State of Utah

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Department of
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DIVISION OF WATER QUALITY
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Director

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OCT 3 0 2014

CERTIFIED MAIL
(Return Receipt Requested)

Lance Wood, General Manager
Central Weber Sewer Improvement District
2618 West Pioneer Road
Ogden, UT 84404

Dear Mr. Wood:

Subject: Central Weber Sewer Improvement District UPDES Permit UT0021911

Enclosed is UPDES permit No. UT0021911 for your facility. Copies of EPA form 3320-1, Discharge Monitoring Report (DMR) forms, for reporting and self-monitoring requirements as specified in the permit, can be sent via e-mail, if requested. This permit will become effective on November 1, 2014, subject to the right of appeal in accordance with the provisions of *Utah Administrative Code*, Section R317-9.

As the State agency charged with the administration of issuing UPDES Permits, we are continuously looking for ways to improve our quality of service to you. In effort to improve the State UPDES permitting process we are asking for your input. Since our customer permittee base is limited, your input is important. Please take a few moments to complete an online survey (Go to www.waterquality.utah.gov and click on the 'Give Feedback to DWQ' button on the left side of page.) The results will be used to improve our quality and responsiveness to our permittees and give us feedback on customer satisfaction. We will address the issues you have identified on an ongoing basis.

If you have any questions regarding this matter, please contact Ken Hoffman at (801) 536-4313 or kenhoffman@utah.gov.

Sincerely,

John Kennington, P.E. Manager
UPDES Engineering Section

JK:JR:pe

Document Date 10/30/2014

DWQ-2014-014290

Enclosures (3):
1. Fact Sheet/Statement of Basis, (DWQ-2014-001067)
2. Waste Load Analysis, (DWQ-2014-011219)
3. Permit, (DWQ-2014-001066)

cc: Amy Clark, EPA Region VIII (w/ encl via e-mail)
Lou Cooper, Weber-Morgan Health Department (w/o encl)
Jeff Kirkman, Plant Superintendent (w/o encl)
Brett Nelson, Pretreatment Coordinator (w/o encl)

DWQ-2014-014105

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STATEMENT OF BASIS
CENTRAL WEBER SEWER IMPROVEMENT DISTRICT
RENEWAL PERMIT: DISCHARGE, BIOSOLIDS & STORM WATER
UPDES PERMIT NUMBER: UT0021911
UPDES BIOSOLIDS PERMIT NUMBER: UTL-021911
UPDES MULTI-SECTOR STORM WATER GENERAL PERMIT NUMBER: UTR000000
MAJOR MUNICIPAL

FACILITY CONTACTS

Person Name:	Lance Wood	Person Name:	Jeff Kirkman
Position:	General Manager	Position:	Plant Superintendent
Person Name:	Kevin Hall	Person Name:	Brett Nelson
Position:	Technical Director	Position:	Pretreatment Coordinator

Facility Name:	Central Weber Sewer Improvement District
Address:	2618 West Pioneer Road Ogden, Utah 84404
Telephone:	(801) 731-3011

DESCRIPTION OF FACILITY

Originally placed in service in 1959, the Central Weber Sewer Improvement District (CWSID) uses a single-stage trickling filter treatment process with chlorination and dechlorination. In 2011 an upgrade was completed of the treatment plant that increased the capacity of the treatment plant to 69.5 MGD. The upgrade is a parallel activated sludge treatment plant. The upgrade included a new headwork's facility, raw sludge pump station, two primary clarifiers, aeration basins with a blower building, four secondary clarifiers, a chlorine contact basin, a dechlorination building, two anaerobic digesters with a digester control building, a sludge thickening building, and a 9 foot diameter effluent pipeline to the weber river. The facility serves the area including the towns of Farr West, Hooper, Harrisville, North Ogden, Ogden, Pleasant View, Marriott-Slaterville, Riverdale, South Ogden, West Haven, South Weber, Washington Terrace, Weber County and portions of Plain City, Roy and Uintah. The facility is located at latitude **41°16'18"** and longitude **112°02'49"**.

SUMMARY OF CHANGES FROM PREVIOUS PERMIT

Changes to the discharge from Outfalls 001 and 002 are due to new wasteload analysis (WLA) and the increase in permitted flow, which is a result of the upgrade of the treatment plant. Due to the increase in permitted flow the facility has completed an anti-degradation review which is included in the permit attachments. The WLA includes changes to the water quality standards and steam standards for the Weber River and the Warren Canal.

CWSID was granted a flow varied discharge for Outfalls 001 and 002. The discharge will be monitored for flow which will be required to be monitored continuously with a flow meter at the effluent. The WLA Addendum includes details regarding the flow variations.

DISCHARGE

DESCRIPTION OF DISCHARGE

Outfall	Description of Discharge Point
001	Located at latitude 41°16'18" and longitude 112°02'49". The discharge from Outfall 001 flows into the Weber River and finally the Great Salt Lake.
002	The discharge from Outfall 002 flows into the Warren Canal, which is tributary of the Great Salt Lake. It may also discharge back into the Weber River through a downstream controlled overflow gate.

RECEIVING WATERS AND STREAM CLASSIFICATION

The Warren Canal is classified as a Class 4 water and the Weber River is classified as a Class 2B, 3C, 3D, and 4 water according to *Utah Administrative Code (UAC) R317-2-13*:

Class 2B	Protected for infrequent primary contact recreation. Also protected for secondary contact recreation where there is a low likelihood of ingestion of water or a low degree of bodily contact with the water. Examples include, but are not limited to, wading, hunting, and fishing.
Class 3C	Protected for nongame fish and other aquatic life, including the necessary aquatic organisms in their food chain.
Class 3D	Protected for waterfowl, shore birds and other water oriented wildlife not included in Class 3A, 3B, or 3C, including the necessary aquatic organisms in their food chain.
Class 4	Protected for agricultural uses including irrigation of crops and stock watering.

BASIS FOR EFFLUENT LIMITATIONS

Limitations on total suspended solids (TSS), biochemical oxygen demand (BOD_5), E-coli and pH are based on current Utah Secondary Treatment Standards, *UAC R317-1-3.2*. A variance for the percent removal requirements of TSS and BOD_5 will be continued from the previous permit. In accordance with *UAC R317-1-3.E*, this variance was granted based on the low influent concentration, which is due to inflow and infiltration (I/I), and the infeasibility of the removal of that I/I based on cost of the removal. The oil and grease limit is based on best professional judgment (BPJ).

Total residual chlorine (TRC), ammonia, dissolved oxygen (DO), copper and mercury limits are determined by wasteload analysis, which is attached. The permit limitations are stated in the following tables.

The facility will be required to test for chronic toxicity. This is because acute toxicity will be detected in the chronic biomonitoring test and the permittee has consistently passed acute testing in

the past. If chronic toxicity occurs that might be or is believed to be due to an acute toxicity failure, then the facility may be required to test for acute toxicity as per the Directors requirements. The Chronic WET must pass with an IC_{25} of > 75% effluent.

In order for the limits below to be applicable the following conditions must be met:

No discharge is allowed from Outfall 001.
Flow from the Warren Canal may and/or is being returned to the Weber River.

Outfall 002				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow	69.5	NA	NA	NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L				
Summer	9.57	NA	NA	38.57
Fall	9.27	NA	NA	28.35
Spring	11.17	NA	NA	38.90
Winter	9.06	NA	NA	30.65
DO, mg/L	NA	NA	5.5	NA
TRC, mg/L				
Summer	2.508	NA	NA	3.711
Fall	0.293	NA	NA	0.412
Spring	0.616	NA	NA	0.906
Winter	0.180	NA	NA	0.263
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000021	NA	NA	0.0038
Copper, mg/L	0.064	NA	NA	0.090
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 1(a) in the wasteload analysis addendum.

In order for the limits below to be applicable the following conditions must be met:

No discharge is occurring from Outfall 001.
Flow from the Warren Canal to the Weber River is not greater than 25 MGD.

Outfall 002				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow	69.5	NA	NA	NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L				
Summer	10.86	NA	NA	38.35
Fall	11.01	NA	NA	28.97
Spring	13.17	NA	NA	40.25
Winter	10.53	NA	NA	30.99
DO, mg/L	NA	NA	5.0	NA
TRC, mg/L				
Summer	3.180	NA	NA	4.292
Fall	0.396	NA	NA	0.501
Spring	0.788	NA	NA	1.054
Winter	0.233	NA	NA	0.308
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000026	NA	NA	0.0038
Copper, mg/L	0.0807	NA	NA	0.1036
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 1(b) in the wasteload analysis addendum.

The limits below are applicable if all of the flow from the WWTP is being discharged to the Weber River from Outfall 001.

Outfall 001, Design Flow 69.5 MGD				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow, MGD	69.5	NA	NA	NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L				
Summer	4.62	NA	NA	19.63
Fall	6.43	NA	NA	20.45
Spring	6.35	NA	NA	22.95
Winter	6.42	NA	NA	27.78
DO, mg/L	NA	NA	5.0	NA
TRC, mg/L	0.017	NA	NA	0.024
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000017	NA	NA	0.003
Copper, mg/L	0.053	NA	NA	0.072
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 2 in the wasteload analysis addendum.

In order for the limits below to be applicable the following conditions must be met:

The flow from Outfall 001 must not exceed a daily maximum of 30 MGD.
Flow from the Warren Canal is not being returned to the Weber River.

Outfall 001, Daily Average Flow 25 MGD and Outfall 002, Daily Average Flow 44.5				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow, MGD e/				
Outfall 001	25	NA	NA	30
Outfall 002	44.5	NA	NA	NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L				
Summer	6.05	NA	NA	20.05
Fall	9.04	NA	NA	21.92
Spring	8.94	NA	NA	25.36
Winter	8.80	NA	NA	24.08
DO, mg/L	NA	NA	5.0	NA
TRC, mg/L	0.027	NA	NA	0.033
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000027	NA	NA	0.0042
Copper, mg/L	0.085	NA	NA	0.085
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 3(a) in the wasteload analysis addendum.

In order for the limits below to be applicable the following conditions must be met:

The flow from Outfall 001 must not exceed a daily maximum of 30 MGD.
Flow from the Warren Canal to the Weber River is 44.5 MGD.

Outfall 001, Daily Average Flow 25 MGD and Outfall 002, Daily Average Flow 44.5				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow, MGD e/				
Outfall 001	25	NA	NA	30
Outfall 002	44.5	NA	NA	NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L				
Summer	6.04	NA	NA	20.10
Fall	8.30	NA	NA	21.98
Spring	9.06	NA	NA	25.38
Winter	8.34	NA	NA	24.00
DO, mg/L	NA	NA	5.0	NA
TRC, mg/L	0.027	NA	NA	0.033
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000021	NA	NA	0.0038
Copper, mg/L	0.063	NA	NA	0.088
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 3(b) in the wasteload analysis addendum.

The Chronic WET must pass with an IC_{25} of > 75% effluent for all discharge scenarios. For additional information regarding WET see Part I of the permit or the Biomonitoring Requirements section of this document.

SELF-MONITORING AND REPORTING REQUIREMENTS

The permit will require reports to be submitted monthly and quarterly, as applicable, on DMR forms due 28 days after the end of the monitoring period. Lab sheets for biomonitoring, quarterly metals and organic toxics must be attached to the DMR.

The monitoring for metals and organic toxics will increase, this is due to the increase in the design

flow at the treatment facility. Metals will be required to be sampled for every two months. The organic toxics will be required to be sampled every six months. This sampling frequency is consistent with the "Region VII Guidance for Determining Monitoring Frequencies for the Pretreatment Program" dated October 15, 1998. The sampling for mercury and copper will be reduced to every two months consistent with the guidance. The sampling for the other parameters is consistent with the "Monitoring, Recording and Reporting Guidelines for Municipal Wastewater Treatment Facilities" developed by the Division of Water Quality and revised on December 1, 1991.

Self-Monitoring and Reporting Requirements Outfall 001 and 002			
Parameter	Frequency	Sample Type	Units
Total Flow	Continuous	Recorder	MGD
BOD_5, Influent Effluent	Daily Daily	Composite Composite	mg/L mg/L
TSS, Influent Effluent	Daily Daily	Composite Composite	mg/L mg/L
Ammonia	Daily	Grab	mg/L
DO	Daily	Grab	mg/L
TRC	Daily	Grab	mg/L
WET, Chronic Biomonitoring	Quarterly	Composite	Pass/Fail
Oil & Grease	Monthly	Grab	mg/L
Mercury	6 X Yearly	Grab	mg/L
Copper	6 X Yearly	Composite	mg/L
E-coli	Daily	Grab	#/ 100 mL
pH	Daily	Grab	SU
Metals, Influent Effluent	6 X Yearly 6 X Yearly	Composite Composite	mg/L mg/L
Organic Toxics, Influent Effluent	2 X Yearly 2 X Yearly	Grab	mg/L

TMDL

The Great Salt Lake is currently undergoing intensive study to develop numeric water quality criteria and address several water quality concerns including eutrophication (excess nutrient loading). Since the Great Salt Lake ultimately receives the effluent from Central Weber's treatment plant, the Division strongly recommends that Central Weber begin planning and evaluating alternatives for nutrient control treatment processes, specifically for nitrogen and phosphorus. As part of this evaluation, regular sampling and analysis of nutrients of the facility's influent and effluent are recommended to characterize the extent of treatment that will likely be required to protect and maintain the Great Salt Lake's aquatic ecosystem. If a TMDL is developed for the lower Weber River, CWSID's permit will be reevaluated to determine if additional requirements are necessary.

BIOSOLIDS

DESCRIPTION OF TREATMENT AND DISPOSAL

The solids are stabilized in a primary anaerobic digester and secondary anaerobic digester with a combined mean cell residence time of 82 days at an average temperature of 35° C (95° F). After stabilization the biosolids are de-watered with a belt press to about seventeen percent solids.

After de-watering the biosolids are either composted to meet Class A standards, or treated with the "two-summer method" to produce Class A biosolids. In 2012, the CWSID sold or gave away 3,138 dry metric tons (DMT) of composted biosolids, and sold or gave away 281 DMT of the "two summer method" of biosolids, for a total of 3,419 DMT of Class A biosolids sold or given away in 2012.

SELF-MONITORING REQUIREMENTS

Under *40 CFR 503.16(a)(1),* the self-monitoring requirements are based upon the amount of biosolids disposed per year and shall be monitored according to the chart below.

Minimum Frequency of Monitoring Based Upon Dry Metric Tons (DMT)	
Amount of Biosolids Produced Per Year	Monitoring Frequency
> 0 to < 290 DMT	Once Per Year
> 290 to < 1,500 DMT	Four Times Per Year
>1,500 to <15,000 DMT	Six Times Per Year

In 2012, the CWSID produced a total of 3,419 DMT, therefore the CWSID will be required to sample at least six times per year, at the time of sale or giveaway.

Landfill Monitoring
Prior to disposal in a landfill all biosolids must pass a paint filter test (to determine if the biosolids exhibit free liquid). If the solids do not pass a paint filter test, the biosolids cannot be disposed of in the landfill under *40 CFR 258.2(3)(c)(1).*

Metals Monitoring
The CWSID is required to sample for metals prior to the time of disposal if the biosolids are land applied or sold or given away to the public.

Pathogen Monitoring for Class A Biosolids (Compost)
The biosolids must be sampled prior to the time of sale or giveaway for *salmonella* or *fecal* coliform under *40 CFR 503.32.*

Pathogen Monitoring for Class A Biosolids (Two Summer Method)
The biosolids must be sampled prior to the time of sale or giveaway for *salmonella* or *fecal* coliform, and enteric viruses under *40 CFR 503.32.*

Vector Attraction Reduction Monitoring
The biosolids must be monitored for moisture reduction or use another means of meeting a requirement for vector attraction reduction under *40 CFR 503.33.*

LIMITATIONS

Metals
If the biosolids are to be land applied to home lawns and gardens, the biosolids need to be sampled and meet the metals limits of *Table 3, 40 CFR 503.13* for the biosolids to be considered Class A exceptional quality (EQ) biosolids with respect to metals. The practice of sale or giveaway to the public is an acceptable use of biosolids of this quality as long as the biosolids continue to meet EQ standards. If the biosolids do not meet EQ standards for metals, *Tables 1, 2,* or *4* of *40 CFR 503.13* will need to be met if the Class B biosolids are to be land applied. However, since all biosolids produced from the CWSID have met EQ standards during the life of the last permit, it is expected that the CWSID will continue to meet the EQ standards of *Table 3* during the life of this permit. If the biosolids fail to meet any of the metals standards of *40 CFR 503.13*, the biosolids will need to be land filled.

Pathogens Class A Biosolids (Compost)
If biosolids are to be considered Class A biosolids, the biosolids need to be treated by a process to further reduce pathogens (PFRP), and meet a microbiological limit of less than 1,000 most probable number (MPN) of fecal coliform per gram of total solids (or less than 3 MPN of *Salmonella* per 4 grams of total solids) to be considered Class A biosolids. The PFRP will be accomplished through a method of composting *(40 CFR 503.32(a)) (Appendix B4).* The practice of sale or giveaway to the public is an acceptable use of biosolids of this quality as long as the biosolids continue to meet Class A standards with respect to pathogens. If the biosolids do not meet Class A pathogen standards the CWSID cannot sell or give away the biosolids to the public and will need to find another method of disposal.

