Official Draft Public Notice Version: May 16, 2015
The findings, determinations and assertions contained in this document are not final and subject to change following the public comment period.

STATEMENT OF BASIS
SILVER CREEK WATER RECLAMATION FACILITY
SNYDERVILLE BASIN WATER RECLAMATION DISTRICT
RENEWAL PERMIT: DISCHARGE, BIOSOLIDS & STORM WATER
UPDES PERMIT NUMBER: UT0024414
UPDES BIOSOLIDS PERMIT NUMBER: UTL-020001
UPDES MULTI-SECTOR STORM WATER GENERAL PERMIT NUMBER: UTR000000
MAJOR MUNICIPAL

FACILITY CONTACTS

Person Name:	Michael Luers	Person Name:	Michael Boyle
Position:	District Manager	Position:	Operations Manager
Person Name:	Cody Snyder		
Position:	Treatment Supervisor		

Facility Name:	Silver Creek Water Reclamation Facility
Mailing Address:	Snyderville Basin Water Reclamation District 2800 Homestead Road Park City, Utah 84098
District Telephone:	435-649-7993
Facility Telephone:	435-649-7993
Facility Address:	7867 Silver Gate Drive Park City, Utah 84098

DESCRIPTION OF FACILITY

Silver Creek Water Reclamation Facility (SCWRF) is one of two water reclamation facilities owned by the Snyderville Basin Water Reclamation District (SBWRD); East Canyon Water Reclamation Facility (ECWRF) is the other. SBWRD has the ability to divert a portion of the influent flow to either facility using a splitter structure located at the junction of Highways 224 and 248.

SBWRD encompasses all of Park City and the adjoining unincorporated area within the Silver Creek and East Canyon Creek watersheds. It includes the most populated portion of Summit County.

SCWRF consists of an extended aeration activated sludge treatment process (EIMCO carousel) with ultraviolet disinfection. The plant includes three (3) influent screw pumps, one (1) mechanically cleaned bar screen, one (1) pista vortex grit chamber, one (1) parshall flume, one (1) carousel oxidation ditch, two (2) mechanical surface oxidation ditch aeration units, two (2) clarifiers, two (2) traveling hood mixed media filters, three (3) in vessel ultraviolet disinfection

chambers, one (1) static post aerator, an effluent meter, one (1) gravity thickener, two (2) sludge holding tanks one is aerated and mixed; one is just aerated, and one (1) sludge belt press. The facility was placed in service in 1987 with a design capacity of 1.5 MGD. Since 1987, many modifications and improvements to the plant have been made. As a result, the plant has increased capacity, but it has not been officially rated for the increased capacity. With the improvements, the plant's design capacity is 2 MGD.

The SCWRF will need to be expanded to provide SBWRD with additional capacity required to meet future growth. SBWRD is currently in the initial design phase and anticipates completing construction in 2019 and optimization in 2020.

SUMMARY OF CHANGES FROM PREVIOUS PERMIT

Due to growth, the SCWRF will be upgraded during this permit cycle to a monthly capacity of 4 MGD. It is anticipated that construction will be complete in Summer 2019 and that one year will be needed to optimize the plant upon completion. Due to the timing of the Echo-Rockport TMDL, the remediation of Silver Creek to be completed under the CERCLA program, and the UPDES permit renewal, this renewal permit was drafted based on the flow of the upgraded facility. Therefore, the renewal permit includes a compliance schedule to allow the facility time to complete construction and to optimize the facility to comply with the total phosphorus load, dissolved oxygen, ammonia, $CBOD_5$, and total nitrogen load as per the 2015 Wasteload Allocation as identified in the Design Parameters table. Silver Creek was listed on the 2010 303(d) list of impaired waterbodies for total dissolved solids (TDS), as a result, a monitoring requirement has been included to gather more data.

DISCHARGE

DESCRIPTION OF DISCHARGE

SCWRF reports self-monitoring results on Discharge Monitoring Reports (DMR) on a monthly basis. A summary of their DMR data for the last three years is attached. There were no effluent limit violations during this timeframe.

Outfall	Description of Discharge Point
001	Located at latitude 40° 44' 40" and longitude 111° 28' 45". The discharge is through a 24-inch diameter gravity flow concrete pipe on the Northeast side of the treatment plant. The receiving water for Outfall 001 is an open channel that drains to Silver Creek, which is a tributary of the Weber River and Echo Reservoir. The outlet channel was determined to be a natural tributary of Silver Creek, with the same classification as Silver Creek.

