

NORTHERN NEVADA WATER PLANNING COMMISSION AGENDA

Wednesday, April 1, 2015
1:30 p.m.

Washoe County Commission Chambers
1001 East Ninth Street
Reno, Nevada

Notes:

1. Items on this agenda on which action may be taken are followed by the term "for possible action". Non-action items are followed by an asterisk (*).
2. Public comment is limited to three minutes per speaker and is allowed during the public comment periods, and before action is taken on any action item. Comments are to be directed to the Commission as a whole. Persons may not allocate unused time to other speakers. The public may sign-up to speak during the public comment period or on a specific agenda item by completing a "Request to Speak" card and submitting it to the clerk.
3. Items on this agenda may be taken out of order, combined with other agenda items for consideration, removed from the agenda, or delayed for discussion at any time. Arrive at the meeting at the posted time to hear item(s) of interest.
4. Supporting material provided to the Commission for the items on the agenda is available to members of the public at the Northern Nevada Water Planning Commission ("NNWPC") offices, 4930 Energy Way, Reno, NV, from June Davis, Administrative Secretary, (775) 954-4665, and on the NNWPC website at <http://www.nnwpc.us>
5. In accordance with NRS 241.020, this agenda closes three working days prior to the meeting. We are pleased to make reasonable accommodations for persons who are disabled and wish to attend meetings. If you require special arrangements for the meeting, please call 954-4665 no later than 24 hours prior to the meeting.
6. In accordance with NRS 241.020, this agenda has been posted at the following locations: Reno City Hall (1 East First Street), Sparks City Hall (431 Prater Way), Sparks Justice Court (1675 East Prater Way), Sun Valley GID (5000 Sun Valley Blvd.), TMWA (1355 Capital Blvd.), Washoe County Administration Building (1001 E. 9th Street), Second Judicial District Court/Courthouse (75 Court Street), Washoe County Central Library (301 South Center St.), Washoe County Community Services Department (4930 Energy Way), Galena Market (19990 Thomas Creek Rd.), Galena High School (3600 Butch Cassidy Way), South Valleys Library (15650A Wedge Parkway), the NNWPC website: <http://www.nnwpc.us> and the State of Nevada Website: <https://notice.nv.gov>

1. Roll Call and determination of presence of a quorum. *
2. Public Comments. * (Three-minute time limit per person.)
3. Approval of agenda. **(For Possible Action)**
4. Approval of the minutes from the March 4, 2015, meeting. **(For Possible Action)**
5. Report on the Bureau of Reclamation ("BOR") Truckee Basin Study Draft Report, and possible direction to staff – Arlan Nickel, BOR. *
6. Review draft Western Regional Water Commission ("WRWC") tentative budget for Fiscal Year 2015 - 2016; discussion, possible direction to staff, and possible recommendation to the WRWC – Jim Smitherman, WRWC / NNWPC Water Resources Program Manager. **(For Possible Action)**
7. Presentation of staff comments on the "Population Forecast and Projections of Water Demand, Peak Day Requirements and Wastewater Flow" chapter for the 2016 Regional Water Management Plan ("RWMP") update; discussion and possible direction to staff – Jim Smitherman. **(For Possible Action)**

8. Presentation of comments received on the “Flood Management and Storm Water Drainage” chapter for the 2016 RWMP update; discussion and possible direction to staff – Jim Smitherman. **(For Possible Action)**
9. Presentation of comments received on the “Water Purveyors” chapter for the 2016 RWMP update; discussion and possible direction to staff – Chris Wessel, Water Management Planner. **(For Possible Action)**
10. Discussion and possible direction to staff regarding any chapters of the RWMP previously reviewed by the NNWPC in relation to the 2016 RWMP update – Jim Smitherman. **(For Possible Action)**
11. Report on legislative activities, including Bill Draft Requests and Bills pending in the 2015 session of the Nevada Legislature that may affect or are of interest to the WRWC / NNWPC, John Rhodes, NNWPC Legal Counsel. *
12. Program Manager’s Report – Jim Smitherman. *
 - a. Report on the Status of Projects and Work Plan Supported by the Regional Water Management Fund ("RWMF");
 - b. Financial Report on the RWMF;
 - c. Report on the TMRPA’s parcel-based population and employment modeling project;
13. Discussion regarding possible agenda items for the May 6, 2015 NNWPC meeting, and other future meetings, and possible direction to staff – Jim Smitherman. **(For Possible Action)**
14. Commission comments. *
15. Staff comments. *
16. Public Comments. * (Three-minute time limit per person.)
17. Adjournment. **(For Possible Action)**

*Indicates a non-action item

DRAFT - MINUTES
NORTHERN NEVADA WATER PLANNING COMMISSION

Wednesday, March 4, 2015

The regular meeting of the Northern Nevada Water Planning Commission ("NNWPC") was held in the Washoe County Commission Chambers, 1001 East Ninth Street, Reno, Nevada and conducted the following business:

The meeting was called to order by Chairman Drinkwater at 1:30 p.m.

1. Roll Call and Determination of Presence of a Quorum

Voting Members Present: Michael Drinkwater, Darrin Price, George Ball, Michael DeMartini (arrived at 1:30 p.m.), John Enloe, John Erwin, Mickey Hazelwood, Danielle Henderson, John Martini, Brian Wadsworth, and David Solaro.

Voting Members Absent: John Flansberg.

Non-Voting Members Present: Chris Anderson, Kim Davis, and Edmund Quaglieri.

