	348
11/11/2015	1,485	355	1,104	381
11/12/2015	1,355	221	1,108	247
11/13/2015	1,418	188	1,204	214
11/14/2015	1,414	182	1,206	208
11/15/2015	1,480	319	1,135	345
11/16/2015	1,357	218	1,113	244
11/17/2015	1,383	184	1,173	210
11/18/2015	1,501	324	1,152	350
11/19/2015	1,498	358	1,115	384
11/20/2015	1,372	225	1,121	251
11/21/2015	1,554	192	1,336	218
11/22/2015	1,402	194	1,182	220
11/23/2015	1,539	326	1,188	352
11/24/2015	1,428	228	1,174	254
11/25/2015	1,551	322	1,203	348
11/26/2015	1,411	218	1,167	244
11/27/2015	1,491	323	1,142	349
11/28/2015	1,513	215	1,272	241
11/29/2015	1,381	183	1,173	209
11/30/2015	1,590	191	1,373	217
	<b>gpm</b>	<b>gpd</b>		
<b>Average</b>	<b>1,450</b>	<b>2,087,772</b>		
<b>Peak</b>	<b>1,590</b>	<b>2,289,823</b>	<b>Peak Date</b>	<b>11/30/2015</b>

December 2015

Date	Site Outfall flow Average (gpm)	AWN Unreg/Dil Flows (gpm)	Regulated Flows Average	Unreg/Dil Flows Average
12/1/2015	1,494	326	1,142	352
12/2/2015	1,606	355	1,225	381
12/3/2015	1,437	226	1,184	252
12/4/2015	1,498	188	1,284	214
12/5/2015	1,415	323	1,066	349
12/6/2015	1,544	223	1,295	249
12/7/2015	1,409	190	1,193	216
12/8/2015	1,543	324	1,193	350
12/9/2015	1,526	360	1,140	386
12/10/2015	1,351	221	1,104	247
12/11/2015	1,345	179	1,139	205
12/12/2015	1,529	321	1,183	347
12/13/2015	1,517	215	1,276	241
12/14/2015	1,465	199	1,240	225
12/15/2015	1,541	200	1,315	226
12/16/2015	1,649	319	1,304	345
12/17/2015	1,391	344	1,021	370
12/18/2015	1,242	205	1,010	231
12/19/2015	1,201	164	1,010	190
12/20/2015	1,334	163	1,145	189
12/21/2015	1,348	300	1,022	326
12/22/2015	1,202	199	977	225
12/23/2015	1,179	163	990	189
12/24/2015	1,315	169	1,120	195
12/25/2015	1,389	442	921	468
12/26/2015	1,306	247	1,032	273
12/27/2015	1,376	185	1,165	211
12/28/2015	1,543	180	1,336	206
12/29/2015	1,571	326	1,219	352
12/30/2015	1,381	217	1,138	243
12/31/2015	1,421	186	1,209	212
	<b>gpm</b>	<b>gpd</b>		
<b>Average</b>	<b>1,422</b>	<b>2,046,975</b>		
<b>Peak</b>	<b>1,649</b>	<b>2,374,502</b>	<b>Peak Date</b>	<b>12/16/2015</b>

**ENDORSEMENT GS**

**GREASE TRAPS, SAND TRAPS AND OIL/WATER SEPARATORS**

**COMPLIANCE REQUIREMENT:** Facilities with grease traps, sand traps or oil/water separators shall periodically inspect the operation of these devices and remove accumulated grease, sand, oil or grit as required to prevent discharge of such pollutants (or materials) to the sanitary sewer.

**MONITORING REQUIREMENT:** The Permittee shall perform periodic inspections, as required, to assure timely removal of accumulated materials.

**REPORTING REQUIREMENT:** The Permittee shall document in each semi-annual report the method used to dispose of materials removed from grease traps, sand traps or oil/water separators. This must include a narrative statement, along with copies of the manifest forms for each material removed from the Permittee's facility during the reporting period. If no materials are removed during the reporting period, a statement of that fact must be submitted. Sample statements are provided below.

\* \* \* \*

**GREASE, SAND, OIL OR GRIT SHIPPING CERTIFICATION STATEMENT – NO SHIPMENTS**

I hereby certify that the permitted facility HAS active grease traps, sand traps or oil/water separators and NO shipments of accumulated grease, oil, sand or grit have occurred during this reporting period.

Facility Name: \_\_\_\_\_  
Permit No.: \_\_\_\_\_ Date: \_\_\_\_\_  
Signature: \_\_\_\_\_ Title: \_\_\_\_\_  
Authorized Representative

\* \* \* \*

**GREASE, SAND, OIL OR GRIT SHIPPING CERTIFICATION STATEMENT - SHIPMENTS**

I hereby certify that the permitted facility HAS active grease traps, sand traps or oil/water separators and shipments of accumulated grease, oil, sand or grit HAVE occurred during this reporting period. Copies of manifests are attached.

Facility Name: Intel Corporation  
Permit No.: 2021A Date: 1/26/16  
Signature: *Mindy Koch* Title: NM Corporate Services Manager  
Authorized Representative

**ENDORSEMENT HAPS**

HAZARDOUS AIR POLLUTANTS CERTIFICATION

COMPLIANCE REQUIREMENT: The Permittee shall not use the treatment and controls located at the POTW to comply with its NESHAP.

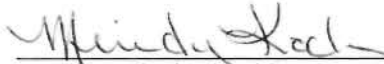
MONITORING REQUIREMENT: None required by the Permittee.

REPORTING REQUIREMENT: The Permittee shall submit the appropriate certification statement shown below with each semi-annual report submittal.

\* \* \* \*

NESHAP CERTIFICATION STATEMENT

I hereby certify that this facility does not use the treatment and controls located at the POTW to comply with its NESHAP.

Facility Name: Intel Corporation  
Permit No.: 2021A Date: 1/26/14  
Signature:  Title: NM Corporate Services Manager  
Authorized Representative

**ENDORSEMENT HZ3**

HAZARDOUS SUBSTANCES AND PRETREATMENT WASTES

FOR PERMIT # 2021A

**COMPLIANCE REQUIREMENT:** The permittee shall insure that: 1) all pretreatment processes are handled in accordance with applicable Resource Conservation and Recovery Act (RCRA) regulations, 2) no materials removed by a pretreatment process are reintroduced into the wastestream, and, 3) hazardous substances stored on-site are not discharged to the sanitary sewer. In other words, disposal of pretreatment wastes or hazardous substances into the sanitary sewer is strictly forbidden.

**MONITORING REQUIREMENTS:** None required by the Permittee.

**REPORTING REQUIREMENTS:** The permittee shall document in each semi-annual report, the method used to dispose of materials removed by the pretreatment process and/or hazardous substances stored on-site. This must include a narrative statement, along with a summary of all hazardous materials generated from the NM site for the reporting period. All original manifests are to be maintained in the permittee's regulatory files and be available to the Water Authority upon request. If no hazardous substances or pretreatment wastes are removed during the reporting period, a statement of that fact must be submitted. Sample statements are provided.

\* \* \* \*

HAZARDOUS SUBSTANCES AND PRETREATMENT WASTES CERTIFICATION  
STATEMENT

I hereby certify that NO shipments of hazardous substances or pretreatment wastes have occurred during this reporting period. **NOT APPLICABLE**

Facility Name: \_\_\_\_\_  
Permit No.: \_\_\_\_\_ Date: \_\_\_\_\_  
Signature: \_\_\_\_\_ Title: \_\_\_\_\_  
Authorized Representative

US EPA ID. No. \_\_\_\_\_ (IF APPLICABLE)

\* \* \* \*

HAZARDOUS SUBSTANCES AND PRETREATMENT WASTES CERTIFICATION  
STATEMENT

I hereby certify that shipments of hazardous substances or pretreatment wastes HAVE occurred during this reporting period. A summary of these shipments has been included with this report.

Facility Name: Intel Corporation

Permit No.: 2021A

Date: 1/26/16

Signature:

*Mindy Koh*  
Authorized Representative

NM Corporate Services  
Title: Manager

US EPA ID. No. NMD000609339 (IF APPLICABLE)

**HAZARDOUS SUBSTANCES AND PRETREATMENT  
WASTE MANAGEMENT**

Intel Corporation utilizes Veolia Environmental Services Technical Solutions, Evoqua Water Technologies, and Clean Harbors Environmental for removal and disposal of all hazardous substances generated at the New Mexico site.

Veolia Environmental Services Technical Solutions, Evoqua Water Technologies, and Clean Harbors Environmental are EPA permitted Treatment Storage and Disposal Facilities (TSDFs). The addresses of the facilities are below:

Veolia Environmental Services Technical Solutions  
9131 East 96<sup>th</sup> Avenue  
Henderson, CO 80640  
Phone Number: (303) 289-4827

Evoqua Water Technologies  
2430 Rose Place  
Roseville, MN 55113  
Phone Number: (651) 638-1330

Clean Harbors Environmental  
1340 West Lincoln Street  
Phoenix, AZ 85007  
Phone Number: (602) 258-6155

A summary report of all hazardous materials generated from the New Mexico site for the reporting period is included. All original manifests are maintained in our regulatory files and are available to the Water Authority upon request.



# Intel Semi-Annual Wastewater Report | H2'2015

Shipping Doc. Number	Ship Date	Profile Number	Waste Name	Quantity (lbs)	Quantity (tons)	Haz/Non-Haz
013489888JJK	7/1/2015	7919597	Slurry Copper Wastewater Resin	1671	0.8355	H
907634VES	7/2/2015	448115	SOLVENT, GENERAL FAB 11S	33260	16.63	Y
202865	7/2/2015	529928	SLUDGE, CALCIUM FLUORIDE	14220	7.11	N
70218	7/4/2015	529928	SLUDGE, CALCIUM FLUORIDE	17180	8.59	N
202866	7/6/2015	529928	SLUDGE, CALCIUM FLUORIDE	13180	6.59	N
911254VES	7/8/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40980	20.49	Y
70219	7/8/2015	529928	SLUDGE, CALCIUM FLUORIDE	13740	6.87	N
70220	7/10/2015	529928	SLUDGE, CALCIUM FLUORIDE	16820	8.41	N
70221	7/12/2015	529928	SLUDGE, CALCIUM FLUORIDE	16700	8.35	N
70222	7/14/2015	529928	SLUDGE, CALCIUM FLUORIDE	14220	7.11	N
013489889JJK	7/15/2015	7919597	Slurry Copper Wastewater Resin	1654	0.827	H
911255VES	7/15/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40100	20.05	Y
202867	7/16/2015	529928	SLUDGE, CALCIUM FLUORIDE	16460	8.23	N
70223	7/18/2015	529928	SLUDGE, CALCIUM FLUORIDE	13480	6.74	N
907608VES	7/20/2015	699331	SOLVENT, SLAM	23300	11.65	Y
202868	7/20/2015	529928	SLUDGE, CALCIUM FLUORIDE	13200	6.6	N
70224	7/21/2015	529928	SLUDGE, CALCIUM FLUORIDE	13940	6.97	N
911365VES	7/22/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	37900	18.95	Y
202869	7/23/2015	529928	SLUDGE, CALCIUM FLUORIDE	15760	7.88	N
70225	7/25/2015	529928	SLUDGE, CALCIUM FLUORIDE	16400	8.2	N
202870	7/27/2015	529928	SLUDGE, CALCIUM FLUORIDE	15500	7.75	N
70226	7/28/2015	529928	SLUDGE, CALCIUM FLUORIDE	14120	7.06	N
911366VES	7/29/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	37480	18.74	Y
202871	7/30/2015	529928	SLUDGE, CALCIUM FLUORIDE	16520	8.26	N
70227	8/1/2015	529928	SLUDGE, CALCIUM FLUORIDE	13960	6.98	N
907635VES	8/3/2015	448115	SOLVENT, GENERAL FAB 11S	41720	20.86	Y
202872	8/3/2015	529928	SLUDGE, CALCIUM FLUORIDE	12960	6.48	N
70228	8/4/2015	529928	SLUDGE, CALCIUM FLUORIDE	10680	5.34	N
911367VES	8/5/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40440	20.22	Y
202873	8/6/2015	529928	SLUDGE, CALCIUM FLUORIDE	15640	7.82	N
70229	8/8/2015	529928	SLUDGE, CALCIUM FLUORIDE	15740	7.87	N
70230	8/9/2015	529928	SLUDGE, CALCIUM FLUORIDE	12960	6.48	N
70231	8/11/2015	529928	SLUDGE, CALCIUM FLUORIDE	13100	6.55	N
013489890JJK	8/12/2015	7919597	Slurry Copper Wastewater Resin	1729	0.8645	H



# Intel Semi-Annual Wastewater Report | H2'2015

Shipping Doc. Number	Ship Date	Profile Number	Waste Name	Quantity (lbs)	Quantity (tons)	Haz/Non-Haz
911369VES	8/13/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40320	20.16	Y
202874	8/13/2015	529928	SLUDGE, CALCIUM FLUORIDE	16020	8.01	N
70232	8/15/2015	529928	SLUDGE, CALCIUM FLUORIDE	13140	6.57	N
202875	8/17/2015	529928	SLUDGE, CALCIUM FLUORIDE	15240	7.62	N
70233	8/19/2015	529928	SLUDGE, CALCIUM FLUORIDE	13220	6.61	N
911368VES	8/20/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40580	20.29	Y
202877	8/20/2015	529928	SLUDGE, CALCIUM FLUORIDE	12920	6.46	N
70234	8/22/2015	529928	SLUDGE, CALCIUM FLUORIDE	15580	7.79	N
202878	8/24/2015	529928	SLUDGE, CALCIUM FLUORIDE	12580	6.29	N
013489891JJK	8/26/2015	7919597	Slurry Copper Wastewater Resin	1731	0.8655	H
70235	8/26/2015	529928	SLUDGE, CALCIUM FLUORIDE	13600	6.8	N
640164VES	8/27/2015	399773	SOLVENTS, HMDS	68	0.034	Y
640164VES	8/27/2015	399825	EDT PARTS	181	0.0905	Y
640164VES	8/27/2015	442913	DEBRIS, ARSENIC	743	0.3715	Y
640164VES	8/27/2015	442923	DEBRIS, MERCURY	11	0.0055	Y
640164VES	8/27/2015	442983	REPEATING LABPACK	215	0.1075	Y
640164VES	8/27/2015	533335	DEBRIS, SOLVENT-HAZARDOUS	247	0.1235	Y
640164VES	8/27/2015	686138	DEBRIS, INP FILTER, HAZARDOUS	50	0.025	Y
640164VES	8/27/2015	691900	DEBRIS, HOUSE VACUUM	151	0.0755	Y
640164VES	8/27/2015	693403	SOLVENTS, SPIN ON GLASS	405	0.2025	Y
640164VES	8/27/2015	713453	HMDS DEBRIS	95	0.0475	Y
911370VES	8/27/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	39940	19.97	Y
202876	8/27/2015	202100	IPA CONTAMINATED WIPERS	2075	1.0375	N
202876	8/27/2015	442694	BATTERIES, LEAD ACID - NON SPILLABLE	894	0.447	N
202876	8/27/2015	442912	LAMPS, MERCURY	50	0.025	N
202876	8/27/2015	442912	LAMPS, MERCURY	531	0.2655	N
202876	8/27/2015	442912	LAMPS, MERCURY	247	0.1235	N
202876	8/27/2015	442912	LAMPS, MERCURY	39	0.0195	N
202876	8/27/2015	532526	SLUDGE, ION EXCHANGE	418	0.209	N
202876	8/27/2015	532530	USED OIL	350	0.175	N
202876	8/27/2015	532537	BATTERIES, LEAD/ACID-WET	826	0.413	N
202876	8/27/2015	591360	LATEX PAINT RELATED MATERIALS	260	0.13	N
202876	8/27/2015	693767	GLYCOLS - HEAT TRANSFER FLUIDS	25	0.0125	N
202879	8/27/2015	529928	SLUDGE, CALCIUM FLUORIDE	15760	7.88	N

# Intel Semi-Annual Wastewater Report | H2'2015

Shipping Doc. Number	Ship Date	Profile Number	Waste Name	Quantity (lbs)	Quantity (tons)	Haz/ Non-Haz
70238	8/29/2015	529928	SLUDGE, CALCIUM FLUORIDE	13240	6.62	N
202880	8/31/2015	529928	SLUDGE, CALCIUM FLUORIDE	15440	7.72	N
70239	9/2/2015	529928	SLUDGE, CALCIUM FLUORIDE	13280	6.64	N
911371VES	9/3/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40000	20	Y
70240	9/4/2015	529928	SLUDGE, CALCIUM FLUORIDE	16220	8.11	N
70241	9/6/2015	529928	SLUDGE, CALCIUM FLUORIDE	13360	6.68	N
907636VES	9/7/2015	448115	SOLVENT, GENERAL FAB 11S	39680	19.84	Y
70242	9/8/2015	529928	SLUDGE, CALCIUM FLUORIDE	15500	7.75	N
013489892JJK	9/9/2015	7919597	Slurry Copper Wastewater Resin	3518	1.759	H
202881	9/10/2015	529928	SLUDGE, CALCIUM FLUORIDE	13020	6.51	N
70243	9/12/2015	529928	SLUDGE, CALCIUM FLUORIDE	12740	6.37	N
911372VES	9/14/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	41320	20.66	Y
202882	9/14/2015	529928	SLUDGE, CALCIUM FLUORIDE	13380	6.69	N
202883	9/17/2015	529928	SLUDGE, CALCIUM FLUORIDE	15700	7.85	N
70244	9/19/2015	529928	SLUDGE, CALCIUM FLUORIDE	14240	7.12	N
911373VES	9/22/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40980	20.49	Y
70245	9/23/2015	529928	SLUDGE, CALCIUM FLUORIDE	13700	6.85	N
202885	9/24/2015	529928	SLUDGE, CALCIUM FLUORIDE	15980	7.99	N
70246	9/27/2015	529928	SLUDGE, CALCIUM FLUORIDE	16300	8.15	N
911374VES	9/28/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40440	20.22	Y
70247	9/29/2015	529928	SLUDGE, CALCIUM FLUORIDE	13720	6.86	N
907638VES	9/30/2015	448115	SOLVENT, GENERAL FAB 11S	32580	16.29	Y
013489893JJK	10/7/2015	7919597	Slurry Copper Wastewater Resin	1760	0.88	H
013489894JJK	10/21/2015	7919597	Slurry Copper Wastewater Resin	1695	0.8475	H
013489895JJK	11/4/2015	7919597	Slurry Copper Wastewater Resin	1570	0.785	H
012542305JJK	11/18/2015	7919597	Slurry Copper Wastewater Resin	1759	0.8795	H
012542306JJK	12/2/2015	7919597	Slurry Copper Wastewater Resin	1831	0.9155	H
012542307JJK	12/18/2015	7919597	Slurry Copper Wastewater Resin	1639	0.8195	H
202887	10/1/2015	529928	SLUDGE, CALCIUM FLUORIDE	15860	7.93	N
70248	10/3/2015	529928	SLUDGE, CALCIUM FLUORIDE	15440	7.72	N
914055VES	10/5/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	41160	20.58	Y
70249	10/6/2015	529928	SLUDGE, CALCIUM FLUORIDE	15700	7.85	N
202888	10/8/2015	529928	SLUDGE, CALCIUM FLUORIDE	14220	7.11	N
70250	10/9/2015	529928	SLUDGE, CALCIUM FLUORIDE	11860	5.93	N
202889	10/12/2015	529928	SLUDGE, CALCIUM FLUORIDE	15140	7.57	N

# Intel Semi-Annual Wastewater Report | H2'2015

Shipping Doc. Number	Ship Date	Profile Number	Waste Name	Quantity (lbs)	Quantity (tons)	Haz/Non-Haz
914057VES	10/13/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	41300	20.65	Y
70251	10/14/2015	529928	SLUDGE, CALCIUM FLUORIDE	13900	6.95	N
640165VES	10/16/2015	483253	SOLVENT, GENERAL-MIXED	37060	18.53	Y
70252	10/16/2015	529928	SLUDGE, CALCIUM FLUORIDE	14280	7.14	N
914058VES	10/19/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	39600	19.8	Y
202890	10/19/2015	529928	SLUDGE, CALCIUM FLUORIDE	13080	6.54	N
70253	10/20/2015	529928	SLUDGE, CALCIUM FLUORIDE	13900	6.95	N
70254	10/23/2015	529928	SLUDGE, CALCIUM FLUORIDE	14320	7.16	N
70255	10/25/2015	529928	SLUDGE, CALCIUM FLUORIDE	14180	7.09	N
202892	10/27/2015	202100	IPA CONTAMINATED WIPERS	2521	1.2605	N
202892	10/27/2015	442912	LAMPS, MERCURY	122	0.061	N
202892	10/27/2015	442983	REPEATING LABPACK	90	0.045	N
202892	10/27/2015	532530	USED OIL	902	0.451	N
202892	10/27/2015	592227	FLUOROCARBONS, PERFLUORINATED POLYETHERS	1415	0.7075	N
202892	10/27/2015	699340	USED OIL, POLYALKYLENE GLYCOL	312	0.156	N
202892	10/27/2015	713444	MIXED BATTERIES (UNIVERSAL-WASTE BAT)	635	0.3175	N
70256	10/27/2015	529928	SLUDGE, CALCIUM FLUORIDE	10180	5.09	N
914059VES	10/28/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40020	20.01	Y
202891	10/29/2015	529928	SLUDGE, CALCIUM FLUORIDE	14660	7.33	N
70257	10/31/2015	529928	SLUDGE, CALCIUM FLUORIDE	13120	6.56	N
202893	11/2/2015	529928	SLUDGE, CALCIUM FLUORIDE	13820	6.91	N
640166VES	11/3/2015	366524	AEROSOL CANS	24	0.012	Y
640166VES	11/3/2015	399773	SOLVENTS, HMDS	36	0.018	Y
640166VES	11/3/2015	442913	DEBRIS, ARSENIC	700	0.35	Y
640166VES	11/3/2015	442914	ARSENIC CONTAMINATED SLURRY MATERIAL	299	0.1495	Y
640166VES	11/3/2015	442923	DEBRIS, MERCURY	10	0.005	Y
640166VES	11/3/2015	442983	REPEATING LABPACK	89	0.0445	Y
640166VES	11/3/2015	442983	REPEATING LABPACK	32	0.016	Y
640166VES	11/3/2015	533335	DEBRIS, SOLVENT-HAZARDOUS	352	0.176	Y
640166VES	11/3/2015	686138	DEBRIS, INP FILTER, HAZARDOUS	58	0.029	Y
640166VES	11/3/2015	692557	CYLINDERS, COMPRESSED GASES	15	0.0075	Y
640166VES	11/3/2015	693403	SOLVENTS, SPIN ON GLASS	266	0.133	Y
640166VES	11/3/2015	713453	HMDS DEBRIS	81	0.0405	Y

# Intel Semi-Annual Wastewater Report | H2'2015

Shipping Doc. Number	Ship Date	Profile Number	Waste Name	Quantity (lbs)	Quantity (tons)	Haz/ Non-Haz
914060VES	11/5/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	38080	19.04	Y
202894	11/5/2015	529928	SLUDGE, CALCIUM FLUORIDE	13600	6.8	N
70258	11/7/2015	529928	SLUDGE, CALCIUM FLUORIDE	14640	7.32	N
202895	11/9/2015	529928	SLUDGE, CALCIUM FLUORIDE	13940	6.97	N
70259	11/11/2015	529928	SLUDGE, CALCIUM FLUORIDE	10960	5.48	N
70260	11/13/2015	529928	SLUDGE, CALCIUM FLUORIDE	13820	6.91	N
905253VES	11/16/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	41440	20.72	Y
70262	11/17/2015	529928	SLUDGE, CALCIUM FLUORIDE	14060	7.03	N
70263	11/20/2015	529928	SLUDGE, CALCIUM FLUORIDE	17020	8.51	N
5245744FLE	11/23/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	10	0.005	Y
5245747FLE	11/23/2015	DecanCMPCleanBG	Decant Drum CMP Cleaner BG1	10	0.005	Y
5245747FLE	11/23/2015	Decant KOH 10%	Decant Drum Potassium Hydroxide 10%	12	0.006	Y
5245747FLE	11/23/2015	Decant MCX-i4C	Decant Drum MCX-i4C	5	0.0025	Y
5245747FLE	11/23/2015	Decant PBR-40	Decant Drum PBR 40	11	0.0055	Y
5245747FLE	11/23/2015	Decant PGMEA-PM	Decant Drum PGMEA - PM Acetate	10	0.005	Y
70264	11/23/2015	529928	SLUDGE, CALCIUM FLUORIDE	14220	7.11	N
905254VES	11/24/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	39080	19.54	Y
5245742FLE	11/25/2015	Decant MCX-i4C	Decant Drum MCX-i4C	3	0.0015	Y
5245742FLE	11/25/2015	Decant PBR-40	Decant Drum PBR 40	11	0.0055	Y
5245748FLE	11/25/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	11	0.0055	Y
70265	11/25/2015	529928	SLUDGE, CALCIUM FLUORIDE	13840	6.92	N
70266	11/27/2015	529928	SLUDGE, CALCIUM FLUORIDE	16860	8.43	N
907639VES	11/29/2015	448115	SOLVENT, GENERAL FAB 11S	39460	19.73	Y
5245751FLE	11/30/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	11	0.0055	Y
5245752FLE	11/30/2015	Decant KOH 10%	Decant Drum Potassium Hydroxide 10%	12	0.006	Y
5245752FLE	11/30/2015	Decant PBR-40	Decant Drum PBR 40	21	0.0105	Y
5245752FLE	11/30/2015	Decant PGMEA-PM	Decant Drum PGMEA - PM Acetate	10	0.005	Y
70267	11/30/2015	529928	SLUDGE, CALCIUM FLUORIDE	10880	5.44	N
70268	12/2/2015	529928	SLUDGE, CALCIUM FLUORIDE	13820	6.91	N
914061VES	12/3/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	37280	18.64	Y
5245750FLE	12/3/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	11	0.0055	Y
5245753FLE	12/3/2015	Decant MCX-i4C	Decant Drum MCX-i4C	11	0.0055	Y
5245753FLE	12/3/2015	Decant PBR-40	Decant Drum PBR 40	11	0.0055	Y
5245753FLE	12/3/2015	Decant PGMEA-PM	Decant Drum PGMEA - PM Acetate	10	0.005	Y



# Intel Semi-Annual Wastewater Report | H2'2015

Shipping Doc. Number	Ship Date	Profile Number	Waste Name	Quantity (lbs)	Quantity (tons)	Haz/ Non-Haz
70269	12/4/2015	529928	SLUDGE, CALCIUM FLUORIDE	14000	7	N
5245755FLE	12/7/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	11	0.0055	Y
5245756FLE	12/7/2015	Decant KOH 10%	Decant Drum Potassium Hydroxide 10%	12	0.006	Y
5245756FLE	12/7/2015	Decant PBR-40	Decant Drum PBR 40	11	0.0055	Y
5245756FLE	12/7/2015	Decant PGMEA-PM	Decant Drum PGMEA - PM Acetate	3	0.0015	Y
70270	12/7/2015	529928	SLUDGE, CALCIUM FLUORIDE	13500	6.75	N
70271	12/8/2015	529928	SLUDGE, CALCIUM FLUORIDE	14160	7.08	N
640168VES	12/10/2015	483253	SOLVENT, GENERAL-MIXED	39762	19.881	Y
5245758FLE	12/10/2015	Decant MCX-i4C	Decant Drum MCX-i4C	11	0.0055	Y
5245758FLE	12/10/2015	Decant PBR-40	Decant Drum PBR 40	21	0.0105	Y
5245760FLE	12/10/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	11	0.0055	Y
70272	12/11/2015	529928	SLUDGE, CALCIUM FLUORIDE	16740	8.37	N
70273	12/13/2015	529928	SLUDGE, CALCIUM FLUORIDE	13760	6.88	N
905255VES	12/14/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	41160	20.58	Y
5245761FLE	12/14/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	11	0.0055	Y
5245764FLE	12/14/2015	Decant KOH 10%	Decant Drum Potassium Hydroxide 10%	12	0.006	Y
5245764FLE	12/14/2015	Decant PBR-40	Decant Drum PBR 40	11	0.0055	Y
5245764FLE	12/14/2015	Decant PGMEA-PM	Decant Drum PGMEA - PM Acetate	10	0.005	Y
72767	12/16/2015	529928	SLUDGE, CALCIUM FLUORIDE	13600	6.8	N
72768	12/19/2015	529928	SLUDGE, CALCIUM FLUORIDE	14200	7.1	N
72769	12/21/2015	529928	SLUDGE, CALCIUM FLUORIDE	13920	6.96	N
5245765FLE	12/22/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	11	0.0055	Y
5245767FLE	12/22/2015	Decant MCX-i4C	Decant Drum MCX-i4C	10	0.005	Y
5245767FLE	12/22/2015	Decant PBR-40	Decant Drum PBR 40	21	0.0105	Y
5245767FLE	12/22/2015	Decant PGMEA-PM	Decant Drum PGMEA - PM Acetate	10	0.005	Y
5245768FLE	12/22/2015	Decant KOH 10%	Decant Drum Potassium Hydroxide 10%	12	0.006	Y
5245768FLE	12/22/2015	Decant MCX-i4C	Decant Drum MCX-i4C	11	0.0055	Y
5245768FLE	12/22/2015	Decant PBR-40	Decant Drum PBR 40	11	0.0055	Y
5245769FLE	12/22/2015	Decant CLK-222	Decant Drum CLK-222,corrosive	1852	0.926	Y
5245770FLE	12/22/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	11	0.0055	Y
914062VES	12/23/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40100	20.05	Y
914065VES	12/23/2015	692208	SOLVENT, CORROSIVE - FAB 11 (D002)	40100	20.05	Y
72770	12/23/2015	529928	SLUDGE, CALCIUM FLUORIDE	11500	5.75	N
72771	12/26/2015	529928	SLUDGE, CALCIUM FLUORIDE	16720	8.36	N

# Intel Semi-Annual Wastewater Report | H2'2015

Shipping Doc. Number	Ship Date	Profile Number	Waste Name	Quantity (lbs)	Quantity (tons)	Haz/ Non-Haz
5245773FLE	12/28/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	22	0.011	Y
72772	12/28/2015	529928	SLUDGE, CALCIUM FLUORIDE	10900	5.45	N
5245778FLE	12/31/2015	DECANTGSOLVE470	Decant Gensolve 470 Corrosive	11	0.0055	Y
72773	12/31/2015	529928	SLUDGE, CALCIUM FLUORIDE	14540	7.27	N

**ENDORSEMENT PH3**

2021A pH MONITORING

COMPLIANCE REQUIREMENT: The Permittee is required to maintain a system to monitor the pH of the effluent from each acid waste neutralization unit continuously. This monitoring is required for information purposes only. The Permittee is required to maintain a system to monitor the pH of the effluent from the site outfall continuously. Compliance with the pH limit this permit will be determined at the designated sampling point at the site outfall.