Pathogens Class A Biosolids (Two Summer Method)
If biosolids are to be considered Class A biosolids, the biosolids need to be treated by a PFRP, and meet a microbiological limit of less than 1,000 MPN of fecal coliform per gram of total solids (or less than 3 MPN of *Salmonella* per 4 grams of total solids) and a microbiological limit of less than 1 plaque forming unit of enteric virus per 4 grams of biosolids under *40 CFR 503.32.* The PFRP will be accomplished through the two summer method (this method has been approved by the EPA Pathogen Equivalency Committee). The practice of sale or giveaway to the public is an acceptable use of biosolids of this quality as long as the biosolids continue to meet Class A standards with respect to pathogens. If the biosolids do not meet Class A pathogen standards the CWSID cannot sell or give away the biosolids to the public and will need to find another method of disposal.

Vector Attraction Reduction
The CWSID needs to meet a method of vector attraction reduction (VAR) if the biosolids are land applied. The CWSID intends to meet VAR under *40 CFR 503.33(b)(1) (at least a 38% reduction in volatile solids during treatment).*

MONITORING DATA 2012

Heavy Metals

The CWSID was required to sample for heavy metals at least six times in 2012. They sampled twelve times. The monitoring results show that the CWSID meets *Table 3 of 40 CFR 503* (EQ Standards).

Table 1, CWSID Heavy Metals Monitoring Data 2012

Parameter	Table 3 (EQ), mg/kg	Average, mg/kg	Maximum, mg/kg
Arsenic	41.0	24.2	28
Cadmium	39.0	1.8	2.26
Copper	1500.0	833	1120
Lead	300.0	540	58.9
Mercury	17.0	2.0	3.43
Molybdenum	75.0	10.9	15.5
Nickel	420.0	35.68	56.7
Selenium	36.0	9.5	12.2
Zinc	2,800.0	1558	1920

Pathogens

The CWSID uses two disposal methods to produce Class A biosolids for sale or giveaway to farmers and the public. Each disposal method requires sampling for pathogens prior to sale or giveaway. The results of both of those disposal methods are below.

Compost

The CWSID was required to sample for Pathogens in the compost at least six times in 2012. They sampled twelve times. The monitoring results show that the CWSID meets the Class A standards for pathogens.

Table 2, CWSID Pathogen Monitoring Data for Compost 2012

Parameter	Permit Limits Must be less than one thousand most probable number per gram of total solids	CWSID, Fecal Coliform Geometric Mean
Fecal Coliform	<1000/MPNg	35 MPN/g

Two Summer Method

The CWSID was required to sample for Pathogens from the "Two Summer Method" at least four times in 2012. They sampled six times. The monitoring results of those six samples show that the CWSID met the Class A standards for pathogens.

Table 3, CWSID Pathogen Monitoring Data for the Two Summer Method 2012

Parameter	Permit Limits Must be less than one thousand most probable number per gram of total solids	Fecal Coliform Geometric Mean	Viable Helminth Ova
Fecal Coliform	<1000/MPNg	35 MPN/g	0.0

RECORD KEEPING

The record keeping requirements from *40 CFR 503.17* are included under Part II.F. of the permit. The amount of time the records must be maintained are dependent on the quality of the biosolids in regards to the metals concentrations. If the biosolids continue to meet *Table 3 of 40 CFR 503.13,* and are land applied, the records must be retained for a minimum of five years. If the biosolids are land applied, and do not meet the metals limits of *Table 3* of *40 CFR 503.13,* and meet *Tables 1 2*, or *4* of *40 CFR 503.13,* the records must be kept indefinitely.

REPORTING

The CWSID is required to report annually as required in *40 CFR 503.18.* This report is to include the results of all monitoring performed in accordance with Part I.C. of the permit, information on management practices, land application sites, and certifications and will be due no later than February 19 of each year. Each report is for the previous calendar year.

STORM WATER

Storm water provisions are included in this combined UPDES permit.

The storm water requirements are based on the UPDES Multi-Sector General Permit for Storm Water Discharges for Industrial Activity, General Permit No. UTR000000 (MSGP). All sections of the MSGP that pertain to discharges from wastewater treatment plants have been included and sections which are redundant or do not pertain have been deleted.

The permit requires the preparation and implementation of a storm water pollution prevention plan for all areas within the confines of the plant. Elements of this plan are required to include: 1. The development of a pollution prevention team: 2. Development of drainage maps and materials stockpiles: 3. An inventory of exposed materials: 4. Spill reporting and response procedures: 5. A preventative maintenance program: 6. Employee training: 7. Certification that storm water discharges are not mixed with non-storm water discharges: 8. Compliance site evaluations and potential pollutant source identification, and: 9. Visual examinations of storm water discharges.

PRETREATMENT REQUIREMENTS

The permittee has an approved industrial pretreatment program. Any changes to the program must be submitted to the Division of Water Quality. Authority to require a pretreatment program is provided for in *19-5-108 UCA, 1953 ann.* and *UAC R317-8-8.*

The permittee will be required to perform an annual evaluation to determine the need to revise or develop technically based local limits to implement the general and specific prohibitions of *40 CFR, Part 403.5(a)* and *Part 403.5(b).* This evaluation may indicate that present local limits are sufficiently protective, or that they must be revised. As part of this evaluation, the permit requires influent and effluent monitoring for metals and organic toxics monitoring listed in *R317-8-7.5* and sludge monitoring for potential pollutants listed in *40 CFR 503.* All metals testing must use a low enough MDL to insure that the metals are not above the allowable levels determined by the WLA for this permittee, a summary can be found in Part VI.H. of the permit. If a test is not available then the lowest test available must be used.

Because of violations of Water Quality Standards on the Weber River CWSID has developed a Mercury Control Strategy as part of their pretreatment program. This program is included in Part IV. I. of CWSID permit.

BIOMONITORING REQUIREMENTS

As part of a nationwide effort to control toxic discharges, biomonitoring requirements are being included in permits for facilities where effluent toxicity is an existing or potential concern. In Utah, this is done in accordance with the *State of Utah Permitting and Enforcement Guidance Document for Whole Effluent Toxicity (WET) Control (Biomonitoring [2/1991]).* Authority to require effluent biomonitoring is provided in *Utah Pollutant Discharge Elimination System UAC R317-8,* and, *Water Quality Standards UAC R317-2.*

Since the permittee is a major municipal discharger, with a significant pretreatment program the renewal permit will require whole effluent acute and chronic limits with chronic toxicity testing. It is anticipated that the chronic testing will not only indicate chronic toxicity, but also screen for acute toxicity. The permit contains toxicity reopener language.

No chronic toxicity will be allowed in the effluent of this discharger. The tests shall alternate each quarter between Ceriodaphnia dubia and Pimephales promelas (fathead minnow). The permit will contain the standard requirements for follow-up testing upon failure of a WET test and a Toxicity Reduction Evaluation (TRE) as necessary.

PUBLIC NOTICE

The public notice was from August 30, 2014 until September 29, 2014. No comments were received.

PERMIT DURATION

It is recommended that this permit be effective for a duration of five (5) years.

Drafted on December 19, 2013 by
Jennifer Robinson, Discharge
Dan Griffin, Biosolids
Michael George, Storm Water
Matthew Garn, Pretreatment
Michael Herkimer, Biomonitoring
David Wham, Wasteload Analysis
Utah Division of Water Quality

APPENDIX A - Wasteload Analysis Summary
Central Weber Sewer Improvement District WWTP

UPDES UT0021911
7/28/2014

Parameter of Interest	Season	Receiving Water 7Q10 Flow, cfs	Receiving Water Temp. Deg. C	Receiving Water pH	Receiving Water Conc. mg/l	Discharge pH	Blended 001 pH	Blended 002 pH	NH3-N/TRC Decay Coeff. per Day	WQ Std. 001 mg/l	WQ Std. 002 mg/l	Std. Acute or Chronic	Chronic TRC/Metal Std. mg/l	Acute TRC/Metal Std. mg/l	WWTP Design Flow MGD	WWTP Flow to Weber R. MGD	WWTP Flow to Warren C. MGD	Warren C. Flow to Weber MGD	Effluent Limit mg/l
		cfs																	
						Scenario 1(a) - 69.5 MGD to Outfall 002									**69.5**	**0**	**69.5**	**69.5**	
NH3-N	Summer	37	17.7	8.2	0.11	7.47		7.81	4.4		11.99	Acute			69.5	0.0	69.5	69.5	**38.57**
NH3-N	Fall	55	6.7	8.2	0.06	7.43		7.84	4.4		11.38	Acute			69.5	0.0	69.5	69.5	**28.35**
NH3-N	Spring	39	11.7	8.0	0.10	7.41		7.69	4.4		14.76	Acute			69.5	0.0	69.5	69.5	**38.90**
NH3-N	Winter	42	3.8	8.1	0.12	7.38		7.73	4.4		13.79	Acute			69.5	0.0	69.5	69.5	**30.65**
NH3-N	Summer	37	17.7	8.2	0.11	7.47		7.81	4.4		2.57	Chronic			69.5	0.0	69.5	69.5	**9.57**
NH3-N	Fall	55	6.7	8.2	0.06	7.43		7.84	4.4		3.04	Chronic			69.5	0.0	69.5	69.5	**9.27**
NH3-N	Spring	39	11.7	8.0	0.10	7.41		7.69	4.4		3.63	Chronic			69.5	0.0	69.5	69.5	**11.17**
NH3-N	Winter	42	3.8	8.1	0.12	7.38		7.73	4.4		3.47	Chronic			69.5	0.0	69.5	69.5	**9.06**
TRC	Summer	37	17.7	8.2	0.000				30.0		0.0190	Acute			69.5	0.0	69.5	69.5	**3.711**
TRC	Fall	55	6.7	8.2	0.000				30.0		0.0190	Acute			69.5	0.0	69.5	69.5	**0.412**
TRC	Spring	39	11.7	8.0	0.000				30.0		0.0190	Acute			69.5	0.0	69.5	69.5	**0.906**
TRC	Winter	42	3.8	8.1	0.000				30.0		0.0190	Acute			69.5	0.0	69.5	69.5	**0.263**
TRC	Summer	37	17.7	8.2	0.00000				30.0		0.011	Chronic			69.5	0.0	69.5	69.5	**2.508**
TRC	Fall	55	6.7	8.2	0.00000				30.0		0.011	Chronic			69.5	0.0	69.5	69.5	**0.293**
TRC	Spring	39	11.7	8.0	0.00000				30.0		0.011	Chronic			69.5	0.0	69.5	69.5	**0.616**
TRC	Winter	42	3.8	8.1	0.00000				30.0		0.011	Chronic			69.5	0.0	69.5	69.5	**0.180**
Copper	Summer	37			0.0018						0.05713	Acute			69.5	0.0	69.5	69.5	**0.0899**
Copper	Fall	55			0.0018						0.05713	Acute			69.5	0.0	69.5	69.5	**0.0970**
Copper	Spring	39			0.0018						0.05713	Acute			69.5	0.0	69.5	69.5	**0.0906**
Copper	Winter	42			0.0018						0.05713	Acute			69.5	0.0	69.5	69.5	**0.0918**
Copper	Summer	37			0.0018						0.0353	Chronic			69.5	0.0	69.5	69.5	**0.0640**
Copper	Fall	55			0.0018						0.0353	Chronic			69.5	0.0	69.5	69.5	**0.0727**
Copper	Spring	39			0.0018						0.0353	Chronic			69.5	0.0	69.5	69.5	**0.0650**
Copper	Winter	42			0.0018						0.0353	Chronic			69.5	0.0	69.5	69.5	**0.0664**
Mercury	Summer	37			2.0E-06						0.002400	Acute			69.5	0.0	69.5	69.5	**0.0038**
Mercury	Fall	55			2.0E-06						0.002400	Acute			69.5	0.0	69.5	69.5	**0.0041**
Mercury	Spring	39			2.0E-06						0.002400	Acute			69.5	0.0	69.5	69.5	**0.0039**
Mercury	Winter	42			2.0E-06						0.002400	Acute			69.5	0.0	69.5	69.5	**0.0039**
Mercury	Summer	37			2.0E-06						0.000012	Chronic			69.5	0.0	69.5	69.5	**0.000021**
Mercury	Fall	55			2.0E-06						0.000012	Chronic			69.5	0.0	69.5	69.5	**0.000023**
Mercury	Spring	39			2.0E-06						0.000012	Chronic			69.5	0.0	69.5	69.5	**0.000021**
Mercury	Winter	42			2.0E-06						0.000012	Chronic			69.5	0.0	69.5	69.5	**0.000021**
																			Limit
						Scenario 1(b) - 25 MGD to Outfall 002									**69.5**	**0**	**69.5**	**25**	
NH3-N	Summer	37	17.7	8.2	0.11	7.47		7.89	4.4		10.32	Acute			69.5	0.0	69.5	25.0	**38.35**
NH3-N	Fall	55	6.7	8.2	0.06	7.43		7.93	4.4		9.58	Acute			69.5	0.0	69.5	25.0	**28.97**
NH3-N	Spring	39	11.7	8.0	0.10	7.41		7.76	4.4		13.13	Acute			69.5	0.0	69.5	25.0	**40.25**
NH3-N	Winter	42	3.8	8.1	0.12	7.38		7.81	4.4		11.90	Acute			69.5	0.0	69.5	25.0	**30.99**
NH3-N	Summer	37	17.7	8.2	0.11	7.47		7.89	4.4		2.31	Chronic			69.5	0.0	69.5	25.0	**10.86**
NH3-N	Fall	55	6.7	8.2	0.06	7.43		7.93	4.4		2.68	Chronic			69.5	0.0	69.5	25.0	**11.01**
NH3-N	Spring	39	11.7	8.0	0.10	7.41		7.76	4.4		3.36	Chronic			69.5	0.0	69.5	25.0	**13.17**
NH3-N	Winter	42	3.8	8.1	0.12	7.38		7.81	4.4		3.14	Chronic			69.5	0.0	69.5	25.0	**10.53**