Non-Voting Members Absent: Harry Fahnestock and My-Linh Nguyen.

Staff Members Present: Jim Smitherman; Chris Wessel; and John Rhodes, Legal Counsel.

2. Public Comment

None

3. Approval of the Agenda (For Possible Action)

COMMISSIONER PRICE MADE A MOTION TO APPROVE THE AGENDA, SECONDED BY COMMISSIONER BALL. THE MOTION CARRIED UNANIMOUSLY WITH NINE (9) MEMBERS PRESENT.

4. Approval of the Minutes from the February 4, 2015, Meeting (For Possible Action)

COMMISSIONER ERWIN MADE A MOTION TO APPROVE THE FEBRUARY 4, 2015, MINUTES, SECONDED BY COMMISSIONER ENLOE. THE MOTION CARRIED UNANIMOUSLY WITH NINE (9) MEMBERS PRESENT.

5. Review of projects funded by the Regional Water Management Fund ("RWMF") and Western Regional Water Commission ("WRWC") budget priorities for fiscal year 2015 – 2016; discussion and possible direction to staff – Jim Smitherman, Northern Nevada Water Planning Commission ("NNWPC") Water Resources Program Manager. (For Possible Action)

(Commissioners DeMartini and Solaro arrived at 1:30 p.m.)

Jim Smitherman reviewed the project related Professional Services Budget Worksheet included in the staff report and requested input from the Commission on project priorities.

Commissioner Enloe requested an update on the Population Employment Model line item. Mr. Smitherman provided a brief summary of the project status.

Commissioner Enloe asked if the budget for that item reflects staff time. Mr. Smitherman replied that it does not include staff time.

Commissioner Erwin asked which items are new for 2015. Mr. Smitherman replied that none of them are new for 2015.

No action was taken.

Chairman Drinkwater stated that Commissioners should have input on a project priority list to Mr. Smitherman before next Friday.

6. Presentation of staff comments on the “Flood Management and Storm Water Drainage” chapter for the 2016 Regional Water Management Plan (“RWMP”) update; discussion and possible direction to staff - Jim Smitherman. (For Possible Action)

Mr. Smitherman stated that the staff report includes redline edits received from the Truckee River Flood Management Authority, and sections that are presently under review by Reno, Sparks and Washoe County staff. There were no comments or questions from the Commissioners, and no action was taken.

7. Presentation of comments received on the “Water Purveyors” chapter for the 2016 RWMP update; discussion and possible direction to staff - Chris Wessel, NNWPC Water Management Planner. (For Possible Action)

Chris Wessel reviewed updates made based on comments received since the last NNWPC meeting when this section was presented. Mr. Wessel stated that additional input is anticipated from Truckee Meadows Water Authority (“TMWA”).

Commissioner Erwin asked if some of the Other PUC Regulated Water Systems are service territory regulated. Edmund Quaglieri stated that the majority of them are fully regulated.

Commissioner Erwin asked if the water systems that are service territory regulated can be identified. Mr. Quaglieri stated that he can add another section to include that information.

Commissioner Erwin asked if they can also add the number of water rights that are attached to each of the utilities. Mr. Quaglieri stated that he will provide that information.

No action was taken.

8. Presentation of comments received on the “Conservation” chapter for the 2016 RWMP update; discussion and possible direction to staff – Chris Wessel. (For Possible Action)

Mr. Wessel reviewed updates made based on comments received since the last NNWPC meeting when this section was presented. Additional changes are anticipated to be submitted by the Sun Valley General Improvement District (“SVGID”). No action was taken.

9. Discussion and possible direction to staff regarding any chapters of the RWMP previously reviewed by the NNWPC in relation to the 2016 RWMP update – Jim Smitherman. (For Possible Action)

Mr. Smitherman reported that he did not receive any requests to bring any other chapters back for further review, and no action was taken.

10. Report on legislative activities, including Bill Draft Requests (“BDR”) and Bills pending in the 2015 session of the Nevada Legislature that may affect or are of interest to the WRWC / NNWPC – John Rhodes, NNWPC Legal Counsel.

John Rhodes stated that the staff report includes all of the BDRs and Bills that have been introduced that the WRWC Legislative Subcommittee has been following. The WRWC Legislative Subcommittee will be supporting the Cloud Seeding Bill when that language becomes available.

11. Program Manager's Report – Jim Smitherman.

- a. Report on the status of projects and work plan supported by the RWMF;
- b. Financial report on the RWMF;
- c. Report on the Truckee Meadows Regional Planning Agency ("TMRPA")'s parcel-based population and employment modeling project;

Mr. Smitherman stated that there is nothing out of the ordinary in the Program Manager's Report.

12. Discussion regarding possible agenda items for the April 1, 2015, NNWPC meeting, and other future meetings; and possible direction to staff – Jim Smitherman. (For Possible Action)

Mr. Smitherman stated future agenda items will include: review of three chapters of the RWMP, review of the draft tentative budget, legislative activities report, and standing items. No action was taken.

13. Selection of NNWPC Chairman and Vice-Chairman for the term April 2015 to April 2016, and possible direction to staff. (For Possible Action)

Commissioner Erwin nominated Commissioner Enloe as Chairman and Commissioner Martini as Vice-Chairman. The nominations were approved by unanimous vote.

14. Commission Comments

Commissioner Wadsworth stated that he will likely have a presentation for the NNWPC in May on the proposed changes to the Pyramid Lake Piute Tribe Water Quality Standards.