RECEIVING WATERS AND STREAM CLASSIFICATION

The final discharge flows into Silver Creek, which flows into the Weber River. Silver Creek and the Weber River are Class 1C, 2B, 3A, and 4, according to *Utah Administrative Code (UAC) R317-2-13.4*:

Class 2B -Protected for secondary contact recreation such as boating, wading, or similar uses.
Class 3A -Protected for cold water species of game fish and other cold water aquatic life, 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

The permit limitations are the same as the previous permit with the exception of the mass effluent limits for Ammonia and the Phosphorus concentration. The mass limits were calculated using a monthly average flow of 2 MGD and the monthly average Ammonia concentration limits from the previous WLA (2007). Limitations on total suspended solids (TSS), carbonaceous oxygen demand ($CBOD_5$), e-coli, pH and percent removal for $CBOD_5$ and TSS are based on current Utah Secondary Treatment Standards, *UAC R317-1-3.2*. The oil and grease effluent limit is based on best professional judgment (BPJ). The phosphorus concentration limit is based on the Technology Based Phosphorus Effluent Limit (TBPEL) rule, *UAC R317-1-3.3A*. This rule states that all mechanical treatment plants must provide treatment processes that will produce effluent less than or equal to an annual mean of 1 mg/L for total phosphorus by January 1, 2020.

The permit limitations are:

Parameter	Effluent Limitations				
	Monthly Average	Weekly Average	Daily Minimum	Daily Maximum	Annual Mean
$CBOD_5$, mg/L $CBOD_5$ Min. % Removal	20 85	30 NA	NA	NA	NA
TSS, mg/L TSS Min. % Removal	25 85	35 NA	NA	NA	NA
Ammonia, as N, mg/L Summer, July-Sept Fall/Spring, Oct-Dec/Apr-June Winter, Jan-Mar	 4.0 4.5 4.0	 NA	 NA	 11.9 10.0 8.5	 NA
Ammonia, as N, kg Summer, July-Sept Fall/Spring, Oct-Dec/Apr-June Winter, Jan-Mar	 901 1,013 901	 NA	 NA	 NA	 NA
Dissolved Oxygen, mg/L	NA	NA	5.5	NA	NA
E-Coli, No./100mL	126	158	NA	NA	NA
Total Phosphorus, mg/L*	NA	NA	NA	NA	1
Oil & Grease, mg/L	NA	NA	NA	10	NA
pH, Standard Units	NA	NA	6.5	9.0	NA

*Effective January 1, 2020

The design parameters for TSS, e-coli, pH, and percent removal for $CBOD_5$ and TSS are based on current Utah Secondary Treatment Standards, *UAC R317-1-3.2*. Oil and grease is based on BPJ. Ammonia, total nitrogen concentration, dissolved oxygen, and $CBOD_5$ are based on the wasteload analysis developed in 2015 using a 30 day average effluent flow of 4 MGD and a daily

max effluent flow of 8 MGD. Because there is no dilution credit from the receiving water, mass effluent limits for ammonia and a flow effluent limit are not required as the end of pipe ammonia concentration limits are sufficiently protective. The phosphorus and nitrogen mass parameters are based on the Echo-Rockport TMDL and will become effective October 1, 2020. All other parameters will be reevaluated at the next permit renewal, and are subject to change. Therefore, they are not included in the renewal permit and are included below for informational purposes only.

The design parameters are:

Parameter	Design Parameters						
	Monthly Average	Monthly Average Minimum	Weekly Average	Daily Minimum	Daily Maximum	Yearly Max	Seasonal Max
$CBOD_5$, mg/L $CBOD_5$ Min. % Removal	10 85	NA	20 NA	NA	NA	NA	NA
TSS, mg/L TSS Min. % Removal	25 85	NA	35 NA	NA	NA	NA	NA
Ammonia, as N, mg/L Summer, July-Sept Fall, Oct-Dec Winter, Jan-Mar Spring, Apr-June	1.0 2.0 3.0 2.5	NA	NA	NA	11.9 10 8 10	NA	NA
Dissolved Oxygen, mg/L	NA	6.5	NA	5	NA	NA	NA
E-Coli, No./100mL	126	NA	158	NA	NA	NA	NA
Oil & Grease, mg/L	NA	NA	NA	NA	10	NA	NA
pH, Standard Units	NA	NA	NA	6.5	9	NA	NA
Total Nitrogen, mg/L	9	NA	NA	NA	NA	NA	NA
Total Nitrogen, kg* April – Sept. Annual	NA	NA	NA	NA	NA	NA 48,585	20,782 NA
Total Phosphorus, kg* April – Sept. Annual	NA	NA	NA	NA	NA	NA 4,849	2,078 NA

NA – Not Applicable.
*Effective October 1, 2020.