TRC	Summer	37	17.7	8.2	0.000			30.0	0.0190	Acute	69.5	0.0	69.5	25.0	**4.292**
TRC	Fall	55	6.7	8.2	0.000			30.0	0.0190	Acute	69.5	0.0	69.5	25.0	**0.501**
TRC	Spring	39	11.7	8.0	0.000			30.0	0.0190	Acute	69.5	0.0	69.5	25.0	**1.054**
TRC	Winter	42	3.8	8.1	0.000			30.0	0.0190	Acute	69.5	0.0	69.5	25.0	**0.308**
TRC	Summer	37	17.7	8.2	0.000			30.0	0.011	Chronic	69.5	0.0	69.5	25.0	**3.180**
TRC	Fall	55	6.7	8.2	0.000			30.0	0.011	Chronic	69.5	0.0	69.5	25.0	**0.396**
TRC	Spring	39	11.7	8.0	0.000			30.0	0.011	Chronic	69.5	0.0	69.5	25.0	**0.788**
TRC	Winter	42	3.8	8.1	0.000			30.0	0.011	Chronic	69.5	0.0	69.5	25.0	**0.233**
Copper	Summer	37			0.0018				0.05713	Acute	69.5	0.0	69.5	25.0	**0.1036**
Copper	Fall	55			0.0018				0.05713	Acute	69.5	0.0	69.5	25.0	**0.1175**
Copper	Spring	39			0.0018				0.05713	Acute	69.5	0.0	69.5	25.0	**0.1052**
Copper	Winter	42			0.0018				0.05713	Acute	69.5	0.0	69.5	25.0	**0.1075**
Copper	Summer	37			0.0018				0.0353	Chronic	69.5	0.0	69.5	25.0	**0.0807**
Copper	Fall	55			0.0018				0.0353	Chronic	69.5	0.0	69.5	25.0	**0.0975**
Copper	Spring	39			0.0018				0.0353	Chronic	69.5	0.0	69.5	25.0	**0.0826**
Copper	Winter	42			0.0018				0.0353	Chronic	69.5	0.0	69.5	25.0	**0.0854**
Mercury	Summer	37			2.0E-06				0.002400	Acute	69.5	0.0	69.5	25.0	**0.0038**
Mercury	Fall	55			2.0E-06				0.002400	Acute	69.5	0.0	69.5	25.0	**0.0050**
Mercury	Spring	39			2.0E-06				0.002400	Acute	69.5	0.0	69.5	25.0	**0.0045**
Mercury	Winter	42			2.0E-06				0.002400	Acute	69.5	0.0	69.5	25.0	**0.0046**
Mercury	Summer	37			2.0E-06				0.000012	Chronic	69.5	0.0	69.5	25.0	**0.000026**
Mercury	Fall	55			2.0E-06				0.000012	Chronic	69.5	0.0	69.5	25.0	**0.000031**
Mercury	Spring	39			2.0E-06				0.000012	Chronic	69.5	0.0	69.5	25.0	**0.000026**
Mercury	Winter	42			2.0E-06				0.000012	Chronic	69.5	0.0	69.5	25.0	**0.000027**
							Scenario 2 - 69.5 MGD to Outfall 001				**69.5**	**69.5**	**0**	**0**	Limit
NH3-N	Summer	37	17.7	8.2	0.11	7.47	7.66	4.4	15.52	Acute	69.5	69.5	0.0	0.0	**19.63**
NH3-N	Fall	55	6.7	8.2	0.06	7.43	7.69	4.4	14.67	Acute	69.5	69.5	0.0	0.0	**20.45**
NH3-N	Spring	39	11.7	8.0	0.10	7.41	7.57	4.4	17.95	Acute	69.5	69.5	0.0	0.0	**22.95**
NH3-N	Winter	42	3.8	8.1	0.12	7.38	7.58	4.4	17.52	Acute	69.5	69.5	0.0	0.0	**22.78**
NH3-N	Summer	37	17.7	8.2	0.11	7.47	7.66	4.4	3.05	Chronic	69.5	69.5	0.0	0.0	**4.62**
NH3-N	Fall	55	6.7	8.2	0.06	7.43	7.69	4.4	3.62	Chronic	69.5	69.5	0.0	0.0	**5.43**
NH3-N	Spring	39	11.7	8.0	0.10	7.41	7.57	4.4	4.11	Chronic	69.5	69.5	0.0	0.0	**6.35**
NH3-N	Winter	42	3.8	8.1	0.12	7.38	7.58	4.4	4.05	Chronic	69.5	69.5	0.0	0.0	**6.42**
TRC	Summer	37	17.7	8.2	0.000			30.0	0.0190	Acute	69.5	69.5	0.0	0.0	**0.024**
TRC	Fall	55	6.7	8.2	0.000			30.0	0.0190	Acute	69.5	69.5	0.0	0.0	**0.027**
TRC	Spring	39	11.7	8.0	0.000			30.0	0.0190	Acute	69.5	69.5	0.0	0.0	**0.024**
TRC	Winter	42	3.8	8.1	0.000			30.0	0.0190	Acute	69.5	69.5	0.0	0.0	**0.025**
TRC	Summer	37	17.7	8.2	0.000			30.0	0.011	Chronic	69.5	69.5	0.0	0.0	**0.017**
TRC	Fall	55	6.7	8.2	0.000			30.0	0.011	Chronic	69.5	69.5	0.0	0.0	**0.020**
TRC	Spring	39	11.7	8.0	0.000			30.0	0.011	Chronic	69.5	69.5	0.0	0.0	**0.017**
TRC	Winter	42	3.8	8.1	0.000			30.0	0.011	Chronic	69.5	69.5	0.0	0.0	**0.018**
Copper	Summer	37			0.0018				0.05713	Acute	69.5	69.5	0.0	0.0	**0.0719**
Copper	Fall	55			0.0018				0.05713	Acute	69.5	69.5	0.0	0.0	**0.0790**
Copper	Spring	39			0.0018				0.05713	Acute	69.5	69.5	0.0	0.0	**0.0727**
Copper	Winter	42			0.0018				0.05713	Acute	69.5	69.5	0.0	0.0	**0.0738**
Copper	Summer	37			0.0018				0.0353	Chronic	69.5	69.5	0.0	0.0	**0.0531**
Copper	Fall	55			0.0018				0.0353	Chronic	69.5	69.5	0.0	0.0	**0.0618**
Copper	Spring	39			0.0018				0.0353	Chronic	69.5	69.5	0.0	0.0	**0.0541**
Copper	Winter	42			0.0018				0.0353	Chronic	69.5	69.5	0.0	0.0	**0.0555**

Mercury	Summer	37			2.0E-06				0.002400		Acute	69.5	69.5	0.0	0.0	**0.0030**
Mercury	Fall	55			2.0E-06				0.002400		Acute	69.5	69.5	0.0	0.0	**0.0033**
Mercury	Spring	39			2.0E-06				0.002400		Acute	69.5	69.5	0.0	0.0	**0.0031**
Mercury	Winter	42			2.0E-06				0.002400		Acute	69.5	69.5	0.0	0.0	**0.0031**
Mercury	Summer	37			2.0E-06				0.000012		Chronic	69.5	69.5	0.0	0.0	**0.000017**
Mercury	Fall	55			2.0E-06				0.000012		Chronic	69.5	69.5	0.0	0.0	**0.000020**
Mercury	Spring	39			2.0E-06				0.000012		Chronic	69.5	69.5	0.0	0.0	**0.000018**
Mercury	Winter	42			2.0E-06				0.000012		Chronic	69.5	69.5	0.0	0.0	**0.000018**
																Limit
			Scenario 3(a) - 25 MGD to Outfall 001 and 0 MGD to Outfall 002									**69.5**	**25**	**44.5**	**0**	
NH3-N	Summer	37	17.7	8.2	0.11	7.47	7.83		4.4	11.6	Acute	69.5	25.0	44.5	0.0	**20.05**
NH3-N	Fall	55	6.7	8.2	0.06	7.43	7.88		4.4	10.5	Acute	69.5	25.0	44.5	0.0	**21.92**
NH3-N	Spring	39	11.7	8.0	0.10	7.41	7.71		4.4	14.3	Acute	69.5	25.0	44.5	0.0	**25.36**
NH3-N	Winter	42	3.8	8.1	0.12	7.38	7.75		4.4	13.1	Acute	69.5	25.0	44.5	0.0	**24.08**
NH3-N	Summer	37	17.7	8.2	0.11	7.47	7.83		4.4	2.51	Chronic	69.5	25.0	44.5	0.0	**6.053**
NH3-N	Fall	55	6.7	8.2	0.06	7.43	7.88		4.4	2.87	Chronic	69.5	25.0	44.5	0.0	**9.037**
NH3-N	Spring	39	11.7	8.0	0.10	7.41	7.71		4.4	3.55	Chronic	69.5	25.0	44.5	0.0	**8.941**
NH3-N	Winter	42	3.8	8.1	0.12	7.38	7.75		4.4	3.36	Chronic	69.5	25.0	44.5	0.0	**8.804**
TRC	Summer	37	17.7	8.2	0.000				30.0	0.0190	Acute	69.5	25.0	44.5	0.0	**0.033**
TRC	Fall	55	6.7	8.2	0.000				30.0	0.0190	Acute	69.5	25.0	44.5	0.0	**0.040**
TRC	Spring	39	11.7	8.0	0.000				30.0	0.0190	Acute	69.5	25.0	44.5	0.0	**0.034**
TRC	Winter	42	3.8	8.1	0.000				30.0	0.0190	Acute	69.5	25.0	44.5	0.0	**0.035**
TRC	Summer	37	17.7	8.2	0.000				30.0	0.011	Chronic	69.5	25.0	44.5	0.0	**0.027**
TRC	Fall	55	6.7	8.2	0.000				30.0	0.011	Chronic	69.5	25.0	44.5	0.0	**0.035**
TRC	Spring	39	11.7	8.0	0.000				30.0	0.011	Chronic	69.5	25.0	44.5	0.0	**0.028**
TRC	Winter	42	3.8	8.1	0.000				30.0	0.011	Chronic	69.5	25.0	44.5	0.0	**0.029**
Copper	Summer	37			0.0018					0.05713	Acute	69.5	25.0	44.5	0.0	**0.085**
Copper	Fall	55			0.0018					0.05713	Acute	69.5	25.0	44.5	0.0	**0.085**
Copper	Spring	39			0.0018					0.05713	Acute	69.5	25.0	44.5	0.0	**0.085**
Copper	Winter	42			0.0018					0.05713	Acute	69.5	25.0	44.5	0.0	**0.085**
Copper	Summer	37			0.0018					0.0353	Chronic	69.5	25.0	44.5	0.0	**0.0849**
Copper	Fall	55			0.0018					0.0353	Chronic	69.5	25.0	44.5	0.0	**0.1090**
Copper	Spring	39			0.0018					0.0353	Chronic	69.5	25.0	44.5	0.0	**0.0876**
Copper	Winter	42			0.0018					0.0353	Chronic	69.5	25.0	44.5	0.0	**0.0916**
Mercury	Summer	37			2.0E-06				0.002400		Acute	69.5	25.0	44.5	0.0	**0.0042**
Mercury	Fall	55			2.0E-06				0.002400		Acute	69.5	25.0	44.5	0.0	**0.0050**
Mercury	Spring	39			2.0E-06				0.002400		Acute	69.5	25.0	44.5	0.0	**0.0043**
Mercury	Winter	42			2.0E-06				0.002400		Acute	69.5	25.0	44.5	0.0	**0.0044**
Mercury	Summer	37			2.0E-06				0.000012		Chronic	69.5	25.0	44.5	0.0	**0.000027**
Mercury	Fall	55			2.0E-06				0.000012		Chronic	69.5	25.0	44.5	0.0	**0.000034**
Mercury	Spring	39			2.0E-06				0.000012		Chronic	69.5	25.0	44.5	0.0	**0.000028**
Mercury	Winter	42			2.0E-06				0.000012		Chronic	69.5	25.0	44.5	0.0	**0.000029**
							Scenario 3(B) - 25 MGD to Outfall 001 and 44.5 MGD to Outfall 002					**69.5**	**25**	**44.5**	**44.5**	
NH3-N	Summer	37	17.7	8.2	0.11	7.47	7.83	7.89	4.4	11.6	10.36	Acute	69.5	25.0	44.5	44.5	**20.10**
NH3-N	Fall	55	6.7	8.2	0.06	7.43	7.88	7.92	4.4	10.5	9.78	Acute	69.5	25.0	44.5	44.5	**21.98**
NH3-N	Spring	39	11.7	8.0	0.10	7.41	7.71	7.75	4.4	14.3	13.19	Acute	69.5	25.0	44.5	44.5	**25.38**
NH3-N	Winter	42	3.8	8.1	0.12	7.38	7.75	7.81	4.4	13.1	12.00	Acute	69.5	25.0	44.5	44.5	**24.00**
NH3-N	Summer	37	17.7	8.2	0.11	7.47	7.83	7.89	4.4	2.51	2.32	Chronic	69.5	25.0	44.5	44.5	**6.04**
NH3-N	Fall	55	6.7	8.2	0.06	7.43	7.88	7.92	4.4	2.87	2.73	Chronic	69.5	25.0	44.5	44.5	**8.30**

NH3-N	Spring	39	11.7	8.0	0.10	7.41	7.71	7.75	4.4	3.55	3.37	Chronic	69.5	25.0	44.5	44.5	**9.06**
NH3-N	Winter	42	3.8	8.1	0.12	7.38	7.75	7.81	4.4	3.36	3.16	Chronic	69.5	25.0	44.5	44.5	**8.34**
TRC	Summer	37	17.7	8.2	0.000				30.0	0.0190	0.0190	Acute	69.5	25.0	44.5	44.5	**0.033**
TRC	Fall	55	6.7	8.2	0.000				30.0	0.0190	0.0190	Acute	69.5	25.0	44.5	44.5	**0.040**
TRC	Spring	39	11.7	8.0	0.000				30.0	0.0190	0.0190	Acute	69.5	25.0	44.5	44.5	**0.034**
TRC	Winter	42	3.8	8.1	0.000				30.0	0.0190	0.0190	Acute	69.5	25.0	44.5	44.5	**0.035**
TRC	Summer	37	17.7	8.2	0.000				30.0	0.011	0.011	Chronic	69.5	25.0	44.5	44.5	**0.027**
TRC	Fall	55	6.7	8.2	0.000				30.0	0.011	0.011	Chronic	69.5	25.0	44.5	44.5	**0.035**
TRC	Spring	39	11.7	8.0	0.000				30.0	0.011	0.011	Chronic	69.5	25.0	44.5	44.5	**0.028**
TRC	Winter	42	3.8	8.1	0.000				30.0	0.011	0.011	Chronic	69.5	25.0	44.5	44.5	**0.029**
Copper	Summer	37			0.0018					0.05713	0.05713	Acute	69.5	25.0	44.5	44.5	**0.08886**
Copper	Fall	55			0.0018					0.05713	0.05713	Acute	69.5	25.0	44.5	44.5	**0.09500**
Copper	Spring	39			0.0018					0.05713	0.05713	Acute	69.5	25.0	44.5	44.5	**0.08952**
Copper	Winter	42			0.0018					0.05713	0.05713	Acute	69.5	25.0	44.5	44.5	**0.09052**
Copper	Summer	37			0.0018					0.0353	0.0353	Chronic	69.5	25.0	44.5	44.5	**0.06347**
Copper	Fall	55			0.0018					0.0353	0.0353	Chronic	69.5	25.0	44.5	44.5	**0.07207**
Copper	Spring	39			0.0018					0.0353	0.0353	Chronic	69.5	25.0	44.5	44.5	**0.06443**
Copper	Winter	42			0.0018					0.0353	0.0353	Chronic	69.5	25.0	44.5	44.5	**0.06586**
Mercury	Summer	37			2.0E-06					0.002400	0.002400	Acute	69.5	25.0	44.5	44.5	**0.0038**
Mercury	Fall	55			2.0E-06					0.002400	0.002400	Acute	69.5	25.0	44.5	44.5	**0.0040**
Mercury	Spring	39			2.0E-06					0.002400	0.002400	Acute	69.5	25.0	44.5	44.5	**0.0038**
Mercury	Winter	42			2.0E-06					0.002400	0.002400	Acute	69.5	25.0	44.5	44.5	**0.0038**
Mercury	Summer	37			2.0E-06					0.000012	0.000012	Chronic	69.5	25.0	44.5	44.5	**0.000021**
Mercury	Fall	55			2.0E-06					0.000012	0.000012	Chronic	69.5	25.0	44.5	44.5	**0.000023**
Mercury	Spring	39			2.0E-06					0.000012	0.000012	Chronic	69.5	25.0	44.5	44.5	**0.000021**
Mercury	Winter	42			2.0E-06					0.000012	0.000012	Chronic	69.5	25.0	44.5	44.5	**0.000021**

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STATE OF UTAH
DIVISION OF WATER QUALITY
DEPARTMENT OF ENVIRONMENTAL QUALITY
SALT LAKE CITY, UTAH

UTAH POLLUTANT DISCHARGE ELIMINATION SYSTEM (UPDES)
COMBINED FACILITY PERMIT

In an effort to clarify all Water Quality related permit responsibilities under the UPDES permit system and reduce paper work and redundancy this permit combines the provisions of the following permits for the **CENTRAL WEBER SEWER IMPROVEMENT DISTRICT**

Major Municipal UPDES Permit No. **UT0021911,** and

UPDES Biosolids Permit No. **UTL0021911**

Includes applicable Provisions of the UPDES Multi-Sector General Permit for Storm Water Discharges, Permit No. **UTR000000**

In compliance with provisions of the Utah *Water Quality Act, Title 19, Chapter 5, Utah Code Annotated ("UCA") 1953, as amended* (the *"Act"*),

CENTRAL WEBER SEWER IMPROVEMENT DISTRICT

is hereby authorized to discharge from its wastewater treatment facility to receiving waters named **WARREN CANAL** or **WEBER RIVER** and dispose of biosolids in accordance with specific limitations, outfalls, and other conditions set forth herein.

This permit shall become effective on November 1, 2014

This permit expires at midnight on October 31, 2019

Signed this 30th day of October, 2014

Leah Ann Lamb
Acting Director

DISCHARGE PERMIT NO. UT0021911
BIOSOLIDS PERMIT NO. UTL-021911
STORM WATER PERMIT NO. UTR000000

Table of Contents

I. DISCHARGE – LIMITATIONS AND REPORTING REQUIREMENTS

A. Description of Discharge Points .

The authorization to discharge provided under this permit is limited to those outfalls specifically designated below as discharge locations. Discharges at any location not authorized under a UPDES permit are violations of the *Act* and may be subject to penalties under the *Act*. Knowingly discharging from an unauthorized location or failing to report an unauthorized discharge may be subject to criminal penalties as provided under the *Act*.

Outfall Numbers	Location of Discharge Points
001	A 60" pipe capable of discharging into the Weber River at latitude 41° 16' 11" and longitude 112° 03' 48".
002	A 72" pipe capable of discharging into the Warren Canal at latitude 41° 16' 18" and longitude 112° 02' 49".

B. Narrative Standard .

It shall be unlawful, and a violation of this permit, for the permittee to discharge or place any waste or other substance in such a way as will be or may become offensive such as unnatural deposits, floating debris, oil, scum, or other nuisances such as color, odor or taste, or cause conditions which produce undesirable aquatic life or which produce objectionable tastes in edible aquatic organisms; or result in concentrations or combinations of substances which produce undesirable physiological responses in desirable resident fish, or other desirable aquatic life, or undesirable human health effects, as determined by a bioassay or other tests performed in accordance with standard procedures.