15. Staff Comments

None

16. Public Comment

None

17. Adjournment (For Possible Action)

The meeting was adjourned at 1:57 p.m.

Respectfully submitted by Christine Birmingham.

Approved by:

John Enloe, Chairman

APPROVED BY COMMISSION IN SESSION ON _____, 2015.

Northern Nevada Water Planning Commission

STAFF REPORT

DATE: March 26, 2015

TO: Chairman and Members, Northern Nevada Water Planning Commission

FROM: Jim Smitherman, Water Resources Program Manager

SUBJECT: Report on the Board of Reclamation ("BOR") Truckee Basin Study Draft Report.

SUMMARY

The Truckee Basin Study was conducted by the United States Department of the Interior, BOR in partnership with four non-Federal cost-share partners: Placer County Water Agency, Tahoe Regional Planning Agency, Truckee Meadows Water Authority, and Truckee River Flood Management Authority.

Mr. Arlan Nickel, Basin Study Program Manager, BOR, and Mr. Jeff Payne, Montgomery Watson Harza, have agreed to provide a verbal report on the Truckee Basin Study to the NNWPC. The draft report is presently undergoing review and is not yet available to the public. It is expected to be finalized and made available to the public in about September or October this year.

The Truckee Basin Study is intended to assist water management agencies in their incorporation of future risks (e.g. water shortages) into their management, decision processes, and investment considerations. It achieves this through the identification of descriptions of future risks to Basin water resources and through an evaluation of selected options for addressing the related supply-demand imbalances. Further, as the first basin-wide climate change study for the Truckee River, this Basin Study provides a foundation for future investigations through the identification of key vulnerabilities and presents options for more detailed investigations. Decisions by local communities to move forward with the options presented in the Basin Study will likely require further information or evaluation and cooperation.

BACKGROUND

The basin study program, authorized by the Secure Water Act (P.L. 111-11), is specifically intended to assess the risk of climate change to water resources in the west's major river basins. BOR is the lead Federal agency for the basin study program.

The Secure Water Act specifically identifies eight major Reclamation basins that are proposed for a basin study; the Truckee River is one of the eight river basins listed. The intent of the basin study program is to ensure, to the maximum extent possible, that strategies are developed at watershed and aquifer scales to address potential climate change effects on water supplies and demands. The basin study is intended to assist water management agencies to incorporate the potential risk of water shortages, conflicts, and other impacts to

water users dependent upon the Truckee River, into their management and decision processes.

FISCAL IMPACT

None

JS:jd

Northern Nevada Water Planning Commission

STAFF REPORT

DATE: March 26, 2015

TO: Chairman and Members, Northern Nevada Water Planning Commission

FROM: Jim Smitherman, Water Resources Program Manager

SUBJECT: Review draft Western Regional Water Commission (“WRWC”) tentative budget for fiscal year 2015 – 2016; discussion, possible direction to staff, possible authorization for the Water Resources Program Manager to approve in-budget expenditures not to exceed \$25,000 from the routine operating expenses portion of the budget, and possible recommendation to the WRWC to approve the tentative budget.

SUMMARY

Staff has developed a draft tentative budget for fiscal year 2015-2016 for review and possible recommendation to the WRWC. The attached budget includes Regional Water Management Fund (“RWMF”) revenues and expenses for staff and non-staff professional services. Additional budget worksheets include details for professional services related to priority projects and routine operating expenses.

The WRWC has authorized the Water Resources Program Manager to approve in-budget expenditures from the RWMF not to exceed \$25,000 per project upon approval of the Northern Nevada Water Planning Commission (“NNWPC”); and to sign contracts for such expenditures. (See attached Resolution No. 3.) In prior years, staff has requested approval of the routine operating budget for non-staff services (see worksheet page 3 of 4) after the WRWC has approved and adopted the tentative budget. This has allowed the Program Manager to procure routine services and supplies without placing individual items for each expenditure on NNWPC agendas. NNWPC authorization for the Program Manager's authority prior to adoption of the tentative budget, contingent upon adoption of the tentative budget by the WRWC, will eliminate the need for a second agenda item for such a recommendation.

Therefore, the intent of staff's recommended action today is twofold: to recommend to the WRWC the approval of the draft tentative budget for fiscal year 2015-2016, and to approve the routine operating budget for non-staff services consistent with WRWC Resolution No. 3, expressly contingent upon the WRWC's approval of the tentative budget without modification to the item for the routine operating budget for non-staff services.

BACKGROUND

The WRWC is required to submit a budget to the Nevada Department of Taxation after holding a hearing in May of each year. The attached draft tentative budget is provided for review, discussion, possible direction to staff, and possible recommendation to the WRWC for approval

as presented or with revisions. Based on input received, staff will prepare a tentative budget for review and adoption by the WRWC.

FISCAL IMPACT

The fiscal year 2015-2016 draft tentative budget projects \$1,571,763 in revenue, \$2,082,050 in expenses, and an ending cash balance of approximately \$2,327,000. Budget expenses include a maximum of \$1,409,050 for WRWC work plan activities, \$602,000 for three full time staff and legal services, and various routine operating expenses in the amount of \$71,000.

RECOMMENDATION

Staff recommends that the NNWPC review the draft tentative budget for fiscal year 2015-2016 and, if acceptable, authorize the Water Resources Program Manager to approve in-budget expenditures from the RWMF not to exceed \$25,000 per project, expressly contingent upon the WRWC's approval of the tentative budget without modification to the item for the routine operating budget for non-staff services, and make a recommendation to the WRWC for approval of the tentative budget.