SELF-MONITORING AND REPORTING REQUIREMENTS

SELF-MONITORING AND REPORTING REQUIREMENTS

Monitoring requirements for total organic nitrogen, nitrite, and nitrate are included in the renewal permit. The need for effluent limits for these parameters will be evaluated at the next permit cycle, post 2020.

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

Self-Monitoring and Reporting Requirements			
Parameter	Frequency	Sample Type	Units
Total Flow	Continuous	Recorder	MGD
$CBOD_5$	2 x Weekly	Composite	mg/L
$CBOD_5$, Influent Effluent	2 x Weekly 2 x Weekly	Composite Composite	mg/L mg/L
TSS, Influent Effluent	2 x Weekly 2 x Weekly	Composite Composite	mg/L mg/L
Ammonia	2 x Weekly	Grab	mg/L
Dissolved Oxygen	2 x Weekly	Grab	mg/L
Total Phosphorus	Monthly	Composite/Grab	mg/L
E-Coli	2 x Weekly	Grab	No./100mL
Oil & Grease	2 x Weekly	Grab	mg/L
pH	2 x Weekly	Grab	SU
Total Organic Nitrogen	Monthly	Grab	mg/L
Nitrite	Monthly	Grab	mg/L
Nitrate	Monthly	Grab	mg/L
Total Dissolved Solids	Monthly	Grab	mg/L
WET, Biomonitoring	Quarterly	Composite	Pass/Fail
Metals, Influent Effluent	Quarterly Quarterly	Composite Composite	mg/L mg/L
Organic Toxics	Yearly	Grab	mg/L

COMPLIANCE SCHEDULE

Due to growth, the SCWRF will be upgraded during this permit cycle to a capacity of 4 MGD. It is anticipated that construction will be complete in Spring 2019 and that one year will be needed to optimize the plant upon completion. Due to the timing of the Echo-Rockport TMDL, the remediation of Silver Creek completed under the CERCLA program, and the UPDES permit renewal, this renewal permit was drafted based on the flow of the future facility. Therefore, the

renewal permit includes a compliance schedule to allow the facility time to complete construction and optimize the facility to comply with the nitrogen and phosphorus mass limits in the Echo-Rockport TMDL. All other parameters included in the Design Parameters table above will be re-evaluated at the next permit cycle and are subject to change.

Date	Milestone
Design Complete and Construction Permit Issued	June 1, 2016
Construction Complete and Authorization to Use Issued by DWQ	October 1, 2019
Compliance with Final Effluent Limits	October 1, 2020

BIOSOLIDS

For clarification purposes, sewage sludge is considered solids, until treatment or testing shows that the solids are safe, and meet beneficial use standards. After the solids are tested or treated, the solids are then known as biosolids. Class A biosolids, may be used for high public contact sites, such as home lawns and gardens, parks, or playing fields, etc. Class B biosolids may be used for low public contact sites, such as farms, rangeland, or reclamation sites, etc.

DESCRIPTION OF BIOSOLIDS TREATMENT AND DISPOSAL

The Snyderville Basin Water Reclamation District (SBWRD) submitted their 2014 annual biosolids report on March 3, 2015. The report states the SBWRD produced 1011.9 dry metric tons (DMT) of solids.

The SBWRD stabilizes the solids (sewage sludge) in oxidation ditches at both of their Water Reclamation facilities with a mean cell residence time of about twenty days. The stabilized solids are dewatered with centrifuges to about eighteen percent solids. Since the solids produced by SBWRD cannot meet Class A or Class B for land application requirements at their own facilities due to odor concerns, the solids need to be further treated before any of the solids can be land applied for beneficial use.