C. Specific Limitations and Self-Monitoring Requirements.

1. Toxicity Limitations for Outfalls 001 and 002.

   a. Effective immediately, and lasting through the life of this permit, there shall be no acute and/or chronic toxicity in the discharge as defined in *Part VIII*, and determined by test procedures described in *Part I.C.2.b)* of this permit.

2. Discharge Water.

   a. Effective immediately and lasting the duration of this permit, the permittee is authorized to discharge from Outfall 001 and 002. Such discharges shall be limited and monitored by the permittee as specified below:

In order for the limits below to be applicable the following conditions must be met:

No discharge is occurring from Outfall 001.
Flow from the Warren Canal may and/or is being returned to the Weber River.

Outfall 002				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow	69.5	NA	NA	NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L				
Summer	9.57	NA	NA	38.57
Fall	9.27	NA	NA	28.35
Spring	11.17	NA	NA	38.90
Winter	9.06	NA	NA	30.65
DO, mg/L	NA	NA	5.5	NA
TRC, mg/L				
Summer	2.508	NA	NA	3.711
Fall	0.293	NA	NA	0.412
Spring	0.616	NA	NA	0.906
Winter	0.180	NA	NA	0.263
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000021	NA	NA	0.0038
Copper, mg/L	0.064	NA	NA	0.090
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 1(a) in the wasteload analysis addendum.

In order for the limits below to be applicable the following conditions must be met:

No discharge is allowed from Outfall 001.
Flow from the Warren Canal to the Weber River is not greater than 25 MGD.

Outfall 002				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow	69.5	NA	NA	NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L				
Summer	10.86	NA	NA	38.35
Fall	11.01	NA	NA	28.97
Spring	13.17	NA	NA	40.25
Winter	10.53	NA	NA	30.99
DO, mg/L	NA	NA	5.0	NA
TRC, mg/L				
Summer	3.180	NA	NA	4.292
Fall	0.396	NA	NA	0.501
Spring	0.788	NA	NA	1.054
Winter	0.233	NA	NA	0.308
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000026	NA	NA	0.0038
Copper, mg/L	0.0807	NA	NA	0.1036
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 1(b) in the wasteload analysis addendum.

The limits below are applicable if all of the flow from the WWTP is being discharged to the Weber River from Outfall 001.

Outfall 001, Design Flow 69.5 MGD				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow, MGD	69.5	NA	NA	NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L				
Summer	4.62	NA	NA	19.63
Fall	6.43	NA	NA	20.45
Spring	6.35	NA	NA	22.95
Winter	6.42	NA	NA	27.78
DO, mg/L	NA	NA	5.0	NA
TRC, mg/L	0.017	NA	NA	0.024
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000017	NA	NA	0.003
Copper, mg/L	0.053	NA	NA	0.072
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 2 in the wasteload analysis addendum.

In order for the limits below to be applicable the following conditions must be met:

The flow from Outfall 001 must not exceed a daily maximum of 30 MGD.
Flow from the Warren Canal is not being returned to the Weber River.

Outfall 001, Daily Average Flow 25 MGD and Outfall 002, Daily Average Flow 44.5				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow, MGD e/				
Outfall 001	25	NA	NA	30
Outfall 002	44.5	NA	NA	NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L				
Summer	6.05	NA	NA	20.05
Fall	9.04	NA	NA	21.92
Spring	8.94	NA	NA	25.36
Winter	8.80	NA	NA	24.08
DO, mg/L	NA	NA	5.0	NA
TRC, mg/L	0.027	NA	NA	0.033
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000027	NA	NA	0.0042
Copper, mg/L	0.085	NA	NA	0.085
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 3(a) in the wasteload analysis addendum.

In order for the limits below to be applicable the following conditions must be met:

The flow from Outfall 001 must not exceed a daily maximum of 30 MGD.
Flow from the Warren Canal to the Weber River is up to 44.5 MGD.

Outfall 001, Daily Average Flow 25 MGD and Outfall 002, Daily Average Flow 44.5				
Parameter	Effluent Limitations a/			
	Monthly Average	Maximum Weekly Average	Daily Minimum	Daily Maximum
Flow, MGD e/ Outfall 001 Outfall 002	 25 44.5	 NA NA	 NA NA	 30 NA
BOD_5, mg/L	25	35	NA	NA
TSS, mg/L	25	35	NA	NA
Ammonia, mg/L Summer Fall Spring Winter	 6.04 8.30 9.06 8.34	 NA NA NA NA	 NA NA NA NA	 20.10 21.98 25.38 24.00
DO, mg/L	NA	NA	5.0	NA
TRC, mg/L	0.027	NA	NA	0.033
Oil & Grease, mg/L	NA	NA	NA	10
Mercury, mg/L	0.000021	NA	NA	0.0038
Copper, mg/L	0.063	NA	NA	0.088
E-coli	126	158	NA	NA
pH, Standard Units	NA	NA	6.5	9.0

NA – Not Applicable

This is scenario 3(b) in the wasteload analysis addendum.

Outfall 001 and 002			
Self-Monitoring and Reporting Requirements a/			
Parameter	Frequency	Sample Type	Units
Total Flow b/ c/ e/	Continuous	Recorder	MGD
BOD_5, Influent d/ Effluent	Daily Daily	Composite Composite	mg/L mg/L
TSS, Influent d/ Effluent	Daily Daily	Composite Composite	mg/L mg/L
Ammonia	Daily	Grab	mg/L
DO	Daily	Grab	mg/L
TRC	Daily	Grab	mg/L
WET, Chronic Biomonitoring, h/	Quarterly	Composite	Pass/Fail
Oil & Grease	Monthly	Grab	mg/L
Mercury	6 X per Year f/	Grab	mg/L
Copper	6 X per Year f/	Composite	mg/L
E-coli	Daily	Grab	# / 100mL
pH	Daily	Grab	SU
Metals, Influent Effluent	6 X per Year f/ 6 X per Year f/	Composite Composite	mg/L mg/L
Organic Toxics, Influent Effluent	2 X Yearly g/ 2 X Yearly g/	Grab	mg/L

NA – Not Applicable

For seasonal sampling the following applies: Spring is March, April and May; Summer is June, July and August; Fall is September, October and November; and Winter is December, January and February.

a/ See Definitions, *Part VIII*, for definition of terms within effluent limitation tables and self-monitoring and reporting requirement table.

b/ Flow measurements of influent/effluent volume shall be made in such a manner that the permittee can affirmatively demonstrate that representative values are being obtained.

c/ If the rate of discharge is controlled, the rate and duration of discharge shall be reported.

d/ In addition to monitoring the final discharge, influent samples shall be taken and analyzed for this constituent at the same frequency as required for this constituent in the discharge.

e/ In order to use the varied flow options for Outfall 001 the permitee must use a continuous flow meter, which is approved by the Director, to insure that the flow is not beyond the allowable flow.

f/ The metals sampling must be done in January - February, March - April, May - June, July – August, September – October, and November – December each year.

g/ The organic toxics must be sampled during the months of January – June and July – December each year. The toxic pollutants are listed in *40 CFR 122 Appendix D Table II (Organic Toxic Pollutants).*

h/ The Chronic WET must pass with an IC_{25} of > 75% effluent. If chronic toxicity occurs that might be or is believed to be due to an acute toxicity failure, then the facility may be required to test for acute toxicity. This acute testing will be done in a manner dictated by the Director.

Samples taken in compliance with the monitoring requirements specified above shall be taken at the outfall prior to mixing with the receiving water.

b. Whole Effluent Testing – Chronic Toxicity.

Starting immediately, the permittee shall quarterly, conduct chronic short-term toxicity tests on a composite sample of the final effluent. The sample shall be collected at outfall 001 and 002.

The monitoring frequency shall be quarterly. Samples shall be collected on a two-day progression; i.e., if the first sample is on a Monday, during the next sampling period, sampling shall be on a Wednesday. If chronic toxicity is detected, the test shall be repeated in less than four weeks from the date the initial sample was taken, all failed tests must be reported per Part V.H. The need for any additional samples, and/or a Toxicity Reduction Evaluation (TRE), see *Part I.C.2.c)* shall be determined by the Director. If the second test does not show chronic toxicity, routine monitoring shall be resumed.

The chronic toxicity tests shall be conducted in general accordance with the procedures set out in the latest revision of *Short-Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Water to Freshwater Organisms. Fourth Edition. October 2002, EPA-821-R-02-013* as per *40 CFR 136.3(a) TABLE 1A-LIST OF APPROVED BIOLOGICAL METHODS.* Test species shall consist of Ceriodaphnia dubia and Pimephales promelas (fathead minnow). WET testing will be done by alternating species quarterly.

Chronic toxicity occurs when the the IC_{25} is less than or equal to an effluent concentration of 75% If any of the acceptable control performance criteria are not met, the test shall be considered invalid.

Quarterly test results shall be reported along with the Discharge Monitoring Report (DMR) submitted for the end of the reporting

calendar quarter. For example, biomonitoring results for the calendar quarter ending March 31 shall be reported with the monthly DMR due April 28, with the remaining biomonitoring reports submitted with monthly DMRs due each July 28, October 28, and January 28. All test results shall be reported along with the DMR submitted for that reporting period. The format for the report shall be consistent with the Region 8 website: http://www.epa.gov/region8/water/wet/documents.html under the *Whole Effluent* Toxicity Reporting forms.

The current Utah whole effluent toxicity (WET) policy is in the process of being updated and revised to assure its consistency with the Environmental Protection Agency's national and regional WET policy. When said revised WET policy has been finalized and officially adopted, this permit will be reopened and modified to incorporate satisfactory follow-up chronic toxicity language (chronic pattern of toxicity, PTI and/or TIE/TRE, etc.) without a public notice, as warranted and appropriate.

c. Toxicity Reduction Evaluation (TRE).

If toxicity is detected during the life of this permit and it is determined by the Director that a TRE is necessary, the permittee shall be so notified and shall initiate a TRE immediately thereafter. The purpose of the TRE will be to establish the cause of toxicity, locate the source(s) of the toxicity, and control or provide treatment for the toxicity.

A TRE may include but is not limited to one, all, or a combination of the following:

1) Phase I – Toxicity Characterization

2) Phase II – Toxicity Identification Procedures

3) Phase III – Toxicity Control Procedures

4) Any other appropriate procedures for toxicity source elimination and control.

If the TRE establishes that the toxicity cannot be immediately eliminated, the permittee shall submit a proposed compliance plan to the Director. The plan shall include the proposed approach to control toxicity and a proposed compliance schedule for achieving control. If the approach and schedule are acceptable to the Director, this permit may be reopened and modified.

If the TRE shows that the toxicity is caused by a toxicant(s) that may be controlled with specific numerical limitations, the permittee may:

a) Submit an *alternative* control program for compliance with the numerical requirements.

b) If necessary, provide a modified biomonitoring protocol, which compensates for the pollutant(s) being controlled numerically.

If acceptable to the Director, this permit may be reopened and modified to incorporate any additional numerical limitations, a modified compliance schedule if judged necessary by the Director, and/or a modified biomonitoring protocol.

Failure to conduct an adequate TRE, or failure to submit a plan or program as described above, or the submittal of a plan or program judged inadequate by the Director, shall be considered a violation of this permit.

D. Reporting of Wastewater Monitoring Results.

1. Discharge Water. Monitoring results obtained during the previous month shall be summarized for each month and reported on a Discharge Monitoring Report Form (EPA No. 3320-1), post-marked no later than the 28th day of the month following the completed reporting period. The first report is due on November 28, 2007. If no discharge occurs during the reporting period, "no discharge" shall be reported. Legible copies of these, and all other reports including whole effluent toxicity (WET) test reports required herein, shall be signed and certified in accordance with the requirements of *Signatory Requirements (see Part VII.G)*, and submitted to the Director, Division of Water Quality and to EPA at the following addresses:

Original to: Department of Environmental quality
Division of Water Quality
195 North 1950 West
PO box 144870
Salt Lake City, Utah 84114-4870

II. BIOSOLIDS REQUIREMENTS

A. Biosolids Treatment and Disposal.
The authorization to dispose of biosolids provided under this permit is limited to those biosolids produced from the treatment works owned and operated by the Central Weber Sewer Improvement District (CWSID). The treatment methods and disposal practices are specifically designated below.

1. Treatment Class A Biosolids (Compost). The solids are stabilized in primary and secondary anaerobic digesters with a mean cell residence time of at least 15 days with a minimum temperature of at least 95° F (36.6° C). The biosolids are de-watered with a belt press to about seventeen percent solids and composted using the windrow method of composting.

2. Treatment Class A Biosolids (Two Summer Method). The solids are stabilized in primary and secondary anaerobic digesters with a mean cell residence time of at least 15 days with a minimum temperature of at least 95° F (36.6° C). The biosolids are de-watered with a belt press to about seventeen percent solids and treated using the two summer method.

3. Biosolids Disposal Methods.

   a. Class A biosolids may be sold or given away to the public for home lawn and garden use. Any biosolids sold or given away in a container larger than a bag or similar container must be applied at agronomic rates.

   b. Biosolids may be landfilled (must meet the requirements of *40 CFR 258, Utah Administrative Code R315-301-5* and *Section 2.12* of the latest version of the *EPA Region VIII Biosolids Management Handbook* must be followed).

4. Changes in Treatment Systems and Disposal Practices. Should the permittee change their disposal methods or the biosolids generation and handling processes of the plant, the permittee must notify the Director at least 180 days in advance. This includes, but is not limited to, the addition or removal of any biosolids treatment units (i.e., digesters, drying beds, belt presses, etc.) and/or any other change, which would require a major modification of the permit.

B. Specific Limitations and Monitoring Requirements.

All biosolids generated by this facility to be sold or given away to the public shall meet the requirements of *Part II.B.1, 2, 3* and *4* listed below.

1. Class A Metals Limitations.

All Class A biosolids sold or given away for land application must meet the metals limitations as described below. If these metals limitations are not met, the CWSID must find an alternative disposal method.

Table 3, Exceptional Quality Biosolids Limitations, mg/Kg	
Total Arsenic	41.0
Total Cadmium	39.0
Total Copper	1500.0
Total Lead	300.0
Total Mercury	17.0
Total Molybdenum	75.0
Total Nickel	420.0
Total Selenium	36.0
Total Zinc	2800.0

2. Class A Pathogen Limitations (Compost).

   a. All biosolids sold or given away must meet the pathogen limitations as described below. If the pathogen limitations are not met, the biosolids cannot be sold or given away.

Fecal Coliform or *Salmonella* Limitations Windrow Compost		The process to further reduce pathogens will be met by:
Fecal Coliform shall be <1000 MPN/g of total solids b/ **OR** *Salmonella* shall be <3 MPN/4g of total solids b/	**AND**	Composting using the windrow method, the temperature of the biosolids is maintained at 55° C (131°F) or higher for 15 days or longer, with a minimum of 5 turnings of the windrows during the 15 days a/

   b. Class A Pathogen Limitations (Two summer Method)
   All biosolids sold or given away in a bag or a similar container for application to lawns and home gardens must meet the pathogen

limitations as described below. If the pathogen limitations are not met, the biosolids cannot be sold or given away.

Pathogen Limitations, Two Summer Method		The process to further reduce pathogens (PSRP) will be met by:
Fecal coliform shall be < 1000 MPN/g of total solids or (*salmonella* shall be <3 MPN/4g of total solids).b/ The CWSID shall monitor for viable helminth ova once for each batch. The finished biosolids cannot contain more than one viable helminth ova per four grams of total solids (dry weight basis). The permittee is not required to monitor for enteric viruses if the conditions listed under the PSRP are followed.	AND	Biosolids that meet the Class B requirements are stored in batch over at least two summers. The biosolids must have a total solids content of at least 14%, but no more than 40% when the piles are formed. The piles are to be formed into windrows 3.5 to 6.0 feet in height. During the first summer the total solids of the pile is not to exceed 60%. The average temperature of the pile must exceed 20° C (68 °F) for 12 months of the storage period (not necessarily consecutive months). The pile shall be turned at least three times (at evenly spaced intervals) during each summer period. At each turning, the permittee shall monitor for volatile solids, total solids and temperature.

3. Vector Attraction Reduction Requirements a/.
If the biosolids are to be land applied the biosolids must meet the vector attraction reduction requirements as described below. If the vector attraction reduction requirement is not met, the biosolids cannot be land applied.

   a. The CWSID will meet vector attraction reduction through a 38% reduction of the volatile solids through time and temperature of the digesters, windrow composting or the two summer method.

a/ There are additional pathogen reduction and vector attraction

reduction alternatives available in *40 CFR 503.32* and *40 CFR 503.33*. If the permittee intends to use one of these alternatives the Director and the EPA must be informed at least 30 days prior to its use. This change may be made without additional public notice.

b/ Based on a minimum of seven (7) samples of biosolids collected over a two-week period (or as approved by the Director in your sampling and analysis plan).

4. Self-Monitoring Requirements

a. At a minimum, upon the effective date of this permit, all metals, pathogens and applicable vector attraction reduction requirements shall be monitored according to *40 CFR 503.16*.