JS:jd
Attachments

**Western Regional Water Commission
Fiscal Year July 1, 2015 - June 30, 2016
Budget Summary Worksheet**

Budget Category	1.5% WMF	NOTE	Washoe County In-Kind	NOTE	TMWA In-Kind	NOTE	SVGID In-Kind	NOTE
REVENUE	Amount		Amount		Amount		Amount	
Estimated Water Surcharge Revenues	1,475,479							
Grant and/or Other Revenue	40,000							
Estimated Interest Income	56,284							
Total Revenue	1,571,763		0		0		0	
PROFESSIONAL SERVICES/SUPPLIES	Amount		Amount		Amount		Amount	
Estimated Professional Services (Page 2)	1,409,050	1						
Staff Services (Page 3)	602,000	2,3	0				0	
Non-Staff Services (Page 3)	71,000							
Total Professional Services/Supplies	2,082,050		0				0	
OTHER EXPENSES	Amount		Amount		Amount		Amount	
Estimated Misc.			0					
Total Other Expense	0		0		0		0	
Total Expenses	2,082,050		0		0		0	

Net Decrease in Cash Reserves (\$510,287)

Cash Balance as of 7/1/14	\$3,831,723
Estimated 2014/2015 Revenue (Cash Flow)	1,515,213
Estimated 2014/2015 expenditure (Page 4)	(\$2,509,630)
Estimated cash balance as of 7/1/15	\$2,837,306
Net Decrease in Cash Reserves for FY 2015-16	(\$510,287)
Estimated cash balance as of 6/30/16	\$2,327,019

NOTES:

- Proposed budget provides legal spending authority for projects yet to be approved by the WRWC upon recommendations provided by the NNWPC. Specific per project scope and cost yet to be developed and approved by the WRWC.
- Proposed budget provides legal spending authority for contract staff services previously approved by the WRWC.
- Includes Washoe County estimate for overhead: 1.5% fund management, accounting, purchasing, human resources, information technology, office space, utilities, computer hardware, software, copier, supplies, routine/administrative and GIS/drafting services.

Professional Services Budget Detail Fiscal Year 2015/2016

Professional Services Project Name	2015/2016 1st Quarter Budget	2015/2016 2nd Quarter Budget	2015/2016 3rd Quarter Budget	2015/2016 4th Quarter Budget	2015/2016 Budget Total	Expense Description/Example
-b-	-f-	-g-	-h-	-i-	-j-	-k-
Restoration Investments in the Truckee Watershed	\$7,263	\$7,263	\$7,263	\$7,263	\$29,050	Second year funding
<i>STM Watrer Facility Plan Update</i>	\$37,500	\$37,500	\$37,500	\$37,500	\$150,000	ILA with TMWA
<i>Highland Canal Water Quality Project</i>	\$31,250	\$31,250	\$31,250	\$31,250	\$125,000	Assumes that project starts in FY14/15
<i>TROA 6700 AF Water Rights Requirement</i>	\$0	\$0	\$0	\$0	\$0	Water rights acquisition for TROA 6700 AF requirement
<i>208 Plan Review and Update</i>	\$15,000	\$15,000	\$15,000	\$15,000	\$60,000	\$20k WMF; \$40k State Grant Funding
Regional Water Planning Projects	\$91,013	\$91,013	\$91,013	\$91,013	\$364,050	
<i>Cloud Seeding Monitoring</i>	\$6,250	\$6,250	\$6,250	\$6,250	\$25,000	For precipitation monitoring and analysis
<i>Cloud Seeding</i>	\$25,000	\$25,000	\$25,000	\$25,000	\$100,000	ILA with DRI for cloud seeding operations
<i>Washoe ET Project</i>	\$2,500	\$2,500	\$2,500	\$2,500	\$10,000	ILA with DRI; annaul monitoring weather station maintenance
<i>Water Usage Review Program</i>	\$25,000	\$25,000	\$25,000	\$25,000	\$100,000	
<i>Certified Landscape Technician Program</i>	\$3,125	\$3,125	\$3,125	\$3,125	\$12,500	ILA with NLA
Regional Water Conservation	\$61,875	\$61,875	\$61,875	\$61,875	\$247,500	
<i>Integrated Wastewater and Reclaimed Water System Planning</i>	\$25,000	\$25,000	\$25,000	\$25,000	\$100,000	Indirect Potable Reuse/Effluent Management Planning
Regional Reclaim Water Planning Projects	\$25,000	\$25,000	\$25,000	\$25,000	\$100,000	
<i>NPDES Storm Water Quality Management Program</i>	\$65,625	\$65,625	\$65,625	\$65,625	\$262,500	ILA with City of Reno
Regional Storm Water Planning Projects	\$65,625	\$65,625	\$65,625	\$65,625	\$262,500	
Regional Flood Control Planning Projects	\$0	\$0	\$0	\$0	\$0	
<i>Water Quality Standards and TMDL Review, and Compliance</i>	18,750	18,750	18,750	18,750	75,000	ILA with City of Reno for LTI
<i>Septic System Mitigation Planning</i>	\$0	\$0	\$0	\$0	\$0	1. Phase II - Risk assessment data needs (150k for two years)
Regional Wastewater Planning Projects	\$18,750	\$18,750	\$18,750	\$18,750	\$75,000	
<i>Water Management Plan Update</i>	\$12,500	\$12,500	\$12,500	\$12,500	\$50,000	50K WMP Update contracts.
<i>TMRPA GIS Population Model</i>	\$77,500	\$77,500	\$77,500	\$77,500	\$310,000	ILA with RRGB
Comprehensive Plan	\$90,000	\$90,000	\$90,000	\$90,000	\$360,000	
Totals	\$352,263	\$352,263	\$352,263	\$352,263	\$1,409,050	