MONITORING REQUIREMENT: See above.

REPORTING REQUIREMENT: The Permittee shall notify the Industrial Waste Engineer within 24 hours of becoming aware of a pH excursion at the Site Vault lasting more than 60 minutes including circumstances and corrective action taken.

The Permittee shall include with each semi-annual report, the results of pH monitoring conducted at the permit sample point during the reporting period. Results reported must include:

- 1) Daily maximum and time of occurrence.
- 2) Daily minimum and time of occurrence.
- 3) Duration in minutes of each individual excursion above or below limits set in this permit. Limits are those stated in the Ordinance unless otherwise noted.

As noted in 40 CFR 401.17

- 1) The total time during which the pH values are outside the required range of pH values shall not exceed seven (7) hours and 26 minutes in any calendar month.
- 2) No individual excursion from the range of pH values shall exceed 60 minutes.

## CONTINUOUS pH MONITORING REPORT

July – August

Site Outfall Daily Minimum and Maximum pH Report

Date	Minimum pH	Duration (min)	Maximum pH	Duration (min)	Date	Minimum pH	Duration (min)	Maximum pH	Duration (min)
7/1/2015	6.77		8.29		8/1/2015	6.78		8.59	
7/2/2015	6.92		9.95		8/2/2015	7.04		9.12	
7/3/2015	6.69		10.90		8/3/2015	7.03		11.41	
7/4/2015	6.70		8.02		8/4/2015	6.89		9.29	
7/5/2015	6.61		8.89		8/5/2015	6.85		9.64	
7/6/2015	6.86		9.38		8/6/2015	7.05		8.74	
7/7/2015	6.77		9.37		8/7/2015	7.04		11.23	
7/8/2015	6.66		8.62		8/8/2015	6.88		9.18	
7/9/2015	6.73		10.55		8/9/2015	6.78		9.77	
7/10/2015	6.85		10.84		8/10/2015	6.85		8.46	
7/11/2015	6.78		7.73		8/11/2015	6.97		11.32	
7/12/2015	6.71		8.04		8/12/2015	6.93		8.39	
7/13/2015	6.91		9.13		8/13/2015	6.98		9.68	
7/14/2015	6.80		10.14		8/14/2015	6.84		8.36	
7/15/2015	6.94		8.24		8/15/2015	5.98		10.00	
7/16/2015	6.91		11.06		8/16/2015	5.84		8.90	
7/17/2015	6.86		10.35		8/17/2015	5.76		8.80	
7/18/2015	6.96		11.36		8/18/2015	5.77		8.31	
7/19/2015	6.77		9.70		8/19/2015	5.73		8.32	
7/20/2015	6.73		9.41		8/20/2015	6.30		8.66	
7/21/2015	6.97		9.47		8/21/2015	5.75		10.00	
7/22/2015	6.78		11.15		8/22/2015	6.60		10.26	
7/23/2015	6.75		9.70		8/23/2015	6.48		10.09	
7/24/2015	6.73		11.33		8/24/2015	6.72		9.94	
7/25/2015	6.97		8.22		8/25/2015	6.56		8.93	
7/26/2015	7.02		9.49		8/26/2015	6.61		9.04	
7/27/2015	6.77		8.82		8/27/2015	6.32		8.58	
7/28/2015	6.94		9.92		8/28/2015	6.34		10.81	
7/29/2015	6.66		9.22		8/29/2015	6.34		8.88	
7/30/2015	6.95		11.02		8/30/2015	6.39		9.78	
7/31/2015	6.87		8.35		8/31/2015	6.21		8.84	
July - Total Time pH Out of Range:				0	August - Total Time pH Out of Range:				0



# Intel Semi-Annual Wastewater Report | H2'2015

September – October

Site Outfall Daily Minimum and Maximum pH Report

Date	Minimum pH	Duration (min)	Maximum pH	Duration (min)	Date	Minimum pH	Duration (min)	Maximum pH	Duration (min)		
9/1/2015	6.08		9.15		10/1/2015	5.96		8.28			
9/2/2015	6.02		9.74		10/2/2015	6.00		9.41			
9/3/2015	5.95		10.02		10/3/2015	5.90		8.08			
9/4/2015	6.22		9.65		10/4/2015	5.94		10.04			
9/5/2015	6.25		9.45		10/5/2015	5.83		8.06			
9/6/2015	6.18		9.52		10/6/2015	5.87		10.52			
9/7/2015	6.14		9.15		10/7/2015	5.77		7.81			
9/8/2015	6.13		10.25		10/8/2015	5.76		10.36			
9/9/2015	6.16		10.53		10/9/2015	5.91		8.57			
9/10/2015	6.07		7.69		10/10/2015	5.89		8.64			
9/11/2015	6.07		10.46		10/11/2015	5.85		7.20			
9/12/2015	6.04		7.60		10/12/2015	5.90		7.25			
9/13/2015	5.96		8.93		10/13/2015	6.17		7.87			
9/14/2015	6.09		8.30		10/14/2015	6.07		8.84			
9/15/2015	6.02		10.29		10/15/2015	6.05		7.26			
9/16/2015	6.01		9.08		10/16/2015	6.27		8.63			
9/17/2015	5.91		8.09		10/17/2015	5.96		9.33			
9/18/2015	6.09		8.56		10/18/2015	6.20		7.51			
9/19/2015	6.25		7.73		10/19/2015	6.12		9.43			
9/20/2015	6.10		7.83		10/20/2015	6.26		8.85			
9/21/2015	6.11		8.25		10/21/2015	5.98		7.20			
9/22/2015	6.07		10.65		10/22/2015	6.00		8.60			
9/23/2015	6.00		7.47		10/23/2015	6.00		7.47			
9/24/2015	6.05		8.32		10/24/2015	6.04		8.73			
9/25/2015	5.86		9.26		10/25/2015	6.00		10.58			
9/26/2015	6.07		9.21		10/26/2015	6.03		7.51			
9/27/2015	6.07		8.32		10/27/2015	6.07		8.92			
9/28/2015	5.97		8.80		10/28/2015	6.15		8.05			
9/29/2015	6.05		8.78		10/29/2015	6.02		10.08			
9/30/2015	6.16		10.69		10/30/2015	6.08		9.05			
					10/31/2015	6.07		8.32			
<b>September - Total Time pH Out of Range:</b>					<b>0</b>	<b>October - Total Time pH Out of Range:</b>					<b>0</b>

# Intel Semi-Annual Wastewater Report | H2'2015

November – December

Site Outfall Daily Minimum and Maximum pH Report

Date	Minimum pH	Duration (min)	Maximum pH	Duration (min)	Date	Minimum pH	Duration (min)	Maximum pH	Duration (min)		
11/1/2015	6.18		9.46		12/1/2015	6.05		8.80			
11/2/2015	6.08		8.04		12/2/2015	6.22		8.61			
11/3/2015	6.09		10.62		12/3/2015	6.57		10.42			
11/4/2015	6.03		10.56		12/4/2015	6.25		9.61			
11/5/2015	6.35		10.55		12/5/2015	6.26		8.84			
11/6/2015	6.12		10.15		12/6/2015	6.07		9.36			
11/7/2015	6.14		8.91		12/7/2015	6.27		8.98			
11/8/2015	6.13		9.32		12/8/2015	6.07		8.56			
11/9/2015	6.07		9.18		12/9/2015	6.09		8.27			
11/10/2015	5.95		8.54		12/10/2015	6.35		8.70			
11/11/2015	5.97		9.07		12/11/2015	6.33		9.15			
11/12/2015	6.13		8.50		12/12/2015	6.11		9.20			
11/13/2015	6.01		9.04		12/13/2015	6.08		7.73			
11/14/2015	5.97		9.09		12/14/2015	6.52		10.64			
11/15/2015	6.04		7.84		12/15/2015	6.44		9.39			
11/16/2015	6.19		8.62		12/16/2015	6.10		7.18			
11/17/2015	6.12		9.41		12/17/2015	6.17		8.81			
11/18/2015	6.08		9.36		12/18/2015	6.35		9.06			
11/19/2015	6.04		8.88		12/19/2015	6.35		9.13			
11/20/2015	6.31		9.15		12/20/2015	6.07		8.77			
11/21/2015	6.11		10.69		12/21/2015	6.15		8.78			
11/22/2015	6.37		10.16		12/22/2015	6.43		8.72			
11/23/2015	6.13		8.39		12/23/2015	6.38		8.88			
11/24/2015	6.24		10.70		12/24/2015	6.13		6.97			
11/25/2015	6.03		8.24		12/25/2015	6.16		8.32			
11/26/2015	6.11		9.40		12/26/2015	6.44		8.97			
11/27/2015	6.03		9.18		12/27/2015	6.21		9.19			
11/28/2015	6.04		10.61		12/28/2015	6.06		8.56			
11/29/2015	6.11		7.85		12/29/2015	6.10		10.76			
11/30/2015	6.00		10.50		12/30/2015	6.37		8.90			
					12/31/2015	6.46		10.32			
<b>November - Total Time pH Out of Range:</b>					<b>0</b>	<b>December - Total Time pH Out of Range:</b>					<b>0</b>

**ENDORSEMENT RC**

REPORTING CERTIFICATION

COMPLIANCE REQUIREMENT: The Permittee is required to certify all materials and information submitted with semi-annual reports is accurate and complete.

MONITORING REQUIREMENT: None

REPORTING REQUIREMENT: The Permittee must complete, sign and submit the Reporting Certification (shown below) with each semi-annual report.

\* \* \* \* \*

REPORTING CERTIFICATION

Facility Name: Intel Corporation

Permit Number: 2021A

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with 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 known violations.

(Signature)

  
Authorized Representative

1/30/14  
Date

**ENDORSEMENT TC3**

TOXIC ORGANIC MANAGEMENT PLAN CERTIFICATION STATEMENT

COMPLIANCE REQUIREMENT: The most recent TOXIC ORGANIC (SOLVENT) MANAGEMENT PLAN (TOMP) submitted by the Permittee to the Industrial Waste Engineer remains in effect. The Permittee must notify the Industrial Waste Engineer, in writing, of any changes to the TOMP.

MONITORING REQUIREMENT: None required by the Permittee.

REPORTING REQUIREMENT: The Permittee shall continue to submit a TOXIC ORGANIC MANAGEMENT PLAN CERTIFICATION STATEMENT with each semiannual report. A sample certification statement has been provided below.

\* \* \* \*

TOXIC ORGANIC MANAGEMENT PLAN CERTIFICATION STATEMENT

Based upon my inquiry of the person or persons directly responsible for managing compliance with the permit limitations [or pretreatment standard] for total toxic organics (TTO), I certify that, to the best of my knowledge and belief, no dumping of concentrated toxic organics into the wastewaters has occurred during this reporting period. I further certify that this facility is implementing the TOXIC ORGANIC MANAGEMENT PLAN (TOMP) submitted to the Industrial Waste Engineer.

Facility Name: Intel Corporation

Permit No.: 2021A

Date:

1/26/16

Signature:



Authorized Representative

Title:

NM Site Corporate Services

Manager

**ENDORSEMENT INGA**

**SPECIAL WASTESTREAM POLLUTANT LIMITATIONS FOR PERMIT 2021A**

**COMPLIANCE REQUIREMENT:** The concentration of the following pollutants in the flow through the sampling point shall not exceed that shown below:

<b>POLLUTANT</b>	<b>MAXIMUM FOR ANY 1 DAY</b>
Indium	0.30 mg/l
Gallium	0.60 ug/l

**MONITORING REQUIREMENT:** The permittee is required to sample the site discharge for the above pollutants semi-annually. Each semi-annual monitoring event must be performed four day in a row using a 24-hour composite sample. All analysis must be done using EPA approved methods. If the EPA method is not applicable, the permittee must submit production values and calculations in each semi-annual report that show the concentrations of the above pollutants at the site outfall.

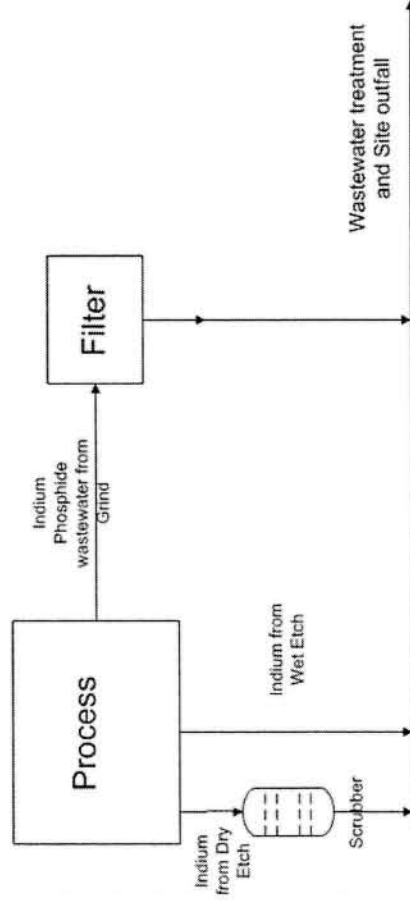
**REPORTING REQUIREMENT:** Submit production values and calculations in each semi-annual report that show the concentrations of the above pollutants at the site outfall.

# Intel Semi-Annual Wastewater Report | H2'2015

Indium Coverage on wafer %	Process types	Current production values - Amount of Indium in wastewater post filtration (grams/day)	Current production values - Amount of Gallium in wastewater (grams/day)	Filter Efficiency	Site outfall flow rate (gpm)
20%	Wafer Grind	65.2	none	35%	1,270
	Wet and Dry Etch	5.1	0.011	NA at this time	

**Modeling based on amount of Indium and Gallium removed during the process vs wafer starts due to potential changes in Indium coverage and Filter Efficiency**

<b>Total Indium (Outfall)</b>	<b>0.010</b>	<b>mg/L</b>
<b>Total Gallium (Outfall)</b>	<b>0.0016</b>	<b>ug/L</b>



**ENDORSEMENT WM**

POLLUTION PREVENTION THROUGH SOURCE REDUCTION AND WASTE MINIMIZATION

COMPLIANCE REQUIREMENT: Permittees shall endeavor, whenever feasible, to reduce or eliminate otherwise polluting substances in waste stream(s) by source reduction, waste minimization or more effective pretreatment.

MONITORING REQUIREMENT: None required by the Permittee.

REPORTING REQUIREMENTS: The Permittee shall include a narrative statement with each semi-annual report describing any source reduction, waste minimization or pretreatment efforts undertaken during the reporting period. If no such efforts are undertaken, the Permittee shall include a statement to that effect in the report.

**Pollution Prevention through Source Reduction and Waste Minimization Statement**

July 2015 – December 2015

Water Use Reduction Projects:

The Intel NM site eliminated the need to divert the Ultra-Pure Water (UPW) Reclaim skid from UPW Return to Reuse Water. This was done by rinsing the new UPW Filter Modules to quality on the UPW Filter Rinse Skid and not finishing the high flow rinse on the UPW online Skid. The amount of wastewater savings realized by not diverting UPW Filter Reclaim effluent from UPWR to URW is 15,966,720 gallons per 6 year Filter Replacement PM.

The site continues to look into routing additional ammonia wastewater streams to the Trimix Treatment System to further reduce ammonia effluent flows. This would also potentially help reduce fluoride flows as well.

NM Site Recycling Rate:

The Intel NM site had a chemical waste recycling rate of 99.3% for H2 2015, and an overall 2015 chemical recycling value of 99.5%.



## **Attachment(s):**

### Semi-Annual Reports:

Test America Laboratories, Inc. Analytical Report, Job ID: 280-76970-1 Semi Annual Waste Water.

Test America Laboratories, Inc. Analytical Report, Job ID: 280-77995-1 Semi Annual Waste Water.\*

\*Repeated samples to complete Gallium sampling of 4 consecutive day 24-hr composites per Endorsement INGA

### Monthly Authority Split Sampling Reports:

**Jul:** Test America Laboratories, Inc. Analytical Report, Job ID: 280-71758-1 Monthly WUA Split Sampling.

**Aug:** Test America Laboratories, Inc. Analytical Report, Job ID: 280-72900-1 Monthly WUA Split Sampling.

**Sept:** Test America Laboratories, Inc. Analytical Report, Job ID: 280-73886-1 Monthly WUA Split Sampling.

**Oct 1<sup>st</sup> day\*\*:** Test America Laboratories, Inc. Analytical Report, Job ID: 280-74909-1 Monthly WUA Split Sampling.

**Oct 2<sup>nd</sup> day\*\*:** Test America Laboratories, Inc. Analytical Report, Job ID: 280-74946-1 Monthly WUA Split Sampling.

**Nov:** Test America Laboratories, Inc. Analytical Report, Job ID: 280-76537-1 Monthly WUA Split Sampling.

**Dec:** Test America Laboratories, Inc. Analytical Report, Job ID: 280-77567-1 Monthly WUA Split Sampling.

\*\*2 sample reports for October following ABCWUA 2-day sampling event.

Intel NM grease trap pumping manifests (1 per month) – H2 2015

Toxic Organic Management Plan (TOMP) – 2016 Revision



# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.

TestAmerica Denver  
4955 Yarrow Street  
Arvada, CO 80002  
Tel: (303)736-0100

TestAmerica Job ID: 280-76970-1

Client Project/Site: Semi Annual Waste Water

For:

Intel Corporation  
4100 Sara Road  
Mail Stop RR5-491  
Rio Rancho, New Mexico 87124

Attn: Jeff Rudnik



Authorized for release by:  
12/4/2015 12:40:24 PM

DiLea Bindel, Project Manager I  
(303)736-0173  
[dilea.bindel@testamericainc.com](mailto:dilea.bindel@testamericainc.com)

### LINKS

Review your project  
results through  
**TotalAccess**

Have a Question?



Visit us at:  
[www.testamericainc.com](http://www.testamericainc.com)

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*

1

2

3

4

5

6

7

8

9

10

11

12

13



# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Case Narrative . . . . .	3
Definitions . . . . .	4
Detection Summary . . . . .	5
Method Summary . . . . .	6
Sample Summary . . . . .	7
Client Sample Results . . . . .	8
QC Sample Results . . . . .	9
QC Association . . . . .	11
Chronicle . . . . .	12
Receipt Checklists . . . . .	13
Chain of Custody . . . . .	15

# Case Narrative

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

**Job ID: 280-76970-1**

**Laboratory: TestAmerica Denver**

**Narrative**

**CASE NARRATIVE**  
**Client: Intel Corporation**  
**Project: Semi Annual Waste Water**  
**Report Number: 280-76970-1**

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

**RECEIPT**

The samples were received on 11/18/2015; the samples arrived in good condition, properly preserved and on ice. The temperature of the cooler at receipt was 1.3° C.

The sample presented in this report was analyzed for Gallium by method 6010B and Ethylene Glycol by method 8015C, per the updated project scope. It can be noted, the updated project scope includes method 8270C NMP, but the laboratory did not receive unpreserved volume. The client indicated, the volume for this analysis will be re-collected at a later date.

TestAmerica Denver subcontracted the requested 6010B Gallium analysis to TestAmerica Phoenix located at 4625 East Cotton Ctr Blvd, Suite 189, Phoenix, AZ 85040.

**GLYCOLS - METHOD 8015C**

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

**METALS (ICP) - METHOD 6010B**

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

# Definitions/Glossary

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
/	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Detection Summary

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

**Client Sample ID: SV-01- SV-11**

**Lab Sample ID: 280-76970-12**

No Detections.

1

2

3

4

5

6

7

8

9

10

11

12

13

This Detection Summary does not include radiochemical test results.

TestAmerica Denver

# Method Summary

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

Method	Method Description	Protocol	Laboratory
8015C	Glycols- Direct Injection (GC/FID)	SW846	TAL DEN
6010B	Metals (ICP)	SW846	TAL PHX

**Protocol References:**

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

TAL PHX = TestAmerica Phoenix, 4625 East Cotton Ctr Blvd, Suite 189, Phoenix, AZ 85040, TEL (602)437-3340





# Sample Summary

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

---

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
280-76970-12	SV-01- SV-11	Water	11/17/15 09:00	11/18/15 10:00

---

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13

# Client Sample Results

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

## Method: 8015C - Glycols- Direct Injection (GC/FID)

Client Sample ID: SV-01- SV-11

Date Collected: 11/17/15 09:00

Date Received: 11/18/15 10:00

Lab Sample ID: 280-76970-12

Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethylene glycol	ND		10		mg/L			11/27/15 15:40	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Butanediol	94		77 - 134					11/27/15 15:40	1

## Method: 6010B - Metals (ICP)

Client Sample ID: SV-01- SV-11

Date Collected: 11/17/15 09:00

Date Received: 11/18/15 10:00

Lab Sample ID: 280-76970-12

Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gallium	ND		0.10		mg/L		11/27/15 16:13	11/30/15 12:53	1

# QC Sample Results

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

## Method: 8015C - Glycols- Direct Injection (GC/FID)

**Lab Sample ID: MB 280-305737/18**  
**Matrix: Water**  
**Analysis Batch: 305737**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethylene glycol	ND		10		mg/L			11/27/15 11:53	1
Surrogate	%Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Butanediol	100		77 - 134					11/27/15 11:53	1

**Lab Sample ID: LCS 280-305737/21**  
**Matrix: Water**  
**Analysis Batch: 305737**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethylene glycol	50.0	48.1		mg/L		96	75 - 120
Surrogate	LCS %Recovery	LCS Qualifier	Limits				
1,4-Butanediol	104		77 - 134				

**Lab Sample ID: LCSD 280-305737/24**  
**Matrix: Water**  
**Analysis Batch: 305737**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethylene glycol	50.0	52.3		mg/L		105	75 - 120	8	20
Surrogate	LCSD %Recovery	LCSD Qualifier	Limits						
1,4-Butanediol	103		77 - 134						

**Lab Sample ID: 280-76970-12 MS**  
**Matrix: Water**  
**Analysis Batch: 305737**

**Client Sample ID: SV-01- SV-11**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethylene glycol	ND		50.0	54.7		mg/L		109	75 - 120
Surrogate	MS %Recovery	MS Qualifier	Limits						
1,4-Butanediol	97		77 - 134						

**Lab Sample ID: 280-76970-12 MSD**  
**Matrix: Water**  
**Analysis Batch: 305737**

**Client Sample ID: SV-01- SV-11**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethylene glycol	ND		50.0	57.4		mg/L		115	75 - 120	5	20
Surrogate	MSD %Recovery	MSD Qualifier	Limits								
1,4-Butanediol	100		77 - 134								

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
 Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

## Method: 6010B - Metals (ICP)

**Lab Sample ID: MB 550-78870/1-A**  
**Matrix: Water**  
**Analysis Batch: 78958**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 78870**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gallium	ND		0.10		mg/L		11/27/15 16:13	11/30/15 12:41	1

**Lab Sample ID: LCS 550-78870/2-A**  
**Matrix: Water**  
**Analysis Batch: 78958**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 78870**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gallium	1.00	1.02		mg/L		102	90 - 110

**Lab Sample ID: LCSD 550-78870/3-A**  
**Matrix: Water**  
**Analysis Batch: 78958**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**  
**Prep Batch: 78870**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gallium	1.00	1.02		mg/L		102	90 - 110	0	20

**Lab Sample ID: 280-76970-12 MS**  
**Matrix: Water**  
**Analysis Batch: 78958**

**Client Sample ID: SV-01- SV-11**  
**Prep Type: Total/NA**  
**Prep Batch: 78870**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Gallium	ND		1.00	1.07		mg/L		107	75 - 125

**Lab Sample ID: 280-76970-12 MSD**  
**Matrix: Water**  
**Analysis Batch: 78958**

**Client Sample ID: SV-01- SV-11**  
**Prep Type: Total/NA**  
**Prep Batch: 78870**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gallium	ND		1.00	1.02		mg/L		102	75 - 125	6	20

# QC Association Summary

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

## GC VOA

### Analysis Batch: 305737

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-76970-12	SV-01- SV-11	Total/NA	Water	8015C	
280-76970-12 MS	SV-01- SV-11	Total/NA	Water	8015C	
280-76970-12 MSD	SV-01- SV-11	Total/NA	Water	8015C	
LCS 280-305737/21	Lab Control Sample	Total/NA	Water	8015C	
LCSD 280-305737/24	Lab Control Sample Dup	Total/NA	Water	8015C	
MB 280-305737/18	Method Blank	Total/NA	Water	8015C	

## Metals

### Prep Batch: 78870

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-76970-12	SV-01- SV-11	Total/NA	Water	3005A	
280-76970-12 MS	SV-01- SV-11	Total/NA	Water	3005A	
280-76970-12 MSD	SV-01- SV-11	Total/NA	Water	3005A	
LCS 550-78870/2-A	Lab Control Sample	Total/NA	Water	3005A	
LCSD 550-78870/3-A	Lab Control Sample Dup	Total/NA	Water	3005A	
MB 550-78870/1-A	Method Blank	Total/NA	Water	3005A	

### Analysis Batch: 78958

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-76970-12	SV-01- SV-11	Total/NA	Water	6010B	78870
280-76970-12 MS	SV-01- SV-11	Total/NA	Water	6010B	78870
280-76970-12 MSD	SV-01- SV-11	Total/NA	Water	6010B	78870
LCS 550-78870/2-A	Lab Control Sample	Total/NA	Water	6010B	78870
LCSD 550-78870/3-A	Lab Control Sample Dup	Total/NA	Water	6010B	78870
MB 550-78870/1-A	Method Blank	Total/NA	Water	6010B	78870

# Lab Chronicle

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water

TestAmerica Job ID: 280-76970-1

**Client Sample ID: SV-01- SV-11**

**Lab Sample ID: 280-76970-12**

**Date Collected: 11/17/15 09:00**

**Matrix: Water**

**Date Received: 11/18/15 10:00**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015C		1	1 mL	1 mL	305737	11/27/15 15:40	AMP	TAL DEN
Total/NA	Prep	3005A			50 mL	50 mL	78870	11/27/15 16:13	AJC	TAL PHX
Total/NA	Analysis	6010B		1	50 mL	50 mL	78958	11/30/15 12:53	AJC	TAL PHX

## Laboratory References:

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

TAL PHX = TestAmerica Phoenix, 4625 East Cotton Ctr Blvd, Suite 189, Phoenix, AZ 85040, TEL (602)437-3340

# Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-76970-1

**Login Number: 76970**  
**List Number: 1**  
**Creator: White, Denise E**

**List Source: TestAmerica Denver**

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	False	Trip Blanks not designated for specific analyses; COC page 2/2 not relinquished
Is the Field Sampler's name present on COC?	False	blank
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



## Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-76970-1

**Login Number: 76970**  
**List Number: 2**  
**Creator: Gravlin, Andrea**

**List Source: TestAmerica Phoenix**  
**List Creation: 11/19/15 10:05 AM**

Question	Answer	Comment
Radioactivity wasn't checked or is <=/ background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	False	Received project as a subcontract.
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	Check done at department level as required.





# Chain of Custody Record

<b>Client Information</b> Intel Corporation 4100 Sara Road Mail Stop RR5-491 Rio Rancho State, Zip: NM, 87124 Phone: 505-353-6943 (Tel) Email: jeffrey.rudnik@intel.com Project Name: Semi Annual Waste Water Site:		Lab P#: Bindel, Dillea E-Mail: dillea.bindel@testamericainc.com		Carrier Tracking No(s): 280-23927-10503.1 Page: Page 1 of 1 Job #: 2072	
<b>Due Date Requested:</b> TAT Requested (days): PO #: WO #: Project #: 28003759 SSOW#:		<b>Analysis Requested</b>			
<b>Sample Identification</b> SV-11 SV-02 SV-03 SV-04 SV-05 SV-06 SV-07 SV-08 SV-09 SV-10 TRIP BLANK		Sample Date 11/17/15	Sample Time 0900	Sample Type C=Comp, G=grab C	Matrix (W=water, S=solid, O=soil, BT=Tissue, A=Air) W
Possible Hazard Identification <input type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological		Special Instructions/QC Requirements: <input type="checkbox"/> Return To Client <input type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)			
Empty Kit Relinquished by: Relinquished by: Relinquished by: Relinquished by:		Method of Shipment: Date/Time: 11/18/15 1000 Company: CAD Company			
Custody Seals Intact: <input type="checkbox"/> Yes <input type="checkbox"/> No Custom Seal No.:		Cooler Temperature(s) °C and Other Remarks:			



# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.

TestAmerica Denver

4955 Yarrow Street

Arvada, CO 80002

Tel: (303)736-0100

TestAmerica Job ID: 280-77995-1

Client Project/Site: Semi Annual Waste Water - NMP  
Resampling

For:

Intel Corporation

4100 Sara Road

Mail Stop RR5-491

Rio Rancho, New Mexico 87124

Attn: Jeff Rudnik



Authorized for release by:

12/29/2015 4:08:34 PM

DiLea Bindel, Project Manager I

(303)736-0173

[dilea.bindel@testamericainc.com](mailto:dilea.bindel@testamericainc.com)

### LINKS

Review your project  
results through

TotalAccess

Have a Question?