Minimum Frequency of Monitoring	
Dry Metric Tons (DMT) of Biosolids Disposed Per Year	Monitoring Frequency
> 0 to < 290, DMT	Once per year
> 290 to < 1,500, DMT	Four times per year
> 1,500 to < 15,000, DMT	Six times per year

Since the CWSID is not expected to produce more than 15,000 DMT per year, the CWSID shall monitor at least six times per year.

b. Deep soil monitoring for nitrate-nitrogen is required for all land application sites (does not apply to sites where biosolids are applied less than once every five years, or biosolids that are sold or given away in a bag or similar container). A minimum of six sample sites for each 320 (or less) acre area are to be collected. These samples are to be collected down to either 5 feet or to the confining layer, whichever is shallower. Each one-foot increment is to be a composite with the other samples from the site and one analysis for nitrate is to be done for each increment. Samples are required to be taken once every five years for non-irrigated sites or annually for irrigated sites.

c. Soil monitoring for phosphorus (reported as P) is required for all land application sites (does not apply to sites where biosolids are applied less than once every five years, or biosolids that are sold or given away in containers larger than a bag or similar container). Six samples of one foot depth each are to be collected for each 320 acre

area and composited. Samples are required to be taken once every five years for non-irrigated sites or annually for irrigated sites.

d. Sample collection, preservation and analysis shall be performed in a manner consistent with the requirements of *40 CFR Part 503* and/or other criteria specified in this permit. Metals analysis is to be performed using *Method SW 846* with *Method 3050* used for digestion. For the digestion procedure, an amount of biosolids equivalent to one gram dry weight shall be used. The methods are also described in the latest version of the *Region VIII Biosolids Management Handbook.* Monitoring for soil nitrate and phosphorus is to be performed using the methods in *Methods of Soil Analysis, Part 2. Chemical and Microbiological Properties.* Page, A. L., Ed., American Society of Agronomy and Soil Science Society of America, Madison, WI, 1982.

e. The Director may request additional monitoring for specific pollutants derived from biosolids if the data shows a potential for concern.

f. After two years of monitoring at the frequency specified, the permittee may request that the Director reduce the sampling frequency for the chemical pollutants in Part II.C.1. The frequency cannot be reduced to less than once per year for land applied biosolids for any parameter. The frequency also cannot be reduced for any of the pathogen or vector attraction reduction requirements listed in this permit.

C. Management Practices for Application of Biosolids to Land

The permittee shall operate and maintain the land application site operations in accordance with the following requirements:

1. The permittee shall provide to the Director and the EPA within 90 days of the effective date of this permit a land application plan.

2. Application of biosolids shall be conducted in a manner that will not contaminate the groundwater or impair the use classification for that water underlying the sites.

3. Application of biosolids shall be conducted in a manner that will not cause a violation of any receiving water quality standard from discharges of surface runoff from the land application sites. Biosolids shall not be applied to land 10 meters or less from waters of the United States (as defined in *40 CFR 122.2*).

4. Biosolids that are sold or given away in quantities larger than a bag or similar container shall not be land applied to frozen, ice-covered, or snow-covered land where the slope of such land is greater than three percent and is less than or equal to six percent unless one of the following requirements is met:

   a. there is 80 percent vegetative ground cover; or,

   b. approval has been obtained based upon a plan demonstrating adequate runoff containment measures.

5. Application of biosolids is prohibited to frozen, ice-covered, or snow covered sites where the slope of the site exceeds six percent.

6. Biosolids shall not be applied to sites where the available phosphorous content of the soil exceeds the following:

   a. 100 ppm as determined by the sodium bicarbonate extraction method

   b. 50 ppm as determined by the AB-DPTA extraction method

   c. 170 ppm as determined by the Bray P1 extraction method

7. Application of biosolids shall be conducted in a manner that does not exceed the agronomic rate for available nitrogen of the crops grown on the site. At a minimum, the permittee is required to follow the methods for calculating agronomic rate outlined in the latest version of the *Region VIII Biosolids Management Handbook* (other methods may be approved by the Director). The treatment plant shall provide written notification to the applier of the biosolids of the concentration of total nitrogen (as N on a dry weight basis) in the biosolids. Written permission from the Director is required to exceed the agronomic rate.

   The permittee may request the limits of Part II, D., 6 and 7 be modified if different limits would be justified based on local conditions. The limits are required to be developed in cooperation with the local agricultural extension office or university.

8. The land application of biosolids shall not harm nor contribute harm to the habitat of a threatened or endangered species.

9. Biosolids shall not be applied to any site area with standing surface water. If the annual high groundwater level is known or suspected to be within five feet of the surface, additional deep soil monitoring for nitrate-nitrogen as described in Part II.4.c. is to be performed. At a minimum, this additional monitoring will involve a collection of more samples in the affected area and possibly more frequent sampling. The exact number of

samples to be collected will be outlined in a deep soil monitoring plan to be submitted to the Director and the EPA within 90 days of the effective date of this permit. The plan is subject to approval by the Director.

10. The specified cover crop shall be planted during the next available planting season. If this does not occur, the permittee shall notify the Director in writing. Additional restrictions may be placed on the application of the biosolids on that site on a case-by-case basis to control nitrate movement. Deep soil monitoring may be increased under the discretion of the Director.

11. When weather and or soil conditions prevent adherence to the biosolids application procedure, biosolids shall not be applied on the site.

12. For biosolids that are sold or given away, an information sheet shall be provided to the person who receives the biosolids. The label or information sheet shall contain:

    a. The name and address of the person who prepared the biosolids for sale or give away for application to the land.

    b. A statement that prohibits the application of the biosolids to the land except in accordance with the instructions on the label or information sheet.

13. Biosolids subject to the cumulative pollutant loading rates in Table 2 (Part II.C.1.) shall not be applied to agricultural land, forest, a public contact site, or a reclamation site if any of the cumulative pollutant loading rates in Table 2 have been reached.

14. If the treatment plant applies the biosolids, it shall provide the owner or leaseholder of the land on which the biosolids are applied notice and necessary information to comply with the requirements in this permit.

15. The permittee shall inspect the application of the biosolids to active sites to prevent malfunctions and deterioration, operator errors and discharges, which may cause or lead to the release of biosolids to the environment or a threat to human health. The permittee must conduct these inspections often enough to identify problems in time to correct them before they harm human health or the environment. The permittee shall keep an inspection log or summary including at least the date and time of inspection, the printed name and the handwritten signature of the inspector, a notation of observations made and the date and nature of any repairs or corrective action.

D. Special Conditions on Biosolids Storage

Permanent storage of biosolids is prohibited. Biosolids shall not be temporarily stored for more than two years. Written permission to store biosolids for more than two years must be obtained from the Director. Storage of biosolids for more than two years will be allowed only if it is determined that significant treatment is occurring.

E. Representative Sampling.

Biosolids samples used to measure compliance with Part II.B. of this Permit shall be collected at locations representative of the quality of biosolids generated at the treatment works and immediately prior to land application.

F. Reporting of Monitoring Results.

The permittee shall provide the results of all monitoring performed in accordance with Part II.B., and information on management practices, biosolids treatment, site restrictions and certifications shall be provided no later than February 19 of each year. Each report is for the previous calendar year. If no biosolids were sold or given away during the reporting period, "no biosolids were sold or given away" shall be reported. Legible copies of these, and all other reports required herein, shall be signed and certified in accordance with the *Signatory Requirements (see Part IV)*, and submitted to the Utah Division of Water Quality and the EPA at the following addresses:

Original to:
Biosolids Coordinator
Utah Division of Water Quality
P. O. Box 144870
Salt Lake City Utah, 84114-4870

Copy to:
Biosolids Coordinator, 8P-W-P
U. S. Environmental Protection Agency
Region VIII
999 18th Street, Suite 500
Denver, Colorado 80202-2466

G. Additional Record Keeping Requirements Specific to Biosolids.

1. If so notified by the Director the permittee may be required to add additional record keeping if information provided indicates that this is necessary to protect public health and the environment.

2. The permittee is required to keep the following information for at least 5 years:

   a. Concentration of each metal in Table 3 (Part II.B.1.).

b. A description of how the pathogen reduction requirements in Part II.B.2. were met.

c. A description of how the vector attraction reduction requirements in Part II.B.3. were met.

d. A description of how the management practices in Part II.C. were met (if necessary).

e. The following certification statement:

"I certify under the penalty of law, that the metals requirements, the pathogen requirements, and the vector attraction requirements in Part II.B., the site restrictions and the management practices in Part II.C have been met. This determination has been made under my direction and supervision in accordance with the system designed to assure that qualified personnel properly gather and evaluate the information used to determine that the pathogen requirements, the vector attraction reduction requirements and the management practices have been met. I am aware that there are significant penalties for false certification including the possibility of imprisonment."

3. The permittee shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this permit and records of all data used to complete the application for this permit for the life of the permit. Data collected on site, copies of Biosolids Report forms, and a copy of this UPDES biosolids-only permit must be maintained on site during the duration of activity at the permitted location.

III. STORM WATER REQUIREMENTS

A. Coverage of This Section.

1. Discharges Covered Under This Section. The requirements listed under this section shall apply to storm water discharges from CWSID

2. Site Coverage. Storm water discharges from the following portions of CWSID may be eligible for coverage under this permit: biosolids drying beds, haul or access roads on which transportation of biosolids may occur, grit screen cleaning areas, chemical loading, unloading and storage areas, salt or sand storage areas, vehicle or equipment storage and maintenance areas, or any other wastewater treatment device or system, used in the storage, treatment, recycling, and reclamation of municipal or domestic sewage, including lands dedicated to the disposal of sewage sludge that are located within the confines of the facility that may have the reasonable expectation of potential to contribute to pollutants in storm water discharge

B. Prohibition of Non-Storm Water Discharges.

1. The following non-storm water discharges may be authorized under this permit provided the non-storm water component of the discharge is in compliance with this section; discharges from fire fighting activities; fire hydrant flushing; potable water sources including waterline flushing; drinking fountain water; irrigation drainage and lawn watering; routine external building wash down water where detergents or other compounds have not been used in the process; pavement wash waters where spills or leaks of toxic or hazardous materials (including oils and fuels) have not occurred (unless all spilled material has been removed) and where detergents are not used; air conditioning condensate; uncontaminated compressor condensate; uncontaminated springs; uncontaminated ground water; and foundation or footing drains where flows are not contaminated with process materials such as solvents.

C. Storm Water Pollution Prevention Plan Requirements.

1. Contents of the Plan. The plan shall include, at a minimum, the following items:

   a. Pollution Prevention Team. Each plan shall identify a specific individual or individuals within the facility organization as members of a storm water Pollution Prevention Team who are responsible for developing the storm water pollution prevention plan and assisting the facility or plant manager in its implementation, maintenance, and revision. The plan shall clearly identify the responsibilities of each team member. The activities and responsibilities of the team shall address all aspects of the facility's storm water pollution prevention plan.

   b. Description of Potential Pollutant Sources. Each plan shall provide a description of potential sources which may reasonably be expected to add

significant amounts of pollutants to storm water discharges or which may result in the discharge of pollutants during dry weather from separate storm sewers draining the facility. Each plan shall identify all activities and significant materials, which may be reasonably expected to have the potential as a significant pollutant source. Each plan shall include, at a minimum:

1) Drainage. A site map indicating drainage areas and storm water outfalls. For each area of the facility that generates storm water discharges associated with the waste water treatment related activity with a reasonable potential for containing significant amounts of pollutants, a prediction of the direction of flow and an identification of the types of pollutants that are likely to be present in storm water discharges associated with the activity. Factors to consider include the toxicity of the pollutant; quantity of chemicals used, produced or discharged; the likelihood of contact with storm water; and history of significant leaks or spills of toxic or hazardous pollutants. Flows with a significant potential for causing erosion shall be identified. The site map shall include but not be limited to:

    a) Drainage direction and discharge points from all wastewater associated activities including but not limited to grit screen cleaning, bio-solids drying beds and transport, chemical/material loading, unloading and storage areas, vehicle maintenance areas, salt or sand storage areas.

    b) Location of any erosion and sediment control structure or other control measures utilized for reducing pollutants in storm water runoff.

    c) Location of bio-solids drying beds where exposed to precipitation or where the transportation of bio-solids may be spilled onto internal roadways or tracked off site.

    d) Location where grit screen cleaning or other routinely performed industrial activities are located and are exposed to precipitation.

    e) Location of any handling, loading, unloading or storage of chemicals or potential pollutants such as caustics, hydraulic fluids, lubricants, solvents or other petroleum products, or hazardous wastes and where these may be exposed to precipitation.

    f) Locations where any major spills or leaks of toxic or hazardous materials have occurred.

    g) Location of any sand or salt piles.

h) Location of fueling stations or vehicle and equipment maintenance and cleaning areas that are exposed to precipitation.

i) Location of receiving streams or other surface water bodies.

j) Locations of outfalls and the types of discharges contained in the drainage areas of the outfalls.

2) Inventory of Exposed Materials. An inventory of the types of materials handled at the site that potentially may be exposed to precipitation. Such inventory shall include a narrative description of significant materials that have been handled, treated, stored or disposed in a manner to allow exposure to storm water between the time of 3 years prior to the effective date of this permit and the present; method and location of onsite storage or disposal; materials management practices employed to minimize contact of materials with storm water runoff between the time of 3 years prior to the effective date of this permit and the present; the location and a description of existing structural and nonstructural control measures to reduce pollutants in storm water runoff; and a description of any treatment the storm water receives.

3) Spills and Leaks. A list of significant spills and significant leaks of toxic or hazardous pollutants that occurred at areas that are exposed to precipitation or that otherwise drain to a storm water conveyance at the facility after the date of 3 years prior to the effective date of this permit. Such list shall be updated as appropriate during the term of the permit.

4) Sampling Data. A summary of existing discharge sampling data describing pollutants in storm water discharges from the facility, including a summary of sampling data collected during the term of this permit.

5) Summary of Potential Pollutant Sources and Risk Assessment. A narrative description of the potential pollutant sources from the following activities associated with treatment works: access roads/rail lines; loading and unloading operations; outdoor storage activities; material handling sites; outdoor vehicle storage or maintenance sites; significant dust or particulate generating processes; and onsite waste disposal practices. Specific potential pollutants shall be identified where known.

6) Measures and Controls. **CWSID** shall develop a description of storm water management controls appropriate for the facility, and implement such controls. The appropriateness and priorities of controls in a plan shall reflect identified potential sources of pollutants at the facility. The description of storm water management controls shall address the following minimum components, including a schedule for implementing such controls:

a) Good Housekeeping. All areas that may contribute pollutants to storm waters discharges shall be maintained in a clean, orderly manner. These are practices that would minimize the generation of pollutants at the source or before it would be necessary to employ sediment ponds or other control measures at the discharge outlets. Where applicable, such measures or other equivalent measures would include the following: sweepers and covered storage to minimize dust generation and storm runoff; conservation of vegetation where possible to minimize erosion; sweeping of haul roads, bio-solids access points, and exits to reduce or eliminate off site tracking; sweeping of sand or salt storage areas to minimize entrainment in storm water runoff; collection, removal, and proper disposal of waste oils and other fluids resulting from vehicle and equipment maintenance; other equivalent measures to address identified potential sources of pollution.

7) Preventive Maintenance. A preventive maintenance program shall involve timely inspection and maintenance of storm water management devices (e.g., cleaning oil/water separators, catch basins) as well as inspecting and testing facility equipment and systems to uncover conditions that could cause breakdowns or failures resulting in discharges of pollutants to surface waters, and ensuring appropriate maintenance of such equipment and systems.

8) Spill Prevention and Response Procedures. Areas where potential spills that can contribute pollutants to storm water discharges can occur, and their accompanying drainage points, shall be identified clearly in the storm water pollution prevention plan. Where appropriate, specifying material handling procedures, storage requirements, and use of equipment such as diversion valves in the plan should be considered. Procedures and equipment for cleaning up spills shall be identified in the plan and made available to the appropriate personnel.

9) Inspections. In addition to the comprehensive site evaluation required under paragraph *(Part III.C.1.b.16)* of this section, qualified facility personnel shall be identified to inspect designated equipment and areas of the facility on a periodic basis. The following areas shall be included in all inspections: access roads/rail lines, equipment storage and maintenance areas (both indoor and outdoor areas); fueling; material handling areas, residual treatment, storage, and disposal areas; and wastewater treatment areas. A set of tracking or follow-up procedures shall be used to ensure that appropriate actions are taken in response to the inspections. Records of inspections shall be maintained. The use of a checklist developed by the facility is encouraged.

10) Employee Training. Employee training programs shall inform personnel responsible for implementing activities identified in the storm water pollution prevention plan or otherwise responsible for storm water management at all levels of responsibility of the components and goals of the storm water pollution prevention plan. Training should address topics such as spill response, good housekeeping and material management practices. The pollution prevention plan shall identify how often training will take place, but training should be held at least annually (once per calendar year). Employee training must, at a minimum, address the following areas when applicable to a facility: petroleum product management; process chemical management; spill prevention and control; fueling procedures; general good housekeeping practices; proper procedures for using fertilizers, herbicides and pesticides.