**Western Regional Water Commission
Routine Operation Budget Fiscal Year 2015/2016**

G/L Account Discription		2015/2016 Annual Routine Operating Budget Total	Expense Description/Example
Contract Services	WRWC Employees	\$340,000	Cost of <i>Support Staff</i> services as defined by employee services contract entered into between Washoe County and WRWC.
Contract Services	Washoe County Overhead	\$130,000	Based on analysis of fy13-14 actual general fund overhead and CSD fy14-15 projected apportioned overhead.
Contract Services	Mileage Expenses	\$2,400	Annual routine daily vehicle mileage expenses.
Legal Services	Legal Services	\$129,600	Cost of <i>Legal Counsel</i> services as defined by contract as entered into between Rhodes Law Office and WRWC
Lobbying	Lobbying Registration	\$0	Cost of registration for staff members as state lobbyists
	Staff Services Subtotal	\$602,000	
Contract Services	Minutes	\$15,000	Annual service contract to provide for recording of meetings, transcription of minutes and document editing.
	Website	\$15,000	Such as; website content and design services; annual website updating, maintenance, and hosting; specialized programming services; digital library development and updating; hosting, development and maintenance of databases; licensing fees, software and software updates, training/programming reference materials.
	Video Coverage	\$5,000	Annual expense for video coverage of WRWC and NNWPC meetings.
Financial Consulting Services	CAFR & Audit	\$10,000	Annual expense for CAFR development and financial audit.
Seminars and Meetings	Regional Training	\$1,000	Cost of training for staff members <i>not covered by in-kind services</i> including registration and other miscellaneous cost such as reference materials, field trips, etc.
Travel	Regional Travel	\$1,000	Cost of travel and training for staff members <i>not covered by in-kind services</i> including transportation services, mileage reimbursement, lodging, meals, and other miscellaneous cost such as parking, etc.
Advertisements	Advertising	\$4,000	Such as advertising and legal notices.
Undesignated Budget	Misc. Operating	\$20,000	Such as: printing & reproduction, publications, and public notices, refreshments for volunteer boards/commissions, GIS and other in-house member agency support (not covered by in-kind services), equipment & supplies (i.e. computers, computer related supplies such as CDs, DVDs, etc.), projectors, printers, poster board, reproduction services, software licensing and fees, labels, business cards, periodicals, subscriptions, books, postage & mailing, promotion and public materials, misc. equipment rental, insurances, moving staff office location, and other expenses not included as part of overhead.
	Non-Staff Services Subtotal	\$71,000	
	Totals	\$673,000	

Estimated Expenditures Fiscal Year 2014/2015

Quarter Ending	Total Estimated Fiscal 2014/2015 Expenditure as of 6/30/15
WRWC Employees	330,000
Mileage Expenses	2,400
WRWC Overhead	130,880
Legal Services	129,600
Lobbying Services	600
<i>Service Contract Subtotal</i>	593,480
Minutes	15,000
Website	10,000
Envision/G3	5,000
CAFR & Audit	8,500
Regional Training	1,000
Regional Travel	1,000
Advertising	3,000
Misc. Operating	40,000
<i>Non-Service Related Routine Operating Subtotal</i>	83,500
Routine Operating Expense Subtotals	676,980
<i>DWR / TMWA Consolidation</i>	300,000
<i>TROA 6700 AF Water Rights Requirement</i>	610,000
<i>Restoration Investments in the Truckee Watershed</i>	29,050
<i>Highland Canal Water Quality Project</i>	125,000
<i>KTMB River Corridor Management Plan</i>	22,000
<i>208 Plan Review and Update</i>	0
Regional Water Planning	1,086,050
	0
<i>DRI Cloud Seeding</i>	132,000
<i>Washoe ET Project</i>	45,000
<i>Water Usage Review Program</i>	65,600
<i>Certified Landscape Technician Program</i>	12,500
Conservation, Sustainability, Climate Change	255,100
<i>TMWRF - Huffaker Intertie Study</i>	20,000
<i>Waste Water Effluent Management</i>	25,000
Regional Reclaimed Water Planning Projects	45,000
	0
<i>NPDES Storm Water Quality Management Program</i>	262,500
Regional Storm Water Planning Projects	262,500
Regional Flood Control Planning Projects	0
	0
<i>Water Quality Standard and TMDL Review</i>	40,000
<i>TMWRF - Corollo</i>	0
<i>Septic Alternatives Analysis</i>	75,000
<i>Federal 208 Pass through Gant for Septic Alternatives Analysis</i>	0
Regional Wastewater Planning Projects	115,000
<i>Plan Update (Cost-Finance and Water Balance Model Contract)</i>	49,000
<i>TMRPA GIS Population Model</i>	10,000
<i>DWR GIS Services</i>	10,000
Water Management Plan	69,000
<i>Project Subtotal</i>	1,832,650
Totals	2,509,630

Northern Nevada Water Planning Commission

STAFF REPORT

DATE: March 27, 2015

TO: Chairman and Members, Northern Nevada Water Planning Commission (“NNWPC”)

FROM: Jim Smitherman, NNWPC Water Resources Program Manager

SUBJECT: Presentation of staff comments on the chapter entitled “Population Forecast and Projections of Water Demand, Peak Day Requirements and Wastewater Flow” for the 2016 Regional Water Management Plan (“RWMP”) update; discussion and possible direction to staff

SUMMARY

Staff has reviewed Chapter 6 (Population Forecast and Projections of Water Demand, Peak Day Requirements and Wastewater Flow) of the 2011 RWMP, and determined that every section will require revisions. For that reason, the attached copy of Chapter 6 does not include shading where edits are expected. The following is a list of sections and subsections reviewed by staff including notes on anticipated revisions:

Introductory Sections: Update all sections with current information.