Visit us at:

[www.testamericainc.com](http://www.testamericainc.com)

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*

1

2

3

4

5

6

7

8

9

10

11

12

13





# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Case Narrative . . . . .	3
Definitions . . . . .	4
Detection Summary . . . . .	5
Method Summary . . . . .	6
Sample Summary . . . . .	7
Client Sample Results . . . . .	8
QC Sample Results . . . . .	9
QC Association . . . . .	11
Chronicle . . . . .	12
Receipt Checklists . . . . .	13
Chain of Custody . . . . .	15

# Case Narrative

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

**Job ID: 280-77995-1**

**Laboratory: TestAmerica Denver**

**Narrative**

**CASE NARRATIVE**  
**Client: Intel Corporation**  
**Project: Semi Annual Waste Water - NMP Resampling**  
**Report Number: 280-77995-1**

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

### **RECEIPT**

The samples were received on 12/12/2015; the samples arrived in good condition, properly preserved and on ice. The temperature of the cooler at receipt was 2.6° C.

The 8270C 1-Methyl-2-pyrrolidione (NMP) analysis was performed by TestAmerica Canton located at 4101 Shuffel Street NW, North Canton, OH 44720.

The 6010B Total Gallium analysis was performed by TestAmerica Phoenix located at 4625 East Cotton Center Boulevard, Suite 189, Phoenix, AZ 85040.

### **SEMIVOLATILE ORGANIC COMPOUNDS (GC-MS) - 8270C**

Sample NMP-01 (280-77995-5) was diluted to bring target compounds within the calibration range of the instrument. Associated results in the analytical report have been flagged with an "E", as these are estimated values. The sample was also analyzed undiluted or at a lesser dilution in order to achieve the lowest possible reporting limits for each analyte. Reporting limits have been adjusted relative to the dilution required.

Insufficient sample volume was available to perform a matrix spike/matrix spike duplicate (MS/MSD) associated with prep batch 240-211268. The acceptable LCS analyte recoveries provide evidence that the laboratory is performing the method within acceptable guidelines.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

### **METALS (ICP) - METHOD 6010B**

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

# Definitions/Glossary

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

## Qualifiers

### GC/MS Semi VOA

Qualifier	Qualifier Description
E	Result exceeded calibration range.

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
▫	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Detection Summary

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

**Client Sample ID: GA-01**

**Lab Sample ID: 280-77995-1**

No Detections.

**Client Sample ID: GA-02**

**Lab Sample ID: 280-77995-2**

No Detections.

**Client Sample ID: GA-03**

**Lab Sample ID: 280-77995-3**

No Detections.

**Client Sample ID: GA-04**

**Lab Sample ID: 280-77995-4**

No Detections.

**Client Sample ID: NMP-01**

**Lab Sample ID: 280-77995-5**

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1-Methyl-2-pyrrolidinone	240	E	48		ug/L	5		8270C	Total/NA
1-Methyl-2-pyrrolidinone - RA	270		96		ug/L	10		8270C	Total/NA

This Detection Summary does not include radiochemical test results.

TestAmerica Denver



# Method Summary

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

Method	Method Description	Protocol	Laboratory
8270C	Semivolatile Organic Compounds (GC/MS)	SW846	TAL CAN
6010B	Metals (ICP)	SW846	TAL PHX

**Protocol References:**

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

**Laboratory References:**

TAL CAN = TestAmerica Canton, 4101 Shuffel Street NW, North Canton, OH 44720, TEL (330)497-9396

TAL PHX = TestAmerica Phoenix, 4625 East Cotton Ctr Blvd, Suite 189, Phoenix, AZ 85040, TEL (602)437-3340



# Sample Summary

Client: Intel Corporation  
Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
280-77995-1	GA-01	Water	12/07/15 10:00	12/12/15 08:40
280-77995-2	GA-02	Water	12/08/15 10:00	12/12/15 08:40
280-77995-3	GA-03	Water	12/09/15 10:00	12/12/15 08:40
280-77995-4	GA-04	Water	12/10/15 10:00	12/12/15 08:40
280-77995-5	NMP-01	Water	12/10/15 10:00	12/12/15 08:40

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13

# Client Sample Results

Client: Intel Corporation  
 Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

## Method: 8270C - Semivolatile Organic Compounds (GC/MS)

**Client Sample ID: NMP-01**  
**Date Collected: 12/10/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-5**  
**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1-Methyl-2-pyrrolidinone	240	E	48		ug/L		12/17/15 09:00	12/21/15 19:22	5
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
2-Fluorobiphenyl (Surr)	61		29 - 110				12/17/15 09:00	12/21/15 19:22	5
2-Fluorophenol (Surr)	22		15 - 110				12/17/15 09:00	12/21/15 19:22	5
2,4,6-Tribromophenol (Surr)	57		21 - 128				12/17/15 09:00	12/21/15 19:22	5
Nitrobenzene-d5 (Surr)	57		31 - 110				12/17/15 09:00	12/21/15 19:22	5
Phenol-d5 (Surr)	15		10 - 110				12/17/15 09:00	12/21/15 19:22	5
Terphenyl-d14 (Surr)	47		31 - 115				12/17/15 09:00	12/21/15 19:22	5

## Method: 8270C - Semivolatile Organic Compounds (GC/MS) - RA

**Client Sample ID: NMP-01**  
**Date Collected: 12/10/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-5**  
**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1-Methyl-2-pyrrolidinone	270		96		ug/L		12/17/15 09:00	12/22/15 17:53	10
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
2-Fluorobiphenyl (Surr)	65		29 - 110				12/17/15 09:00	12/22/15 17:53	10
2-Fluorophenol (Surr)	27		15 - 110				12/17/15 09:00	12/22/15 17:53	10
2,4,6-Tribromophenol (Surr)	65		21 - 128				12/17/15 09:00	12/22/15 17:53	10
Nitrobenzene-d5 (Surr)	61		31 - 110				12/17/15 09:00	12/22/15 17:53	10
Phenol-d5 (Surr)	17		10 - 110				12/17/15 09:00	12/22/15 17:53	10
Terphenyl-d14 (Surr)	54		31 - 115				12/17/15 09:00	12/22/15 17:53	10

## Method: 6010B - Metals (ICP)

**Client Sample ID: GA-01**  
**Date Collected: 12/07/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-1**  
**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gallium	ND		0.10		mg/L		12/19/15 07:46	12/21/15 19:00	1

**Client Sample ID: GA-02**  
**Date Collected: 12/08/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-2**  
**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gallium	ND		0.10		mg/L		12/19/15 07:46	12/21/15 19:02	1

**Client Sample ID: GA-03**  
**Date Collected: 12/09/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-3**  
**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gallium	ND		0.10		mg/L		12/19/15 07:46	12/21/15 19:04	1

**Client Sample ID: GA-04**  
**Date Collected: 12/10/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-4**  
**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gallium	ND		0.10		mg/L		12/19/15 07:46	12/21/15 19:06	1

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
 Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

## Method: 8270C - Semivolatile Organic Compounds (GC/MS)

**Lab Sample ID: MB 240-211268/9-A**  
**Matrix: Water**  
**Analysis Batch: 211747**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 211268**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1-Methyl-2-pyrrolidinone	ND		10		ug/L		12/17/15 09:00	12/21/15 11:53	1
Surrogate	%Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
2-Fluorobiphenyl (Surr)	73		29 - 110				12/17/15 09:00	12/21/15 11:53	1
2-Fluorophenol (Surr)	70		15 - 110				12/17/15 09:00	12/21/15 11:53	1
2,4,6-Tribromophenol (Surr)	78		21 - 128				12/17/15 09:00	12/21/15 11:53	1
Nitrobenzene-d5 (Surr)	77		31 - 110				12/17/15 09:00	12/21/15 11:53	1
Phenol-d5 (Surr)	52		10 - 110				12/17/15 09:00	12/21/15 11:53	1
Terphenyl-d14 (Surr)	84		31 - 115				12/17/15 09:00	12/21/15 11:53	1

**Lab Sample ID: LCS 240-211268/10-A**  
**Matrix: Water**  
**Analysis Batch: 211747**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 211268**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	Limits
2-Chloronaphthalene	20.0	15.6		ug/L		78	47 - 120
2-Chlorophenol	20.0	17.1		ug/L		85	43 - 120
2,4-Dichlorophenol	20.0	16.9		ug/L		84	46 - 120
2,4-Dimethylphenol	20.0	16.2		ug/L		81	38 - 120
2,4-Dinitrophenol	40.0	27.6		ug/L		69	10 - 120
2,4-Dinitrotoluene	20.0	18.4		ug/L		92	52 - 120
2-Nitrophenol	20.0	18.5		ug/L		92	42 - 120
1,2,4-Trichlorobenzene	20.0	15.5		ug/L		78	49 - 110
2,4,6-Trichlorophenol	20.0	17.6		ug/L		88	43 - 120
2,6-Dinitrotoluene	20.0	16.7		ug/L		83	52 - 120
Surrogate	%Recovery	LCS Qualifier	Limits				
2-Fluorobiphenyl (Surr)	79		29 - 110				
2-Fluorophenol (Surr)	74		15 - 110				
2,4,6-Tribromophenol (Surr)	98		21 - 128				
Nitrobenzene-d5 (Surr)	108		31 - 110				
Phenol-d5 (Surr)	60		10 - 110				
Terphenyl-d14 (Surr)	88		31 - 115				

## Method: 6010B - Metals (ICP)

**Lab Sample ID: MB 550-80332/1-A**  
**Matrix: Water**  
**Analysis Batch: 80459**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 80332**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gallium	ND		0.10		mg/L		12/19/15 07:46	12/21/15 18:43	1

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
 Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

## Method: 6010B - Metals (ICP) (Continued)

**Lab Sample ID: LCS 550-80332/2-A**  
**Matrix: Water**  
**Analysis Batch: 80459**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 80332**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gallium	1.00	0.934		mg/L		93	90 - 110

**Lab Sample ID: LCSD 550-80332/3-A**  
**Matrix: Water**  
**Analysis Batch: 80459**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**  
**Prep Batch: 80332**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gallium	1.00	0.939		mg/L		94	90 - 110	1	20

**Lab Sample ID: 550-56032-A-1-A MS**  
**Matrix: Water**  
**Analysis Batch: 80459**

**Client Sample ID: Matrix Spike**  
**Prep Type: Total/NA**  
**Prep Batch: 80332**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Gallium	ND		1.00	0.922		mg/L		92	75 - 125

**Lab Sample ID: 550-56032-A-1-B MSD**  
**Matrix: Water**  
**Analysis Batch: 80459**

**Client Sample ID: Matrix Spike Duplicate**  
**Prep Type: Total/NA**  
**Prep Batch: 80332**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gallium	ND		1.00	0.912		mg/L		91	75 - 125	1	20

# QC Association Summary

Client: Intel Corporation  
 Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

## GC/MS Semi VOA

### Prep Batch: 211268

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-77995-5 - RA	NMP-01	Total/NA	Water	3510C	
280-77995-5	NMP-01	Total/NA	Water	3510C	
LCS 240-211268/10-A	Lab Control Sample	Total/NA	Water	3510C	
MB 240-211268/9-A	Method Blank	Total/NA	Water	3510C	

### Analysis Batch: 211747

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-77995-5	NMP-01	Total/NA	Water	8270C	211268
LCS 240-211268/10-A	Lab Control Sample	Total/NA	Water	8270C	211268
MB 240-211268/9-A	Method Blank	Total/NA	Water	8270C	211268

### Analysis Batch: 211901

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-77995-5 - RA	NMP-01	Total/NA	Water	8270C	211268

## Metals

### Prep Batch: 80332

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-77995-1	GA-01	Total/NA	Water	3005A	
280-77995-2	GA-02	Total/NA	Water	3005A	
280-77995-3	GA-03	Total/NA	Water	3005A	
280-77995-4	GA-04	Total/NA	Water	3005A	
550-56032-A-1-A MS	Matrix Spike	Total/NA	Water	3005A	
550-56032-A-1-B MSD	Matrix Spike Duplicate	Total/NA	Water	3005A	
LCS 550-80332/2-A	Lab Control Sample	Total/NA	Water	3005A	
LCSD 550-80332/3-A	Lab Control Sample Dup	Total/NA	Water	3005A	
MB 550-80332/1-A	Method Blank	Total/NA	Water	3005A	

### Analysis Batch: 80459

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-77995-1	GA-01	Total/NA	Water	6010B	80332
280-77995-2	GA-02	Total/NA	Water	6010B	80332
280-77995-3	GA-03	Total/NA	Water	6010B	80332
280-77995-4	GA-04	Total/NA	Water	6010B	80332
550-56032-A-1-A MS	Matrix Spike	Total/NA	Water	6010B	80332
550-56032-A-1-B MSD	Matrix Spike Duplicate	Total/NA	Water	6010B	80332
LCS 550-80332/2-A	Lab Control Sample	Total/NA	Water	6010B	80332
LCSD 550-80332/3-A	Lab Control Sample Dup	Total/NA	Water	6010B	80332
MB 550-80332/1-A	Method Blank	Total/NA	Water	6010B	80332

# Lab Chronicle

Client: Intel Corporation  
 Project/Site: Semi Annual Waste Water - NMP Resampling

TestAmerica Job ID: 280-77995-1

**Client Sample ID: GA-01**  
**Date Collected: 12/07/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-1**  
**Matrix: Water**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3005A			50 mL	50 mL	80332	12/19/15 07:46	SGO	TAL PHX
Total/NA	Analysis	6010B		1	50 mL	50 mL	80459	12/21/15 19:00	AJC	TAL PHX

**Client Sample ID: GA-02**  
**Date Collected: 12/08/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-2**  
**Matrix: Water**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3005A			50 mL	50 mL	80332	12/19/15 07:46	SGO	TAL PHX
Total/NA	Analysis	6010B		1	50 mL	50 mL	80459	12/21/15 19:02	AJC	TAL PHX

**Client Sample ID: GA-03**  
**Date Collected: 12/09/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-3**  
**Matrix: Water**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3005A			50 mL	50 mL	80332	12/19/15 07:46	SGO	TAL PHX
Total/NA	Analysis	6010B		1	50 mL	50 mL	80459	12/21/15 19:04	AJC	TAL PHX

**Client Sample ID: GA-04**  
**Date Collected: 12/10/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-4**  
**Matrix: Water**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3005A			50 mL	50 mL	80332	12/19/15 07:46	SGO	TAL PHX
Total/NA	Analysis	6010B		1	50 mL	50 mL	80459	12/21/15 19:06	AJC	TAL PHX

**Client Sample ID: NMP-01**  
**Date Collected: 12/10/15 10:00**  
**Date Received: 12/12/15 08:40**

**Lab Sample ID: 280-77995-5**  
**Matrix: Water**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3510C			1040 mL	2 mL	211268	12/17/15 09:00	JDR	TAL CAN
Total/NA	Analysis	8270C		5	1040 mL	2 mL	211747	12/21/15 19:22	JMG	TAL CAN
Total/NA	Prep	3510C	RA		1040 mL	2 mL	211268	12/17/15 09:00	JDR	TAL CAN
Total/NA	Analysis	8270C	RA	10	1040 mL	2 mL	211901	12/22/15 17:53	JMG	TAL CAN

**Laboratory References:**

TAL CAN = TestAmerica Canton, 4101 Shuffel Street NW, North Canton, OH 44720, TEL (330)497-9396

TAL PHX = TestAmerica Phoenix, 4625 East Cotton Ctr Blvd, Suite 189, Phoenix, AZ 85040, TEL (602)437-3340

# Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-77995-1

**Login Number: 77995**  
**List Number: 1**  
**Creator: Muniz, Ashley T**

**List Source: TestAmerica Denver**

Question	Answer	Comment
Radioactivity wasn't checked or is <math>\leq</math> background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	False	Field left blank
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



## Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-77995-1

**Login Number: 77995**  
**List Number: 3**  
**Creator: Gravlin, Andrea**

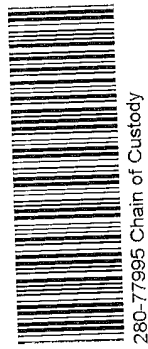
**List Source: TestAmerica Phoenix**  
**List Creation: 12/18/15 01:48 PM**

Question	Answer	Comment
Radioactivity wasn't checked or is <math>\leq</math> background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	False	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	Check done at department level as required.

Client Information  
 Client Contact: Jeff Rudnik  
 Company: Intel Corporation  
 Address: 4100 Sara Road Mail Stop RR5-491  
 City: Rio Rancho  
 State: NM, Zip: 87124  
 Phone: 505-353-6943 (Tel)  
 Email: jeffrey.rudnik@intel.com  
 Project #: 28003759  
 Site: Semi Annual Waste Water - NMP Resampling

Sampler: Bindel, DiLea  
 Lab PM: Bindel, DiLea  
 E-Mail: dilea.bindel@testamericainc.com  
 Camer Tracking No(s):  
 COC No: 280-23927-10503.1  
 Page: Page 1 of 1  
 Job #:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=wastebolt)	Analysis Requested		Special Instructions/Note: 8270C-NMP (Sub to Canton)	Total Number of Containers
					Field Filtered Sample (Yes or No)	Bottom MS/MSD (Yes or No)		
GA-01	12/7/15	10:00	C	W				
GA-02	12/9/15	10:00	C	W				
GA-03	12/9/15	10:00	C	W				
GA-04	12/10/15	10:00	C	W				
NMP-01 (Z ex.)	12/10/15	10:00	C	W				



Possible Hazard Identification  
 Non-Hazard  Flammable  Skin Irritant  Poison B  Unknown  Radiological  
 Deliverable Requested: I, II, III, IV, Other (specify)

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)  
 Return To Client  Disposal By Lab  Archive For \_\_\_\_\_ Months

Special Instructions/QC Requirements:

Empty Kit Relinquished by: K. URBAN  
 Relinquished by: [Signature]  
 Relinquished by: [Signature]  
 Relinquished by: [Signature]

Date: 12/10/15 / 12/10/15  
 Date/Time: 12:00:00  
 Date/Time: 12:00:00  
 Date/Time: 12:00:00

Company: [Signature]  
 Company: [Signature]  
 Company: [Signature]

Cooler Temperature(s) °C and Other Remarks: 210 RTH 08A 12DELS





TestAmerica Canton Sample Receipt Form/Narrative  
Canton Facility

Login #

Client Denver Site Name \_\_\_\_\_  
Cooler Received on 12-16-15 Opened on 12-16-15  
FedEx: 1<sup>st</sup> Grd  Exp UPS FAS Stetson Client Drop Off TestAmerica Courier Other \_\_\_\_\_

Cooler unpacked by: \_\_\_\_\_

Receipt After-hours: Drop-off Date/Time \_\_\_\_\_ Storage Location \_\_\_\_\_

TestAmerica Cooler # \_\_\_\_\_ Foam Box  Client Cooler Box Other \_\_\_\_\_  
Packing material used: ~~Bubble~~ Wrap Foam Plastic Bag None Other \_\_\_\_\_  
COOLANT: ~~Wet Ice~~ Blue Ice Dry Ice Water None

1. Cooler temperature upon receipt

IR GUN# 53 (CF +0.1 °C) Observed Cooler Temp. \_\_\_\_\_ °C Corrected Cooler Temp. \_\_\_\_\_ °C  
IR GUN# 48 (CF -0.3 °C) Observed Cooler Temp. 1.4 °C Corrected Cooler Temp. 1.1 °C  
~~IR GUN# 5 (CF +0.4 °C) Observed Cooler Temp. \_\_\_\_\_ °C Corrected Cooler Temp. \_\_\_\_\_ °C~~  
IR GUN# 8 (CF -0.5 °C) Observed Cooler Temp. \_\_\_\_\_ °C Corrected Cooler Temp. \_\_\_\_\_ °C

See Multiple Cooler Form

2. Were custody seals on the outside of the cooler(s)? If Yes Quantity 1 Yes No  
-Were custody seals on the outside of the cooler(s) signed & dated? Yes No NA  
-Were custody seals on the bottle(s) or bottle kits (LLHg/MeHg)? Yes  No  
3. Shippers' packing slip attached to the cooler(s)? Yes No  
4. Did custody papers accompany the sample(s)? Yes No  
5. Were the custody papers relinquished & signed in the appropriate place? Yes No  
6. Was/were the person(s) who collected the samples clearly identified on the COC? Yes  No  
7. Did all bottles arrive in good condition (Unbroken)? Yes No  
8. Could all bottle labels be reconciled with the COC? Yes No  
9. Were correct bottle(s) used for the test(s) indicated? Yes No  
10. Sufficient quantity received to perform indicated analyses? Yes No  
11. Were sample(s) at the correct pH upon receipt? Yes No  NA pH Strip Lot# HC559158  
12. Were VOAs on the COC? Yes  No  
13. Were air bubbles >6 mm in any VOA vials? Yes No  NA  
14. Was a VOA trip blank present in the cooler(s)? Trip Blank Lot # \_\_\_\_\_ Yes  No  
15. Was a LL Hg or Me Hg trip blank present? Yes  No

Contacted PM \_\_\_\_\_ Date \_\_\_\_\_ by \_\_\_\_\_ via Verbal Voice Mail Other  
Concerning \_\_\_\_\_

14. CHAIN OF CUSTODY & SAMPLE DISCREPANCIES

Samples processed by: \_\_\_\_\_

15. SAMPLE CONDITION

Sample(s) \_\_\_\_\_ were received after the recommended holding time had expired.  
Sample(s) \_\_\_\_\_ were received in a broken container.  
Sample(s) \_\_\_\_\_ were received with bubble >6 mm in diameter. (Notify PM)

16. SAMPLE PRESERVATION

Sample(s) \_\_\_\_\_ were further preserved in the laboratory.  
Time preserved: \_\_\_\_\_ Preservative(s) added/Lot number(s): \_\_\_\_\_

**TestAmerica Denver**

4955 Yarrow Street  
 Avada, CO 80002  
 Phone (303) 736-0100 Fax (303) 431-7171

**Chain of Custody Record**



**TestAmerica**  
 THE LEADER IN ENVIRONMENTAL TESTING

**Client Information (Sub Contract Lab)**

Company: TestAmerica Laboratories, Inc  
 Address: 4625 East Cotton Ctr Blvd, Suite 189,  
 Phoenix AZ, 85040  
 Phone: 602-437-3340(Tel) 602-454-9303(Fax)  
 Email:

Sampler: Lab P/N:  
 Bindel, Dilaa R  
 E-Mail: dilaa.bindel@testamericainc.com

Carrier Tracking No(S):  
 Job #: 280-77995-1

COC No: 280-333999-1  
 Page: Page 1 of 1

**Analysis Requested**

Due Date Requested: 12/24/2015

TAT Requested (days): Standard TAT

Project Name: Semi Annual Waste Water - NMP Resampling

Project #: 28003759

Field Filtered Sample (Yes or No)

Perform MS/MSD (Yes or No)

6010B/3005A\_TOT Gallium (TA PHX)

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=Water, S=Soil, O=Other, A=Air)	Preservation Code: (B=Ice, A=AsH)	Total Number of containers	Special Instructions/Note:
GA-01 (280-77995-1)	12/7/15	10:00	C	Water		1	
GA-02 (280-77995-2)	12/8/15	10:00	C	Water		1	
GA-03 (280-77995-3)	12/9/15	10:00	C	Water		1	
GA-04 (280-77995-4)	12/10/15	10:00	C	Water		1	

Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	Analysis Requested
<input type="checkbox"/>	<input type="checkbox"/>	

- Preservation Codes:
- A - HCL
  - B - NaOH
  - C - Zn Acetate
  - D - Nitric Acid
  - E - NaHSO4
  - F - MeOH
  - G - Amchlor
  - H - Ascorbic Acid
  - I - Ice
  - J - DI Water
  - K - EDTA
  - L - EDA
  - M - Hexane
  - N - None
  - O - ASN#02
  - P - Na2OAS
  - Q - Na2SO3
  - R - Na2S2O3
  - S - H2SO4
  - T - TSP Dodecylhydrate
  - U - Acetone
  - V - MCAA
  - W - pn 4-5
  - Z - other (specify)

Empty Kit Relinquished by: \_\_\_\_\_ Date: \_\_\_\_\_

Relinquished by: *[Signature]* Date/Time: 12/15/15 2:50 PM Company: TAD

Relinquished by: \_\_\_\_\_ Date/Time: \_\_\_\_\_ Company: \_\_\_\_\_

Relinquished by: \_\_\_\_\_ Date/Time: \_\_\_\_\_ Company: \_\_\_\_\_

Custody Seals Intact:  Yes  No Custody Seal No.: \_\_\_\_\_

Cooler Temperature(s) °C and Other Remarks: 0.9gc

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)  
 Return To Client  Disposal By Lab  Archive For \_\_\_\_\_ Months

Special Instructions/QC Requirements:



# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.

TestAmerica Denver

4955 Yarrow Street

Arvada, CO 80002

Tel: (303)736-0100

TestAmerica Job ID: 280-71758-1

Client Project/Site: Monthly WUA Split Sampling

For:

Intel Corporation

4100 Sara Road

Mail Stop RR5-465

Rio Rancho, New Mexico 87124

Attn: Jeff Rudnik



Authorized for release by:

7/23/2015 9:22:34 AM

Stephanie Kupper, Project Manager I

(303)736-0182

[stephanie.kupper@testamericainc.com](mailto:stephanie.kupper@testamericainc.com)

### LINKS

Review your project  
results through

Total Access

Have a Question?



Visit us at:

[www.testamericainc.com](http://www.testamericainc.com)

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*

1

2

3

4

5

6

7

8

9

10

11

12

13

14



# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Definitions . . . . .	3
Case Narrative . . . . .	4
Detection Summary . . . . .	5
Method Summary . . . . .	6
Sample Summary . . . . .	7
Client Sample Results . . . . .	8
QC Sample Results . . . . .	10
QC Association . . . . .	13
Chronicle . . . . .	15
Certification Summary . . . . .	17
Chain of Custody . . . . .	18
Receipt Checklists . . . . .	19

# Definitions/Glossary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## Qualifiers

### General Chemistry

Qualifier	Qualifier Description
*	LCS or LCSD is outside acceptance limits.

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
▫	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)



# Case Narrative

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

**Job ID: 280-71758-1**

**Laboratory: TestAmerica Denver**

## Narrative

**CASE NARRATIVE**  
**Client: Intel Corporation**  
**Project: Monthly WUA Split Sampling**  
**Report Number: 280-71758-1**

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

### **RECEIPT**

The samples were received on 7/11/2015 at 8:50 AM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 1.5° C.

The client was contacted on 7/13/2015 and instructed the laboratory to log each sample as individual samples, no compositing required by lab.

### **GENERAL CHEMISTRY**

The laboratory control sample (LCS) for batch 280-286290 recovered outside control limits for Cyanide. This analyte was biased high in the LCS and was not detected in the associated samples; therefore, the data have been reported.

Samples OUTFALL COMPOSITE-3 (280-71758-3)[10X] and OUTFALL COMPOSITE-6 (280-71758-6)[10X] required dilution prior to analysis for Ammonia. The reporting limits have been adjusted accordingly.

Samples OUTFALL COMPOSITE-3 (280-71758-3)[5X] and OUTFALL COMPOSITE-6 (280-71758-6)[10X] required dilution prior to analysis for TKN. The reporting limits have been adjusted accordingly.

Samples OUTFALL COMPOSITE-2 (280-71758-2)[5X] and OUTFALL COMPOSITE-5 (280-71758-5)[2X] required dilution prior to analysis for COD. The reporting limits have been adjusted accordingly.

The following sample was diluted for TSS due to slow filtration: OUTFALL COMPOSITE-4 (280-71758-4). Elevated reporting limits (RLs) are provided.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

# Detection Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## Client Sample ID: OUTFALL COMPOSITE-1

Lab Sample ID: 280-71758-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Total Suspended Solids	20		4.0		mg/L	1		SM 2540D	Total/NA

## Client Sample ID: OUTFALL COMPOSITE-2

Lab Sample ID: 280-71758-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chemical Oxygen Demand	150		100		mg/L	5		410.4	Total/NA

## Client Sample ID: OUTFALL COMPOSITE-3

Lab Sample ID: 280-71758-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ammonia as N	35		1.0		mg/L	10		350.1	Total/NA
Nitrogen, Kjeldahl	24		5.0		mg/L	5		351.2	Total/NA

## Client Sample ID: OUTFALL COMPOSITE-4

Lab Sample ID: 280-71758-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Total Suspended Solids	79		6.7		mg/L	1		SM 2540D	Total/NA

## Client Sample ID: OUTFALL COMPOSITE-5

Lab Sample ID: 280-71758-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chemical Oxygen Demand	150		40		mg/L	2		410.4	Total/NA

## Client Sample ID: OUTFALL COMPOSITE-6

Lab Sample ID: 280-71758-6

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ammonia as N	39		1.0		mg/L	10		350.1	Total/NA
Nitrogen, Kjeldahl	34		10		mg/L	10		351.2	Total/NA

## Client Sample ID: OUTFALL GRAB-1

Lab Sample ID: 280-71758-7

No Detections.

## Client Sample ID: OUTFALL GRAB-2

Lab Sample ID: 280-71758-8

No Detections.

## Client Sample ID: OUTFALL GRAB-3

Lab Sample ID: 280-71758-9

No Detections.

## Client Sample ID: OUTFALL GRAB-4

Lab Sample ID: 280-71758-10

No Detections.

This Detection Summary does not include radiochemical test results.