The solids are disposed of at one of two disposal facilities; Wasatch Regional Landfill and E.T. Technologies. Currently all the solids are transported to E.T. Technologies located at 6030 West 1300 South in Salt Lake City, adjacent to the Salt Lake Valley Landfill. In 2014 1011.9 DMT of solids were transferred to E.T. Technologies.

ET Technologies is a soil regeneration site and operates under a special use permit issued by the Salt Lake Valley Health Department. The biosolids that are hauled to ET Technologies must pass a toxicity characteristic leaching procedure (TCLP) test, which includes testing for inorganics, heavy metals, and volatile organic compounds. As the trucks pull through the weigh station the drivers receive a manifest and the loads are screened for radiation.

After the testing requirements have been performed, the biosolids are mixed with petroleum contaminated soil, sawdust, fats oils and greases from restaurants, and other waste materials. The

mixture is processed in bioremediation impoundment cells for about a year before it is used for final landfill final cover at the adjacent Salt Lake Valley Solid Waste Management Facility for land reclamation purposes.

FUTURE DISPOSAL METHODS

In the future, the SBWRD may change its disposal methods to include an alternative landfill, mono fill, composting, or transfer to another facility for processing into Class B or A Biosolids. If the other facility already operates under a permit, SBWRD should notify the state 30 days prior to making the change. If the facility will be operating under SBWRD permit, they may need to modify their permit to include the activity and should request the change no later than 180 days before the changes is made.

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 (40 CFR Part 503.16, 503.26. and 503.46)		
Amount of Biosolids Disposed Per Year		Monitoring Frequency
Dry US Tons	Dry Metric Tons	Per Year or Batch
> 0 to < 320	> 0 to < 290	Once Per Year or Batch
> 320 to < 1650	> 290 to < 1,500	Once a Quarter or Four Times
> 1,650 to < 16,500	> 1,500 to < 15,000	Bi-Monthly or Six Times
> 16,500	> 15,000	Monthly or Twelve Times

In 2014, SBWRD disposed of 1011.9 DMT of biosolids; therefore they need to sample at least once a quarter or four times a year,

BIOSOLIDS LIMITATIONS

Heavy Metals

Class A Biosolids for Home Lawn and Garden Use

The intent of the heavy metals regulations of Table 3, 40 CFR 503.13 is to ensure the heavy metals do not build up in the soil in home lawn and gardens to the point where the heavy metals become phytotoxic to plants. The permittee will be required to produce an information sheet (see Part III. C. of the permit) to be made available to all people who are receiving and land applying Class A biosolids to their lawns and gardens. If the instructions of the information sheet are followed to any reasonable degree, the Class A biosolids will be able to be land applied year after year, to the same lawns and garden plots without any deleterious effects to the environment. The information sheet must be provided to the public, because the permittee is not required, nor able to track the quantity of Class A biosolids that are land applied to home lawns and gardens.

Class A Requirements With Regards to Heavy Metals

If the biosolids are to be applied to a lawn or home garden, the biosolids shall not exceed the

maximum heavy metals in Table 1 and the monthly average pollutant concentrations in Table 3 (see Table 1 and Table 3 below). If the biosolids do not meet these requirements, the biosolids cannot be sold or given away for applications to home lawns and gardens.

Class B Requirements for Agriculture and Reclamation Sites
The intent of the heavy metals regulations of Tables 1, 2 and 3, of 40 CFR 503.13 is to ensure that heavy metals do not build up in the soil at farms, forest land, and land reclamation sites to the point where the heavy metals become phytotoxic to plants. The permittee will be required to produce an information sheet (see Part III. C. of the permit) to be handed out to all people who are receiving and land applying Class B biosolids to farms, ranches, and land reclamation sites (if biosolids are only applied to land owned by the permittee, the information sheet requirements are waived). If the biosolids are land applied according to the regulations of 40 CFR 503.13, to any reasonable degree, the Class B biosolids will be able to be land applied year after year, to the same farms, ranches, and land reclamation sites without any deleterious effects to the environment.

Class B Requirements With Regards to Heavy Metals
If the biosolids are to be land applied to agricultural land, forest land, a public contact site or a reclamation site it must meet at all times:

> The maximum heavy metals listed in Table 1 and the heavy metals loading rates in Table 2; or
>
> The maximum heavy metals in Table 1 and the monthly heavy metals concentrations in Table 3.