- 6.1** *Comparison of the Consensus Population Forecast and the Estimated Population that can be Supported by the Sustainable Water Resources in the Planning Area*
 - 6.1.1** *Consensus Population Forecast:* Update using 2014 Consensus Forecast.
 - 6.1.2** *Water Resources:* Update water resources figures using the latest Truckee Meadows Water Authority (“TMWA”) Water Resource Plan (“WRP”) data.
 - 6.1.3** *Water Demand and Population Projections:* Update water demand figures using the latest TMWA WRP data.
 - 6.1.4** *Conclusions:* Update as needed using current information. The overall conclusion will be unchanged: “*the estimated sustainable water resources of approximately 183,200 af per year as shown in the Water Resources Baseline Table are more than adequate to serve the draft Consensus Forecast population...*”.
- 6.2** *Projections of Water Demand, Peak Day Requirements and Wastewater Flow for Service Areas*
 - 6.2.1** *Projections by Planning Area:* Update using the latest TMWA WRP data, Truckee Meadows Regional Planning Agency (“TMRPA”) population and employment modeling results and Stantec technical assistance as necessary.
 - 6.2.2** *Water Demand Projections:* Same comment as above.
 - 6.2.3** *Wastewater Flow Projections:* Update using the latest TMWA WRP data, Reno, Sparks and Washoe County wastewater service provider data, TMRPA population and employment modeling results, and Stantec technical assistance as necessary.
- 6.3** *Water Balance Model:* Update using data from prior sections and Stantec technical assistance.

RECOMMENDATION

Staff recommends that the NNWPC accept the review notes on Chapter 6 of the 2011 RWMP, with or without changes, and provide direction to staff as appropriate concerning this chapter as part of the development of the 2016 RWMP update.

JS:jd

Attachment: 2011 RWMP Chapter 6 Population Forecast and Projections of Water Demand, Peak Day Requirements and Wastewater Flow

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Chapter 6 – Population Forecast and Projections of Water Demand, Peak Day Requirements and Wastewater Flow

Purpose and Scope

This chapter uses the *Washoe County Consensus Population Forecast* (Washoe County, 2010) as the basis for estimating the future needs of the Planning Area with respect to water demands including peak day requirements, wastewater flows and treatment capacity, effluent disposal and reclaimed water capacity. The chapter relies on data presented in preceding chapters and develops a water budget showing present and future water supplies available to public purveyors, wastewater flows by service provider in addition to capacities to dispose of effluent and use reclaimed water.

Summary and Findings

On April 9, 2010, the Western Regional Water Commission (“WRWC”) determined and made a finding that the draft Washoe County Consensus Population Forecast for 2030 (“Consensus Forecast”) is less than the estimated population that can be supported by the sustainable water resources identified in the *Regional Water Plan*. The finding was transmitted to the Truckee Meadows Regional Planning Agency (“TMRPA”), Reno, Sparks and Washoe County in May 2010.

The Washoe County Consensus Forecast is adequate for 20-year, county-wide population projections, but it is not adequate for facility planning as performed by public purveyors and other water-related utilities or for disaggregation to utility service areas.

A Regional Water Balance Flow Diagram has been developed covering five planning areas (Figure 6-1), which is a graphical representation of the existing conditions (Figure 6-2) and the projected 2030 future conditions (Figure 6-3) for the water supply, wastewater treatment, reclaimed water and wastewater disposal requirements. The following conclusions can be drawn from this evaluation:

Water Resources

Overall, the region has available water resources to meet the projected 2030 increase in demand. These water resources include the *Truckee River Operating Agreement* (“TROA”) water supplies, the Fish Springs Water Importation Project, local basin groundwater supplies, and local tributary creeks including Galena, Thomas, Whites, Brown’s and Steamboat Creeks. In addition to these water resources, the region has reclaimed water resources available for multiple uses from the Truckee Meadows Water Reclamation Facility (“TMWRF”), South Truckee Meadows Water Reclamation Facility (“STMWRF”), Reno Stead Water Reclamation Facility (“RSWRF”) and Cold Springs Water Reclamation Facility (“CSWRF”).

In several planning areas, however, there are water supply imbalances that will need to be addressed over the long term. In particular, the demands from domestic wells and permitted municipal groundwater pumping in Cold Springs Valley, Lemmon Valley and Spanish Springs Valley exceed the respective State Engineer estimates of perennial yield of each basin. This is an issue that affects both existing and future water users, and exists under both current and projected 2030 conditions.

The Truckee Meadows, Sparks and South Truckee Meadows planning areas do not have water supply imbalances.