TestAmerica Denver

# Method Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

Method	Method Description	Protocol	Laboratory
350.1	Nitrogen, Ammonia	MCAWW	TAL DEN
351.2	Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)	MCAWW	TAL DEN
410.4	COD	MCAWW	TAL DEN
SM 2540D	Solids, Total Suspended (TSS)	SM	TAL DEN
SM 4500 CN E	Cyanide, Total	SM	TAL DEN

**Protocol References:**

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

SM = "Standard Methods For The Examination Of Water And Wastewater",

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100



# Sample Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
280-71758-1	OUTFALL COMPOSITE-1	Water	07/09/15 09:00	07/11/15 08:50
280-71758-2	OUTFALL COMPOSITE-2	Water	07/09/15 09:00	07/11/15 08:50
280-71758-3	OUTFALL COMPOSITE-3	Water	07/09/15 09:00	07/11/15 08:50
280-71758-4	OUTFALL COMPOSITE-4	Water	07/10/15 09:20	07/11/15 08:50
280-71758-5	OUTFALL COMPOSITE-5	Water	07/10/15 09:20	07/11/15 08:50
280-71758-6	OUTFALL COMPOSITE-6	Water	07/10/15 09:20	07/11/15 08:50
280-71758-7	OUTFALL GRAB-1	Water	07/08/15 10:00	07/11/15 08:50
280-71758-8	OUTFALL GRAB-2	Water	07/08/15 14:00	07/11/15 08:50
280-71758-9	OUTFALL GRAB-3	Water	07/08/15 18:00	07/11/15 08:50
280-71758-10	OUTFALL GRAB-4	Water	07/08/15 22:00	07/11/15 08:50



# Client Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## General Chemistry

**Client Sample ID: OUTFALL COMPOSITE-1**

**Date Collected: 07/09/15 09:00**

**Date Received: 07/11/15 08:50**

**Lab Sample ID: 280-71758-1**

**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Suspended Solids	20		4.0		mg/L			07/16/15 16:45	1

**Client Sample ID: OUTFALL COMPOSITE-2**

**Date Collected: 07/09/15 09:00**

**Date Received: 07/11/15 08:50**

**Lab Sample ID: 280-71758-2**

**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chemical Oxygen Demand	150		100		mg/L			07/14/15 11:14	5

**Client Sample ID: OUTFALL COMPOSITE-3**

**Date Collected: 07/09/15 09:00**

**Date Received: 07/11/15 08:50**

**Lab Sample ID: 280-71758-3**

**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	35		1.0		mg/L			07/15/15 19:57	10
Nitrogen, Kjeldahl	24		5.0		mg/L		07/18/15 17:54	07/22/15 21:04	5

**Client Sample ID: OUTFALL COMPOSITE-4**

**Date Collected: 07/10/15 09:20**

**Date Received: 07/11/15 08:50**

**Lab Sample ID: 280-71758-4**

**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Suspended Solids	79		6.7		mg/L			07/16/15 16:45	1

**Client Sample ID: OUTFALL COMPOSITE-5**

**Date Collected: 07/10/15 09:20**

**Date Received: 07/11/15 08:50**

**Lab Sample ID: 280-71758-5**

**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chemical Oxygen Demand	150		40		mg/L			07/14/15 11:14	2

**Client Sample ID: OUTFALL COMPOSITE-6**

**Date Collected: 07/10/15 09:20**

**Date Received: 07/11/15 08:50**

**Lab Sample ID: 280-71758-6**

**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	39		1.0		mg/L			07/15/15 20:29	10
Nitrogen, Kjeldahl	34		10		mg/L		07/18/15 17:54	07/22/15 21:06	10

**Client Sample ID: OUTFALL GRAB-1**

**Date Collected: 07/08/15 10:00**

**Date Received: 07/11/15 08:50**

**Lab Sample ID: 280-71758-7**

**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND	*	0.010		mg/L		07/15/15 09:41	07/15/15 17:15	1

**Client Sample ID: OUTFALL GRAB-2**

**Date Collected: 07/08/15 14:00**

**Date Received: 07/11/15 08:50**

**Lab Sample ID: 280-71758-8**

**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND	*	0.010		mg/L		07/15/15 09:41	07/15/15 17:16	1

**Client Sample ID: OUTFALL GRAB-3**

**Date Collected: 07/08/15 18:00**

**Date Received: 07/11/15 08:50**

**Lab Sample ID: 280-71758-9**

**Matrix: Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND	*	0.010		mg/L		07/15/15 09:41	07/15/15 17:18	1

TestAmerica Denver

# Client Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## General Chemistry

Client Sample ID: **OUTFALL GRAB-4**

Date Collected: **07/08/15 22:00**

Date Received: **07/11/15 08:50**

Lab Sample ID: **280-71758-10**

Matrix: **Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND	*	0.010		mg/L		07/15/15 09:41	07/15/15 17:19	1

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# QC Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## Method: 350.1 - Nitrogen, Ammonia

**Lab Sample ID: MB 280-286298/109**  
**Matrix: Water**  
**Analysis Batch: 286298**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	ND		0.10		mg/L			07/15/15 18:25	1

**Lab Sample ID: LCS 280-286298/107**  
**Matrix: Water**  
**Analysis Batch: 286298**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	2.50	2.31		mg/L		92	90 - 110

**Lab Sample ID: LCSD 280-286298/108**  
**Matrix: Water**  
**Analysis Batch: 286298**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia as N	2.50	2.52		mg/L		101	90 - 110	9	10

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)

**Lab Sample ID: MB 280-286700/3-A**  
**Matrix: Water**  
**Analysis Batch: 286731**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 286700**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrogen, Kjeldahl	ND		1.0		mg/L		07/18/15 17:54	07/19/15 17:06	1

**Lab Sample ID: LCS 280-286700/1-A**  
**Matrix: Water**  
**Analysis Batch: 286731**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 286700**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrogen, Kjeldahl	6.00	6.26		mg/L		104	90 - 110

**Lab Sample ID: LCSD 280-286700/2-A**  
**Matrix: Water**  
**Analysis Batch: 286731**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**  
**Prep Batch: 286700**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Nitrogen, Kjeldahl	6.00	6.35		mg/L		106	90 - 110	1	25

## Method: 410.4 - COD

**Lab Sample ID: MB 280-286010/5**  
**Matrix: Water**  
**Analysis Batch: 286010**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chemical Oxygen Demand	ND		20		mg/L			07/14/15 11:14	1

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## Method: 410.4 - COD (Continued)

**Lab Sample ID: LCS 280-286010/3**  
**Matrix: Water**  
**Analysis Batch: 286010**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chemical Oxygen Demand	100	103		mg/L		103	90 - 110

**Lab Sample ID: LCSD 280-286010/4**  
**Matrix: Water**  
**Analysis Batch: 286010**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chemical Oxygen Demand	100	95.8		mg/L		96	90 - 110	8	11

**Lab Sample ID: 280-71758-5 MS**  
**Matrix: Water**  
**Analysis Batch: 286010**

**Client Sample ID: OUTFALL COMPOSITE-5**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chemical Oxygen Demand	150		100	245		mg/L		99	90 - 110

**Lab Sample ID: 280-71758-5 MSD**  
**Matrix: Water**  
**Analysis Batch: 286010**

**Client Sample ID: OUTFALL COMPOSITE-5**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chemical Oxygen Demand	150		100	247		mg/L		101	90 - 110	1	11

## Method: SM 2540D - Solids, Total Suspended (TSS)

**Lab Sample ID: MB 280-286428/2**  
**Matrix: Water**  
**Analysis Batch: 286428**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Suspended Solids	ND		4.0		mg/L			07/16/15 16:45	1

**Lab Sample ID: LCS 280-286428/1**  
**Matrix: Water**  
**Analysis Batch: 286428**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Suspended Solids	100	90.0		mg/L		90	86 - 114

## Method: SM 4500 CN E - Cyanide, Total

**Lab Sample ID: MB 280-286195/4-A**  
**Matrix: Water**  
**Analysis Batch: 286290**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 286195**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.010		mg/L		07/15/15 09:41	07/15/15 16:58	1

TestAmerica Denver



# QC Sample Results

Client: Intel Corporation  
 Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## Method: SM 4500 CN E - Cyanide, Total (Continued)

**Lab Sample ID: HLCS 280-286195/1-A**  
**Matrix: Water**  
**Analysis Batch: 286290**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 286195**

Analyte	Spike Added	HLCS Result	HLCS Qualifier	Unit	D	%Rec	Limits
Cyanide, Total	0.400	0.382		mg/L		96	90 - 110

**Lab Sample ID: LCS 280-286195/3-A**  
**Matrix: Water**  
**Analysis Batch: 286290**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 286195**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	Limits
Cyanide, Total	0.0870	0.0962	*	mg/L		111	90 - 110

**Lab Sample ID: LLCS 280-286195/2-A**  
**Matrix: Water**  
**Analysis Batch: 286290**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 286195**

Analyte	Spike Added	LLCS Result	LLCS Qualifier	Unit	D	%Rec	Limits
Cyanide, Total	0.100	0.101		mg/L		101	44 - 167

# QC Association Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## General Chemistry

### Analysis Batch: 286010

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-71758-2	OUTFALL COMPOSITE-2	Total/NA	Water	410.4	
280-71758-5	OUTFALL COMPOSITE-5	Total/NA	Water	410.4	
280-71758-5 MS	OUTFALL COMPOSITE-5	Total/NA	Water	410.4	
280-71758-5 MSD	OUTFALL COMPOSITE-5	Total/NA	Water	410.4	
LCS 280-286010/3	Lab Control Sample	Total/NA	Water	410.4	
LCS 280-286010/4	Lab Control Sample Dup	Total/NA	Water	410.4	
MB 280-286010/5	Method Blank	Total/NA	Water	410.4	

### Prep Batch: 286195

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-71758-7	OUTFALL GRAB-1	Total/NA	Water	SM 4500 CN C	
280-71758-8	OUTFALL GRAB-2	Total/NA	Water	SM 4500 CN C	
280-71758-9	OUTFALL GRAB-3	Total/NA	Water	SM 4500 CN C	
280-71758-10	OUTFALL GRAB-4	Total/NA	Water	SM 4500 CN C	
HLCS 280-286195/1-A	Lab Control Sample	Total/NA	Water	SM 4500 CN C	
LCS 280-286195/3-A	Lab Control Sample	Total/NA	Water	SM 4500 CN C	
LLCS 280-286195/2-A	Lab Control Sample	Total/NA	Water	SM 4500 CN C	
MB 280-286195/4-A	Method Blank	Total/NA	Water	SM 4500 CN C	

### Analysis Batch: 286290

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-71758-7	OUTFALL GRAB-1	Total/NA	Water	SM 4500 CN E	286195
280-71758-8	OUTFALL GRAB-2	Total/NA	Water	SM 4500 CN E	286195
280-71758-9	OUTFALL GRAB-3	Total/NA	Water	SM 4500 CN E	286195
280-71758-10	OUTFALL GRAB-4	Total/NA	Water	SM 4500 CN E	286195
HLCS 280-286195/1-A	Lab Control Sample	Total/NA	Water	SM 4500 CN E	286195
LCS 280-286195/3-A	Lab Control Sample	Total/NA	Water	SM 4500 CN E	286195
LLCS 280-286195/2-A	Lab Control Sample	Total/NA	Water	SM 4500 CN E	286195
MB 280-286195/4-A	Method Blank	Total/NA	Water	SM 4500 CN E	286195

### Analysis Batch: 286298

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-71758-3	OUTFALL COMPOSITE-3	Total/NA	Water	350.1	
280-71758-6	OUTFALL COMPOSITE-6	Total/NA	Water	350.1	
LCS 280-286298/107	Lab Control Sample	Total/NA	Water	350.1	
LCS 280-286298/108	Lab Control Sample Dup	Total/NA	Water	350.1	
MB 280-286298/109	Method Blank	Total/NA	Water	350.1	

### Analysis Batch: 286428

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-71758-1	OUTFALL COMPOSITE-1	Total/NA	Water	SM 2540D	
280-71758-4	OUTFALL COMPOSITE-4	Total/NA	Water	SM 2540D	
LCS 280-286428/1	Lab Control Sample	Total/NA	Water	SM 2540D	
MB 280-286428/2	Method Blank	Total/NA	Water	SM 2540D	

### Prep Batch: 286700

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-71758-3	OUTFALL COMPOSITE-3	Total/NA	Water	351.2	
280-71758-6	OUTFALL COMPOSITE-6	Total/NA	Water	351.2	
LCS 280-286700/1-A	Lab Control Sample	Total/NA	Water	351.2	
LCS 280-286700/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	

TestAmerica Denver

# QC Association Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## General Chemistry (Continued)

### Prep Batch: 286700 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 280-286700/3-A	Method Blank	Total/NA	Water	351.2	

### Analysis Batch: 286731

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCS 280-286700/1-A	Lab Control Sample	Total/NA	Water	351.2	286700
LCSD 280-286700/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	286700
MB 280-286700/3-A	Method Blank	Total/NA	Water	351.2	286700

### Analysis Batch: 287336

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-71758-3	OUTFALL COMPOSITE-3	Total/NA	Water	351.2	286700
280-71758-6	OUTFALL COMPOSITE-6	Total/NA	Water	351.2	286700

# Lab Chronicle

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## Client Sample ID: OUTFALL COMPOSITE-1

Date Collected: 07/09/15 09:00

Date Received: 07/11/15 08:50

## Lab Sample ID: 280-71758-1

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	SM 2540D		1	250 mL	250 mL	286428	07/16/15 16:45	MW1	TAL DEN

## Client Sample ID: OUTFALL COMPOSITE-2

Date Collected: 07/09/15 09:00

Date Received: 07/11/15 08:50

## Lab Sample ID: 280-71758-2

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	410.4		5	2 mL	2 mL	286010	07/14/15 11:14	CCJ	TAL DEN

## Client Sample ID: OUTFALL COMPOSITE-3

Date Collected: 07/09/15 09:00

Date Received: 07/11/15 08:50

## Lab Sample ID: 280-71758-3

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	350.1		10			286298	07/15/15 19:57	CML	TAL DEN
Total/NA	Prep	351.2			25 mL	25 mL	286700	07/18/15 17:54	MW1	TAL DEN
Total/NA	Analysis	351.2		5	25 mL	25 mL	287336	07/22/15 21:04	MW1	TAL DEN

## Client Sample ID: OUTFALL COMPOSITE-4

Date Collected: 07/10/15 09:20

Date Received: 07/11/15 08:50

## Lab Sample ID: 280-71758-4

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	SM 2540D		1	150 mL	250 mL	286428	07/16/15 16:45	MW1	TAL DEN

## Client Sample ID: OUTFALL COMPOSITE-5

Date Collected: 07/10/15 09:20

Date Received: 07/11/15 08:50

## Lab Sample ID: 280-71758-5

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	410.4		2	2 mL	2 mL	286010	07/14/15 11:14	CCJ	TAL DEN

## Client Sample ID: OUTFALL COMPOSITE-6

Date Collected: 07/10/15 09:20

Date Received: 07/11/15 08:50

## Lab Sample ID: 280-71758-6

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	350.1		10			286298	07/15/15 20:29	CML	TAL DEN
Total/NA	Prep	351.2			25 mL	25 mL	286700	07/18/15 17:54	MW1	TAL DEN
Total/NA	Analysis	351.2		10	25 mL	25 mL	287336	07/22/15 21:06	MW1	TAL DEN

TestAmerica Denver

# Lab Chronicle

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## Client Sample ID: OUTFALL GRAB-1

Lab Sample ID: 280-71758-7

Date Collected: 07/08/15 10:00

Matrix: Water

Date Received: 07/11/15 08:50

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	SM 4500 CN C			50 mL	50 mL	286195	07/15/15 09:41	RSN	TAL DEN
Total/NA	Analysis	SM 4500 CN E		1	50 mL	50 mL	286290	07/15/15 17:15	RSN	TAL DEN

## Client Sample ID: OUTFALL GRAB-2

Lab Sample ID: 280-71758-8

Date Collected: 07/08/15 14:00

Matrix: Water

Date Received: 07/11/15 08:50

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	SM 4500 CN C			50 mL	50 mL	286195	07/15/15 09:41	RSN	TAL DEN
Total/NA	Analysis	SM 4500 CN E		1	50 mL	50 mL	286290	07/15/15 17:16	RSN	TAL DEN

## Client Sample ID: OUTFALL GRAB-3

Lab Sample ID: 280-71758-9

Date Collected: 07/08/15 18:00

Matrix: Water

Date Received: 07/11/15 08:50

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	SM 4500 CN C			50 mL	50 mL	286195	07/15/15 09:41	RSN	TAL DEN
Total/NA	Analysis	SM 4500 CN E		1	50 mL	50 mL	286290	07/15/15 17:18	RSN	TAL DEN

## Client Sample ID: OUTFALL GRAB-4

Lab Sample ID: 280-71758-10

Date Collected: 07/08/15 22:00

Matrix: Water

Date Received: 07/11/15 08:50

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	SM 4500 CN C			50 mL	50 mL	286195	07/15/15 09:41	RSN	TAL DEN
Total/NA	Analysis	SM 4500 CN E		1	50 mL	50 mL	286290	07/15/15 17:19	RSN	TAL DEN

### Laboratory References:

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

# Certification Summary

Client: Intel Corporation  
 Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-71758-1

## Laboratory: TestAmerica Denver

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		2907.01	10-31-15
A2LA	ISO/IEC 17025		2907.01	10-31-15
Alabama	State Program	4	40730	09-30-12 *
Alaska (UST)	State Program	10	UST-30	04-05-16
Arizona	State Program	9	AZ0713	12-19-15
Arkansas DEQ	State Program	6	88-0687	06-01-16
California	State Program	9	2513	08-31-16
Connecticut	State Program	1	PH-0686	09-30-16
Florida	NELAP	4	E87667	06-30-15 *
Georgia	State Program	4	N/A	01-09-15 *
Illinois	NELAP	5	200017	04-30-16
Iowa	State Program	7	370	11-30-16
Kansas	NELAP	7	E-10166	09-30-15
Louisiana	NELAP	6	02096	06-30-16
Maine	State Program	1	CO0002	03-03-17
Minnesota	NELAP	5	8-999-405	12-31-15
Nevada	State Program	9	CO0026	07-31-15
New Hampshire	NELAP	1	205310	04-28-16
New Jersey	NELAP	2	CO004	09-30-15
New York	NELAP	2	11964	04-01-16
North Carolina (WW/SW)	State Program	4	358	12-31-15
North Dakota	State Program	8	R-034	01-09-16
Oklahoma	State Program	6	8614	08-31-15
Oregon	NELAP	10	4025	01-09-16
Pennsylvania	NELAP	3	68-00664	07-30-15
South Carolina	State Program	4	72002001	06-30-15 *
Texas	NELAP	6	T104704183-13-8	09-30-15
USDA	Federal		P330-13-00202	07-02-16
Utah	NELAP	8	CO00026	07-31-15
Virginia	NELAP	3	460232	06-14-16
Washington	State Program	10	C583	08-03-15
West Virginia DEP	State Program	3	354	11-30-15
Wisconsin	State Program	5	999615430	08-31-15
Wyoming (UST)	A2LA	8	2907.01	10-31-15

\* Certification renewal pending - certification considered valid.



## Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-71758-1

**Login Number: 71758**

**List Source: TestAmerica Denver**

**List Number: 1**

**Creator: Muniz, Ashley T**

Question	Answer	Comment
Radioactivity wasn't checked or is <math>\leq</math> background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	False	Limited volume received.
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.

TestAmerica Denver

4955 Yarrow Street

Arvada, CO 80002

Tel: (303)736-0100

TestAmerica Job ID: 280-72900-1

Client Project/Site: Monthly WUA Split Sampling

Revision: 1

For:

Intel Corporation

4100 Sara Road

Mail Stop RR5-465

Rio Rancho, New Mexico 87124

Attn: Jeff Rudnik



Authorized for release by:

8/20/2015 4:38:12 PM

DiLea Bindel, Project Manager I

(303)736-0173

[dilea.bindel@testamericainc.com](mailto:dilea.bindel@testamericainc.com)

### LINKS

Review your project  
results through  
**TotalAccess**

Have a Question?



Visit us at:  
[www.testamericainc.com](http://www.testamericainc.com)

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*

1

2

3

4

5

6

7

8

9

10

11

12

13

14



# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Definitions . . . . .	3
Case Narrative . . . . .	4
Detection Summary . . . . .	5
Method Summary . . . . .	6
Sample Summary . . . . .	7
Client Sample Results . . . . .	8
QC Sample Results . . . . .	9
QC Association . . . . .	11
Chronicle . . . . .	12
Certification Summary . . . . .	13
Chain of Custody . . . . .	14
Receipt Checklists . . . . .	15

# Definitions/Glossary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

## Qualifiers

### General Chemistry

Qualifier	Qualifier Description
F1	MS and/or MSD Recovery is outside acceptance limits.

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
▫	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Case Narrative

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

**Job ID: 280-72900-1**

**Laboratory: TestAmerica Denver**

**Narrative**

**CASE NARRATIVE**  
**Client: Intel Corporation**  
**Project: Monthly WUA Split Sampling**  
**Report Number: 280-72900-1**

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

### **RECEIPT**

The samples were received on 08/10/2015; the samples arrived in good condition, properly preserved and on ice. The temperature of the cooler at receipt was 12.7° C.

The samples were received at the laboratory outside the required temperature criteria. The client was contacted regarding this issue, and the laboratory was instructed to proceed with analysis. The cooler contained water which indicated evidence of melted ice.

### **GENERAL CHEMISTRY**

Due to high constituent concentrations, sample SITE OUTFALL SPLIT SAMPLE (280-72900-1)[20X] required dilution prior to analysis for Ammonia. The reporting limits have been adjusted accordingly.

Due to high constituent concentrations, sample SITE OUTFALL SPLIT SAMPLE (280-72900-1)[10X] required dilution prior to analysis for TKN. The reporting limits have been adjusted accordingly.

The matrix spike / matrix spike duplicate (MS/MSD) samples associated with analysis batch 280-290625 were performed on SITE OUTFALL SPLIT SAMPLE (280-72900-1) and exhibited recoveries outside control limits for Ammonia. Method precision and accuracy have been verified by the acceptable LCS/LCSD analysis data; therefore, corrective action is deemed unnecessary.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

# Detection Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**

**Lab Sample ID: 280-72900-1**

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ammonia as N	38	F1	2.0		mg/L	20		350.1	Total/NA
Nitrogen, Kjeldahl	49		10		mg/L	10		351.2	Total/NA

This Detection Summary does not include radiochemical test results.

TestAmerica Denver

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# Method Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

Method	Method Description	Protocol	Laboratory
350.1	Nitrogen, Ammonia	MCAWW	TAL DEN
351.2	Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)	MCAWW	TAL DEN

**Protocol References:**

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100



# Sample Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

---

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
280-72900-1	SITE OUTFALL SPLIT SAMPLE	Water	08/07/15 09:30	08/10/15 08:35

---

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# Client Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

## General Chemistry

Client Sample ID: SITE OUTFALL SPLIT SAMPLE

Date Collected: 08/07/15 09:30

Date Received: 08/10/15 08:35

Lab Sample ID: 280-72900-1

Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	38	F1	2.0		mg/L			08/13/15 18:19	20
Nitrogen, Kjeldahl	49		10		mg/L		08/14/15 16:26	08/16/15 14:08	10

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14



# QC Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

## Method: 350.1 - Nitrogen, Ammonia

**Lab Sample ID: MB 280-290625/109**  
**Matrix: Water**  
**Analysis Batch: 290625**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	ND		0.10		mg/L			08/13/15 17:12	1

**Lab Sample ID: LCS 280-290625/107**  
**Matrix: Water**  
**Analysis Batch: 290625**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	2.50	2.49		mg/L		100	90 - 110

**Lab Sample ID: LCSD 280-290625/108**  
**Matrix: Water**  
**Analysis Batch: 290625**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia as N	2.50	2.52		mg/L		101	90 - 110	1	10

**Lab Sample ID: 280-72900-1 MS**  
**Matrix: Water**  
**Analysis Batch: 290625**

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	38	F1	20.0	60.5	F1	mg/L		111	90 - 110

**Lab Sample ID: 280-72900-1 MSD**  
**Matrix: Water**  
**Analysis Batch: 290625**

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia as N	38	F1	20.0	60.7	F1	mg/L		112	90 - 110	0	10

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)

**Lab Sample ID: MB 280-290766/3-A**  
**Matrix: Water**  
**Analysis Batch: 290913**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 290766**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrogen, Kjeldahl	ND		1.0		mg/L		08/14/15 16:26	08/16/15 13:18	1

**Lab Sample ID: LCS 280-290766/1-A**  
**Matrix: Water**  
**Analysis Batch: 290913**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 290766**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrogen, Kjeldahl	6.00	5.90		mg/L		98	90 - 110

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
 Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll) (Continued)

Lab Sample ID: LCSD 280-290766/2-A  
 Matrix: Water  
 Analysis Batch: 290913

Client Sample ID: Lab Control Sample Dup  
 Prep Type: Total/NA  
 Prep Batch: 290766

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Nitrogen, Kjeldahl	6.00	5.94		mg/L		99	90 - 110	1	25

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# QC Association Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

## General Chemistry

### Analysis Batch: 290625

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-72900-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	350.1	
280-72900-1 MS	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	350.1	
280-72900-1 MSD	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	350.1	
LCS 280-290625/107	Lab Control Sample	Total/NA	Water	350.1	
LCSD 280-290625/108	Lab Control Sample Dup	Total/NA	Water	350.1	
MB 280-290625/109	Method Blank	Total/NA	Water	350.1	

### Prep Batch: 290766

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-72900-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	
LCS 280-290766/1-A	Lab Control Sample	Total/NA	Water	351.2	
LCSD 280-290766/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	
MB 280-290766/3-A	Method Blank	Total/NA	Water	351.2	

### Analysis Batch: 290913

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-72900-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	290766
LCS 280-290766/1-A	Lab Control Sample	Total/NA	Water	351.2	290766
LCSD 280-290766/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	290766
MB 280-290766/3-A	Method Blank	Total/NA	Water	351.2	290766

# Lab Chronicle

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**

**Lab Sample ID: 280-72900-1**

**Date Collected: 08/07/15 09:30**

**Matrix: Water**

**Date Received: 08/10/15 08:35**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	350.1		20			290625	08/13/15 18:19	CML	TAL DEN
Total/NA	Prep	351.2			25 mL	25 mL	290766	08/14/15 16:26	MW1	TAL DEN
Total/NA	Analysis	351.2		10	25 mL	25 mL	290913	08/16/15 14:08	MW1	TAL DEN

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# Certification Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-72900-1

## Laboratory: TestAmerica Denver

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		2907.01	10-31-15
A2LA	ISO/IEC 17025		2907.01	10-31-15
Alabama	State Program	4	40730	09-30-12 *
Alaska (UST)	State Program	10	UST-30	04-05-16
Arizona	State Program	9	AZ0713	12-19-15
Arkansas DEQ	State Program	6	88-0687	06-01-16
California	State Program	9	2513	08-31-16
Connecticut	State Program	1	PH-0686	09-30-16
Florida	NELAP	4	E87667	06-30-15 *
Georgia	State Program	4	N/A	01-09-15 *
Illinois	NELAP	5	200017	04-30-16
Iowa	State Program	7	370	11-30-16
Kansas	NELAP	7	E-10166	09-30-15
Louisiana	NELAP	6	02096	06-30-16
Maine	State Program	1	CO0002	03-03-17
Minnesota	NELAP	5	8-999-405	12-31-15
Nevada	State Program	9	CO0026	07-31-16
New Hampshire	NELAP	1	205310	04-28-16
New Jersey	NELAP	2	CO004	09-30-15
New York	NELAP	2	11964	04-01-16
North Carolina (WW/SW)	State Program	4	358	12-31-15
North Dakota	State Program	8	R-034	01-09-16
Oklahoma	State Program	6	8614	08-31-15
Oregon	NELAP	10	4025	01-09-16
Pennsylvania	NELAP	3	68-00664	08-30-15
South Carolina	State Program	4	72002001	06-30-15 *
Texas	NELAP	6	T104704183-13-8	09-30-15
USDA	Federal		P330-13-00202	07-02-16
Utah	NELAP	8	CO00026	07-31-16
Virginia	NELAP	3	460232	06-14-16
Washington	State Program	10	C583	08-03-15 *
West Virginia DEP	State Program	3	354	11-30-15
Wisconsin	State Program	5	999615430	08-31-15
Wyoming (UST)	A2LA	8	2907.01	10-31-15

\* Certification renewal pending - certification considered valid.

TestAmerica Denver



## Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-72900-1

**Login Number: 72900**

**List Number: 1**

**Creator: White, Denise E**

**List Source: TestAmerica Denver**

Question	Answer	Comment
Radioactivity wasn't checked or is <math>\leq</math> background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	False	Water present in cooler; indicates evidence of melted ice.
Cooler Temperature is acceptable.	False	Cooler temperature outside required temperature criteria.
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.

TestAmerica Denver  
4955 Yarrow Street  
Arvada, CO 80002  
Tel: (303)736-0100

TestAmerica Job ID: 280-73886-1

Client Project/Site: Monthly WUA Split Sampling

For:

Intel Corporation  
4100 Sara Road  
Mail Stop RR5-465  
Rio Rancho, New Mexico 87124

Attn: Jeff Rudnik



Authorized for release by:

9/18/2015 5:00:43 PM

Jamie Ide, Project Manager I

(303)736-0126

[jamie.ide@testamericainc.com](mailto:jamie.ide@testamericainc.com)

Designee for

DiLea Bindel, Project Manager I

(303)736-0173

[dilea.bindel@testamericainc.com](mailto:dilea.bindel@testamericainc.com)

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*



### LINKS

Review your project  
results through

TotalAccess

Have a Question?



Visit us at:

[www.testamericainc.com](http://www.testamericainc.com)

1

2

3

4

5

6

7

8

9

10

11

12

13

14





# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Definitions . . . . .	3
Case Narrative . . . . .	4
Detection Summary . . . . .	5
Method Summary . . . . .	6
Sample Summary . . . . .	7
Client Sample Results . . . . .	8
QC Sample Results . . . . .	9
QC Association . . . . .	11
Chronicle . . . . .	12
Certification Summary . . . . .	13
Chain of Custody . . . . .	14
Receipt Checklists . . . . .	15

# Definitions/Glossary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

## Qualifiers

### General Chemistry

Qualifier	Qualifier Description
4	MS, MSD: The analyte present in the original sample is greater than 4 times the matrix spike concentration; therefore, control limits are not applicable.

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
α	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Case Narrative

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

**Job ID: 280-73886-1**

**Laboratory: TestAmerica Denver**

## Narrative

**CASE NARRATIVE**  
**Client: Intel Corporation**  
**Project: Monthly WUA Split Sampling**  
**Report Number: 280-73886-1**

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

### **RECEIPT**

The sample was received on 9/4/2015 9:30 AM; the sample arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 2.9° C.

### **AMMONIA**

Sample SITE OUTFALL SPLIT SAMPLE (280-73886-1)[10X] required dilution prior to analysis. The reporting limits have been adjusted accordingly.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

### **TOTAL KJELDAHL NITROGEN**

The MS/MSD performed on sample SITE OUTFALL SPLIT SAMPLE (280-73886-1) exhibited spike recoveries outside QC control limits for Kjeldahl Nitrogen. The associated LCS/LCSD was in control and demonstrates that operating procedures were in control. No further action was required.