11) Record keeping and Internal Reporting Procedures. A description of incidents (such as spills, or other discharges), along with other information describing the quality and quantity of storm water discharges shall be included in the plan required under this part. Inspections and maintenance activities shall be documented and records of such activities shall be incorporated into the plan.

12) Non-storm Water Discharges.

    a) Certification. The plan shall include a certification that the discharge has been tested or evaluated for the presence of non-storm water discharges. The certification shall include the identification of potential significant sources of non-storm water at the site, a description of the results of any test and/or evaluation for the presence of non-storm water discharges, the evaluation criteria or testing method used, the date of any testing and/or evaluation, and the onsite drainage points that were directly observed during the test. Certifications shall be signed in accordance with *Part VII.G* of this permit.

    b) Exceptions. Except for flows from fire fighting activities, sources of non-storm water listed in *Part III.B.* (Prohibition of Non-storm Water Discharges) of this permit that are combined with storm water discharges associated with industrial activity must be identified in the plan. The plan shall identify and ensure the implementation of appropriate pollution prevention measures for the non-storm water component(s) of the discharge.

    c) Failure to Certify. Any facility that is unable to provide the certification required (testing for non-storm water discharges), must notify the *Director* within 180 days after the effective date of this permit. If the failure to certify is caused by the inability to

perform adequate tests or evaluations, such notification shall describe: the procedure of any test conducted for the presence of non-storm water discharges; the results of such test or other relevant observations; potential sources of non-storm water discharges to the storm sewer; and why adequate tests for such storm sewers were not feasible. Non-storm water discharges to waters of the State, which are not, authorized by a *UPDES* permit are unlawful, and must be terminated.

13) Sediment and Erosion Control. The plan shall identify areas, which, due to topography, activities, or other factors, have a high potential for significant soil erosion, and identify structural, vegetative, and/or stabilization measures to be used to limit erosion.

14) Management of Runoff. The plan shall contain a narrative consideration of the appropriateness of traditional storm water management practices (practices other than those which control the generation or source(s) of pollutants) used to divert, infiltrate, reuse, or otherwise manage storm water runoff in a manner that reduces pollutants in storm water discharges from the site. The plan shall provide that measures that the permittee determines to be reasonable and appropriate shall be implemented and maintained. The potential of various sources at the facility to contribute pollutants to storm water discharges associated with industrial activity *Part III.C.1.b* (Description of Potential Pollutant Sources) of this permit shall be considered when determining reasonable and appropriate measures. Appropriate measures or other equivalent measures may include: vegetative swales and practices, reuse of collected storm water (such as for a process or as an irrigation source), inlet controls (such as oil/water separators), snow management activities, infiltration devices, wet detention/retention devices and discharging storm water through the waste water facility for treatment.

15) Comprehensive Site Compliance Evaluation. Qualified personnel shall conduct site compliance evaluations at appropriate intervals specified in the plan, but in no case less than once a year. Such evaluations shall provide:

    a) Areas contributing to a storm water discharge associated with industrial activity shall be visually inspected for evidence of, or the potential for, pollutants entering the drainage system. Measures to reduce pollutant loadings shall be evaluated to determine whether they are adequate and properly implemented in accordance with the terms of the permit or whether additional control measures are needed. Structural storm water management measures, sediment and erosion control measures, and other structural pollution prevention measures identified in the plan shall be observed to ensure that they are operating correctly. A

visual inspection of equipment needed to implement the plan, such as spill response equipment, shall be made.

b) Based on the results of the evaluation, the description of potential pollutant sources identified in the plan in accordance with *Part III.C.1.b* (Description of Potential Pollutant Sources) of this section and pollution prevention measures and controls identified in the plan in accordance with *Part III.C.1.b.6* (Measures and Controls) of this section shall be revised as appropriate within 2 weeks of such evaluation and shall provide for implementation of any changes to the plan in a timely manner, but in no case more than 12 weeks after the evaluation.

c) A report summarizing the scope of the evaluation, personnel making the evaluation, the date(s) of the evaluation, major observations relating to the implementation of the storm water pollution prevention plan, and actions taken in accordance with paragraph (a) (above) shall be made and retained as part of the storm water pollution prevention plan for at least 3 years after the date of the evaluation. The report shall identify any incidents of noncompliance. Where a report does not identify any incidents of noncompliance, the report shall contain a certification that the facility is in compliance with the storm water pollution prevention plan and this permit. The report shall be signed in accordance with *Part VII.G* (Signatory Requirements) of this permit.

16) Deadlines for Plan Preparation and Compliance. **CWSID** shall prepare and implement a plan in compliance with the provisions of this section within 270 days of the effective date of this permit.

17) Keeping Plans Current. **CWSID** shall amend the plan whenever there is a change in design, construction, operation, or maintenance, that has a significant effect on the potential for the discharge of pollutants to the waters of the state or if the storm water pollution prevention plan proves to be ineffective in eliminating or significantly minimizing pollutants from sources identified by the plan, or in otherwise achieving the general objective of controlling pollutants in storm water discharges associated with the activities at the facility.

D. Monitoring and Reporting Requirements.

1. Quarterly Visual Examination of Storm Water Quality. Facilities shall perform and document a visual examination of a storm water discharge associated with industrial activity from each outfall, except discharges exempted below. The examination must be made at least once in each of the following designated periods during daylight hours unless there is insufficient rainfall or snow melt to produce a runoff event: January through March; April through June; July through September; and October through December.

a. Sample and Data Collection. Examinations shall be made of samples collected within the first 30 minutes (or as soon thereafter as practical, but not to exceed 1 hour) of when the runoff or snowmelt begins discharging. The examinations shall document observations of color, odor, clarity, floating solids, settled solids, suspended solids, foam, oil sheen, and other obvious indicators of storm water pollution. The examination must be conducted in a well lit area. No analytical tests are required to be performed on the samples. All such samples shall be collected from the discharge resulting from a storm event that is greater than 0.1 inches in magnitude and that occurs at least 72 hours from the previously measurable (greater than 0.1 inch rainfall) storm event. Where practicable, the same individual should carry out the collection and examination of discharges for entire permit term.

b. Visual Storm Water Discharge Examination Reports. Visual examination reports must be maintained onsite in the pollution prevention plan. The report shall include the examination date and time, examination personnel, the nature of the discharge (i.e., runoff or snow melt), visual quality of the storm water discharge (including observations of color, odor, clarity, floating solids, settled solids, suspended solids, foam, oil sheen, and other obvious indicators of storm water pollution), and probable sources of any observed storm water contamination.

c. Representative Discharge. When **CWSID** has two or more outfalls that, based on a consideration of industrial activity, significant materials, and management practices and activities within the area drained by the outfall, the permittee reasonably believes discharge substantially identical effluents, the permittee may collect a sample of effluent of one of such outfalls and report that the observation data also applies to the substantially identical outfall(s) provided that the permittee includes in the storm water pollution prevention plan a description of the location of the outfalls and explains in detail why the outfalls are expected to discharge substantially identical effluents. In addition, for each outfall that the permittee believes is representative, an estimate of the size of the drainage area (in square feet) and an estimate of the runoff coefficient of the drainage area [e.g., low (under 40 percent), medium (40 to 65 percent), or high (above 65 percent)] shall be provided in the plan.

d. Adverse Conditions. When a discharger is unable to collect samples over the course of the visual examination period as a result of adverse climatic conditions, the discharger must document the reason for not performing the visual examination and retain this documentation onsite with the results of the visual examination. Adverse weather conditions, which may prohibit the collection of samples, include weather conditions that create dangerous conditions for personnel (such as local flooding, high winds, hurricane, tornadoes, electrical storms, etc.) or otherwise make the collection of a sample impracticable (drought, extended frozen conditions, etc.).

e. Inactive and Unstaffed Site. When a discharger is unable to conduct visual storm water examinations at an inactive and unstaffed site, the operator of the facility may exercise a waiver of the monitoring requirement as long as the facility remains inactive and unstaffed. The facility must maintain a certification with the pollution prevention plan stating that the site is inactive and unstaffed so that performing visual examinations during a qualifying event is not feasible.

IV. INDUSTRIAL PRETREATMENT PROGRAM

A. The permittee has been delegated primary responsibility for enforcing against discharges prohibited by *40 CFR 403.5* and applying and enforcing any national Pretreatment Standards established by the United States Environmental Protection Agency in accordance with Section 307 (b) and (c) of *The Clean Water Act (CWA)*, as amended by *The Water Quality Act (WQA), of 1987.*

The permittee shall implement the Industrial Pretreatment Program in accordance with the legal authorities, policies, and procedures described in the permittee's approved Pretreatment Program submission. Such program commits the permittee to do the following:

1. Carry out inspection, surveillance, and monitoring procedures, which will determine, independent of information supplied by the industrial user, whether the industrial user is in compliance with the pretreatment standards. At a minimum, all significant industrial users shall be inspected and sampled by the permittee at least once per year;

2. Control through permit, order, or similar means, the contribution to the POTW by each industrial user to ensure compliance with applicable pretreatment standards and requirements;

3. Require development, as necessary, of compliance schedules by each industrial user for the installation of control technologies to meet applicable pretreatment standards;

4. Maintain and update industrial user information as necessary, to ensure that all IUs are properly permitted and/or controlled at all times;

5. Enforce all applicable pretreatment standards and requirements and obtain appropriate remedies for noncompliance by any industrial user;

6. Annually publish a list of industrial users that were determined to be in significant noncompliance during the previous year. The notice must be published before March 28 of the following year;

7. Maintain an adequate revenue structure and staffing level for continued implementation of the Pretreatment Program.

8. Evaluate all significant industrial users at least once every two years to determine if they need to develop a slug prevention plan. If a slug prevention plan is required, the permittee shall insure that the plan contains at least the minimum elements required in *40 CFR 403.8(f)(2)(v);*

9. Notify all significant industrial users of their obligation to comply with applicable requirements under *Subtitles C and D* of the *Resource Conservation and Recovery Act (RCRA)*; and

10. Develop, implement, and maintain an enforcement response plan as required by *40 CFR 403.8(f)(5)* which shall, at a minimum,

    a. Describe how the POTW will investigate instances of noncompliance;

    b. Describe the types of escalating enforcement responses the POTW will take in response to all anticipated type of industrial user violations; and

    c. Describe the time periods within which such responses will be taken and identify the POTW staff position(s) responsible for pursuing these actions.

11. Establish and enforce specific local limits as necessary to implement the provisions of the *40 CFR Parts 403.5(a)* and *(b)*, and as required by *40 CFR Part 403.5(c)*.

B. The permittee is required to modify its pretreatment program, as necessary, to reflect changes in the regulations of *40 CFR 403*. Such modifications shall be completed within the time frame set forth by the applicable regulations. Modification of the approved pretreatment program must be done in accordance with the requirements of *40 CFR 403.18*. Modifications of the approved program which result in less stringent industrial user requirements shall not be effective until after approval has been granted by the Director.

C. The permittee shall provide the Division of Water Quality and EPA with an annual report briefly describing the permittee's pretreatment program activities over the previous calendar year. Reports shall be submitted no later than March 28 of each year. These annual reports shall, at a minimum, include:

1. An updated listing of the permittee's industrial users.

2. A descriptive summary of the compliance activities including numbers of any major enforcement actions, i.e., administrative orders, penalties, civil actions, etc.

3. An assessment of the compliance status of the permittee's industrial users and the effectiveness of the permittee's Pretreatment Program in meeting its needs and objectives.

4. A summary of all sampling data taken of the influent and effluent for those pollutants listed in *Part I.C.*

5. A description of all substantive changes made to the permittee's pretreatment program referenced in *Section B* of this section. Substantive changes include, but are not limited to, any change in any ordinance, major modification in the program's administrative structure or operating agreement(s), a significant reduction in monitoring, or a change in the method of funding the program.

6. Other information as may be determined necessary by the Director.

D. Pretreatment standards (*40 CFR 403.5*) specifically prohibit the introduction of the following pollutants into the waste treatment system from any source of non-domestic discharge:

1. Pollutants which create a fire or explosion hazard in the publicly owned treatment works (POTW), including, but not limited to, wastestreams with a closed cup flashpoint of less than 140°F (60°C);

2. Pollutants, which will cause corrosive structural damage to the POTW, but in no case, discharges with a pH lower than 5.0;

3. Solid or viscous pollutants in amounts which will cause obstruction to the flow in the POTW resulting in interference;

4. Any pollutant, including oxygen demanding pollutants (BOD, etc.), released in a discharge at such volume or strength as to cause interference in the POTW;

5. Heat in amounts, which will inhibit biological activity in the POTW, resulting in interference, but in no case, heat in such quantities that the influent to the sewage treatment works exceeds 104°F (40°C);

6. Petroleum oil, nonbiodegradable cutting oil, or products of mineral oil origin in amounts that will cause interference or pass through;

7. Pollutants, which result in the presence of toxic gases, vapor, or fumes within the POTW in a quantity that may cause worker health or safety problems;

8. Any trucked or hauled pollutants, except at discharge points designated by the POTW; or

9. Any pollutant that causes pass through or interference at the POTW.

10. Any specific pollutant which exceeds any local limitation established by the POTW in accordance with the requirement of *40 CFR 403.5(c)* and *40 CFR 403.5(d)*.

E. In addition to the general and specific limitations expressed in *Part A and D* of this section, applicable National Categorical Pretreatment Standards must be met by all industrial users of the POTW. These standards are published in the federal regulations at *40 CFR 405* et. seq.

F. *UCA 19-5-104* provides that the State may issue a notice to the POTW stating that a determination has been made that appropriate enforcement action must be taken against an industrial user for noncompliance with any pretreatment requirements within 30 days. The issuance of such notice shall not be construed to limit the authority of the Director.

G. The Director retains the right to take legal action against any industrial user and/or POTW for those cases where a permit violation has occurred because of the failure of an industrial user to meet an applicable pretreatment standard.

H. Self-Monitoring and Reporting Requirements.

1. Influent and Effluent Monitoring and Reporting Requirements. The permittee shall sample and analyze both the influent and effluent quarterly, for the following parameters.

Metals Monitoring for Pretreatment Program				
Parameter	Sample Type	Frequency	Test Limit a./	Units
Total Aluminum	Composite	6 X Yearly	0.75	mg/L
Total Arsenic			0.134	
Total Cadmium			0.0007	
Total Chromium			0.260	
Total Copper			0.029	
Total Lead			0.000015	
Total cyanide	Grab		0.0067	
Total Mercury	Composite/Grab		0.000018	
Total Molybdenum	Composite			
Total Nickel			0.20	
Total Selenium			0.006	
Total Silver			0.031	
Total Zinc			0.462	

a./ The minimum detection limit (MDL) of the test method used for analysis must be below this limit, if a test method is not available the permittee must submit documentation to the Director regarding the method that will be used.

In addition, the permittee shall analyze the treatment facility influent and effluent for the presence of the toxic pollutants listed in *40 CFR 122 Appendix D Table II*

(Organic Toxic Pollutants) 2 X yearly. The pesticides fraction of *Appendix D, Table II* is suspended unless pesticides are expected to be present.

The results of the analyses of metals, cyanide and toxic organics shall be submitted along with the Discharge Monitoring Report (DMR) at the end of the earliest possible reporting period.

2. In accordance with the requirements of *40 CFR Part 403.5(c)*, the permittee shall determine if there is a need to develop or revise its local limits in order to implement the general and specific prohibitions of *40 CFR Part 403.5 (a)* and *Part 403.5 (b)*. A technical evaluation of the need to develop or revise local limits shall be submitted to the Division within **12 months** of the effective date of this permit. This evaluation should be conducted in accordance with the latest revision of the *Utah Model Industrial Pretreatment Program, Section 4, Local Limits*. If a technical evaluation, which may be based on the *Utah Model Industrial Pretreatment Program, Section 4, Local Limits*, reveals that development or revision of local limits is necessary, the permittee shall submit the proposed local limits revision to the Division of Water Quality in an approvable form, within **12 months** of the Division's determination that a revision is necessary.

I. Mercury Control Program

1. CWSID must implement a Mercury Control Program which will include:

   a. An independent IWS for identifying potential sources of Mercury (Hg). The IWS will included, but will not be limited to the following known sources of Hg hospitals, doctors, dentists, veterinary offices, schools, industry and laboratories. The survey will request information as to possible mercury contributions for potential sources at each entity.

   b. Sewer system sampling throughout the district to find if an area is a major contributor of Hg.

   c. CWSID's legal authority must give them the authority to permit users that discharge Hg, on an as needed bases.

   d. CWSID will issue permits to the users found in the IWS that are identified as being a source of Hg, if needed to control the users discharge of Hg and other pollutants of concern. The permits will include monitoring by the users as well as by CWSID.

2. CWSID shall use EPA Method 1631 to comply with the mercury monitoring requirements of this permit.

3. CWSID shall submit an annual report, due March 28, to DWQ with the pretreatment annual report. The report will include the following:

   a. All program monitoring results for the year. Which will include influent, effluent and biosolids monitoring as well as an users which Hg monitoring was done;

   b. A list of potential sources of Hg;

   c. A summary of any actions taken to reduce Hg in the effluent; and

   d. Any updates of the Mercury Control Program that were not previously submitted.