There will continue to be local area impacts within portions of these planning areas where mitigation of groundwater level declines and impacts to shallow domestic wells will continue to be necessary. The Mt. Rose fan area is an example of this situation.

Wastewater

Long term disposal and reuse of treated effluent will be a challenge throughout the different planning areas. Cold Springs and Lemmon Valley generally have sufficient disposal capacity to meet the projected needs until 2030. However, future disposal options will need to be identified to accommodate planned development beyond the 2030 time horizon.

In the Central Truckee Meadows, Sparks and Spanish Springs planning areas, discharge to the Truckee River through TMWRF may be limited in the future by several constraints. Roughly 7,700 acre feet (“af”) of additional disposal capacity will be required.

In the South Truckee Meadows planning area, 100 percent of the reclaimed water is used for irrigation. Based on the 2030 flow projections, approximately 5,700 af of additional water reclamation or disposal capacity will be required.

Introduction

This chapter presents a summary of the process that was followed to determine whether the forecasted population for the year 2030 can be supported by the sustainable water resources available within Washoe County. Furthermore, more detailed projections of future water demands, including peak day capacity requirements and wastewater treatment plant capacity needs have been compiled for the primary service areas within the region.

An analysis as to whether the forecasted population can be supported by the sustainable water resources was done in response to *Truckee Meadows Regional Plan* (“Regional Plan”) (Truckee Meadows Regional Planning Agency, 2002) amendments adopted by the Regional Planning Governing Board (“RPGB”) in January 2010. The amendments provide for a comparison between the draft Consensus Forecast and the estimated population that can be supported by the sustainable water resources as identified in this Plan. As discussed in more detail in Section 2.2.1.1, amendments to the RPGB’s Regulations on Procedure designate the Northern Nevada Water Planning Commission (“NNWPC”) and the WRWC as the entities to perform the comparison, and the WRWC as the body to make a determination and finding as to the results of the comparison.

For the *Regional Water Plan*, an estimate of future water demands and wastewater flows at the treatment plants consistent with the Consensus Forecast population projection has been compiled for the primary service areas within the planning area. The service areas are consistent with the planning areas established for the *City of Reno and Washoe County TMSA/FSA Water Wastewater and Flood Management Facility Plan* (ECO:LOGIC, 2007) and the *City of Sparks TMSA/FSA Conceptual Facility Master Plan* (Stantec, 2008), which are based primarily on wastewater service areas and political boundaries. The planning areas are identified as Cold Springs, Stead/Lemmon Valley, the Washoe County portion of Spanish Springs, Sparks, Sun Valley General Improvement District (“SVGID”), Truckee Meadows and South Truckee Meadows. A Regional Water Balance Flow Diagram has also been developed,

which is a graphical representation of existing and future conditions for the water supply, wastewater treatment, reclaimed water and wastewater disposal requirements. The Regional Water Balance Flow Diagram is useful to answer the following questions:

- How much potable water is used today, and in what locations?
- From which sources does the potable water originate, and once used, where does it go for wastewater treatment?
- Following treatment, how much of the water is reused, and where is the balance disposed?
- Are there future imbalances in water supply, wastewater disposal or reclaimed water usage, and if so, in which planning areas?
- Are there planning areas with adequate capacity to address imbalances?

6.1 Comparison of the Consensus Population Forecast and the Estimated Population that can be Supported by the Sustainable Water Resources in the Planning Area

As described in Section 2.2.1.1, the RRGB designated the NNWPC and the WRWC as the entities to perform a comparison of the draft Consensus Forecast with the estimated population that can be supported by the sustainable water resources as set forth in this Plan prior to the adoption of the Consensus Forecast.

6.1.1 Consensus Population Forecast

The Washoe County Department of Community Development provided the draft Consensus Forecast in February 2010. The population was compiled using data from Truckee Meadows Water Authority (“TMWA”), Global Insight, Woods and Poole, and the State Demographer. The draft Consensus Forecast population for 2030 is approximately 590,500, which is 29,823 less than the 2008 Consensus Forecast population for 2030.

6.1.2 Water Resources

Table 2-1, Water Resources Baseline, provides long-range planning-level estimates for sustainable water resources using the best available information. The table identifies selected hydrographic basins within the region and quantifies surface water and groundwater in two ways. Appropriations (water rights), including decreed rights and rights permitted or certificated by the State Engineer for municipal and industrial (“M&I”) use and those that may be converted to M&I use, are quantified separately from those that cannot be converted to M&I use.

The Water Resources Baseline Table (Table 2-1) acknowledges *TROA*’s effect on the availability and sustainability of Truckee River water. *TROA* is designed to provide long-term sustainable water operations for the multiple stakeholders on the Truckee River system through the continued use of water rights converted from irrigation to M&I use. The Truckee Meadows is fortunate in having significant capacity for storage in upstream reservoirs, including Lake Tahoe, to integrate with other resources to maximize the yield of the Truckee River. *TROA* further enhances the ability to maximize storage for drought supplies.

TMWA has over 142,900 af of decreed, groundwater, storage, and irrigation rights sufficient to generate water to serve approximately 101,000 af of commitments as of June 2009. As shown in Table 3 of TMWA’s *2030 Water Resource Plan*, over 50,000 af of Truckee River mainstem

rights are potentially available for dedication to TMWA or Washoe County Department of Water Resources (“WCDWR”) to support future will-serve commitments. It should be noted, however, that Truckee River mainstem irrigation water rights available for conversion to M&I use over the long term continues to decrease, and “availability” is not necessarily an indication of the willingness of a party to sell.