Sample SITE OUTFALL SPLIT SAMPLE (280-73886-1)[10X] required dilution prior to analysis. The reporting limits have been adjusted accordingly.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

# Detection Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**

**Lab Sample ID: 280-73886-1**

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ammonia as N	38		1.0		mg/L	10		350.1	Total/NA
Nitrogen, Kjeldahl	32		10		mg/L	10		351.2	Total/NA

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

This Detection Summary does not include radiochemical test results.

TestAmerica Denver

# Method Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

Method	Method Description	Protocol	Laboratory
350.1	Nitrogen, Ammonia	MCAWW	TAL DEN
351.2	Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)	MCAWW	TAL DEN

**Protocol References:**

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100



# Sample Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

---

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
280-73886-1	SITE OUTFALL SPLIT SAMPLE	Water	09/03/15 09:00	09/04/15 09:30

---

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# Client Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

## General Chemistry

Client Sample ID: SITE OUTFALL SPLIT SAMPLE

Date Collected: 09/03/15 09:00

Date Received: 09/04/15 09:30

Lab Sample ID: 280-73886-1

Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	38		1.0		mg/L			09/09/15 18:40	10
Nitrogen, Kjeldahl	32		10		mg/L		09/12/15 16:15	09/13/15 14:32	10

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# QC Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

## Method: 350.1 - Nitrogen, Ammonia

Lab Sample ID: MB 280-294388/148  
Matrix: Water  
Analysis Batch: 294388

Client Sample ID: Method Blank  
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	ND		0.10		mg/L			09/09/15 17:39	1

Lab Sample ID: LCS 280-294388/146  
Matrix: Water  
Analysis Batch: 294388

Client Sample ID: Lab Control Sample  
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	2.50	2.47		mg/L		99	90 - 110

Lab Sample ID: LCSD 280-294388/147  
Matrix: Water  
Analysis Batch: 294388

Client Sample ID: Lab Control Sample Dup  
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia as N	2.50	2.67		mg/L		107	90 - 110	7	10

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)

Lab Sample ID: MB 280-294646/3-A  
Matrix: Water  
Analysis Batch: 294666

Client Sample ID: Method Blank  
Prep Type: Total/NA  
Prep Batch: 294646

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrogen, Kjeldahl	ND		1.0		mg/L		09/12/15 16:15	09/13/15 13:46	1

Lab Sample ID: LCS 280-294646/1-A  
Matrix: Water  
Analysis Batch: 294666

Client Sample ID: Lab Control Sample  
Prep Type: Total/NA  
Prep Batch: 294646

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrogen, Kjeldahl	6.00	6.17		mg/L		103	90 - 110

Lab Sample ID: LCSD 280-294646/2-A  
Matrix: Water  
Analysis Batch: 294666

Client Sample ID: Lab Control Sample Dup  
Prep Type: Total/NA  
Prep Batch: 294646

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Nitrogen, Kjeldahl	6.00	6.12		mg/L		102	90 - 110	1	25

Lab Sample ID: 280-73886-1 MS  
Matrix: Water  
Analysis Batch: 294666

Client Sample ID: SITE OUTFALL SPLIT SAMPLE  
Prep Type: Total/NA  
Prep Batch: 294646

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrogen, Kjeldahl	32		3.00	37.3	4	mg/L		166	90 - 110

TestAmerica Denver



# QC Sample Results

Client: Intel Corporation  
 Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll) (Continued)

Lab Sample ID: 280-73886-1 MSD

Client Sample ID: SITE OUTFALL SPLIT SAMPLE

Matrix: Water

Prep Type: Total/NA

Analysis Batch: 294666

Prep Batch: 294646

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Nitrogen, Kjeldahl	32		3.00	37.6	4	mg/L		174	90 - 110	1	25

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# QC Association Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

## General Chemistry

### Analysis Batch: 294388

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-73886-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	350.1	
LCS 280-294388/146	Lab Control Sample	Total/NA	Water	350.1	
LCSD 280-294388/147	Lab Control Sample Dup	Total/NA	Water	350.1	
MB 280-294388/148	Method Blank	Total/NA	Water	350.1	

### Prep Batch: 294646

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-73886-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	
280-73886-1 MS	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	
280-73886-1 MSD	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	
LCS 280-294646/1-A	Lab Control Sample	Total/NA	Water	351.2	
LCSD 280-294646/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	
MB 280-294646/3-A	Method Blank	Total/NA	Water	351.2	

### Analysis Batch: 294666

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-73886-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	294646
280-73886-1 MS	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	294646
280-73886-1 MSD	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	294646
LCS 280-294646/1-A	Lab Control Sample	Total/NA	Water	351.2	294646
LCSD 280-294646/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	294646
MB 280-294646/3-A	Method Blank	Total/NA	Water	351.2	294646

# Lab Chronicle

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**

**Lab Sample ID: 280-73886-1**

**Date Collected: 09/03/15 09:00**

**Matrix: Water**

**Date Received: 09/04/15 09:30**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	350.1		10			294388	09/09/15 18:40	CML	TAL DEN
Total/NA	Prep	351.2			25 mL	25 mL	294646	09/12/15 16:15	MW1	TAL DEN
Total/NA	Analysis	351.2		10	25 mL	25 mL	294666	09/13/15 14:32	MW1	TAL DEN

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

# Certification Summary

Client: Intel Corporation  
 Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-73886-1

## Laboratory: TestAmerica Denver

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		2907.01	10-31-15
A2LA	ISO/IEC 17025		2907.01	10-31-15
Alabama	State Program	4	40730	09-30-12 *
Alaska (UST)	State Program	10	UST-30	04-05-16
Arizona	State Program	9	AZ0713	12-19-15
Arkansas DEQ	State Program	6	88-0687	06-01-16
California	State Program	9	2513	08-31-16
Connecticut	State Program	1	PH-0686	09-30-16
Florida	NELAP	4	E87667	06-30-16
Georgia	State Program	4	N/A	01-09-15 *
Illinois	NELAP	5	200017	04-30-16
Iowa	State Program	7	370	11-30-16
Kansas	NELAP	7	E-10166	04-30-16
Louisiana	NELAP	6	02096	06-30-16
Maine	State Program	1	CO0002	03-03-17
Minnesota	NELAP	5	8-999-405	12-31-15
Nevada	State Program	9	CO0026	07-31-16
New Hampshire	NELAP	1	205310	04-28-16
New Jersey	NELAP	2	CO004	09-30-15
New York	NELAP	2	11964	04-01-16
North Carolina (WW/SW)	State Program	4	358	12-31-15
North Dakota	State Program	8	R-034	01-09-16
Oklahoma	State Program	6	8614	08-31-16
Oregon	NELAP	10	4025	01-09-16
Pennsylvania	NELAP	3	68-00664	07-31-16
South Carolina	State Program	4	72002001	06-30-15 *
Texas	NELAP	6	T104704183-15-11	09-30-16
USDA	Federal		P330-13-00202	07-02-16
Utah	NELAP	8	CO00026	07-31-16
Virginia	NELAP	3	460232	06-14-16
Washington	State Program	10	C583	08-03-16
West Virginia DEP	State Program	3	354	11-30-15
Wisconsin	State Program	5	999615430	08-31-16
Wyoming (UST)	A2LA	8	2907.01	10-31-15

\* Certification renewal pending - certification considered valid.

Chain of Custody Record



280-73886 Chain of Custody

<b>Client Information</b> Client Contact: Jeff Rudnik Company: Intel Corporation Address: 4100 Sara Road Mail Stop RR5-465 City: Rio Rancho State, Zip: NIM, 87124 Phone: 505-893-1613(Tel) Email: jeffrey.rudnik@intel.com Project Name: Monthly WJUA Split Sampling Site:		Sampler: <b>AFQUJVA</b> Lab P.M.: Kupper, Stephanie K Phone: <b>505-893-1613</b> E-Mail: stephanie.kupper@testamericainc.com Carrier Tracking No(s): Due Date Requested: TAT Requested (days): PO #: Pay by Credit Card WO #: Project #: 28013471 SSOW#:		Analysis Requested Total Number of Containers:		Preservation Codes: A - HCL B - NaOH C - Zn Acetate D - Nitric Acid E - NaHSO4 F - MeOH G - Amchlor H - Ascorbic Acid I - Ice J - DI Water K - EDTA L - EDA Other: M - Hexane N - None O - AsNaO2 P - Na2OAS Q - Na2SO3 R - Na2S2SO3 S - H2SO4 T - TSP Dodecahydrate U - Acetone V - MCAA W - ph 4-5 Z - other (specify)	
<b>Sample Identification</b> Site Outfall Split Sample		Sample Date: 9/13/15 Sample Time: 0900 Sample Type (C=comp, G=grab): C W Matrix (W=water, S=solid, O=wastefoil, B=BIssue, A=Air):		Field Filtered Sample (Yes or No): Form MS/MSD (Yes or No): Special Instructions/Note:		Preservation Codes: M - Hexane N - None O - AsNaO2 P - Na2OAS Q - Na2SO3 R - Na2S2SO3 S - H2SO4 T - TSP Dodecahydrate U - Acetone V - MCAA W - ph 4-5 Z - other (specify)	
<b>Possible Hazard Identification</b> <input type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological		Deliverable Requested: I, II, III, IV, Other (specify)		Sample Disposal (A fee may be assessed if samples are retained longer than 1 month) <input type="checkbox"/> Return To Client <input type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months		Special Instructions/QC Requirements:	
Empty Kit Relinquished by:		Date/Time: 9/13/15		Method of Shipment:		Received by: [Signature]	
Relinquished by: [Signature]		Date/Time:		Received by: [Signature]		Date/Time: 0730 04SEP15	
Relinquished by:		Date/Time:		Received by:		Date/Time:	
Relinquished by:		Date/Time:		Received by:		Date/Time:	
Custody Seals Intact: <input type="checkbox"/> Yes <input type="checkbox"/> No		Custody Seal No.:		Cooler Temperature(s) °C and Other Remarks: 7.8 18.201 [Signature] Sep 15		Company: Intel Company	



## Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-73886-1

**Login Number: 73886**  
**List Number: 1**  
**Creator: Muniz, Ashley T**

**List Source: TestAmerica Denver**

Question	Answer	Comment
Radioactivity wasn't checked or is <math>\leq</math> background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	Samples checked, no residual chlorine detected.



# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.  
TestAmerica Denver  
4955 Yarrow Street  
Arvada, CO 80002  
Tel: (303)736-0100

TestAmerica Job ID: 280-74909-1  
Client Project/Site: Outfall Split Sampling

For:  
Intel Corporation  
4100 Sara Road  
Mail Stop RR5-491  
Rio Rancho, New Mexico 87124

Attn: Jeff Rudnik



Authorized for release by:  
10/21/2015 9:33:08 AM

DiLea Bindel, Project Manager I  
(303)736-0173  
[dilea.bindel@testamericainc.com](mailto:dilea.bindel@testamericainc.com)

### LINKS

Review your project  
results through  
**TotalAccess**

Have a Question?



Visit us at:  
[www.testamericainc.com](http://www.testamericainc.com)

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14



# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Definitions . . . . .	3
Case Narrative . . . . .	4
Detection Summary . . . . .	5
Method Summary . . . . .	6
Sample Summary . . . . .	7
Client Sample Results . . . . .	8
QC Sample Results . . . . .	10
QC Association . . . . .	13
Chronicle . . . . .	15
Certification Summary . . . . .	17
Chain of Custody . . . . .	18
Receipt Checklists . . . . .	19



# Definitions/Glossary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
α	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Case Narrative

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

**Job ID: 280-74909-1**

**Laboratory: TestAmerica Denver**

**Narrative**

## **CASE NARRATIVE** **Client: Intel Corporation** **Project: Outfall Split Sampling** **Report Number: 280-74909-1**

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

### **RECEIPT**

The samples were received on 10/02/2015; the samples arrived in good condition, properly preserved and on ice. The temperature of the cooler at receipt was 3.4° C.

### **TOTAL METALS (ICP) - METHOD 200.7**

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

### **TOTAL METALS - METHOD 200.8**

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

### **GENERAL CHEMISTRY**

Due to elevated concentrations, sample SITE OUTFALL SPLIT SAMPLE-6 (280-74909-6) required dilution prior to analysis for Ammonia. The reporting limits have been adjusted accordingly.

Due to elevated concentrations, sample SITE OUTFALL SPLIT SAMPLE-6 (280-74909-6) required dilution prior to analysis for TKN. The reporting limits have been adjusted accordingly.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

# Detection Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-1

Lab Sample ID: 280-74909-1

No Detections.

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-2

Lab Sample ID: 280-74909-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Aluminum	130		100		ug/L	1		200.7 Rev 4.4	Total/NA
Boron	130		100		ug/L	1		200.7 Rev 4.4	Total/NA
Arsenic	6.6		5.0		ug/L	1		200.8	Total/NA
Copper	86		2.0		ug/L	1		200.8	Total/NA
Molybdenum	7.0		2.0		ug/L	1		200.8	Total/NA
Zinc	13		10		ug/L	1		200.8	Total/NA

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-3

Lab Sample ID: 280-74909-3

No Detections.

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-4

Lab Sample ID: 280-74909-4

No Detections.

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-5

Lab Sample ID: 280-74909-5

No Detections.

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-6

Lab Sample ID: 280-74909-6

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ammonia as N	30		1.0		mg/L	10		350.1	Total/NA
Nitrogen, Kjeldahl	48		10		mg/L	10		351.2	Total/NA

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-7

Lab Sample ID: 280-74909-7

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Total Suspended Solids	9.6		4.0		mg/L	1		SM 2540D	Total/NA

This Detection Summary does not include radiochemical test results.

TestAmerica Denver

# Method Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

Method	Method Description	Protocol	Laboratory
200.7 Rev 4.4	Metals (ICP)	EPA	TAL DEN
200.8	Metals (ICP/MS)	EPA	TAL DEN
350.1	Nitrogen, Ammonia	MCAWW	TAL DEN
351.2	Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)	MCAWW	TAL DEN
SM 2540D	Solids, Total Suspended (TSS)	SM	TAL DEN
SM 4500 CN E	Cyanide, Total	SM	TAL DEN

#### Protocol References:

EPA = US Environmental Protection Agency

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

SM = "Standard Methods For The Examination Of Water And Wastewater",

#### Laboratory References:

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100



# Sample Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
280-74909-1	SITE OUTFALL SPLIT SAMPLE-1	Water	10/01/15 00:30	10/02/15 09:35
280-74909-2	SITE OUTFALL SPLIT SAMPLE-2	Water	10/01/15 10:00	10/02/15 09:35
280-74909-3	SITE OUTFALL SPLIT SAMPLE-3	Water	10/01/15 04:30	10/02/15 09:35
280-74909-4	SITE OUTFALL SPLIT SAMPLE-4	Water	10/01/15 06:30	10/02/15 09:35
280-74909-5	SITE OUTFALL SPLIT SAMPLE-5	Water	10/01/15 08:30	10/02/15 09:35
280-74909-6	SITE OUTFALL SPLIT SAMPLE-6	Water	10/01/15 10:00	10/02/15 09:35
280-74909-7	SITE OUTFALL SPLIT SAMPLE-7	Water	10/01/15 10:00	10/02/15 09:35

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# Client Sample Results

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## Method: 200.7 Rev 4.4 - Metals (ICP)

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE-2**

**Lab Sample ID: 280-74909-2**

**Date Collected: 10/01/15 10:00**

**Matrix: Water**

**Date Received: 10/02/15 09:35**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aluminum	130		100		ug/L		10/07/15 14:30	10/13/15 04:06	1
Boron	130		100		ug/L		10/07/15 14:30	10/13/15 04:06	1

## Method: 200.8 - Metals (ICP/MS)

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE-2**

**Lab Sample ID: 280-74909-2**

**Date Collected: 10/01/15 10:00**

**Matrix: Water**

**Date Received: 10/02/15 09:35**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	6.6		5.0		ug/L		10/07/15 14:30	10/08/15 06:14	1
Cadmium	ND		1.0		ug/L		10/07/15 14:30	10/08/15 06:14	1
Chromium	ND		3.0		ug/L		10/07/15 14:30	10/08/15 06:14	1
Copper	86		2.0		ug/L		10/07/15 14:30	10/08/15 06:14	1
Lead	ND		1.0		ug/L		10/07/15 14:30	10/08/15 06:14	1
Molybdenum	7.0		2.0		ug/L		10/07/15 14:30	10/08/15 06:14	1
Nickel	ND		2.0		ug/L		10/07/15 14:30	10/08/15 06:14	1
Selenium	ND		5.0		ug/L		10/07/15 14:30	10/08/15 06:14	1
Silver	ND		1.0		ug/L		10/07/15 14:30	10/08/15 06:14	1
Zinc	13		10		ug/L		10/07/15 14:30	10/08/15 06:14	1

## General Chemistry

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE-1**

**Lab Sample ID: 280-74909-1**

**Date Collected: 10/01/15 00:30**

**Matrix: Water**

**Date Received: 10/02/15 09:35**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.010		mg/L		10/10/15 08:39	10/10/15 13:47	1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE-3**

**Lab Sample ID: 280-74909-3**

**Date Collected: 10/01/15 04:30**

**Matrix: Water**

**Date Received: 10/02/15 09:35**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.010		mg/L		10/10/15 08:39	10/10/15 13:48	1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE-4**

**Lab Sample ID: 280-74909-4**

**Date Collected: 10/01/15 06:30**

**Matrix: Water**

**Date Received: 10/02/15 09:35**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.010		mg/L		10/10/15 08:39	10/10/15 13:50	1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE-5**

**Lab Sample ID: 280-74909-5**

**Date Collected: 10/01/15 08:30**

**Matrix: Water**

**Date Received: 10/02/15 09:35**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.010		mg/L		10/10/15 08:39	10/10/15 13:59	1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE-6**

**Lab Sample ID: 280-74909-6**

**Date Collected: 10/01/15 10:00**

**Matrix: Water**

**Date Received: 10/02/15 09:35**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	30		1.0		mg/L			10/06/15 18:00	10

TestAmerica Denver

# Client Sample Results

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## General Chemistry (Continued)

Client Sample ID: SITE OUTFALL SPLIT SAMPLE-6

Lab Sample ID: 280-74909-6

Date Collected: 10/01/15 10:00

Matrix: Water

Date Received: 10/02/15 09:35

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrogen, Kjeldahl	48		10		mg/L		10/17/15 15:44	10/18/15 17:49	10

Client Sample ID: SITE OUTFALL SPLIT SAMPLE-7

Lab Sample ID: 280-74909-7

Date Collected: 10/01/15 10:00

Matrix: Water

Date Received: 10/02/15 09:35

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Suspended Solids	9.6		4.0		mg/L			10/06/15 12:25	1

# QC Sample Results

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## Method: 200.7 Rev 4.4 - Metals (ICP)

**Lab Sample ID: MB 280-298211/1-A**  
**Matrix: Water**  
**Analysis Batch: 299038**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 298211**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aluminum	ND		100		ug/L		10/07/15 14:30	10/13/15 03:28	1
Boron	ND		100		ug/L		10/07/15 14:30	10/13/15 03:28	1

**Lab Sample ID: LCS 280-298211/2-A**  
**Matrix: Water**  
**Analysis Batch: 299038**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 298211**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Aluminum	2000	1890		ug/L		95	87 - 111
Boron	1000	989		ug/L		99	86 - 110

## Method: 200.8 - Metals (ICP/MS)

**Lab Sample ID: MB 280-298214/1-A**  
**Matrix: Water**  
**Analysis Batch: 298370**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 298214**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	ND		5.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Cadmium	ND		1.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Chromium	ND		3.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Copper	ND		2.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Lead	ND		1.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Molybdenum	ND		2.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Nickel	ND		2.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Selenium	ND		5.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Silver	ND		1.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Zinc	ND		10		ug/L		10/07/15 14:30	10/08/15 05:41	1

**Lab Sample ID: LCS 280-298214/2-A**  
**Matrix: Water**  
**Analysis Batch: 298370**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 298214**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Arsenic	40.0	38.2		ug/L		95	89 - 111
Cadmium	40.0	36.6		ug/L		91	89 - 111
Chromium	40.0	38.4		ug/L		96	86 - 115
Copper	40.0	38.7		ug/L		97	90 - 115
Lead	40.0	39.0		ug/L		98	88 - 115
Molybdenum	40.0	38.1		ug/L		95	89 - 112
Nickel	40.0	40.3		ug/L		101	86 - 115
Selenium	40.0	36.8		ug/L		92	85 - 114
Silver	40.0	38.1		ug/L		95	90 - 114
Zinc	40.0	40.8		ug/L		102	88 - 115

TestAmerica Denver



# QC Sample Results

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## Method: 350.1 - Nitrogen, Ammonia

**Lab Sample ID: MB 280-298146/20**  
**Matrix: Water**  
**Analysis Batch: 298146**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	ND		0.10		mg/L			10/06/15 16:46	1

**Lab Sample ID: LCS 280-298146/18**  
**Matrix: Water**  
**Analysis Batch: 298146**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	2.50	2.52		mg/L		101	90 - 110

**Lab Sample ID: LCSD 280-298146/19**  
**Matrix: Water**  
**Analysis Batch: 298146**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia as N	2.50	2.40		mg/L		96	90 - 110	5	10

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)

**Lab Sample ID: MB 280-299843/3-A**  
**Matrix: Water**  
**Analysis Batch: 299875**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 299843**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrogen, Kjeldahl	ND		1.0		mg/L		10/17/15 15:44	10/18/15 17:29	1

**Lab Sample ID: LCS 280-299843/1-A**  
**Matrix: Water**  
**Analysis Batch: 299875**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 299843**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrogen, Kjeldahl	6.00	5.71		mg/L		95	90 - 110

**Lab Sample ID: LCSD 280-299843/2-A**  
**Matrix: Water**  
**Analysis Batch: 299875**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**  
**Prep Batch: 299843**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Nitrogen, Kjeldahl	6.00	5.59		mg/L		93	90 - 110	2	25

## Method: SM 2540D - Solids, Total Suspended (TSS)

**Lab Sample ID: MB 280-298080/1**  
**Matrix: Water**  
**Analysis Batch: 298080**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Suspended Solids	ND		4.0		mg/L			10/06/15 12:25	1

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## Method: SM 2540D - Solids, Total Suspended (TSS) (Continued)

**Lab Sample ID: LCS 280-298080/2**  
**Matrix: Water**  
**Analysis Batch: 298080**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Suspended Solids	100	90.8		mg/L		91	86 - 114

**Lab Sample ID: LCSD 280-298080/3**  
**Matrix: Water**  
**Analysis Batch: 298080**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Total Suspended Solids	100	94.0		mg/L		94	86 - 114	3	20

## Method: SM 4500 CN E - Cyanide, Total

**Lab Sample ID: MB 280-298756/4-A**  
**Matrix: Water**  
**Analysis Batch: 298786**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 298756**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.010		mg/L		10/10/15 08:39	10/10/15 13:38	1

**Lab Sample ID: HLCS 280-298756/1-A**  
**Matrix: Water**  
**Analysis Batch: 298786**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 298756**

Analyte	Spike Added	HLCS Result	HLCS Qualifier	Unit	D	%Rec	%Rec. Limits
Cyanide, Total	0.400	0.412		mg/L		103	90 - 110

**Lab Sample ID: LCS 280-298756/3-A**  
**Matrix: Water**  
**Analysis Batch: 298786**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 298756**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Cyanide, Total	0.0955	0.0963		mg/L		101	90 - 110

**Lab Sample ID: LLCS 280-298756/2-A**  
**Matrix: Water**  
**Analysis Batch: 298786**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 298756**

Analyte	Spike Added	LLCS Result	LLCS Qualifier	Unit	D	%Rec	%Rec. Limits
Cyanide, Total	0.100	0.104		mg/L		104	44 - 167

# QC Association Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## Metals

### Prep Batch: 298211

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-2	SITE OUTFALL SPLIT SAMPLE-2	Total/NA	Water	200.7	
LCS 280-298211/2-A	Lab Control Sample	Total/NA	Water	200.7	
MB 280-298211/1-A	Method Blank	Total/NA	Water	200.7	

### Prep Batch: 298214

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-2	SITE OUTFALL SPLIT SAMPLE-2	Total/NA	Water	200.8	
LCS 280-298214/2-A	Lab Control Sample	Total/NA	Water	200.8	
MB 280-298214/1-A	Method Blank	Total/NA	Water	200.8	

### Analysis Batch: 298370

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-2	SITE OUTFALL SPLIT SAMPLE-2	Total/NA	Water	200.8	298214
LCS 280-298214/2-A	Lab Control Sample	Total/NA	Water	200.8	298214
MB 280-298214/1-A	Method Blank	Total/NA	Water	200.8	298214

### Analysis Batch: 299038

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-2	SITE OUTFALL SPLIT SAMPLE-2	Total/NA	Water	200.7 Rev 4.4	298211
LCS 280-298211/2-A	Lab Control Sample	Total/NA	Water	200.7 Rev 4.4	298211
MB 280-298211/1-A	Method Blank	Total/NA	Water	200.7 Rev 4.4	298211

## General Chemistry

### Analysis Batch: 298080

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-7	SITE OUTFALL SPLIT SAMPLE-7	Total/NA	Water	SM 2540D	
LCS 280-298080/2	Lab Control Sample	Total/NA	Water	SM 2540D	
LCSD 280-298080/3	Lab Control Sample Dup	Total/NA	Water	SM 2540D	
MB 280-298080/1	Method Blank	Total/NA	Water	SM 2540D	

### Analysis Batch: 298146

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-6	SITE OUTFALL SPLIT SAMPLE-6	Total/NA	Water	350.1	
LCS 280-298146/18	Lab Control Sample	Total/NA	Water	350.1	
LCSD 280-298146/19	Lab Control Sample Dup	Total/NA	Water	350.1	
MB 280-298146/20	Method Blank	Total/NA	Water	350.1	

### Prep Batch: 298756

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-1	SITE OUTFALL SPLIT SAMPLE-1	Total/NA	Water	SM 4500 CN C	
280-74909-3	SITE OUTFALL SPLIT SAMPLE-3	Total/NA	Water	SM 4500 CN C	
280-74909-4	SITE OUTFALL SPLIT SAMPLE-4	Total/NA	Water	SM 4500 CN C	
280-74909-5	SITE OUTFALL SPLIT SAMPLE-5	Total/NA	Water	SM 4500 CN C	
HLCS 280-298756/1-A	Lab Control Sample	Total/NA	Water	SM 4500 CN C	
LCS 280-298756/3-A	Lab Control Sample	Total/NA	Water	SM 4500 CN C	
LLCS 280-298756/2-A	Lab Control Sample	Total/NA	Water	SM 4500 CN C	
MB 280-298756/4-A	Method Blank	Total/NA	Water	SM 4500 CN C	

TestAmerica Denver

# QC Association Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## General Chemistry (Continued)

### Analysis Batch: 298786

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-1	SITE OUTFALL SPLIT SAMPLE-1	Total/NA	Water	SM 4500 CN E	298756
280-74909-3	SITE OUTFALL SPLIT SAMPLE-3	Total/NA	Water	SM 4500 CN E	298756
280-74909-4	SITE OUTFALL SPLIT SAMPLE-4	Total/NA	Water	SM 4500 CN E	298756
280-74909-5	SITE OUTFALL SPLIT SAMPLE-5	Total/NA	Water	SM 4500 CN E	298756
HLCS 280-298756/1-A	Lab Control Sample	Total/NA	Water	SM 4500 CN E	298756
LCS 280-298756/3-A	Lab Control Sample	Total/NA	Water	SM 4500 CN E	298756
LLCS 280-298756/2-A	Lab Control Sample	Total/NA	Water	SM 4500 CN E	298756
MB 280-298756/4-A	Method Blank	Total/NA	Water	SM 4500 CN E	298756

### Prep Batch: 299843

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-6	SITE OUTFALL SPLIT SAMPLE-6	Total/NA	Water	351.2	
LCS 280-299843/1-A	Lab Control Sample	Total/NA	Water	351.2	
LCSD 280-299843/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	
MB 280-299843/3-A	Method Blank	Total/NA	Water	351.2	

### Analysis Batch: 299875

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74909-6	SITE OUTFALL SPLIT SAMPLE-6	Total/NA	Water	351.2	299843
LCS 280-299843/1-A	Lab Control Sample	Total/NA	Water	351.2	299843
LCSD 280-299843/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	299843
MB 280-299843/3-A	Method Blank	Total/NA	Water	351.2	299843

# Lab Chronicle

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-1

Lab Sample ID: 280-74909-1

Date Collected: 10/01/15 00:30

Matrix: Water

Date Received: 10/02/15 09:35

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	SM 4500 CN C			50 mL	50 mL	298756	10/10/15 08:39	JML	TAL DEN
Total/NA	Analysis	SM 4500 CN E		1	50 mL	50 mL	298786	10/10/15 13:47	JML	TAL DEN

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-2

Lab Sample ID: 280-74909-2

Date Collected: 10/01/15 10:00

Matrix: Water

Date Received: 10/02/15 09:35

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	200.7			50 mL	50 mL	298211	10/07/15 14:30	MLS	TAL DEN
Total/NA	Analysis	200.7 Rev 4.4		1	50 mL	50 mL	299038	10/13/15 04:06	CRR	TAL DEN
Total/NA	Prep	200.8			50 mL	50 mL	298214	10/07/15 14:30	MLS	TAL DEN
Total/NA	Analysis	200.8		1	50 mL	50 mL	298370	10/08/15 06:14	LMT	TAL DEN

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-3

Lab Sample ID: 280-74909-3

Date Collected: 10/01/15 04:30

Matrix: Water

Date Received: 10/02/15 09:35

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	SM 4500 CN C			50 mL	50 mL	298756	10/10/15 08:39	JML	TAL DEN
Total/NA	Analysis	SM 4500 CN E		1	50 mL	50 mL	298786	10/10/15 13:48	JML	TAL DEN

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-4

Lab Sample ID: 280-74909-4

Date Collected: 10/01/15 06:30

Matrix: Water

Date Received: 10/02/15 09:35

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	SM 4500 CN C			50 mL	50 mL	298756	10/10/15 08:39	JML	TAL DEN
Total/NA	Analysis	SM 4500 CN E		1	50 mL	50 mL	298786	10/10/15 13:50	JML	TAL DEN

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE-5

Lab Sample ID: 280-74909-5

Date Collected: 10/01/15 08:30

Matrix: Water

Date Received: 10/02/15 09:35

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	SM 4500 CN C			50 mL	50 mL	298756	10/10/15 08:39	JML	TAL DEN
Total/NA	Analysis	SM 4500 CN E		1	50 mL	50 mL	298786	10/10/15 13:59	JML	TAL DEN

# Lab Chronicle

Client: Intel Corporation  
 Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE-6**

**Lab Sample ID: 280-74909-6**

**Date Collected: 10/01/15 10:00**

**Matrix: Water**

**Date Received: 10/02/15 09:35**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	350.1		10			298146	10/06/15 18:00	CML	TAL DEN
Total/NA	Prep	351.2			25 mL	25 mL	299843	10/17/15 15:44	MW1	TAL DEN
Total/NA	Analysis	351.2		10	25 mL	25 mL	299875	10/18/15 17:49	MW1	TAL DEN

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE-7**

**Lab Sample ID: 280-74909-7**

**Date Collected: 10/01/15 10:00**

**Matrix: Water**

**Date Received: 10/02/15 09:35**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	SM 2540D		1	250 mL	250 mL	298080	10/06/15 12:25	CML	TAL DEN

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100



# Certification Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74909-1

## Laboratory: TestAmerica Denver

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		2907.01	10-31-15 *
A2LA	ISO/IEC 17025		2907.01	10-31-15
Alabama	State Program	4	40730	09-30-12 *
Alaska (UST)	State Program	10	UST-30	04-05-16
Arizona	State Program	9	AZ0713	12-19-15 *
Arkansas DEQ	State Program	6	88-0687	06-01-16
California	State Program	9	2513	08-31-16
Connecticut	State Program	1	PH-0686	09-30-16
Florida	NELAP	4	E87667	06-30-16
Georgia	State Program	4	N/A	01-09-15 *
Illinois	NELAP	5	200017	04-30-16
Iowa	State Program	7	370	11-30-16
Kansas	NELAP	7	E-10166	04-30-16
Louisiana	NELAP	6	02096	06-30-16
Maine	State Program	1	CO0002	03-03-17
Minnesota	NELAP	5	8-999-405	12-31-15
Nevada	State Program	9	CO0026	07-31-16
New Hampshire	NELAP	1	205310	04-28-16
New Jersey	NELAP	2	CO004	10-30-15
New York	NELAP	2	11964	04-01-16
North Carolina (WW/SW)	State Program	4	358	12-31-15
North Dakota	State Program	8	R-034	01-09-16
Oklahoma	State Program	6	8614	08-31-16
Oregon	NELAP	10	4025	01-09-16
Pennsylvania	NELAP	3	68-00664	07-31-16
South Carolina	State Program	4	72002001	01-09-16
Texas	NELAP	6	T104704183-15-11	09-30-16
USDA	Federal		P330-13-00202	07-02-16
Utah	NELAP	8	CO00026	07-31-16
Virginia	NELAP	3	460232	06-14-16
Washington	State Program	10	C583	08-03-16
West Virginia DEP	State Program	3	354	11-30-15
Wisconsin	State Program	5	999615430	08-31-16
Wyoming (UST)	A2LA	8	2907.01	10-31-15

\* Certification renewal pending - certification considered valid.