4. If needed the CWSID will impose local limits on its permittees identified in the Hg IWS, which could include BMPs as local limits, if CWSID choose to. Although, CWSID must change its pretreatment program to allow local limits as BMPs.

5. As part of the Mercury Control Program CWSID will inspect annually and monitor, using EPA method 1631 at least once during the UPDES permit cycle, users that are identified on the IWS.

V. MONITORING, RECORDING & GENERAL REPORTING REQUIREMENTS

A. Representative Sampling.
Samples taken in compliance with the monitoring requirements established under *Part I* shall be collected from the effluent stream prior to discharge into the receiving waters. Samples and measurements shall be representative of the volume and nature of the monitored discharge. Sludge samples shall be collected at a location representative of the quality of sludge immediately prior to the use-disposal practice.

B. Monitoring Procedures. Monitoring must be conducted according to test procedures approved under *Utah Administrative Code ("UAC") R317-2-10 and 40CFR Part 503*, unless other test procedures have been specified in this permit.

C. Penalties for Tampering.
The *Act* provides that any person who falsifies, tampers with, or knowingly renders inaccurate, any monitoring device or method required to be maintained under this permit shall, upon conviction, be punished by a fine of not more than $10,000 per violation, or by imprisonment for not more than six months per violation, or by both.

D. Compliance Schedules.
Reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any Compliance Schedule of this permit shall be submitted no later than 14 days following each schedule date.

E. Additional Monitoring by the Permittee.
If the permittee monitors any parameter more frequently than required by this permit, using test procedures approved under *UAC R317-2-10* and *40 CFR 503* or as specified in this permit, the results of this monitoring shall be included in the calculation and reporting of the data submitted in the DMR or the Biosolids Report Form. Such increased frequency shall also be indicated. Only those parameters required by the permit need to be reported.

F. Records Contents.
Records of monitoring information shall include:

1. The date, exact place, and time of sampling or measurements:
2. The individual(s) who performed the sampling or measurements;
3. The date(s) and time(s) analyses were performed;
4. The individual(s) who performed the analyses;
5. The analytical techniques or methods used; and,
6. The results of such analyses.

G. Retention of Records.

The permittee shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit, for a period of at least five years from the date of the sample, measurement, report or application. This period may be extended by request of the Director at any time. A copy of this UPDES permit must be maintained on site during the duration of activity at the permitted location.

H. Twenty-four Hour Notice of Noncompliance Reporting

1. The permittee shall (orally) report any noncompliance including transportation accidents, spills, and uncontrolled runoff from biosolids transfer or land application sites which may seriously endanger health or environment, as soon as possible, but no later than twenty-four (24) hours from the time the permittee first became aware of circumstances. The report shall be made to the Division of Water Quality, (801) 536-4300, or 24-hour answering service (801) 536-4123.

2. The following occurrences of noncompliance shall be reported by telephone, to a live person, to either (801) 231-1769 or (801) 536-4123 as soon as possible but no later than 24 hours from the time the permittee becomes aware of the circumstances:

   a. Any noncompliance which may endanger health or the environment;

   b. Any unanticipated bypass, which exceeds any effluent limitation in the permit (See *Part VI.G, Bypass of Treatment Facilities.)*; or

   c. Any upset which exceeds any effluent limitation in the permit (See *Part VI.H, Upset Conditions.*)

3. The following occurrences of noncompliance shall be reported by telephone to the permit writer or (801) 536-4300 as soon as possible but no later than 24 hours from the time the permittee becomes aware of the circumstances:

   a. Violation of a maximum daily discharge limitation for any of the pollutants listed in the permit; or,

   b. Violation of any of the Table 3 metals limits, the pathogen limits, the vector attraction reduction limits or the management practices for biosolids that have been sold or given away.

4. A written submission shall also be provided within five days of the time that the permittee becomes aware of the circumstances. The written submission shall contain:

   a. A description of the noncompliance and its cause;

   b. The period of noncompliance, including exact dates and times;

   c. The estimated time noncompliance is expected to continue if it has not been corrected;

   d. Steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance; and,

   e. Steps taken, if any, to mitigate the adverse impacts on the environment and human health during the noncompliance period.

5. The Director may waive the written report on a case-by-case basis if the oral report has been received within 24 hours by the Division of Water Quality, (801) 536-4300.

6. Reports shall be submitted to the addresses in *Part I.D, Reporting of Monitoring Results.*

I. Other Noncompliance Reporting.
Instances of noncompliance not required to be reported within 24 hours shall be reported at the time that monitoring reports for *Part I.D* are submitted. The reports shall contain the information listed in *Part V.H.4.*

J. Inspection and Entry.
The permittee shall allow the Director, or an authorized representative, upon the presentation of credentials and other documents as may be required by law, to:

1. Enter upon the permittee's premises where a regulated facility or activity is located or conducted, or where records must be kept under the conditions of the permit;

2. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;

3. Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this permit, including but not limited to, biosolids

treatment, collection, storage facilities or area, transport vehicles and containers, and land application sites;

4. Sample or monitor at reasonable times, for the purpose of assuring permit compliance or as otherwise authorized by the *Act*, any substances or parameters at any location, including, but not limited to, digested biosolids before dewatering, dewatered biosolids, biosolids transfer or staging areas, any ground or surface waters at the land application sites or biosolids, soils, or vegetation on the land application sites; and,

5. The permittee shall make the necessary arrangements with the landowner or leaseholder to obtain permission or clearance, the Director, or authorized representative, upon the presentation of credentials and other documents as may be required by law, will be permitted to enter without delay for the purposes of performing their responsibilities.

VI. COMPLIANCE RESPONSIBILITIES

A. Duty to Comply.
The permittee must comply with all conditions of this permit. Any permit noncompliance constitutes a violation of the Act and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application. The permittee shall give advance notice to the Director of any planned changes in the permitted facility or activity, which may result in noncompliance with permit requirements.

B. Penalties for Violations of Permit Conditions.
The *Act* provides that any person who violates a permit condition implementing provisions of the *Act* is subject to a civil penalty not to exceed $10,000 per day of such violation. Any person who willfully or negligently violates permit conditions or the Act is subject to a fine not exceeding $25,000 per day of violation. Any person convicted under *UCA 19-5-115(2)* a second time shall be punished by a fine not exceeding $50,000 per day. Except as provided at *Part VI.G, Bypass of Treatment Facilities* and *Part VI.H, Upset Conditions*, nothing in this permit shall be construed to relieve the permittee of the civil or criminal penalties for noncompliance.

C. Need to Halt or Reduce Activity not a Defense.
It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit.

D. Duty to Mitigate.
The permittee shall take all reasonable steps to minimize or prevent any discharge in violation of this permit, which has a reasonable likelihood of adversely affecting human health or the environment. The permittee shall also take all reasonable steps to minimize or prevent any land application in violation of this permit.

E. Proper Operation and Maintenance.
The permittee shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the permittee to achieve compliance with the conditions of this permit. Proper operation and maintenance also includes adequate laboratory controls and quality assurance procedures. This provision requires the operation of back-up or auxiliary facilities or similar systems, which are installed by a permittee only when the operation is necessary to achieve compliance with the conditions of the permit.

F. Removed Substances.
Collected screening, grit, solids, sludge, or other pollutants removed in the course of treatment shall be disposed of in such a manner so as to prevent any pollutant from entering any waters of the state or creating a health hazard. Sludge/digester supernatant and filter backwash shall not directly enter either the final effluent or waters of the state by any other direct route.

G. Bypass of Treatment Facilities

1. Bypass Not Exceeding Limitations. The permittee may allow any bypass to occur which does not cause effluent limitations to be exceeded, but only if it also is for essential maintenance to assure efficient operation. These bypasses are not subject to *paragraph 2 and 3* of this section.

2. Prohibition of Bypass.

   a. Bypass is prohibited, and the Director may take enforcement action against a permittee for bypass, unless:

      1) Bypass was unavoidable to prevent loss of human life, personal injury, or severe property damage;

      2) There were no feasible alternatives to bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime. This condition is not satisfied if adequate backup equipment should have been installed in the exercise of reasonable engineering judgement to prevent a bypass which occurred during normal periods of equipment downtime or preventive maintenance, and

      3) The permittee submitted notices as required under *section VI.G.3.*

   b. The Director may approve an anticipated bypass, after considering its adverse effects, if the Director determines that it will meet the three conditions listed in *sections VI.G.2.a (1), (2) and (3).*

3. Notice.

   a. Anticipated bypass. Except as provided above in *section VI.G.2* and below in *section VI.G.3.b*, if the permittee knows in advance of the need for a bypass, it shall submit prior notice, at least ninety days before the date of bypass. The prior notice shall include the following unless otherwise waived by the Director:

1) Evaluation of alternative to bypass, including cost-benefit analysis containing an assessment of anticipated resource damages:

2) A specific bypass plan describing the work to be performed including scheduled dates and times. The permittee must notify the Director in advance of any changes to the bypass schedule;

3) Description of specific measures to be taken to minimize environmental and public health impacts;

4) A notification plan sufficient to alert all downstream users, the public and others reasonably expected to be impacted by the bypass;

5) A water quality assessment plan to include sufficient monitoring of the receiving water before, during and following the bypass to enable evaluation of public health risks and environmental impacts; and,

6) Any additional information requested by the Director.

b. Emergency Bypass. Where ninety days advance notice is not possible, the permittee must notify the Director, and the Director of the Department of Natural Resources, as soon as it becomes aware of the need to bypass and provide to the Director the information in *section VI.G.3.a.(1) through (6)* to the extent practicable.

c. Unanticipated bypass. The permittee shall submit notice of an unanticipated bypass to the Director as required under *Part V.H*, Twenty Four Hour Reporting. The permittee shall also immediately notify the Director of the Department of Natural Resources, the public and downstream users and shall implement measures to minimize impacts to public health and environment to the extent practicable.

H. Upset Conditions

1. Effect of an upset. An upset constitutes an affirmative defense to an action brought for noncompliance with technology based permit effluent limitations if the requirements of P*aragraph 2* of this section are met. Director's administrative determination regarding a claim of upset cannot be judiciously challenged by the permittee until such time as an action is initiated for noncompliance.

2. Conditions necessary for a demonstration of upset. A permittee who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed, contemporaneous operating logs, or other relevant evidence that:

   a. An upset occurred and that the permittee can identify the cause(s) of the upset;

   b. The permitted facility was at the time being properly operated;

   c. The permittee submitted notice of the upset as required under *Part V.H, Twenty-four Hour Notice of Noncompliance Reporting*; and,

   d. The permittee complied with any remedial measures required under *Part VI.D, Duty to Mitigate.*

3. Burden of proof. In any enforcement proceeding, the permittee seeking to establish the occurrence of an upset has the burden of proof.

VII. GENERAL REQUIREMENTS

A. Planned Changes.
The permittee shall give notice to the Director as soon as possible of any planned physical alterations or additions to the permitted facility. Notice is required only when the alteration or addition could significantly change the nature or increase the quantity of parameters discharged or pollutant sold or given away. This notification applies to pollutants, which are not subject to effluent limitations in the permit. In addition, if there are any planned substantial changes to the permittee's existing sludge facilities or their manner of operation or to current sludge management practices of storage and disposal, the permittee shall give notice to the Director of any planned changes at least 30 days prior to their implementation.

B. Anticipated Noncompliance.
The permittee shall give advance notice to the Director of any planned changes in the permitted facility or activity, which may result in noncompliance with permit requirements.

C. Permit Actions.
This permit may be modified, revoked and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance, does not stay any permit condition.

D. Duty to Reapply.
If the permittee wishes to continue an activity regulated by this permit after the expiration date of this permit, the permittee shall apply for and obtain a new permit. The application shall be submitted at least 180 days before the expiration date of this permit.

E. Duty to Provide Information.
The permittee shall furnish to the Director, within a reasonable time, any information which the Director may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit, or to determine compliance with this permit. The permittee shall also furnish to the Director, upon request, copies of records required to be kept by this permit.

F. Other Information.
When the permittee becomes aware that it failed to submit any relevant facts in a permit application, or submitted incorrect information in a permit application or any report to the Director, it shall promptly submit such facts or information.

G. Signatory Requirements.

All applications, reports or information submitted to the Director shall be signed and certified.

1. All permit applications shall be signed by either a principal executive officer or ranking elected official.

2. All reports required by the permit and other information requested by the Director shall be signed by a person described above or by a duly authorized representative of that person. A person is a duly authorized representative only if:

   a. The authorization is made in writing by a person described above and submitted to the Director, and,

   b. The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility, such as the position of plant manager, superintendent, position of equivalent responsibility, or an individual or position having overall responsibility for environmental matters. A duly authorized representative may thus be either a named individual or any individual occupying a named position.

3. Changes to authorization. If an authorization under *paragraph VII.G.2* is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new authorization satisfying the requirements of *paragraph VII.G.2.* must be submitted to the Director prior to or together with any reports, information, or applications to be signed by an authorized representative.

4. Certification. Any person signing a document under this section shall make the following certification:

   "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 knowing violations."

H. Penalties for Falsification of Reports.
The *Act* provides that any person who knowingly makes any false statement, representation, or certification in any record or other document submitted or

required to be maintained under this permit, including monitoring reports or reports of compliance or noncompliance shall, upon conviction be punished by a fine of not more than $10,000.00 per violation, or by imprisonment for not more than six months per violation, or by both.

I. Availability of Reports.
Except for data determined to be confidential under *UAC R317-8-3.2*, all reports prepared in accordance with the terms of this permit shall be available for public inspection at the office of Director. As required by the *Act*, permit applications, permits and effluent data shall not be considered confidential.

J. Oil and Hazardous Substance Liability.
Nothing in this permit shall be construed to preclude the permittee of any legal action or relieve the permittee from any responsibilities, liabilities, or penalties to which the permittee is or may be subject under the *Act*.

K. Property Rights.
The issuance of this permit does not convey any property rights of any sort, or any exclusive privileges, nor does it authorize any injury to private property or any invasion of personal rights, nor any infringement of federal, state or local laws or regulations.

L. Severability.
The provisions of this permit are severable, and if any provisions of this permit, or the application of any provision of this permit to any circumstance, is held invalid, the application of such provision to other circumstances, and the remainder of this permit, shall not be affected thereby.

M. Transfers.
This permit may be automatically transferred to a new permittee if:

1. The current permittee notifies the Director at least 20 days in advance of the proposed transfer date;

2. The notice includes a written agreement between the existing and new permittee's containing a specific date for transfer of permit responsibility, coverage, and liability between them; and,

3. The Director does not notify the existing permittee and the proposed new permittee of his or her intent to modify, or revoke and reissue the permit. If this notice is not received, the transfer is effective on the date specified in the agreement mentioned in paragraph *2* above.

N. State or Federal Laws.

Nothing in this permit shall be construed to preclude the institution of any legal action or relieve the permittee from any responsibilities, liabilities, or penalties established pursuant to any applicable state law or regulation under authority preserved by *UCA 19-5-117* and *Section 510* of the *Act* or any applicable Federal or State transportation regulations, such as but not limited to the Department of Transportation regulations.

O. Water Quality - Reopener Provision.
This permit may be reopened and modified (following proper administrative procedures) to include the appropriate effluent limitations and compliance schedule, if necessary, if one or more of the following events occurs:

1. Water Quality Standards for the receiving water(s) to which the permittee discharges are modified in such a manner as to require different effluent limits than contained in this permit.

2. A final wasteload allocation is developed and approved by the State and/or EPA for incorporation in this permit.

3. A revision to the current Water Quality Management Plan is approved and adopted which calls for different effluent limitations than contained in this permit.

P. Biosolids – Reopener Provision.
This permit may be reopened and modified (following proper administrative procedures) to include the appropriate biosolids limitations (and compliance schedule, if necessary), management practices, other appropriate requirements to protect public health and the environment, or if there have been substantial changes (or such changes are planned) in biosolids use or disposal practices; applicable management practices or numerical limitations for pollutants in biosolids have been promulgated which are more stringent than the requirements in this permit; and/or it has been determined that the permittees biosolids use or land application practices do not comply with existing applicable state of federal regulations.

Q. Toxicity Limitation - Reopener Provision.
This permit may be reopened and modified (following proper administrative procedures) to include, whole effluent toxicity (WET) limitations, a compliance date, a compliance schedule, a change in the whole effluent toxicity (biomonitoring) protocol, additional or modified numerical limitations, or any other conditions related to the control of toxicants if one or more of the following events occur;

1. Toxicity is detected, as per Part I.C.2.b of this permit, during the duration of this permit.

2. The TRE results indicate that the toxicant(s) represent pollutant(s) that may be controlled with specific numerical limits, and the Director agrees that numerical controls are the most appropriate course of action.

3. Following the implementation of numerical control(s) of toxicant(s), the Director agrees that a modified biomonitoring protocol is necessary to compensate for those toxicant that are controlled numerically.

4. The TRE reveals other unique conditions or characteristics, which in the opinion of the permit issuing authority justify the incorporation of unanticipated special conditions in the permit.