Tables 1, 2, and 3 of Heavy Metal Limitations

Pollutant Limits, (40 CFR Part 503.13)			
Heavy Metals	Table 1	Table 2	Table 3
All heavy metals concentrations shall be measured and reported	Daily Maximum mg/Kg *a, *b, *c	Cumulative Loading Rate Kg/Ha	Monthly Average Concentration mg/Kg *a, *b, *c,
Total Arsenic	75	41	41
Total Cadmium	85	39	39
Total Copper	4300	1500	1500
Total Lead	840	300	300
Total Mercury	57	17	17
Total Molybdenum	75	N/A	N/A
Total Nickel	420	420	420
Total Selenium	100	100	100
Total Zinc	7500	2800	2800

*a, The limitations represent the maximum allowable levels of heavy

metals in any biosolids intended for land application.

*b, Any violation of these limitations shall be reported in accordance with the requirements of Part III.F.1. of the permit.

*c, These limitations represent the maximum allowable levels of heavy metals based on an average of all samples taken during a 30-day period.

If the biosolids do not meet these requirements they cannot be land applied.

Pathogens

The Pathogen Control class listed in the table below must be met;

Pathogen Control Class	
Class A (40 CFR Part 503.32 (a), (3-8))	Class B (40 CFR Part 503.32 (b), (2))
Salmonella species -less than three (3) per four (4) grams total solids (or less than 1,000 fecal coliforms per gram total solids)	Fecal Coliforms –less than 2,000,000 colony forming units (CFU) per gram total solids
Enteric viruses -less than one (1) MPN (or plaque forming unit) per four (4) grams total solids	
Viable helminth ova -less than one (1) MPN per four (4) grams total solids	
MPN –Most Probable Number	

Class A Pathogen Requirements for Home Lawn and Garden Use

If biosolids are land applied to home lawns and gardens, the biosolids need to be treated by a specific process to further reduce pathogens (PFRP), and meet a microbiological limit of less than less than 3 most probable number (MPN) of Salmonella per 4 grams of total solids (or less than 1,000 most probable number (MPN/g) of fecal coliform per gram of total solids) to be considered Class A biosolids. The PFRP's can be found under 40 CFR 503.32(a).

The practice of sale or giveaway to the public is an acceptable use of biosolids as long as the biosolids meet Class A standards with respect to pathogens. If the biosolids do not meet Class A pathogen standards the biosolids cannot be sold or given away to the public, and the permittee will need find another method of beneficial use or disposal.

Class B Pathogen Requirements

If biosolids are to be land applied for agriculture or land reclamation the solids need to be treated by a specific process to significantly reduce pathogens (PSRP). The PSRP's can be found under 40 CFR 503.32 (b).

If the biosolids do not meet Class B pathogen standards the biosolids cannot be sold or given away to the public, and the permittee will need find another method of beneficial use or disposal.

VECTOR ATTRACTION REDUCTION REQUIREMENTS

The biosolids will need to meet one of the vector attraction reduction (VAR) requirements under *40 CFR 503.33.* Some of the options available to SBWRD are listed below:

Composting, Class A and Class B Biosolids (VAR). If the solids are composted to meet Class A pathogen reduction requirements, the biosolids will automatically meet a method of vector attraction reduction. If the solids are composted to meet Class B pathogen reduction requirements the temperature of the solids will need to be maintained at 40°C (104° F) for at least 14 days according to *40 CFR 503.33(b)(5).*

Moisture Reduction (VAR). If the biosolids are land applied, the solids content must be at least 90% according to *40 CFR 503.33(b)(8).*

Incorporation (VAR). If the biosolids are land applied, Class A biosolids must be incorporated into the soil within eight hours of land application. If Class B biosolids are land applied, the biosolids must be incorporated into the soil within six hours of land application according to *40 CFR 503.33 (b)(10).*

Landfill (VAR). If the solids are land filled the solids must be covered with soil or another approved material at the end of each operating day for vector attraction reduction according to *40 CFR 503.33(b)(11)* and *UAC R315-301-5* .

If the biosolids do not meet a method of VAR, the biosolids cannot be land applied.