TestAmerica Denver

Chain of Custody Record

<b>Client Information</b> Client Contact: Jeff Rudnik Phone: 505-893-1613 E-Mail: stephanie.kupper@testamericainc.com		Lab PM: Kupper, Stephanie K E-Mail: stephanie.kupper@testamericainc.com		Carrier Tracking No(s): Job #:	
Company: Intel Corporation Address: 4100 Sara Road Mail Stop RR5-465 City: Rio Rancho State: NM, Zip: 87124 Phone: 505-893-1613 (Tel) Email: jeffrey.rudnik@intel.com Project Name: Monthly WUA Split Sampling Site:		Due Date Requested: TAT Requested (days): PO #: Pay by Credit Card WO #: Project #: 28013471 SSOW #:		Preservation Codes: A - HCL B - NaOH C - Zn Acetate D - Nitric Acid E - NaHSO4 F - MeOH G - Amchlor H - Ascorbic Acid I - Ice J - DI Water K - EDTA L - EDA Other: M - Hexane N - None O - AsNaO2 P - Na2OAS Q - Na2SO3 R - Na2S2SO3 S - H2SO4 T - TSP Dodecahydrate U - Acetone V - MCAA W - ph 4-5 Z - other (Specify)	
<b>Sample Identification</b> Site Outfall Split Sample - 1 Site Outfall Split Sample - 2 Site Outfall Split Sample - 3 Site Outfall Split Sample - 4 Site Outfall Split Sample - 5 Site Outfall Split Sample - 6 Site Outfall Split Sample - 7		Sample Date 10/11/15 10/11/15 10/11/15 10/11/15 10/11/15 10/11/15 10/11/15		Sample Time 0030 1000 0430 0630 0830 1000 1000	
Sample Type (C=Comp, G=grab) G C G G G C C		Matrix (W=water, S=solid, O=soil, B=BT, T=tissue, A=air) W W W W W W W		Field Filtered Sample (Yes or No) X X X X X X X	
Analysis Requested Cyanide (EPA SM 4500) Metals (EPA 200.8) TKN/Ammonia (EPA 351.3) TSS (EPA 160.2)		Total Number of Containers X X X X X X X		Special Instructions/Note: 280-74909 Chain of Custody	
<b>Possible Hazard Identification</b> <input type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological		Deliverable Requested: I, II, III, IV, Other (specify)		Sample Disposal (A fee may be assessed if samples are retained longer than 1 month) <input type="checkbox"/> Return To Client <input type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For Months	
Empty Kit Relinquished by:		Date: 1/30 10/1/15		Method of Shipment:	
Relinquished by: [Signature]		Date/Time: 0935 020-115		Company: TAP	
Relinquished by:		Date/Time:		Company:	
Relinquished by:		Date/Time:		Company:	
Custody Seals Intact <input type="checkbox"/> Yes <input type="checkbox"/> No		Custody Seal No.:		Cooler Temperature(s) °C and Other Remarks: 3-3 1850, 020-15 Transfer	





## Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-74909-1

**Login Number: 74909**

**List Source: TestAmerica Denver**

**List Number: 1**

**Creator: Muniz, Ashley T**

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	False	Refer to Job Narrative for details.
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.  
TestAmerica Denver  
4955 Yarrow Street  
Arvada, CO 80002  
Tel: (303)736-0100

TestAmerica Job ID: 280-74946-1  
Client Project/Site: Outfall Split Sampling

For:  
Intel Corporation  
4100 Sara Road  
Mail Stop RR5-491  
Rio Rancho, New Mexico 87124

Attn: Jeff Rudnik



Authorized for release by:  
10/21/2015 9:39:01 AM

DiLea Bindel, Project Manager I  
(303)736-0173  
[dilea.bindel@testamericainc.com](mailto:dilea.bindel@testamericainc.com)

### LINKS

Review your project  
results through  
**TotalAccess**

Have a Question?



Visit us at:  
[www.testamericainc.com](http://www.testamericainc.com)

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*

1

2

3

4

5

6

7

8

9

10

11

12

13

14



# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Definitions . . . . .	3
Case Narrative . . . . .	4
Detection Summary . . . . .	5
Method Summary . . . . .	6
Sample Summary . . . . .	7
Client Sample Results . . . . .	8
QC Sample Results . . . . .	9
QC Association . . . . .	13
Chronicle . . . . .	15
Certification Summary . . . . .	16
Chain of Custody . . . . .	17
Receipt Checklists . . . . .	18

# Definitions/Glossary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
α	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Case Narrative

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

**Job ID: 280-74946-1**

**Laboratory: TestAmerica Denver**

**Narrative**

## CASE NARRATIVE Client: Intel Corporation Project: Outfall Split Sampling Report Number: 280-74946-1

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

### RECEIPT

The samples were received on 10/03/2015; the samples arrived in good condition, properly preserved and on ice. The temperature of the cooler at receipt was 3.2° C.

### TOTAL METALS (ICP) - METHOD 200.7

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

### TOTAL METALS - METHOD 200.8

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

### GENERAL CHEMISTRY

Due to elevated concentrations, sample SITE OUTFALL SPLIT SAMPLE - 3 (280-74946-3) required dilution prior to analysis for Ammonia. The reporting limits have been adjusted accordingly.

Due to elevated concentrations, sample SITE OUTFALL SPLIT SAMPLE - 3 (280-74946-3) required dilution prior to analysis for TKN. The reporting limits have been adjusted accordingly.

Due to elevated concentrations, sample SITE OUTFALL SPLIT SAMPLE - 2 (280-74946-2) required dilution prior to analysis for COD. The reporting limits have been adjusted accordingly.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

# Detection Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 1

Lab Sample ID: 280-74946-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Aluminum	140		100		ug/L	1		200.7 Rev 4.4	Total/NA
Boron	120		100		ug/L	1		200.7 Rev 4.4	Total/NA
Arsenic	9.0		5.0		ug/L	1		200.8	Total/NA
Copper	71		2.0		ug/L	1		200.8	Total/NA
Molybdenum	8.3		2.0		ug/L	1		200.8	Total/NA

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 2

Lab Sample ID: 280-74946-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chemical Oxygen Demand	170		40		mg/L	2		410.4	Total/NA

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 3

Lab Sample ID: 280-74946-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ammonia as N	30		1.0		mg/L	10		350.1	Total/NA
Nitrogen, Kjeldahl	38		10		mg/L	10		351.2	Total/NA

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 4

Lab Sample ID: 280-74946-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Total Suspended Solids	7.2		4.0		mg/L	1		SM 2540D	Total/NA

This Detection Summary does not include radiochemical test results.

TestAmerica Denver

# Method Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

Method	Method Description	Protocol	Laboratory
200.7 Rev 4.4	Metals (ICP)	EPA	TAL DEN
200.8	Metals (ICP/MS)	EPA	TAL DEN
350.1	Nitrogen, Ammonia	MCAWW	TAL DEN
351.2	Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)	MCAWW	TAL DEN
410.4	COD	MCAWW	TAL DEN
SM 2540D	Solids, Total Suspended (TSS)	SM	TAL DEN

#### Protocol References:

EPA = US Environmental Protection Agency

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

SM = "Standard Methods For The Examination Of Water And Wastewater",

#### Laboratory References:

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

# Sample Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
280-74946-1	SITE OUTFALL SPLIT SAMPLE - 1	Water	10/02/15 10:00	10/03/15 10:00
280-74946-2	SITE OUTFALL SPLIT SAMPLE - 2	Water	10/02/15 10:00	10/03/15 10:00
280-74946-3	SITE OUTFALL SPLIT SAMPLE - 3	Water	10/02/15 10:00	10/03/15 10:00
280-74946-4	SITE OUTFALL SPLIT SAMPLE - 4	Water	10/02/15 10:00	10/03/15 10:00

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14



# Client Sample Results

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## Method: 200.7 Rev 4.4 - Metals (ICP)

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 1**

**Lab Sample ID: 280-74946-1**

**Date Collected: 10/02/15 10:00**

**Matrix: Water**

**Date Received: 10/03/15 10:00**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aluminum	140		100		ug/L		10/07/15 14:30	10/13/15 03:33	1
Boron	120		100		ug/L		10/07/15 14:30	10/13/15 03:33	1

## Method: 200.8 - Metals (ICP/MS)

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 1**

**Lab Sample ID: 280-74946-1**

**Date Collected: 10/02/15 10:00**

**Matrix: Water**

**Date Received: 10/03/15 10:00**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	9.0		5.0		ug/L		10/07/15 14:30	10/08/15 05:48	1
Cadmium	ND		1.0		ug/L		10/07/15 14:30	10/08/15 05:48	1
Chromium	ND		3.0		ug/L		10/07/15 14:30	10/08/15 05:48	1
Copper	71		2.0		ug/L		10/07/15 14:30	10/08/15 05:48	1
Lead	ND		1.0		ug/L		10/07/15 14:30	10/08/15 05:48	1
Molybdenum	8.3		2.0		ug/L		10/07/15 14:30	10/08/15 05:48	1
Nickel	ND		2.0		ug/L		10/07/15 14:30	10/08/15 05:48	1
Selenium	ND		5.0		ug/L		10/07/15 14:30	10/08/15 05:48	1
Silver	ND		1.0		ug/L		10/07/15 14:30	10/08/15 05:48	1
Zinc	ND		10		ug/L		10/07/15 14:30	10/08/15 05:48	1

## General Chemistry

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 2**

**Lab Sample ID: 280-74946-2**

**Date Collected: 10/02/15 10:00**

**Matrix: Water**

**Date Received: 10/03/15 10:00**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chemical Oxygen Demand	170		40		mg/L			10/05/15 09:10	2

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 3**

**Lab Sample ID: 280-74946-3**

**Date Collected: 10/02/15 10:00**

**Matrix: Water**

**Date Received: 10/03/15 10:00**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	30		1.0		mg/L			10/08/15 17:53	10
Nitrogen, Kjeldahl	38		10		mg/L		10/17/15 15:44	10/18/15 18:05	10

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 4**

**Lab Sample ID: 280-74946-4**

**Date Collected: 10/02/15 10:00**

**Matrix: Water**

**Date Received: 10/03/15 10:00**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Suspended Solids	7.2		4.0		mg/L			10/06/15 12:25	1

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## Method: 200.7 Rev 4.4 - Metals (ICP)

**Lab Sample ID: MB 280-298211/1-A**  
**Matrix: Water**  
**Analysis Batch: 299038**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 298211**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aluminum	ND		100		ug/L		10/07/15 14:30	10/13/15 03:28	1
Boron	ND		100		ug/L		10/07/15 14:30	10/13/15 03:28	1

**Lab Sample ID: LCS 280-298211/2-A**  
**Matrix: Water**  
**Analysis Batch: 299038**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 298211**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Aluminum	2000	1890		ug/L		95	87 - 111
Boron	1000	989		ug/L		99	86 - 110

## Method: 200.8 - Metals (ICP/MS)

**Lab Sample ID: MB 280-298214/1-A**  
**Matrix: Water**  
**Analysis Batch: 298370**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 298214**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	ND		5.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Cadmium	ND		1.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Chromium	ND		3.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Copper	ND		2.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Lead	ND		1.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Molybdenum	ND		2.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Nickel	ND		2.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Selenium	ND		5.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Silver	ND		1.0		ug/L		10/07/15 14:30	10/08/15 05:41	1
Zinc	ND		10		ug/L		10/07/15 14:30	10/08/15 05:41	1

**Lab Sample ID: LCS 280-298214/2-A**  
**Matrix: Water**  
**Analysis Batch: 298370**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 298214**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Arsenic	40.0	38.2		ug/L		95	89 - 111
Cadmium	40.0	36.6		ug/L		91	89 - 111
Chromium	40.0	38.4		ug/L		96	86 - 115
Copper	40.0	38.7		ug/L		97	90 - 115
Lead	40.0	39.0		ug/L		98	88 - 115
Molybdenum	40.0	38.1		ug/L		95	89 - 112
Nickel	40.0	40.3		ug/L		101	86 - 115
Selenium	40.0	36.8		ug/L		92	85 - 114
Silver	40.0	38.1		ug/L		95	90 - 114
Zinc	40.0	40.8		ug/L		102	88 - 115

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## Method: 200.8 - Metals (ICP/MS) (Continued)

**Lab Sample ID: 280-74946-1 MS**  
**Matrix: Water**  
**Analysis Batch: 298370**

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 1**  
**Prep Type: Total/NA**  
**Prep Batch: 298214**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	Limits
Arsenic	9.0		40.0	47.8		ug/L		97	79 - 120
Cadmium	ND		40.0	37.3		ug/L		93	89 - 111
Chromium	ND		40.0	40.9		ug/L		96	86 - 115
Copper	71		40.0	111		ug/L		101	90 - 115
Lead	ND		40.0	39.0		ug/L		97	88 - 115
Molybdenum	8.3		40.0	48.2		ug/L		100	89 - 112
Nickel	ND		40.0	39.3		ug/L		94	86 - 115
Selenium	ND		40.0	37.4		ug/L		94	85 - 114
Silver	ND		40.0	38.1		ug/L		95	20 - 120
Zinc	ND		40.0	48.9		ug/L		109	88 - 115

**Lab Sample ID: 280-74946-1 MSD**  
**Matrix: Water**  
**Analysis Batch: 298370**

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 1**  
**Prep Type: Total/NA**  
**Prep Batch: 298214**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Arsenic	9.0		40.0	46.5		ug/L		94	79 - 120	3	20
Cadmium	ND		40.0	37.4		ug/L		94	89 - 111	0	20
Chromium	ND		40.0	40.6		ug/L		95	86 - 115	1	20
Copper	71		40.0	110		ug/L		97	90 - 115	1	20
Lead	ND		40.0	38.2		ug/L		96	88 - 115	2	20
Molybdenum	8.3		40.0	48.6		ug/L		101	89 - 112	1	20
Nickel	ND		40.0	41.0		ug/L		98	86 - 115	4	20
Selenium	ND		40.0	36.9		ug/L		92	85 - 114	1	20
Silver	ND		40.0	37.9		ug/L		95	20 - 120	1	20
Zinc	ND		40.0	45.4		ug/L		100	88 - 115	7	20

## Method: 350.1 - Nitrogen, Ammonia

**Lab Sample ID: MB 280-298546/20**  
**Matrix: Water**  
**Analysis Batch: 298546**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	ND		0.10		mg/L			10/08/15 17:49	1

**Lab Sample ID: LCS 280-298546/18**  
**Matrix: Water**  
**Analysis Batch: 298546**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	2.50	2.55		mg/L		102	90 - 110

**Lab Sample ID: LCSD 280-298546/19**  
**Matrix: Water**  
**Analysis Batch: 298546**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	Limit
Ammonia as N	2.50	2.54		mg/L		102	90 - 110	1	10

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

**Lab Sample ID: 280-74946-3 MS**  
**Matrix: Water**  
**Analysis Batch: 298546**

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 3**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	30		10.0	41.2		mg/L		108	90 - 110

**Lab Sample ID: 280-74946-3 MSD**  
**Matrix: Water**  
**Analysis Batch: 298546**

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 3**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia as N	30		10.0	41.1		mg/L		108	90 - 110	0	10

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)

**Lab Sample ID: MB 280-299843/3-A**  
**Matrix: Water**  
**Analysis Batch: 299875**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 299843**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrogen, Kjeldahl	ND		1.0		mg/L		10/17/15 15:44	10/18/15 17:29	1

**Lab Sample ID: LCS 280-299843/1-A**  
**Matrix: Water**  
**Analysis Batch: 299875**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 299843**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrogen, Kjeldahl	6.00	5.71		mg/L		95	90 - 110

**Lab Sample ID: LCSD 280-299843/2-A**  
**Matrix: Water**  
**Analysis Batch: 299875**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**  
**Prep Batch: 299843**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Nitrogen, Kjeldahl	6.00	5.59		mg/L		93	90 - 110	2	25

## Method: 410.4 - COD

**Lab Sample ID: MB 280-297853/5**  
**Matrix: Water**  
**Analysis Batch: 297853**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chemical Oxygen Demand	ND		20		mg/L			10/05/15 09:10	1

**Lab Sample ID: LCS 280-297853/3**  
**Matrix: Water**  
**Analysis Batch: 297853**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chemical Oxygen Demand	100	96.8		mg/L		97	90 - 110

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
 Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## Method: 410.4 - COD (Continued)

**Lab Sample ID: LCSD 280-297853/4**  
**Matrix: Water**  
**Analysis Batch: 297853**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chemical Oxygen Demand	100	101		mg/L		101	90 - 110	4	11

**Lab Sample ID: 280-74946-2 MS**  
**Matrix: Water**  
**Analysis Batch: 297853**

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 2**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chemical Oxygen Demand	170		100	273		mg/L		99	90 - 110

**Lab Sample ID: 280-74946-2 MSD**  
**Matrix: Water**  
**Analysis Batch: 297853**

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 2**  
**Prep Type: Total/NA**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chemical Oxygen Demand	170		100	273		mg/L		99	90 - 110	0	11

## Method: SM 2540D - Solids, Total Suspended (TSS)

**Lab Sample ID: MB 280-298080/1**  
**Matrix: Water**  
**Analysis Batch: 298080**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Suspended Solids	ND		4.0		mg/L			10/06/15 12:25	1

**Lab Sample ID: LCS 280-298080/2**  
**Matrix: Water**  
**Analysis Batch: 298080**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Suspended Solids	100	90.8		mg/L		91	86 - 114

**Lab Sample ID: LCSD 280-298080/3**  
**Matrix: Water**  
**Analysis Batch: 298080**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Total Suspended Solids	100	94.0		mg/L		94	86 - 114	3	20

# QC Association Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## Metals

### Prep Batch: 298211

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74946-1	SITE OUTFALL SPLIT SAMPLE - 1	Total/NA	Water	200.7	
LCS 280-298211/2-A	Lab Control Sample	Total/NA	Water	200.7	
MB 280-298211/1-A	Method Blank	Total/NA	Water	200.7	

### Prep Batch: 298214

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74946-1	SITE OUTFALL SPLIT SAMPLE - 1	Total/NA	Water	200.8	
280-74946-1 MS	SITE OUTFALL SPLIT SAMPLE - 1	Total/NA	Water	200.8	
280-74946-1 MSD	SITE OUTFALL SPLIT SAMPLE - 1	Total/NA	Water	200.8	
LCS 280-298214/2-A	Lab Control Sample	Total/NA	Water	200.8	
MB 280-298214/1-A	Method Blank	Total/NA	Water	200.8	

### Analysis Batch: 298370

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74946-1	SITE OUTFALL SPLIT SAMPLE - 1	Total/NA	Water	200.8	298214
280-74946-1 MS	SITE OUTFALL SPLIT SAMPLE - 1	Total/NA	Water	200.8	298214
280-74946-1 MSD	SITE OUTFALL SPLIT SAMPLE - 1	Total/NA	Water	200.8	298214
LCS 280-298214/2-A	Lab Control Sample	Total/NA	Water	200.8	298214
MB 280-298214/1-A	Method Blank	Total/NA	Water	200.8	298214

### Analysis Batch: 299038

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74946-1	SITE OUTFALL SPLIT SAMPLE - 1	Total/NA	Water	200.7 Rev 4.4	298211
LCS 280-298211/2-A	Lab Control Sample	Total/NA	Water	200.7 Rev 4.4	298211
MB 280-298211/1-A	Method Blank	Total/NA	Water	200.7 Rev 4.4	298211

## General Chemistry

### Analysis Batch: 297853

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74946-2	SITE OUTFALL SPLIT SAMPLE - 2	Total/NA	Water	410.4	
280-74946-2 MS	SITE OUTFALL SPLIT SAMPLE - 2	Total/NA	Water	410.4	
280-74946-2 MSD	SITE OUTFALL SPLIT SAMPLE - 2	Total/NA	Water	410.4	
LCS 280-297853/3	Lab Control Sample	Total/NA	Water	410.4	
LCSD 280-297853/4	Lab Control Sample Dup	Total/NA	Water	410.4	
MB 280-297853/5	Method Blank	Total/NA	Water	410.4	

### Analysis Batch: 298080

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74946-4	SITE OUTFALL SPLIT SAMPLE - 4	Total/NA	Water	SM 2540D	
LCS 280-298080/2	Lab Control Sample	Total/NA	Water	SM 2540D	
LCSD 280-298080/3	Lab Control Sample Dup	Total/NA	Water	SM 2540D	
MB 280-298080/1	Method Blank	Total/NA	Water	SM 2540D	

### Analysis Batch: 298546

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74946-3	SITE OUTFALL SPLIT SAMPLE - 3	Total/NA	Water	350.1	
280-74946-3 MS	SITE OUTFALL SPLIT SAMPLE - 3	Total/NA	Water	350.1	
280-74946-3 MSD	SITE OUTFALL SPLIT SAMPLE - 3	Total/NA	Water	350.1	
LCS 280-298546/18	Lab Control Sample	Total/NA	Water	350.1	

TestAmerica Denver

# QC Association Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## General Chemistry (Continued)

### Analysis Batch: 298546 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCSD 280-298546/19	Lab Control Sample Dup	Total/NA	Water	350.1	
MB 280-298546/20	Method Blank	Total/NA	Water	350.1	

### Prep Batch: 299843

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74946-3	SITE OUTFALL SPLIT SAMPLE - 3	Total/NA	Water	351.2	
LCS 280-299843/1-A	Lab Control Sample	Total/NA	Water	351.2	
LCSD 280-299843/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	
MB 280-299843/3-A	Method Blank	Total/NA	Water	351.2	

### Analysis Batch: 299875

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-74946-3	SITE OUTFALL SPLIT SAMPLE - 3	Total/NA	Water	351.2	299843
LCS 280-299843/1-A	Lab Control Sample	Total/NA	Water	351.2	299843
LCSD 280-299843/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	299843
MB 280-299843/3-A	Method Blank	Total/NA	Water	351.2	299843



# Lab Chronicle

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 1

Lab Sample ID: 280-74946-1

Date Collected: 10/02/15 10:00

Matrix: Water

Date Received: 10/03/15 10:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	200.7			50 mL	50 mL	298211	10/07/15 14:30	MLS	TAL DEN
Total/NA	Analysis	200.7 Rev 4.4		1	50 mL	50 mL	299038	10/13/15 03:33	CRR	TAL DEN
Total/NA	Prep	200.8			50 mL	50 mL	298214	10/07/15 14:30	MLS	TAL DEN
Total/NA	Analysis	200.8		1	50 mL	50 mL	298370	10/08/15 05:48	LMT	TAL DEN

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 2

Lab Sample ID: 280-74946-2

Date Collected: 10/02/15 10:00

Matrix: Water

Date Received: 10/03/15 10:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	410.4		2	2 mL	2 mL	297853	10/05/15 09:10	CCJ	TAL DEN

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 3

Lab Sample ID: 280-74946-3

Date Collected: 10/02/15 10:00

Matrix: Water

Date Received: 10/03/15 10:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	350.1		10			298546	10/08/15 17:53	CML	TAL DEN
Total/NA	Prep	351.2			25 mL	25 mL	299843	10/17/15 15:44	MW1	TAL DEN
Total/NA	Analysis	351.2		10	25 mL	25 mL	299875	10/18/15 18:05	MW1	TAL DEN

## Client Sample ID: SITE OUTFALL SPLIT SAMPLE - 4

Lab Sample ID: 280-74946-4

Date Collected: 10/02/15 10:00

Matrix: Water

Date Received: 10/03/15 10:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	SM 2540D		1	250 mL	250 mL	298080	10/06/15 12:25	CML	TAL DEN

### Laboratory References:

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100



# Certification Summary

Client: Intel Corporation  
Project/Site: Outfall Split Sampling

TestAmerica Job ID: 280-74946-1

## Laboratory: TestAmerica Denver

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

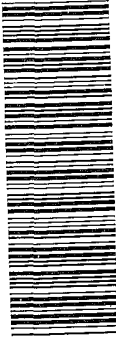
Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		2907.01	10-31-15 *
A2LA	ISO/IEC 17025		2907.01	10-31-15
Alabama	State Program	4	40730	09-30-12 *
Alaska (UST)	State Program	10	UST-30	04-05-16
Arizona	State Program	9	AZ0713	12-19-15 *
Arkansas DEQ	State Program	6	88-0687	06-01-16
California	State Program	9	2513	08-31-16
Connecticut	State Program	1	PH-0686	09-30-16
Florida	NELAP	4	E87667	06-30-16
Georgia	State Program	4	N/A	01-09-15 *
Illinois	NELAP	5	200017	04-30-16
Iowa	State Program	7	370	11-30-16
Kansas	NELAP	7	E-10166	04-30-16
Louisiana	NELAP	6	02096	06-30-16
Maine	State Program	1	CO0002	03-03-17
Minnesota	NELAP	5	8-999-405	12-31-15
Nevada	State Program	9	CO0026	07-31-16
New Hampshire	NELAP	1	205310	04-28-16
New Jersey	NELAP	2	CO004	10-30-15
New York	NELAP	2	11964	04-01-16
North Carolina (WW/SW)	State Program	4	358	12-31-15
North Dakota	State Program	8	R-034	01-09-16
Oklahoma	State Program	6	8614	08-31-16
Oregon	NELAP	10	4025	01-09-16
Pennsylvania	NELAP	3	68-00664	07-31-16
South Carolina	State Program	4	72002001	01-09-16
Texas	NELAP	6	T104704183-15-11	09-30-16
USDA	Federal		P330-13-00202	07-02-16
Utah	NELAP	8	CO00026	07-31-16
Virginia	NELAP	3	460232	06-14-16
Washington	State Program	10	C583	08-03-16
West Virginia DEP	State Program	3	354	11-30-15
Wisconsin	State Program	5	999615430	08-31-16
Wyoming (UST)	A2LA	8	2907.01	10-31-15

\* Certification renewal pending - certification considered valid.