R. Storm Water-Reopener Provision.
At any time during the duration (life) of this permit, this permit may be reopened and modified (following proper administrative procedures) as per *UAC R317.8*, to include, any applicable storm water provisions and requirements, a storm water pollution prevention plan, a compliance schedule, a compliance date, monitoring and/or reporting requirements, or any other conditions related to the control of storm water discharges to "waters-of-State".

VIII. DEFINITIONS

A. Wastewater.

1. The "7-day (and weekly) average", other than for e-coli bacteria, fecal coliform bacteria, and total coliform bacteria, is the arithmetic average of all samples collected during a consecutive 7-day period or calendar week, whichever is applicable. Geometric means shall be calculated for e-coli bacteria, fecal coliform bacteria, and total coliform bacteria. The 7-day and weekly averages are applicable only to those effluent characteristics for which there are 7-day average effluent limitations. The calendar week, which begins on Sunday and ends on Saturday, shall be used for purposes of reporting self-monitoring data on discharge monitoring report forms. Weekly averages shall be calculated for all calendar weeks with Saturdays in the month. If a calendar week overlaps two months (i.e., the Sunday is in one month and the Saturday in the following month), the weekly average calculated for that calendar week shall be included in the data for the month that contains Saturday.

2. The "30-day (and monthly) average," other than for e-coli bacteria, fecal coliform bacteria and total coliform bacteria, is the arithmetic average of all samples collected during a consecutive 30-day period or calendar month, whichever is applicable. Geometric means shall be calculated for e-coli bacteria, fecal coliform bacteria and total coliform bacteria. The calendar month shall be used for purposes of reporting self-monitoring data on discharge monitoring report forms.

3. "Act," means the *Utah Water Quality Act*.

4. "Bypass," means the diversion of waste streams from any portion of a treatment facility.

5. "Chronic toxicity" occurs when the survival, growth, or reproduction for either test species exposed to a dilution of 75 percent effluent (or lower) is significantly less (at the 95 percent confidence level) than the survival, growth, or reproduction of the control specimens.

6. "Composite Samples" shall be flow proportioned. The composite sample shall, as a minimum, contain at least four (4) samples collected over the compositing period. Unless otherwise specified, the time between the collection of the first sample and the last sample shall not be less than six (6) hours nor more than 24 hours. Acceptable methods for preparation of composite samples are as follows:

a. Constant time interval between samples, sample volume proportional to flow rate at time of sampling;

b. Constant time interval between samples, sample volume proportional to total flow (volume) since last sample. For the first sample, the flow rate at the time the sample was collected may be used;

c. Constant sample volume, time interval between samples proportional to flow (i.e., sample taken every "X" gallons of flow); and,

d. Continuous sample volume, with sample collection rate proportional to flow rate.

7. "CWA," means *The Federal Water Pollution Control Act*, as amended, by *The Clean Water Act of 1987.*

8. "Daily Maximum" (Daily Max.) is the maximum value allowable in any single sample or instantaneous measurement.

9. "EPA," means the United States Environmental Protection Agency.

10. "Director," means Director of the Utah Division of Water Quality.

11. A "grab" sample, for monitoring requirements, is defined as a single "dip and take" sample collected at a representative point in the discharge stream.

12. An "instantaneous" measurement, for monitoring requirements, is defined as a single reading, observation, or measurement.

13. "Severe Property Damage," means substantial physical damage to property, damage to the treatment facilities which causes them to become inoperable, or substantial and permanent loss of natural resources which can reasonably be expected to occur in the absence of a bypass. Severe property damage does not mean economic loss caused by delays in production.

14. "Upset," means an exceptional incident in which there is unintentional and temporary noncompliance with technology-based permit effluent limitations because of factors beyond the reasonable control of the permittee. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, inadequate treatment facilities, lack of preventative maintenance, or careless or improper operation.

B. Biosolids

1. "Biosolids," means any material or material derived from sewage solids that have been biologically treated.

2. "Dry Weight-Basis," means 100 percent solids (i.e. zero percent moisture).

3. "Land Application" is the spraying or spreading of biosolids onto the land surface; the injection of biosolids below the land surface; or the incorporation of biosolids into the land so that the biosolids can either condition the soil or fertilize crops or vegetation grown in the soil. Land application includes distribution and marketing (i.e. the selling or giving away of the biosolids).

4. "Pathogen," means an organism that is capable of producing an infection or disease in a susceptible host.

5. "Pollutant" for the purposes of this permit is an organic substance, an inorganic substance, a combination of organic and inorganic substances, or pathogenic organisms that after discharge and upon exposure, ingestion, inhalation, or assimilation into an organism either directly from the environment or indirectly by ingestion through the food-chain, could on the basis of information available to the Administrator of EPA, cause death, disease, behavioral abnormalities, cancer, genetic mutations, physiological malfunctions (including malfunction in reproduction), or physical deformations in either organisms or offspring of the organisms.

6. "Runoff" is rainwater, leachate, or other liquid that drains over any part of a land surface and runs off the land surface.

7. "Similar Container" is either an open or closed receptacle. This includes, but is not limited to, a bucket, a box, a carton, and a vehicle or trailer with a load capacity of one metric ton or less.

8. "Total Solids" are the materials in the biosolids that remain as a residue if the biosolids are dried at 103° or 105° Celsius.

9. "Treatment Works" are either Federally owned, publicly owned, or privately owned devices or systems used to treat (including recycling and reclamation) either domestic sewage or a combination of domestic sewage and industrial waste or liquid manure.

10. "Vector Attraction" is the characteristic of biosolids that attracts rodents, flies mosquito's or other organisms capable of transporting infectious agents.

11. "Animals" for the purpose of this permit are domestic livestock.

12. "Annual Whole Sludge Application Rate" is the amount of sewage sludge (dry-weight basis) that can be applied to a unit area of land during a cropping cycle.

13. "Agronomic Rate is the whole sludge application rate (dry-weight basis) designed to: (1) provide the amount of nitrogen needed by the crop or vegetation grown on the land; and (2) minimize the amount of nitrogen in the sewage sludge that passes below the root zone of the crop or vegetation grown on the land to the ground water.

14. "Annual Pollutant Loading Rate" is the maximum amount of a pollutant (dry-weight basis) that can be applied to a unit area of land during a 365-day period.

    1. "Application Site or Land Application Site" means all contiguous areas of a users' property intended for sludge application.

15. "Cumulative Pollutant Loading Rate" is the maximum amount of an inorganic pollutant (dry-weight basis) that can be applied to a unit area of land.

16. "Grit and Screenings" are sand, gravel, cinders, other materials with a high specific gravity and relatively large materials such as rags generated during preliminary treatment of domestic sewage at a treatment works and shall be disposed of according to *40 CFR 258*.

17. "High Potential for Public Contact Site" is land with a high potential for contact by the public. The includes, but is not limited to, public parks, ball fields, cemeteries, plant nurseries, turf farms, and gold courses.

18. "Low Potential for Public Contact Site" is the land with a low potential for contact by the public. This includes, but is not limited to, farms, ranches, reclamation areas, and other lands which are private lands, restricted public lands, or lands which are not generally accessible to or used by the public.

19. "Monthly Average" is the arithmetic mean of all measurements taken during the month.

20. "Volatile Solids" is the amount of the total solids in sewage sludge lost when the sludge is combusted at 550 degrees Celsius for 15-20 minutes in the presence of excess air.

C. Storm Water

1. "Best Management Practices" ("BMPs") means schedules of activities, prohibitions of practices, maintenance procedures, and other management practices to prevent or reduce the pollution of waters of the State. BMPs also include treatment requirements, operating procedures, and practices to control facility site runoff, spillage or leaks, sludge or waste disposal, or drainage from raw material storage.

2. "Coal pile runoff" means the rainfall runoff from or through any coal storage pile.

3. "Co-located industrial activity" means when a facility has industrial activities being conducted onsite that are described under more than one of the coverage sections of *Appendix II* in the General Multi-Sector Permit for Storm Water Discharges Associated with Industrial Activity. Facilities with co-located industrial activities shall comply with all applicable monitoring and pollution prevention plan requirements of each section in which a co-located industrial activity is described.

4. "Commercial Treatment and Disposal Facilities" means facilities that receive, on a commercial basis, any produced hazardous waste (not their own) and treat or dispose of those wastes as a service to the generators. Such facilities treating and/or disposing exclusively residential hazardous wastes are not included in this definition.

5. "Landfill" means an area of land or an excavation in which wastes are placed for permanent disposal, and that is not a land application unit, surface impoundment, injection well, or waste pile.

6. "Land application unit" means an area where wastes are applied onto or incorporated into the soil surface (excluding manure spreading operations) for treatment or disposal.

7. "Municipal separate storm sewer system" (large and/or medium) means all municipal separate storm sewers that are either:

   a. Located in an incorporated place (city) with a population of 100,000 or more as determined by the latest Decennial Census by the Bureau of Census (at the issuance date of this permit, Salt Lake City is the only city in Utah that falls in this category); or

b. Located in the counties with unincorporated urbanized populations of 100,000 or more, except municipal separate storm sewers that are located in the incorporated places, townships or towns within such counties (at the issuance date of this permit Salt Lake County is the only county that falls in this category); or

c. Owned or operated by a municipality other than those described in paragraph *a.* or *b.* (above) and that are designated by the *Director* as part of the large or medium municipal separate storm sewer system.

8. "NOI" means "notice of intent", it is an application form that is used to obtain coverage under the General Multi-Sector Permit for Storm Water Discharges Associated with Industrial Activity.

9. "NOT" means "notice of termination", it is a form used to terminate coverage under the General Multi-Sector Permit for Storm Water Discharges Associated with Industrial Activity.

10. "Point source" means any discernible, confined, and discrete conveyance, including but not limited to, any pipe, ditch, channel, tunnel, conduit, well, discrete fissure, container, rolling stock, concentrated animal feeding operation, landfill leachate collection system, vessel or other floating craft from which pollutants are or may be discharged. This term does not include return flows from irrigated agriculture or agricultural storm water runoff.

11. "Section 313 water priority chemical" means a chemical or chemical categories that:

a. Are listed at *40 CFR 372.65* pursuant to *Section 313* of the *Emergency Planning and Community Right-to-Know Act* (*EPCRA*) (also known as *Title III of the Superfund Amendments and Reauthorization Act* (*SARA*) of 1986);

b. Are present at or above threshold levels at a facility subject to *EPCRA Section 313* reporting requirements; and

c. Meet at least one of the following criteria:

1) Are listed in *Appendix D* of *40 CFR Part 122* on either Table II (organic priority pollutants), Table III (certain metals, cyanides, and phenols) or Table V (certain toxic pollutants and hazardous substances);

2) Are listed as a hazardous substance pursuant to *Section 311(b)(2)(A)* of the *CWA* at *40 CFR 116.4*; or

3) Are pollutants for which EPA has published acute or chronic water quality criteria. See *Appendix III* of this permit. This appendix was revised based on final rulemaking EPA published in the *Federal Register* November 30, 1994.

12. "Significant materials" includes, but is not limited to: raw materials; fuels; materials such as solvents, detergents, and plastic pellets; finished materials such as metallic products; raw materials used in food processing or production; hazardous substances designated under *Section 101(14)* of *CERCLA*; any chemical the facility is required to report pursuant to *EPCRA Section 313*; fertilizers; pesticides; and waste products such as ashes, slag and sludge that have the potential to be released with storm water discharges.

13. "Significant spills" includes, but is not limited to: releases of oil or hazardous substances in excess of reportable quantities under *Section 311 of the Clean Water Act* (see *40 CFR 110.10* and *CFR 117.21*) or *Section 102* of *CERCLA* (see *40 CFR 302.4*).

14. "Storm water" means storm water runoff, snowmelt runoff, and surface runoff and drainage.

15. "SWDMR" means "storm water discharge monitoring report", a report of the results of storm water monitoring required by the permit. The Division of Water Quality provides the storm water discharge monitoring report form.

16. "Storm water associated with industrial activity" (*UAC R317-8-3.8(6)(c) & (d)*) means the discharge from any conveyance that is used for collecting and conveying storm water and that is directly related to manufacturing, processing or raw materials storage areas at an industrial plant. The term does not include discharges from facilities or activities excluded from the *UPDES* program. For the categories of industries identified in paragraphs *(a)* through *(j)* of this definition, the term includes, but is not limited to, storm water discharges from industrial plant yards; immediate access roads and rail lines used or traveled by carriers of raw materials, manufactured products, waste material, or by-products used or created by the facility; material handling sites; refuse sites; sites used for the application or disposal of process waste waters (as defined in *40 CFR Part 401*); sites used for the storage and maintenance of material handling equipment; sites used for residual treatment, storage, or disposal; shipping and receiving areas; manufacturing buildings; storage areas

(including tank farms) for raw materials, and intermediate and finished products; and areas where industrial activity has taken place in the past and significant materials remain and are exposed to storm water. For the categories of industries identified in paragraph *(k)* of this definition, the term includes only storm water discharges from all areas (except access roads and rail lines) listed in the previous sentence where material handling equipment or activities, raw materials, intermediate products, final products, waste materials, by-products, or industrial machinery are exposed to storm water. For the purposes of this paragraph, material handling activities include the storage, loading and unloading, transportation, or conveyance of any raw material, intermediate product, finished product, by-product or waste product. The term excludes areas located on plant lands separate from the plant's industrial activities, such as office buildings and accompanying parking lots as long as the drainage from the excluded areas is not mixed with storm water drained from the above described areas. Industrial facilities (including industrial facilities that are Federally, State, or municipally owned or operated that meet the description of the facilities listed in paragraphs *(a)* to *(k)* of this definition) include those facilities designated under *UAC R317-8-3.8(1)(a)5.* The following categories of facilities are considered to be engaging in "industrial activity" for purposes of this subsection:

a. Facilities subject to storm water effluent limitations guidelines, new source performance standards, or toxic pollutant effluent standards under *40 CFR Subchapter N* (except facilities with toxic pollutant effluent standards that are exempted under category (k) of this definition);

b. Facilities classified as Standard Industrial Classifications 24 (except 2434), 26 (except 265 and 267), 28 (except 283 and 285), 29, 311, 32 (except 323), 33, 3441, 373;

c. Facilities classified as Standard Industrial Classifications 10 through 14 (mineral industry) including active or inactive mining operations (except for areas of coal mining operations no longer meeting the definition of a reclamation area under *40 CFR 434.11(l)* because the performance bond issued to the facility by the appropriate SMCRA authority has been released, or except for areas of non-coal mining operations that have been released from applicable State or Federal reclamation requirements after December 17, 1990) and oil and gas exploration, production, processing, or treatment operations, or transmission facilities that discharge storm water contaminated by contact with or that has come into contact with, any overburden, raw material, intermediate products, finished products, byproducts or waste products located on the site of such operations; inactive mining

operations are mining sites that are not being actively mined, but that have an identifiable owner/operator;

d. Hazardous waste treatment, storage, or disposal facilities, including those that are operating under interim status or a permit under Subtitle C of RCRA;

e. Landfills, land application sites, and open dumps that have received any industrial wastes (waste that is received from any of the facilities described under this subsection) including those that are subject to regulation under *Subtitle D* of *RCRA*;

f. Facilities involved in the recycling of materials, including metal scrapyards, battery reclaimers, salvage yards, and automobile junkyards, including but limited to those classified as Standard Industrial Classification 5015 and 5093;

g. Steam electric power generating facilities, including coal handling sites;

h. Transportation facilities classified as Standard Industrial Classifications 40, 41, 42 (except 4221-25), 43, 44, 45 and 5171 that have vehicle maintenance shops, equipment cleaning operations, or airport deicing operations. Only those portions of the facility that are either involved in vehicle maintenance (including vehicle rehabilitation, mechanical repairs, painting, fueling, and lubrication), equipment cleaning operations, airport deicing operations, or that are otherwise identified under paragraphs (a) to (g) or (I) to (k) of this subsection are associated with industrial activity;

i. Treatment works treating domestic sewage or any other sewage sludge or wastewater treatment device or system, used in the storage treatment, recycling, and reclamation of municipal or domestic sewage, including land dedicated to the disposal of sewage sludge that are located within the confines of the facility, with a design flow of 1.0 mgd or more, or required to have an approved pretreatment program under *40 CFR Part 403*. Not included are farm lands, domestic gardens or lands used for sludge management where sludge is beneficially reused and that are not physically located in the confines of the facility, or areas that are in compliance with *40 CFR Part 503*;

j. Construction activity including clearing, grading and excavation activities except: operations that result in the disturbance of less than

5 acres of total land area that are not part of a larger common plan of development or sale;

k. Facilities under Standard Industrial Classifications 20, 21, 22, 23, 2434, 25, 265, 267, 27, 283, 285, 30, 31 (except 311), 323, 34 (except 3441), 35, 36, 37 (except 373), 38, 39, 4221-25, (and that are not otherwise included within categories (a) to (j))

17. "Waste pile" means any non-containerized accumulation of solid, non-flowing waste that is used for treatment or storage.