Landfill Monitoring

Under *40 CFR 258,* the landfill monitoring requirements include a paint filter test to determine if the biosolids exhibit free liquid. If the biosolids do not pass a paint filter test, the biosolids cannot be disposed in the sanitary landfill *(40 CFR 258.28(c)(1).*

Record Keeping

The record keeping requirements from *40 CFR 503.17* are included under *Part III.G.* 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 the metals limits of *Table 3* of *40 CFR 503.13*, and are sold or given away the records must be retained for a minimum of five years. If the biosolids are disposed in a landfill the records must retained for a minimum of five years.

Reporting

SBWRD must report annually as required in *40 CFR 503.18.* This report is to include the results of all monitoring performed in accordance with *Part III.C* of the permit, information on management practices, biosolids treatment, and certifications. This report is due no later than February 19 of each year. Each report is for the previous calendar year.

MONITORING DATA

Metals Monitoring Data
The SBWRD was not required to sample the solids for heavy metals in 2014. However, they did sample each plant once. The monitoring data shows that the SBWRD met the heavy metals requirements from both plants of *Table 3* of *40 CFR 503.13,* therefore, the SBWRD solids is considered Exceptional Quality with respect to heavy metals. The monitoring data for both plants is below.

SBWRD Metals Monitoring Data 2014

SBWRD Metals Monitoring Data, 2014			
Parameter	Table 3, mg/kg (Exceptional Quality)	SCWRF, mg/kg	ECWRF, mg/kg
Arsenic	41.0	8.65	9.99
Cadmium	39.0	6.14	2.17
Copper	1,500.0	558	571
Lead	300.0	15.6	10.6
Mercury	17.0	0.46	0.31
Molybdenum	75.0	6.06	4.17
Nickel	400.0	11.1	10.7
Selenium	36.0	11.4	8.92
Zinc	2,800.0	1500	859

Landfill Monitoring Data
ET Technologies administers a paint filter test before the solids are mixed and placed in the cells for bioremediation. The solids have passed each time.

STORM WATER

STORMWATER REQUIREMENTS

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 pretreatment requirements remain the same as in the current permit with the permittee administering an approved pretreatment program. Any substantial changes to the program must be submitted for approval 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 of 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 quarterly influent and effluent monitoring for metals and yearly organic toxics listed in *R317-8-7.5* and sludge monitoring for potential pollutants listed in *40 CFR 503.*

BIOMONITORING REQUIREMENTS

A nationwide effort to control toxic discharges where effluent toxicity is an existing or potential concern is regulated in accordance with the *State of Utah Permitting and Enforcement Guidance Document for Whole Effluent Toxicity Control (biomonitoring)*. Authority to require effluent biomonitoring is provided in *Permit Conditions, UAC R317-8-4.2, Permit Provisions, UAC R317-8-5.3* and *Water Quality Standards, UAC R317-2-5* and *R317-2-7.2.*

Since the permittee is a major municipal discharger, the renewal permit will again require whole effluent toxicity (WET) testing. Over the last five years the permittee has not failed their acute WET testing. Therefore, the permittee will continue alternating between acute and chronic WET testing quarterly, with alternating species and no acute WET limit. However, the permit will contain a toxicity limitation re-opener provision. This provision allows for modification of the permit to include WET limitations and/or increased WET monitoring, should additional information indicate the presence of toxicity in the discharge.

The permit will contain the standard requirements for accelerated testing upon failure of a WET test and a PTI (Preliminary Toxicity Investigation) and TRE (Toxicity Reduction Evaluation) as necessary. Biomonitoring tests are required quarterly, alternating acute and chronic and alternating Ceriodaphnia dubia and Pimephales promelas (fathead minnow).

ANTIDEGRADATION REVIEWS

Antidegradation Reviews are intended to ensure that waters that have better quality than required by the standards are not degraded unless the degradation is necessary for important social or economic reasons.

An ADR Level I review was performed and the conclusion was that an ADR Level II review was required, because the facility will be increasing its loading due to the upgrade. SCWRF has completed an Antidegradation Level II Review. Copies of both ADR documents are appended to this document.

The DWQ concurs with the findings of both the Level I (compliance with water quality standards) and Level II Reviews.

PERMIT DURATION

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

Drafted by
Kim Shelley, Discharge
Dan Griffin, Biosolids
Mike Herkimer, Whole Effluent Toxicity
Jennifer Robinson, Pretreatment
Mike George, Storm Water
Nick von Stackelberg, Level I and II ADR
Utah Division of Water Quality

PUBLIC NOTICE

Began:
Ended:
Public Noticed in The Park Record