TestAmerica Denver

TestAmerica Denver  
 4955 Yarrow Street  
 Arvada, CO 80002  
 Phone (303) 736-0100 Fax (303) 431-7171

### Chain of Custody Record



TestAmerica  
 THE LEADER IN ENVIRONMENTAL TESTING

OC No: 280-74946 Chain of Custody

Sample: **ABCWUA** Lab PII: **Kupper, Stephanie K**  
 Client Contact: **Jeff Rudnik** Phone: **505-893-1613** E-Mail: **stephanie.kupper@testamericainc.com**  
 Company: **Intel Corporation**

Address: **4100 Sara Road Mail Stop RR5-465**  
 City: **Rio Rancho**  
 State, Zip: **NM, 87124**  
 Phone: **505-893-1613(Tel)**  
 Email: **jeffrey.rudnik@intel.com**  
 Project Name: **Monthly WUA Split Sampling**  
 Site:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=other)	Analysis Requested		Field Filtered Sample (Yes or No)	Perform MS/SP (Yes or No)	Total Number of Containers	Special Instructions/Note:
					Metals (EPA 200.8)	TKN/Ammonia (EPA 351.3)				
Site Outfall Split Sample - 1	10/2/15	1000	C	W	X					
Site Outfall Split Sample - 2	10/2/15	1000	C	W	X					
Site Outfall Split Sample - 3	10/2/15	1000	C	W	X					
Site Outfall Split Sample - 4	10/2/15	1000	C	W	X					

Due Date Requested: \_\_\_\_\_ TAT Requested (days): \_\_\_\_\_  
 PO #: \_\_\_\_\_ Pay by Credit Card \_\_\_\_\_  
 Project #: **28013471** SSOW#: \_\_\_\_\_  
 Preservation Codes:  
 A - HCL B - NaOH C - Zn Acetate D - Nitric Acid E - NaHSO4 F - MeOH G - Amchlor H - Ascorbic Acid I - Ice J - DI Water K - EDTA L - EDA Other: \_\_\_\_\_  
 M - Hexane N - None O - AsNaO2 P - Na2O4S Q - Na2SO3 R - H2SO4 S - H2SO4 T - TSP Dodecahydrate U - Acetone V - MCAA W - ph 4-5 X - EDTA Z - other (specify)

Possible Hazard Identification  
 Non-Hazard  Flammable  Skin Irritant  Poison B  Unknown  Radiological  
 Deliverable Requested: I, II, III, IV, Other (specify) \_\_\_\_\_

Empty Kit Relinquished by: \_\_\_\_\_ Date: \_\_\_\_\_  
 Relinquished by: \_\_\_\_\_ Date/Time: **10/2/15 1130** Company: \_\_\_\_\_  
 Relinquished by: \_\_\_\_\_ Date/Time: \_\_\_\_\_ Company: \_\_\_\_\_  
 Relinquished by: \_\_\_\_\_ Date/Time: \_\_\_\_\_ Company: \_\_\_\_\_

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)  
 Return To Client  Disposal By Lab  Archive For \_\_\_\_\_ Months

Special Instructions/QC Requirements: \_\_\_\_\_  
 Method of Shipment: \_\_\_\_\_  
 Received by: \_\_\_\_\_ Date/Time: **10/3/15 1000** Company: **WUA**  
 Received by: \_\_\_\_\_ Date/Time: \_\_\_\_\_ Company: \_\_\_\_\_  
 Received by: \_\_\_\_\_ Date/Time: \_\_\_\_\_ Company: \_\_\_\_\_  
 Cooler Temperature(s) °C and Other Remarks: **3, 170, 1 DR#5 OW 10/3/15**



# Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-74946-1

**Login Number: 74946**

**List Number: 1**

**Creator: White, Denise E**

**List Source: TestAmerica Denver**

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.

TestAmerica Denver  
4955 Yarrow Street  
Arvada, CO 80002  
Tel: (303)736-0100

TestAmerica Job ID: 280-76537-1

Client Project/Site: Monthly WUA Split Sampling

For:

Intel Corporation  
4100 Sara Road  
Mail Stop RR5-491  
Rio Rancho, New Mexico 87124

Attn: Jeff Rudnik



Authorized for release by:

11/20/2015 9:39:25 AM

Stephanie Kupper, Project Manager I  
(303)736-0182

[stephanie.kupper@testamericainc.com](mailto:stephanie.kupper@testamericainc.com)

Designee for

DiLea Bindel, Project Manager I  
(303)736-0173

[dilea.bindel@testamericainc.com](mailto:dilea.bindel@testamericainc.com)

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*



### LINKS

Review your project  
results through  
**TotalAccess**

Have a Question?



Visit us at:  
[www.testamericainc.com](http://www.testamericainc.com)

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14



# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Definitions . . . . .	3
Case Narrative . . . . .	4
Detection Summary . . . . .	5
Method Summary . . . . .	6
Sample Summary . . . . .	7
Client Sample Results . . . . .	8
QC Sample Results . . . . .	9
QC Association . . . . .	10
Chronicle . . . . .	11
Certification Summary . . . . .	12
Chain of Custody . . . . .	13
Receipt Checklists . . . . .	14

# Definitions/Glossary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
α	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Case Narrative

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

**Job ID: 280-76537-1**

**Laboratory: TestAmerica Denver**

## Narrative

**CASE NARRATIVE**  
**Client: Intel Corporation**  
**Project: Monthly WUA Split Sampling**  
**Report Number: 280-76537-1**

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

### RECEIPT

The sample was received on 11/6/2015 at 9:30 AM; the sample arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 0.2° C.

### GENERAL CHEMISTRY

Due to elevated concentrations, sample SITE OUTFALL SPLIT SAMPLE (280-76537-1)[10X] required dilution prior to analysis for Ammonia. The reporting limits have been adjusted accordingly.

Due to elevated concentrations, sample SITE OUTFALL SPLIT SAMPLE (280-76537-1)[5X] required dilution prior to analysis for TKN. The reporting limits have been adjusted accordingly.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

# Detection Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**

**Lab Sample ID: 280-76537-1**

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ammonia as N	19		1.0		mg/L	10		350.1	Total/NA
Nitrogen, Kjeldahl	27		5.0		mg/L	5		351.2	Total/NA

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

This Detection Summary does not include radiochemical test results.

TestAmerica Denver



# Method Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

Method	Method Description	Protocol	Laboratory
350.1	Nitrogen, Ammonia	MCAWW	TAL DEN
351.2	Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)	MCAWW	TAL DEN

**Protocol References:**

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# Sample Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

---

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
280-76537-1	SITE OUTFALL SPLIT SAMPLE	Water	11/05/15 10:00	11/06/15 09:30

---

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# Client Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

## General Chemistry

Client Sample ID: SITE OUTFALL SPLIT SAMPLE

Date Collected: 11/05/15 10:00

Date Received: 11/06/15 09:30

Lab Sample ID: 280-76537-1

Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	19		1.0		mg/L			11/09/15 16:21	10
Nitrogen, Kjeldahl	27		5.0		mg/L		11/10/15 21:15	11/13/15 22:21	5

# QC Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

## Method: 350.1 - Nitrogen, Ammonia

**Lab Sample ID: MB 280-303257/20**  
**Matrix: Water**  
**Analysis Batch: 303257**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	ND		0.10		mg/L			11/09/15 16:03	1

**Lab Sample ID: LCS 280-303257/18**  
**Matrix: Water**  
**Analysis Batch: 303257**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	2.50	2.48		mg/L		99	90 - 110

**Lab Sample ID: LCSD 280-303257/19**  
**Matrix: Water**  
**Analysis Batch: 303257**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia as N	2.50	2.46		mg/L		98	90 - 110	1	10

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)

**Lab Sample ID: MB 280-303462/3-A**  
**Matrix: Water**  
**Analysis Batch: 304108**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 303462**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrogen, Kjeldahl	ND		1.0		mg/L		11/10/15 21:15	11/13/15 21:41	1

**Lab Sample ID: LCS 280-303462/1-A**  
**Matrix: Water**  
**Analysis Batch: 304108**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**  
**Prep Batch: 303462**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrogen, Kjeldahl	6.00	5.88		mg/L		98	90 - 110

**Lab Sample ID: LCSD 280-303462/2-A**  
**Matrix: Water**  
**Analysis Batch: 304108**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**  
**Prep Batch: 303462**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Nitrogen, Kjeldahl	6.00	5.90		mg/L		98	90 - 110	0	25

# QC Association Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

## General Chemistry

### Analysis Batch: 303257

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-76537-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	350.1	
LCS 280-303257/18	Lab Control Sample	Total/NA	Water	350.1	
LCSD 280-303257/19	Lab Control Sample Dup	Total/NA	Water	350.1	
MB 280-303257/20	Method Blank	Total/NA	Water	350.1	

### Prep Batch: 303462

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-76537-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	
LCS 280-303462/1-A	Lab Control Sample	Total/NA	Water	351.2	
LCSD 280-303462/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	
MB 280-303462/3-A	Method Blank	Total/NA	Water	351.2	

### Analysis Batch: 304108

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-76537-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	303462
LCS 280-303462/1-A	Lab Control Sample	Total/NA	Water	351.2	303462
LCSD 280-303462/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	303462
MB 280-303462/3-A	Method Blank	Total/NA	Water	351.2	303462

# Lab Chronicle

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**

**Lab Sample ID: 280-76537-1**

**Date Collected: 11/05/15 10:00**

**Matrix: Water**

**Date Received: 11/06/15 09:30**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	350.1		10			303257	11/09/15 16:21	KAM	TAL DEN
Total/NA	Prep	351.2			25 mL	25 mL	303462	11/10/15 21:15	MW1	TAL DEN
Total/NA	Analysis	351.2		5	25 mL	25 mL	304108	11/13/15 22:21	MW1	TAL DEN

#### Laboratory References:

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

# Certification Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-76537-1

## Laboratory: TestAmerica Denver

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		2907.01	11-30-15 *
A2LA	ISO/IEC 17025		2907.01	11-30-15
Alabama	State Program	4	40730	09-30-12 *
Alaska (UST)	State Program	10	UST-30	04-05-16
Arizona	State Program	9	AZ0713	12-19-16
Arkansas DEQ	State Program	6	88-0687	06-01-16
California	State Program	9	2513	08-31-16
Connecticut	State Program	1	PH-0686	09-30-16
Florida	NELAP	4	E87667	06-30-16
Georgia	State Program	4	N/A	01-09-16
Illinois	NELAP	5	200017	04-30-16
Iowa	State Program	7	370	11-30-16
Kansas	NELAP	7	E-10166	04-30-16
Louisiana	NELAP	6	02096	06-30-16
Maine	State Program	1	CO0002	03-03-17
Minnesota	NELAP	5	8-999-405	12-31-15
Nevada	State Program	9	CO0026	07-31-16
New Hampshire	NELAP	1	205310	04-28-16
New Jersey	NELAP	2	CO004	11-30-15 *
New York	NELAP	2	11964	04-01-16
North Carolina (WW/SW)	State Program	4	358	12-31-15
North Dakota	State Program	8	R-034	01-09-16
Oklahoma	State Program	6	8614	08-31-16
Oregon	NELAP	10	4025	01-09-16
Pennsylvania	NELAP	3	68-00664	07-31-16
South Carolina	State Program	4	72002001	01-09-16
Texas	NELAP	6	T104704183-15-11	09-30-16
USDA	Federal		P330-13-00202	07-02-16
Utah	NELAP	8	CO00026	07-31-16
Virginia	NELAP	3	460232	06-14-16
Washington	State Program	10	C583	08-03-16
West Virginia DEP	State Program	3	354	11-30-15
Wisconsin	State Program	5	999615430	08-31-16
Wyoming (UST)	A2LA	8	2907.01	11-30-15

\* Certification renewal pending - certification considered valid.

### Chain of Custody Record

<b>Client Information</b> Client Contact: Jeff Rudnik Company: Intel Corporation		Lab PM: Kupper, Stephanie K E-Mail: stephanie.kupper@testamericainc.com		Carrier Tracking No(s): 280-44204-16936.1 Page: Page 1 of 1 Job #:	
Address: 4100 Sara Road Mail Stop RR5-465 City: Rio Rancho State/Zip: NM, 87124 Phone: 505-893-1613(Tel) Email: jeffrey.rudnik@intel.com		Due Date Requested: TAT Requested (days): PO #: Pay by Credit Card WO #: Project #: 28013471 SSOW#:		Analysis Requested TKU/Ammonia (EPA 351.3)	
Sample Identification Site: <b>Site Outfall Split Sample</b>		Sample Date: <b>11/5/15</b>	Sample Time: <b>1000</b>	Sample Type (C=Comp, G=grab): <b>C</b>	Matrix (W=water, S=solid, O=wastebot, B=issue, A=air)
Possible Hazard Identification <input type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological		Deliverable Requested: I, II, III, IV, Other (specify)		Sample Disposal (A fee may be assessed if samples are retained longer than 1 month) <input type="checkbox"/> Return To Client <input type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months	
Empty Kit Relinquished by: <i>[Signature]</i> Date: _____ Time: _____		Relinquished by: <i>[Signature]</i> Date/Time: <b>11/5/15 1030</b> Company: <b>Intel Company</b>		Relinquished by: <i>[Signature]</i> Date/Time: _____ Company: _____	
Relinquished by: _____ Date/Time: _____ Company: _____		Relinquished by: _____ Date/Time: _____ Company: _____		Relinquished by: _____ Date/Time: _____ Company: _____	
Custody Seals Intact: <input type="checkbox"/> Yes <input type="checkbox"/> No		Custody Seal No.:		Cooler Temperature(s) °C and Other Remarks: <b>0210.0 IER# 11/7/15 ST</b>	





## Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-76537-1

**Login Number: 76537**

**List Number: 1**

**Creator: True, Joshua A**

**List Source: TestAmerica Denver**

Question	Answer	Comment
Radioactivity wasn't checked or is <math>\leq</math> background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.

TestAmerica Denver

4955 Yarrow Street

Arvada, CO 80002

Tel: (303)736-0100

TestAmerica Job ID: 280-77567-1

Client Project/Site: Monthly WUA Split Sampling

For:

Intel Corporation

4100 Sara Road

Mail Stop RR5-491

Rio Rancho, New Mexico 87124

Attn: Jeff Rudnik



Authorized for release by:

12/15/2015 2:26:15 PM

DiLea Bindel, Project Manager I

(303)736-0173

dilea.bindel@testamericainc.com

### LINKS

Review your project  
results through  
**TotalAccess**

Have a Question?



Visit us at:  
[www.testamericainc.com](http://www.testamericainc.com)

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*

1

2

3

4

5

6

7

8

9

10

11

12

13

14



# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Definitions . . . . .	3
Case Narrative . . . . .	4
Detection Summary . . . . .	5
Method Summary . . . . .	6
Sample Summary . . . . .	7
Client Sample Results . . . . .	8
QC Sample Results . . . . .	9
QC Association . . . . .	11
Chronicle . . . . .	12
Certification Summary . . . . .	13
Chain of Custody . . . . .	14
Receipt Checklists . . . . .	15

# Definitions/Glossary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
α	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Case Narrative

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

**Job ID: 280-77567-1**

**Laboratory: TestAmerica Denver**

## Narrative

**CASE NARRATIVE**  
**Client: Intel Corporation**  
**Project: Monthly WUA Split Sampling**  
**Report Number: 280-77567-1**

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

### RECEIPT

The samples were received on 12/04/2015; the samples arrived in good condition, properly preserved and on ice. The temperature of the cooler at receipt was 0.1° C.

### GENERAL CHEMISTRY

Due to high concentrations, sample SITE OUTFALL SPLIT SAMPLE (280-77567-1) required dilution prior to analysis for Ammonia. The reporting limits have been adjusted accordingly.

Due to high concentrations, sample SITE OUTFALL SPLIT SAMPLE (280-77567-1) required dilution prior to analysis for TKN. The reporting limits have been adjusted accordingly.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

# Detection Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**

**Lab Sample ID: 280-77567-1**

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ammonia as N	13		0.50		mg/L	5		350.1	Total/NA
Nitrogen, Kjeldahl	22		5.0		mg/L	5		351.2	Total/NA

This Detection Summary does not include radiochemical test results.

TestAmerica Denver

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

# Method Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

Method	Method Description	Protocol	Laboratory
350.1	Nitrogen, Ammonia	MCAWW	TAL DEN
351.2	Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)	MCAWW	TAL DEN

**Protocol References:**

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100



# Sample Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

---

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
280-77567-1	SITE OUTFALL SPLIT SAMPLE	Water	12/03/15 10:00	12/04/15 10:00

---

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14



# Client Sample Results

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

## General Chemistry

Client Sample ID: SITE OUTFALL SPLIT SAMPLE

Date Collected: 12/03/15 10:00

Date Received: 12/04/15 10:00

Lab Sample ID: 280-77567-1

Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	13		0.50		mg/L			12/09/15 18:32	5
Nitrogen, Kjeldahl	22		5.0		mg/L		12/11/15 21:52	12/12/15 15:59	5

# QC Sample Results

Client: Intel Corporation  
 Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

## Method: 350.1 - Nitrogen, Ammonia

**Lab Sample ID: MB 280-307201/61**  
**Matrix: Water**  
**Analysis Batch: 307201**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	ND		0.10		mg/L			12/09/15 16:46	1

**Lab Sample ID: LCS 280-307201/59**  
**Matrix: Water**  
**Analysis Batch: 307201**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	2.50	2.53		mg/L		101	90 - 110

**Lab Sample ID: LCSD 280-307201/60**  
**Matrix: Water**  
**Analysis Batch: 307201**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia as N	2.50	2.50		mg/L		100	90 - 110	1	10

**Lab Sample ID: MB 280-307510/20**  
**Matrix: Water**  
**Analysis Batch: 307510**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N	ND		0.10		mg/L			12/11/15 13:24	1

**Lab Sample ID: LCS 280-307510/18**  
**Matrix: Water**  
**Analysis Batch: 307510**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia as N	2.50	2.49		mg/L		100	90 - 110

**Lab Sample ID: LCSD 280-307510/19**  
**Matrix: Water**  
**Analysis Batch: 307510**

**Client Sample ID: Lab Control Sample Dup**  
**Prep Type: Total/NA**

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia as N	2.50	2.49		mg/L		100	90 - 110	0	10

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll)

**Lab Sample ID: MB 280-307535/3-A**  
**Matrix: Water**  
**Analysis Batch: 307569**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**  
**Prep Batch: 307535**

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrogen, Kjeldahl	ND		1.0		mg/L		12/11/15 21:52	12/12/15 15:08	1

TestAmerica Denver

# QC Sample Results

Client: Intel Corporation  
 Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

## Method: 351.2 - Nitrogen, Total Kjeldahl (Colorimetric, Semi-Automated Block Digester, AAll) (Continued)

Lab Sample ID: LCS 280-307535/1-A  
 Matrix: Water  
 Analysis Batch: 307569

Client Sample ID: Lab Control Sample  
 Prep Type: Total/NA  
 Prep Batch: 307535  
 %Rec.

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	Limits
Nitrogen, Kjeldahl	6.00	6.16		mg/L		103	90 - 110

Lab Sample ID: LCSD 280-307535/2-A  
 Matrix: Water  
 Analysis Batch: 307569

Client Sample ID: Lab Control Sample Dup  
 Prep Type: Total/NA  
 Prep Batch: 307535  
 %Rec. RPD

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Nitrogen, Kjeldahl	6.00	6.16		mg/L		103	90 - 110	0	25

# QC Association Summary

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

## General Chemistry

### Analysis Batch: 307201

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-77567-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	350.1	
LCS 280-307201/59	Lab Control Sample	Total/NA	Water	350.1	
LCSD 280-307201/60	Lab Control Sample Dup	Total/NA	Water	350.1	
MB 280-307201/61	Method Blank	Total/NA	Water	350.1	

### Analysis Batch: 307510

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCS 280-307510/18	Lab Control Sample	Total/NA	Water	350.1	
LCSD 280-307510/19	Lab Control Sample Dup	Total/NA	Water	350.1	
MB 280-307510/20	Method Blank	Total/NA	Water	350.1	

### Prep Batch: 307535

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-77567-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	
LCS 280-307535/1-A	Lab Control Sample	Total/NA	Water	351.2	
LCSD 280-307535/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	
MB 280-307535/3-A	Method Blank	Total/NA	Water	351.2	

### Analysis Batch: 307569

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
280-77567-1	SITE OUTFALL SPLIT SAMPLE	Total/NA	Water	351.2	307535
LCS 280-307535/1-A	Lab Control Sample	Total/NA	Water	351.2	307535
LCSD 280-307535/2-A	Lab Control Sample Dup	Total/NA	Water	351.2	307535
MB 280-307535/3-A	Method Blank	Total/NA	Water	351.2	307535

# Lab Chronicle

Client: Intel Corporation  
Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

**Client Sample ID: SITE OUTFALL SPLIT SAMPLE**

**Lab Sample ID: 280-77567-1**

**Date Collected: 12/03/15 10:00**

**Matrix: Water**

**Date Received: 12/04/15 10:00**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	350.1		5			307201	12/09/15 18:32	KAM	TAL DEN
Total/NA	Prep	351.2			25 mL	25 mL	307535	12/11/15 21:52	MW1	TAL DEN
Total/NA	Analysis	351.2		5	25 mL	25 mL	307569	12/12/15 15:59	MW1	TAL DEN

**Laboratory References:**

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

# Certification Summary

Client: Intel Corporation  
 Project/Site: Monthly WUA Split Sampling

TestAmerica Job ID: 280-77567-1

## Laboratory: TestAmerica Denver

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		2907.01	12-31-15 *
A2LA	ISO/IEC 17025		2907.01	12-31-15
Alabama	State Program	4	40730	09-30-12 *
Alaska (UST)	State Program	10	UST-30	04-05-16
Arizona	State Program	9	AZ0713	12-19-16
Arkansas DEQ	State Program	6	88-0687	06-01-16
California	State Program	9	2513	08-31-16
Connecticut	State Program	1	PH-0686	09-30-16
Florida	NELAP	4	E87667	06-30-16
Georgia	State Program	4	N/A	01-09-16
Illinois	NELAP	5	200017	04-30-16
Iowa	State Program	7	370	11-30-16
Kansas	NELAP	7	E-10166	04-30-16
Louisiana	NELAP	6	02096	06-30-16
Maine	State Program	1	CO0002	03-03-17
Minnesota	NELAP	5	8-999-405	12-31-15
Nevada	State Program	9	CO0026	07-31-16
New Hampshire	NELAP	1	205310	04-28-16
New Jersey	NELAP	2	CO004	06-30-16
New York	NELAP	2	11964	04-01-16
North Carolina (WW/SW)	State Program	4	358	12-31-16
North Dakota	State Program	8	R-034	01-09-16
Oklahoma	State Program	6	8614	08-31-16
Oregon	NELAP	10	4025	01-09-16
Pennsylvania	NELAP	3	68-00664	07-31-16
South Carolina	State Program	4	72002001	01-09-16
Texas	NELAP	6	T104704183-15-11	09-30-16
USDA	Federal		P330-13-00202	07-02-16
Utah	NELAP	8	CO00026	07-31-16
Virginia	NELAP	3	460232	06-14-16
Washington	State Program	10	C583	08-03-16
West Virginia DEP	State Program	3	354	11-30-16
Wisconsin	State Program	5	999615430	08-31-16
Wyoming (UST)	A2LA	8	2907.01	12-31-15

\* Certification renewal pending - certification considered valid.



# Login Sample Receipt Checklist

Client: Intel Corporation

Job Number: 280-77567-1

**Login Number: 77567**

**List Number: 1**

**Creator: White, Denise E**

**List Source: TestAmerica Denver**

Question	Answer	Comment
Radioactivity wasn't checked or is $\leq$ background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is $<6\text{mm}$ (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



RR5 GREASE TRIP Pump

# AAA PUMPING SERVICE, INC.

P.O. BOX 12186 ALBUQUERQUE, NM 87195  
Ph: (505) 345-3965 Fax: (505) 243-0314

**DISPOSAL  
TRIP MANIFEST**  
**44970**

### WASTE PRODUCER

PRODUCER'S NAME INTEK RRS MARK GRIFFIN APPROX. GALLONS 150 DATE OF COLLECTION 7/16/15  
 ADDRESS 4100 Sara Rd PHONE 270 7410  
 CITY Rio Rancho STATE nm ZIP \_\_\_\_\_ WASTE TYPE:  
 SAND OR GRIT  GREASE  
 OTHER - DESCRIBE \_\_\_\_\_  
 RESPON. PERSON X [Signature] DATE 7/16/15

### WASTE TRANSPORTER

TRUCK DRIVER'S SIGNATURE X [Signature] DATE 7/16/15 PERMIT NO. \_\_\_\_\_

### DISPOSAL SITE DATE STAMP

### HAULER'S BILLING INFORMATION

675.00  
 TAX 48.52  
 -----  
 753.52

Pump trap

INVOICE NUMBER 23771 INVOICE DATE 7/16/15 INVOICE AMOUNT 753.52

Responsible person signing for Waste Producer certifies that there is nothing hazardous in the materials being pumped. AAA SEPTIC TANK & PUMPING SERVICE, INC. reserves the right to file legal action against the Waste Producer for falsification of information.

Disposal Trip Manifest # 4497D

RRS TRAP BY DISH/RET WASH  
Rio Rancho Grease Removal Device Report

6T-00-DA1-25

RA1 Grease Interceptor		Comments
Inspection Date	7-16-15	Service Date 7-16-15 Technician/Company PATRICK SIERRA AAA Pumping
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches	
Depth of FOG (fats, oils, grease)	3 Inches	
Depth of Solids	1 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	26.666%
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	50	
Location where grease was disposed of:	AAA	AAA Pumping Yard



D.J.M. # 44997B  
 6T-00-DA1-26

RS TRAP UNDER COUNTER  
 Rio Rancho Grease Removal Device Report

RAI Grease Interceptor		Comments
Inspection Date <u>7-16-15</u>	Service Date <u>7-16-15</u>	Technician/Company <u>ARTUR SIERRA/AAA RMP</u>
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	<u>15</u> Inches	
Depth of FOG (fats, oils, grease)	<u>1/2</u> Inches	
Depth of Solids	<u>1/2</u> Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	<u>Yes/No</u>	
Prior to opening is odor from the interceptor present 10' or greater?	<u>Yes/No</u>	
Are the access covers in need of repair?	<u>Yes/No</u>	
FOG Passing by Interceptor?	<u>Yes/No</u>	
Does grease interceptor need immediate repair?	<u>Yes/No</u>	
Are there signs the grease interceptor walls may be deteriorating?	<u>Yes/No</u>	
Are there signs the grease interceptor may be leaking?	<u>Yes/No</u>	
Was the grease interceptor pressure washed?	<u>Yes/No</u>	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	<u>Yes/No</u>	
Is there any leakage under the baffle wall?	<u>Yes/No</u>	
Was all grease removed from walls, ledges and ridges?	<u>Yes/No</u>	
Total Gallons pumped out:	<u>50</u>	
Location where grease was disposed of:	<u>AAA</u>	<u>Pumpouts Yard</u>

D.T.M. # 4497D  
 6T-00-DA1-27

RRS TRAP BY OFFICE  
 Rio Rancho Grease Removal Device Report

RA1 Grease Interceptor		Comments
Inspection Date	7-16-15	Service Date 7-16-15 Technician/Company PATRICK SIERRA/AAA PUMPING
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches	
Depth of FOG (fats, oils, grease)	1/4 Inches	
Depth of Solids	1/2 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AAA	PUMPING TRAP



D.T.M. #449710  
GT-00-DA1-28

RES TRAP NORTH WEST COFFEE  
Rio Rancho Grease Removal Device Report

Inspection Date	Service Date	Technician/Company	Comments
7-16-15	7/16/15	<del>Patrick Sierra</del> PATRICK SIERRA	AAA Pumping
RA1 Grease Interceptor			
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches		
Depth of FOG (fats, oils, grease)	1/2 Inches		
Depth of Solids	3/4 Inches		
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No		
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No		
Are the access covers in need of repair?	Yes/No		
FOG Passing by Interceptor?	Yes/No		
Does grease interceptor need immediate repair?	Yes/No		
Are there signs the grease interceptor walls may be deteriorating?	Yes/No		
Are there signs the grease interceptor may be leaking?	Yes/No		
Was the grease interceptor pressure washed?	Yes/No		
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No		
Is there any leakage under the baffle wall?	Yes/No		
Was all grease removed from walls, ledges and ridges?	Yes/No		
Total Gallons pumped out:	20		
Location where grease was disposed of:	AAA		Pumpkin's Yard

RRS GREASE TRAP Pump

# AAA PUMPING SERVICE, INC.

P.O. BOX 12186 ALBUQUERQUE, NM 87195  
Ph: (505) 345-3965 Fax: (505) 243-0314

DISPOSAL  
TRIP MANIFEST  
**51983**

RRS

## WASTE PRODUCER

PRODUCER'S NAME Intel RRS PHONE 206-7416 APPROX. GALLONS 150 DATE OF COLLECTION 8/21/15

ADDRESS 4100 SARA Rd WASTE TYPE:  SAND OR GRIT  GREASE

CITY Rio Rancho STATE NM ZIP \_\_\_\_\_  OTHER - DESCRIBE \_\_\_\_\_

RESPON. PERSON X [Signature] DATE 8/21/15

## WASTE TRANSPORTER

TRUCK DRIVER'S SIGNATURE X [Signature] DATE 8/21/15 PERMIT NO. SA7

### DISPOSAL SITE/DATE STAMP

AAA Pumping Service  
8-21-15

### HAULER'S BILLING INFORMATION

INVOICE NUMBER 24122 INVOICE DATE 8/21/15 INVOICE AMOUNT \_\_\_\_\_

Responsible person signing for Waste Producer certifies that there is nothing hazardous in the materials being pumped. AAA SEPTIC TANK & PUMPING SERVICE, INC. reserves the right to file legal action against the Waste Producer for falsification of information.



GT-00-DA1-25

Rio Rancho Grease Removal Device Report

RA1 Grease Interceptor		Comments
Inspection Date	8-21-15	Service Date 8-21-15 Technician/Company BILLY HARSO / AAA RANCHO
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches	
Depth of FOG (fats, oils, grease)	8 Inches	
Depth of Solids	3 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	OIL MUSTY FOOD ON BOTTOM WORKING WITH EARL TO MAKE/REPAIR TO GET OIL LEVEL DOWN?
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	50	
Location where grease was disposed of:	AAA	PUMPING TRAP

D.T.M. # 51983  
 ET-00-DA1-26

RRS TRAP UNDER TABLE  
 Rio Rancho Grease Removal Device Report

RA1 Grease Interceptor		Comments
Inspection Date <u>8-21-15</u>	Service Date <u>8-21-15</u>	Technician/Company <u>BILLY HARVEY</u>
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	<u>15</u> Inches	
Depth of FOG (fats, oils, grease)	<u>1/8</u> Inches	
Depth of Solids	<u>1/8</u> Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/ <u>No</u>	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/ <u>No</u>	
Are the access covers in need of repair?	Yes/ <u>No</u>	
FOG Passing by Interceptor?	Yes/ <u>No</u>	
Does grease interceptor need immediate repair?	Yes/ <u>No</u>	
Are there signs the grease interceptor walls may be deteriorating?	Yes/ <u>No</u>	
Are there signs the grease interceptor may be leaking?	Yes/ <u>No</u>	
Was the grease interceptor pressure washed?	Yes/ <u>No</u>	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/ <u>No</u>	
Is there any leakage under the baffle wall?	Yes/ <u>No</u>	
Was all grease removed from walls, ledges and ridges?	Yes/ <u>No</u>	
Total Gallons pumped out:	<u>50</u>	
Location where grease was disposed of:	<u>AAA RAMPAGE YARD</u>	



D.J.M. # 51982

6T-00-DA1-27

RAS TRAP BY OFFICE  
Rio Rancho Grease Removal Device Report

Inspection Date 8-21-15 Service Date 8-21-15 Technician/Company BILLY HARSO AAA Plumbing  
RA1 Grease Interceptor Comments

Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches	
Depth of FOG (fats, oils, grease)	1/4 Inches	
Depth of Solids	1/2 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AAA Plumbing	

D. T. 111, # 51983  
 67-00-041-28

RRS-TRAP NORTH WEST / COFFEE  
 Rio Rancho Grease Removal Device Report

RA1 Grease Interceptor		Comments
Inspection Date	8-21-15	Service Date 8-21-15 Technician/Company Billy Harso / AAA Pumping
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches	
Depth of FOG (fats, oils, grease)	1/8 Inches	
Depth of Solids	1 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AAA Pumping Yard	



RR5 GREASE TRAP PUMP

# AAA PUMPING SERVICE, INC.

P.O. BOX 12186 ALBUQUERQUE, NM 87195  
Ph: (505) 345-3965 Fax: (505) 243-0314

DISPOSAL  
TRIP MANIFEST  
**52481**

RR5

## WASTE PRODUCER

PRODUCER'S NAME Intel RR5 PHONE 270-7410 APPROX. GALLONS 150 DATE OF COLLECTION 9/18/15  
ADDRESS 4100 SARA Rd WASTE TYPE:  
CITY Las Luncho STATE NM ZIP \_\_\_\_\_  SAND OR GRIT  GREASE  
 OTHER - DESCRIBE \_\_\_\_\_  
RESPON. PERSON X [Signature] DATE 9/18/15

## WASTE TRANSPORTER

TRUCK DRIVER'S SIGNATURE X [Signature] DATE 9/18/15 PERMIT NO. \_\_\_\_\_

### DISPOSAL SITE DATE STAMP

### HAULER'S BILLING INFORMATION

AAA Pumping Service

9-18-15

INVOICE NUMBER 24506 INVOICE DATE 9/18/15 INVOICE AMOUNT \_\_\_\_\_

Responsible person signing for Waste Producer certifies that there is nothing hazardous in the materials being pumped. AAA SEPTIC TANK & PUMPING SERVICE, INC. reserves the right to file legal action against the Waste Producer for falsification of information.

DISPOSAL TRIP MANIFEST # 50481

RRS TRAP BY POT WASH

### Rio Rancho Grease Removal Device Report

GT-00-DA1-25

Inspection Date <u>9-18-15</u> Service Date <u>9-18-15</u> Technician/Company <u>BILLY HARJO AAA Pumping</u>	
RA1 Grease Interceptor	
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches
Depth of FOG (fats, oils, grease)	8 Inches
Depth of Solids	1 Inches
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No
Are the access covers in need of repair?	Yes/No
FOG Passing by Interceptor?	Yes/No
Does grease interceptor need immediate repair?	Yes/No
Are there signs the grease interceptor walls may be deteriorating?	Yes/No
Are there signs the grease interceptor may be leaking?	Yes/No
Was the grease interceptor pressure washed?	Yes/No
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No
Is there any leakage under the baffle wall?	Yes/No
Was all grease removed from walls, ledges and ridges?	Yes/No
Total Gallons pumped out:	50
Location where grease was disposed of:	AAA Pumping Yard

Comments

NOTE: GREASE IS NOT BAD - (MOSTLY OIL)

WORKING WITH COOKS AND DISH WASHER TO GET OIL LEVELS DOWN



D.T.M. \* 52481

R.R.S TRAP UNDER TABLE

### Rio Rancho Grease Removal Device Report

GT-00-DA1-26

Inspection Date 9-18-15 Service Date 9-18-15 Technician/Company BULLY HARSO AAA Pumping

#### RA1 Grease Interceptor

#### Comments

Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches
Depth of FOG (fats, oils, grease)	1/8 Inches
Depth of Solids	1/8 Inches
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No
Are the access covers in need of repair?	Yes/No
FOG Passing by Interceptor?	Yes/No
Does grease interceptor need immediate repair?	Yes/No
Are there signs the grease interceptor walls may be deteriorating?	Yes/No
Are there signs the grease interceptor may be leaking?	Yes/No
Was the grease interceptor pressure washed?	Yes/No
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No
Is there any leakage under the baffle wall?	Yes/No
Was all grease removed from walls, ledges and ridges?	Yes/No
Total Gallons pumped out:	50
Location where grease was disposed of:	AAA Pumping YARD

D.T.M. # 52481

GT-00-DA1-27

RRS TRAP BY OFFICE

### Rio Rancho Grease Removal Device Report

Inspection Date 9-18-15 Service Date 9-18-15 Technician/Company BILLY HARTO AAA PUMPING

RA1 Grease Interceptor

Comments

Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches
Depth of FOG (fats, oils, grease)	1/2 Inches
Depth of Solids	1/2 Inches
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No
Are the access covers in need of repair?	Yes/No
FOG Passing by Interceptor?	Yes/No
Does grease interceptor need immediate repair?	Yes/No
Are there signs the grease interceptor walls may be deteriorating?	Yes/No
Are there signs the grease interceptor may be leaking?	Yes/No
Was the grease interceptor pressure washed?	Yes/No
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No
Is there any leakage under the baffle wall?	Yes/No
Was all grease removed from walls, ledges and ridges?	Yes/No
Total Gallons pumped out:	20
Location where grease was disposed of:	AAA PUMPING YARD



D.T.M. # 52481  
 ARS TRAP NORTH/WEST COFFEE  
 Rio Rancho Grease Removal Device Report

GT-00-DA1-28

Inspection Date <u>9-18-15</u> Service Date <u>9-18-15</u> Technician/Company <u>BILLY HARJO AAA PUMPING</u>		Comments
RA1 Grease Interceptor		
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches	
Depth of FOG (fats, oils, grease)	1/2 Inches	
Depth of Solids	Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AAA PUMPING YARD	

TRAP  
RR5 GREASE PUMP

# AAA PUMPING SERVICE, INC.

P.O. BOX 12186 ALBUQUERQUE, NM 87195  
Ph: (505) 345-3965 Fax: (505) 243-0314

DISPOSAL  
TRIP MANIFEST  
53359

RR5

## WASTE PRODUCER

PRODUCER'S NAME Intel RR5 PHONE 270-7410 APPROX. GALLONS 150 DATE OF COLLECTION 10/16/15  
ADDRESS 4106 Sara Rd WASTE TYPE:  
CITY Rio Rancho STATE NM ZIP \_\_\_\_\_  SAND OR GRIT  GREASE  
RESPON. PERSON X [Signature] DATE 10/16/15  OTHER - DESCRIBE \_\_\_\_\_

## WASTE TRANSPORTER

TRUCK DRIVER'S SIGNATURE X [Signature] DATE 10/16/15 PERMIT NO. \_\_\_\_\_

### DISPOSAL SITE DATE STAMP

AAA Pumping Service  
10-16-15

### HAULER'S BILLING INFORMATION

INVOICE NUMBER 24810 INVOICE DATE 10/16/15 INVOICE AMOUNT \_\_\_\_\_

Responsible person signing for Waste Producer certifies that there is nothing hazardous in the materials being pumped. AAA SEPTIC TANK & PUMPING SERVICE, INC. reserves the right to file legal action against the Waste Producer for falsification of information.



DTM. # 52359

RRS TRAP BY PRT WASH  
Rio Rancho Grease Removal Device Report

6T-00-DA1-25

RA1 Grease Interceptor		Inspection Date	Service Date	Technician/Company	Comments
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches	10-16-15	10-16-15	BILLY HARSO	AAA Pumping
Depth of FOG (fats, oils, grease)	10 Inches				GREASE 1/8 (REST OIL)
Depth of Solids	1 Inches				
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No				
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No				
Are the access covers in need of repair?	Yes/No				
FOG Passing by Interceptor?	Yes/No				
Does grease interceptor need immediate repair?	Yes/No				
Are there signs the grease interceptor walls may be deteriorating?	Yes/No				
Are there signs the grease interceptor may be leaking?	Yes/No				
Was the grease interceptor pressure washed?	Yes/No				
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No				
Is there any leakage under the baffle wall?	Yes/No				
Was all grease removed from walls, ledges and ridges?	Yes/No				
Total Gallons pumped out:	50				
Location where grease was disposed of:	AAA				PUMPING TRAP

DTM # 53359

GT-08-041-26

# RRS TRAP UNDER TABLE Rio Rancho Grease Removal Device Report

Inspection Date 10-16-15 Service Date 10-16-15 Technician/Company BLYL HARSTO/AAA PERMINS  
RA1 Grease Interceptor Comments

Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches	
Depth of FOG (fats, oils, grease)	1/8 Inches	
Depth of Solids	1/8 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	50	
Location where grease was disposed of:	AAA	PERMINS TRAP



DTM # 53359

GT-00-DA1-27

RRS TRAP BY OFFICE  
Rio Rancho Grease Removal Device Report

Inspection Date 10-16-15 Service Date 10-16-15 Technician/Company 10-16-15  
RA1 Grease Interceptor Comments

Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 inches	
Depth of FOG (fats, oils, grease)	1/4 inches	
Depth of Solids	1/4 inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AA A	Pump Pits Yard

D T M # 53359

R.R.S TRAP NORTH WEST - CREEK  
Rio Rancho Grease Removal Device Report

ST-00-DA1-28

Inspection Date 10-16-15 Service Date 10-16-15 Technician/Company BILLY HARSTO / AAA PUMPS  
RA1 Grease Interceptor Comments

Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches	
Depth of FOG (fats, oils, grease)	1/4 Inches	
Depth of Solids	1 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AAA	PUMPS



RR5 GREASE TRAP PUMP

# AAA PUMPING SERVICE, INC.

P.O. BOX 12186 ALBUQUERQUE, NM 87195  
Ph: (505) 345-3965 Fax: (505) 243-0314

DISPOSAL  
TRIP MANIFEST  
**52621**

RR5

## WASTE PRODUCER

PRODUCER'S NAME Intel RR5 PHONE 270-7410 APPROX. GALLONS 150 DATE OF COLLECTION 11/13/15

ADDRESS 4160 SARA Rd WASTE TYPE:  SAND OR GRIT  GREASE

CITY Los Ranchos STATE NM ZIP \_\_\_\_\_  OTHER - DESCRIBE \_\_\_\_\_

RESPON. PERSON X [Signature] DATE 11/13/15

## WASTE TRANSPORTER

TRUCK DRIVER'S SIGNATURE X [Signature] DATE 11/12/15 PERMIT NO. \_\_\_\_\_

### DISPOSAL SITE DATE STAMP

### HAULER'S BILLING INFORMATION

AAA Pumping Service  
11-13-15

INVOICE NUMBER 25212 INVOICE DATE 11/13/15 INVOICE AMOUNT \_\_\_\_\_

Responsible person signing for Waste Producer certifies that there is nothing hazardous in the materials being pumped. AAA SEPTIC TANK & PUMPING SERVICE, INC. reserves the right to file legal action against the Waste Producer for falsification of information.

Rio Rancho Grease Removal Device Report

67-00-DA1-25

Inspection Date 11-13-15	Service Date 11-13-15	Technician/Company BILLY HARSO	Comments AAA Pumping
RA1 Grease Interceptor			
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches		
Depth of FOG (fats, oils, grease)	7 Inches		
Depth of Solids	2 Inches		Mostly Oil FOOD ON BOTTOM MOSTLY RICE
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No		
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No		
Are the access covers in need of repair?	Yes/No		
FOG Passing by Interceptor?	Yes/No		
Does grease interceptor need immediate repair?	Yes/No		
Are there signs the grease interceptor walls may be deteriorating?	Yes/No		
Are there signs the grease interceptor may be leaking?	Yes/No		
Was the grease interceptor pressure washed?	Yes/No		
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No		
Is there any leakage under the baffle wall?	Yes/No		
Was all grease removed from walls, ledges and ridges?	Yes/No		
Total Gallons pumped out:	50		
Location where grease was disposed of:	AAA Pumping Yard		



J.T.M. # 52621

67-00-DA1-26

RCS TRAP UNDER TABLE  
Rio Rancho Grease Removal Device Report

Inspection Date 11-13-15 Service Date 11-13-15 Technician/Company BILLY HARVEY/AAA Pump Plus  
RA1 Grease Interceptor Comments

Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches		
Depth of FOG (fats, oils, grease)	1/8 Inches		
Depth of Solids	1/8 Inches		
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No		
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No		
Are the access covers in need of repair?	Yes/No		
FOG Passing by Interceptor?	Yes/No		
Does grease interceptor need immediate repair?	Yes/No		
Are there signs the grease interceptor walls may be deteriorating?	Yes/No		
Are there signs the grease interceptor may be leaking?	Yes/No		
Was the grease interceptor pressure washed?	Yes/No		
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No		
Is there any leakage under the baffle wall?	Yes/No		
Was all grease removed from walls, ledges and ridges?	Yes/No		
Total Gallons pumped out:	50	= 50 GALS	BH
Location where grease was disposed of:	AAA	Pump Plus TRAP	

D.T. 111, # 59621  
 67-00-DA1-27

RRS TRAP BY OFFICE  
 Rio Rancho Grease Removal Device Report

RA1 Grease Interceptor		Comments
Inspection Date <u>11-13-15</u>	Service Date <u>11-13-15</u>	Technician/Company <u>BUCK HARRIS/AAA PUMPING</u>
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches	
Depth of FOG (fats, oils, grease)	1/8 Inches	
Depth of Solids	1/8 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AAA Pumping Trap	



D.T.M. # 52621

GT-00-DA1-27

RRS-TRAP

COFFEE NORTHWEST UNIT

Rio Rancho Grease Removal Device Report

Inspection Date 11-13-15

Service Date 11-13-15

Technician/Company BILLY HARTSO/AAA Repair

RA1 Grease Interceptor

Comments

Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches	
Depth of FOG (fats, oils, grease)	1/8 Inches	
Depth of Solids	1 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AAA Pumping Trap	

~~RRS GREASE TRAP PUMP~~  
RRS GREASE TRAP PUMP

# AAA PUMPING SERVICE, INC.

P.O. BOX 12186 ALBUQUERQUE, NM 87195  
Ph: (505) 345-3965 Fax: (505) 243-0314

RRS

DISPOSAL  
TRIP MANIFEST  
53003

## WASTE PRODUCER

PRODUCER'S NAME Intel-RR5 PHONE \_\_\_\_\_ APPROX. GALLONS 150 DATE OF COLLECTION 12/18/15  
ADDRESS 4100 Sara Rd WASTE TYPE:  
CITY Rio Rancho STATE NM ZIP \_\_\_\_\_  SAND OR GRIT  GREASE  
RESPON. PERSON X [Signature] DATE 12/18/15  OTHER - DESCRIBE \_\_\_\_\_

## WASTE TRANSPORTER

TRUCK DRIVER'S SIGNATURE X [Signature] DATE 12/18/15 PERMIT NO. \_\_\_\_\_

### DISPOSAL SITE DATE STAMP

AAA Pumping  
Service  
12/18/15

### HAULER'S BILLING INFORMATION

INVOICE NUMBER 075480 INVOICE DATE 12/18/15 INVOICE AMOUNT \_\_\_\_\_

Responsible person signing for Waste Producer certifies that there is nothing hazardous in the materials being pumped. AAA SEPTIC TANK & PUMPING SERVICE, INC. reserves the right to file legal action against the Waste Producer for falsification of information.



Rio Rancho Grease Removal Device Report

ET-00-DA1-25

Inspection Date 12-18-15 Service Date 12-18-15 Technician/Company ERAUCI/SCA DIAZ/AAA Pumpaks

	RA1 Grease Interceptor	Comments
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches	
Depth of FOG (fats, oils, grease)	6 Inches	Mostly Oil
Depth of Solids	1 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	50	
Location where grease was disposed of:	AAA	PUMPINGS YARD

D. T. M. # 53603

GT-00-DA1-26

TAP UNDER TABLE  
Rio Rancho Grease Removal Device Report

Inspection Date 12-18-15 Service Date 12-18-15 Technician/Company Fernando Diaz/AAA Pumping

RA1 Grease Interceptor	Comments
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	15 Inches
Depth of FOG (fats, oils, grease)	1/4 Inches
Depth of Solids	1/4 Inches
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No
Are the access covers in need of repair?	Yes/No
FOG Passing by Interceptor?	Yes/No
Does grease interceptor need immediate repair?	Yes/No
Are there signs the grease interceptor walls may be deteriorating?	Yes/No
Are there signs the grease interceptor may be leaking?	Yes/No
Was the grease interceptor pressure washed?	Yes/No
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No
Is there any leakage under the baffle wall?	Yes/No
Was all grease removed from walls, ledges and ridges?	Yes/No
Total Gallons pumped out:	50
Location where grease was disposed of:	AAA Pumping YARD



D.T.M. #53003

6-T-00-DA1-27

TRAP BY OFFICE  
Rio Rancho Grease Removal Device Report

Inspection Date 12-18-15 Service Date 12-18-15 Technician/Company BRANCO/DIY2/AAA Pump

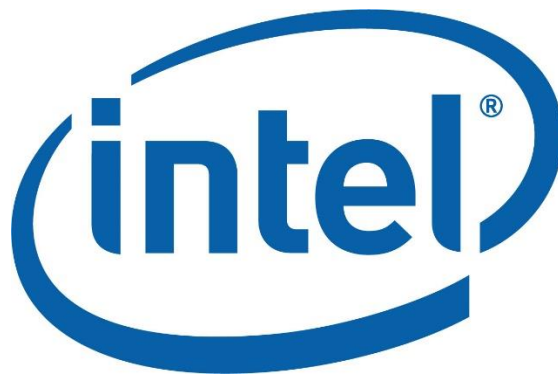
RAI Grease Interceptor		Comments
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches	
Depth of FOG (fats, oils, grease)	1/2 Inches	
Depth of Solids	1/4 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease Interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AAA	Pumping Yard

D. T. N. 1. # 53DD03  
 67-00-041-28

TRAP FOR COFFEE AREA - NORTH WEST  
 Rio Rancho Grease Removal Device Report

RA1 Grease Interceptor		Comments
Inspection Date	12-18-15	Service Date 12-18-15 Technician/Company FRANKESCO DIAZ/AAA PUMPING
Depth of Interceptor from Invert at Outlet Tee to Bottom of Outlet Chamber	12 Inches	
Depth of FOG (fats, oils, grease)	1/4 Inches	
Depth of Solids	3/4 Inches	
Is the accumulated FOG and solids occupying greater than 25% of the interceptor capacity	Yes/No	
Prior to opening is odor from the interceptor present 10' or greater?	Yes/No	
Are the access covers in need of repair?	Yes/No	
FOG Passing by Interceptor?	Yes/No	
Does grease interceptor need immediate repair?	Yes/No	
Are there signs the grease interceptor walls may be deteriorating?	Yes/No	
Are there signs the grease interceptor may be leaking?	Yes/No	
Was the grease interceptor pressure washed?	Yes/No	
Inlet Tee, Baffle Wall Elbow and Outlet Tee pressure washed?	Yes/No	
Is there any leakage under the baffle wall?	Yes/No	
Was all grease removed from walls, ledges and ridges?	Yes/No	
Total Gallons pumped out:	20	
Location where grease was disposed of:	AAA PUMPING - YARD	

**Intel New Mexico  
Toxic Organic (Solvent) Management Plan**



Submitted to:

Albuquerque Bernalillo County  
Water Utility Authority  
Industrial Waste Pretreatment Section

Prepared By:

Intel Corporation  
4100 Sara Road  
Rio Rancho, New Mexico 87124

2016 Revision



Intel New Mexico  
Toxic Organic (Solvent) Management Plan

**Table of Contents**

1.0 Introduction

2.0 Chemical Use Approval and Control

3.0 Waste Management Practices

4.0 Spill Prevention and Clean Up

Appendix A: Intel Environmental “2020 Goals”

# Intel New Mexico Toxic Organic (Solvent) Management Plan

## 1.0 Introduction

This 2016 update of the Intel New Mexico site Toxic Organic Management Plan (TOMP) is prepared to meet the requirements of Wastewater Industrial Discharge Permit 2021A. Per Endorsement TR6, the Permittee is required to submit a TOMP to the Industrial Waste Engineer every two years, and when changes to the plan occur. The Plan shall identify all toxic organics used onsite, quantities used and stored at the facility, procedures followed to prevent discharge and spills of these materials to the sanitary sewer, and the method of disposal used in place of discharge to the sanitary sewer. The 2016 revision should be submitted the Industrial Waste Engineer no later than April 1, 2016.

Intel Corporation located at 4100 Sara Road, Rio Rancho, New Mexico 87124 operates a 300 millimeter wafer semiconductor manufacturing facility. The site also operates various chemical, module repair, and computer labs, a large scale computing server farm, and multiple office and support buildings.

Semiconductor manufacturing processes use various organic compounds, generally classified as resists, cleaners/solvents, and etchants. The resists are mixtures of photoactive compounds, resins, and other non-halogenated solvents used to image a circuit pattern onto the Silicon wafer. Cleaning solvents are used to rinse the wafers and clean equipment parts. Common cleaning solvents include Acetone, Isopropyl Alcohol (IPA), Tetramethyl Ammonium Hydroxide (TMAH), Ethylene Glycol (EG), and n-Methyl Pyrrolidone (NMP). Etchants are used to chemically remove unwanted materials from the wafer. The chemical labs use similar chemicals but in limited quantities. Examples of organic etchants used at Intel Rio Rancho include methyl sulfonic acid (MSA), sulfolane, and diethylene glycol monoethyl ether (DGMEE).

The U.S. EPA has promulgated wastewater effluent guidelines for semiconductor manufacturing in 40 CFR 469 Subpart A, which includes a list of Total Toxic Organics (TTOs) for the semiconductor industry. No TTOs listed in 40 CFR 469 Subpart A are used in Intel's manufacturing process in Rio Rancho.

## 2.0 Chemical Use Approval and Control

Intel maintains a chemical approval process that serves to prevent unauthorized introduction of chemicals at the NM site, thereby keeping them out of wastewater discharged to the Albuquerque Bernalillo County Water Utility Authority (ABCWUA). Every chemical used on site, including those used in the manufacturing process, must be approved by a site Environmental Engineer and Industrial Hygienist. Part of the approval process includes a review of the chemical constituents against various lists of toxic and hazardous chemicals regulated by the EPA, the New Mexico Environment Department (NMED), ABCWUA, and other applicable agencies.

In addition, for process technologies transferred to New Mexico from the process development site are analyzed and vetted based on Intel's "Design for Environment"

## Intel New Mexico Toxic Organic (Solvent) Management Plan

(DfE) criteria. This process aims to minimize waste, emissions, water, and energy use with each new process technology. Intel has also implemented a chemical “Green Screen” process that searches for the best environmental alternative for each process chemical with consideration to the process requirements, which Intel will use for 100% of new chemicals and gases used in its process by 2020 (See Appendix A for Intel’s 2020 Environmental Goals). The program aims to use chemicals that have a reduced “cradle to grave” environmental impact during their manufacture, use, and disposal, thus reduce the amount of hazardous wastes generated from the manufacturing process at the source. The screening process is completed before a process technology is finalized and transferred to any of Intel’s High Volume Manufacturing (HVM) sites, including New Mexico.

For non-technology transfer process chemicals, such as pilot chemicals or facilities/maintenance chemicals, a request must be completed and approved at the site level before the new chemical can be brought on site. Intel’s Purchasing Department verifies that all chemicals have been approved prior to ordering any chemicals.

Review of new chemicals includes information on the chemical constituents, concentrations, use locations, use type, and material Safety Data Sheet (SDS) content. This information is used to determine waste management, treatment (if applicable), personnel protective equipment, and disposal methods.

### **3.0 Waste Management Practices**

Intel’s waste/wastewater utilities and collection systems are constructed to ensure proper segregation and treatment of waste and wastewaters. No open trenches or piping cross-connections are allowed between the systems. There are no open floor drains in manufacturing areas except for those directly servicing emergency showers. Separate piping and collection systems have been constructed for the following liquid waste streams:

1. Corrosive wastewater
2. Fluoride-bearing wastewater
3. Ammonium Fluoride-bearing wastewater
4. Copper-bearing wastewater
5. General Solvent Waste (GSW)
6. Corrosive Solvent Waste (CSW)
7. Spin-On-Glass Solvent Waste (SOG)

The first four waste streams listed above are treated prior to being released to the sewer. The last three waste streams (5-7) are collected separately in tanks and shipped offsite by an EPA permitted Treatment, Storage, and Disposal Facility (TSDF).

All manufacturing and support equipment is evaluated prior to installation to determine the volume and nature of liquid waste, if any. Installations are then made with drain system hookups to the appropriate treatment or collection system(s) to ensure proper waste segregation. The newly-installed equipment and drain

## Intel New Mexico Toxic Organic (Solvent) Management Plan

connections are inspected and documented through a formal Equipment Sign-Off process prior to use.

Necessary wastewater treatment systems are installed with each process technology to ensure compliance with all applicable permits and regulations. Intel New Mexico has a robust pretreatment program that treats for wastewater ammonia, fluorides, metals, and elementary neutralization prior to discharge to the POTW. Many of the organic solvents used in the process drain to segregated collection systems and shipped to an approved TSDf for treatment & disposal. This ensures that all wastewater leaving the New Mexico site is well within applicable limits, and impact to the POTW is minimized.

Some liquid organic wastes, such as specialty oils and viscous organic chemicals, are collected in 55-gallon drums. These drums are shipped off-site to an EPA permitted TSDf. All storage facilities have secondary containment systems and are inspected on a weekly basis.

Some organic chemicals that are present in some manufacturing process steps do enter the wastewater system. For example, diethylene glycol monoethyl ether (DGME) and sulfolane from the wafer-rinsing baths are drained to the Acid Neutralization Wastewater system. Treatability studies of these and all Intel wastewater pollutants have been completed prior to implementing any new process technology to ensure no issues arise with discharge permit compliance, POTW process upset, or other pertinent concerns.













### **4.0 Spill Prevention and Clean Up**

Liquid chemicals are delivered through double-contained piping to manufacturing areas. There is no underground chemical supply piping at Intel. There are multiple alarmed leak detection systems for immediate notification of spills or releases. Bottled chemicals are transported in carts designed to contain any spill.

Intel maintains Full Time Responder Teams (FRST) and Emergency Response Teams (ERT) assigned to all areas of the site, including manufacturing, support, and office areas. FRST personnel are onsite 24-hours per day and respond within minutes to any spill or emergency situation. Supporting ERT personnel are subject matter experts trained to respond to emergencies and knowledgeable on the hazards in the areas they work.

Wastes generated from all chemical spills, including organic spills, are collected and disposed of in accordance with all applicable regulations. Additionally, secondary containments in chemical docks and loading areas are designed to contain any chemical spill and prevent chemicals from entering the storm water or sanitary sewer systems. Industrial areas that commonly see chemical traffic are sealed with a Chemical Resistant Coating (CRC) to contain all chemical spills and prevent degradation of the outside surface or inside flooring.

## Appendix A: Intel Environmental “2020 Goals”, 2014 Corporate Responsibility Report

Goals and Performance		
2020 Environmental Goals	2014 Performance	
Reduce direct greenhouse gas (GHG) emissions by 10% on a per unit basis <sup>1</sup> by 2020 from 2010 levels.	In 2014, our GHG emissions were down 22% on a per unit basis compared to 2010 levels, and with continued investment in emissions reducing initiatives, we believe we are on track to reach this goal.	
Reduce water use on a per unit basis below 2010 levels by 2020.	Our per unit water usage decreased by 9% in 2014 compared to 2013 levels, and with continued investments in water conservation, we believe we will be able to meet our 2020 goal.	
Achieve cumulative energy savings of 4 billion kWh from 2012 to 2020.	We continued to invest in energy conservation projects during 2014, investing \$30 million and achieving energy savings of 211 million kWh for a total cumulative energy savings of 1.6 billion kWh. Taking into account other planned investments, we are on track to reach our goal.	
Achieve zero hazardous waste to landfill by 2020.	In 2014, we sent 0% of our hazardous waste generated to landfill, and are on track toward achieving our 2020 goal.	
Achieve 90% non-hazardous waste recycle rate by 2020.	We recycled 86% of our non-hazardous waste generated in 2014, and are on track to meet our 2020 goal.	
Reduce hazardous waste generation by 10% on a per unit basis <sup>1</sup> by 2020 from 2010 levels.	Based on our calculations and projections, we do not believe we will be able to achieve our 2020 goal. We have decided to eliminate this goal, and focus on reducing the amount of hazardous waste we send to landfill.	
Implement an enhanced green chemistry screening and selection process for 100% of new chemicals and gases by 2020.	We continue to make progress toward our green chemistry screening and selection process for 100% of new chemicals and gases, and believe we will be able to achieve our 2020 goal.	
Design all new buildings to a minimum LEED* Silver certification between 2010 and 2020.	We successfully designed all new buildings to a minimum LEED* Silver certification, and have revised the goal to design all new buildings to a minimum LEED* Gold certification level between 2015 and 2020.	
Increase the energy efficiency of notebook computers and data center products 25x by 2020 from 2010 levels. <sup>2</sup>	We are working with industry partners to accomplish this aggressive goal, and believe we are on track to achieve it.	
 Achieved  Partially Achieved or on Track  Not Met		
<small><sup>1</sup> Based on the number of die produced and made available for sale. <sup>2</sup> Data center energy efficiency is determined by server energy efficiency (as measured by SPECpower_ssj2008 or equivalent publications and using a 2010 baseline of an E56xx series processor-based server platform) as well as technology adoption that raises overall data center work output (such as virtualization technology). Notebook computer energy efficiency is determined by average battery life, battery capacity, and number of recharge cycles of volume notebook computers in that model year.</small>		