The Water Resources Baseline Table also shows the quantity of groundwater in each basin consistent with the State Engineer’s estimates of perennial yield. In basins where appropriations for M&I use (or those that may be converted to M&I use), are less than the perennial yield estimate, only those water rights actually appropriated are considered to be sustainable. The table includes basins that may provide M&I water supplies within a 20-year planning timeframe.

6.1.3 Water Demand and Population Projections

TMWA has developed a three-step process to produce a long-range water demand projection for all of Washoe County. The first step was to develop a population projection model based on fitting a logistic curve model to past population, and then create a projection of that population to the year 2050. The second step was to develop a countywide inventory of buildings, and then create a projection of new residential dwelling units and commercial buildings as a function of population. The third step was to estimate water demand as a function of building inventories and historic water use coefficients.

The results of steps one and two show that the models fit the historic data well and that the projected values follow a reasonable trend. The projected trend for persons per dwelling unit and persons per developed acre show that the projection will meet the land and building needs of the projected population. TMWA’s methodology is published in its *2030 Water Resource Plan, Appendix I*.

TMWA assisted the NNWPC and the WRWC by re-running its model using the draft Consensus Forecast population and producing a building inventory and water demand projection. The building inventory and water demand projection estimates the increase in both single family and multi family dwelling units, including residential units served by domestic wells, and commercial buildings. A projection of metered irrigation usage is also presented.

6.1.4 Conclusions

The model projects a water demand of approximately 142,000 af to support a population of approximately 590,500 as projected for the year 2030 by the draft Consensus Forecast. Therefore, the estimated sustainable water resources of approximately 183,200 af per year as shown in the Water Resources Baseline Table are more than adequate to serve the draft Consensus Forecast population for 2030. On April 9, 2010, the WRWC approved a finding that the forecasted population can be supported by the sustainable water resources as set forth in this Plan.

The model was also used to project beyond the 2030 population estimate using the same planning assumptions, purely as a planning exercise, to estimate the maximum population that could be supported by the sustainable water resources. That exercise calculated a population of approximately 741,000. It is imperative to understand that this population calculation is the result of a mathematical model and has no basis in, or correlation to, the Consensus Forecast or any other population forecast.

6.2 Projections of Water Demand, Peak Day Requirements and Wastewater Flow for Service Areas

The preceding sections present a summary of the process that was followed to determine whether the forecasted population can be supported by the sustainable water resources available within Washoe County. Given that sustainable water resources are available to meet future growth through 2030, more detailed projections of future water demands, including peak day capacity requirements and wastewater treatment plant capacity needs are required to estimate future infrastructure requirements and costs.

Estimates of future water demands and wastewater flows consistent with the Consensus Forecast population projection have been disaggregated for seven primary planning areas within the region. The intent of this projection is to more closely approximate water and wastewater infrastructure needs by service provider; it is not intended in any way to supplant or be in conflict with the Regional Planning Commission's adoption of the Consensus Forecast or the provisions of the Regional Plan.

6.2.1 Projections by Planning Area

The seven planning areas are consistent with the planning areas established for the *City of Reno and Washoe County TMSA/FSA Water Wastewater and Flood Management Facility Plan* (ECO:LOGIC, 2007) and the *City of Sparks TMSA/FSA Conceptual Facility Master Plan* (Stantec, 2008). The planning areas are based primarily on wastewater service areas and political boundaries, and are identified as Cold Springs, Stead/Lemmon Valley, the Washoe County portion of Spanish Springs, Sparks, SVGID, Truckee Meadows and South Truckee Meadows.

6.2.1.1 Calibrated Consensus Forecast

The water demand model developed by TMWA for its *2030 Water Resource Plan* was used to disaggregate projected water demands. To apply the model to this Plan, the following adaptations were made:

- Population data includes 2009 population estimates.
- Consensus Forecast is calibrated to 2009 population estimate.
- Planning area boundaries are changes to hydrographic basins and wastewater service areas.
- A new building model was re-estimated using 2009 property data.

A full description of the model is published in *TMWA's 2030 Water Resource Plan, Chapter 4, Appendix H, and Appendix I.*

The water demand model depends on four components; a population projection, building inventories, water service counts and annual water use per service. The historic population is used with the annual building inventories to estimate the relationship between population, new homes, new multi-family units, and commercial buildings. The statistical relationship between the historic population and building growth is used to project the growth of new buildings as a function of the projected population.

The Consensus Forecast was used for this water demand projection. To satisfy model requirements, the Consensus Forecast is calibrated to 2009. The annual building inventory is estimated from the County Assessor's parcel and building tables. Using the construction year for each building on each parcel, a tabulation of building by type and year is created. This annual inventory is used to compute the statistical relationship between population and buildings. This model is used with the population projections to project the following classes of buildings and water services:

- Single family homes on wells
- Single family homes on municipal water
- Multi-family dwelling units
- Commercial buildings using general metered water service
- Metered irrigation water services

Total projected water service counts are converted to water demand using the following annual water use per service factors:

- Single family homes on wells: 325,851 gallons
- Single family homes on municipal: 166,610 gallons
- Multi-family service: 435,009 gallons or 42,522 gallons per dwelling unit
- Commercial water service: 707,220 gallons
- Metered irrigation service: 1,018,000 gallons

To disaggregate the total demand into the smaller planning areas, the historic percentage of each class of buildings is projected for each area and building type. The total number of water services and water demand in each planning area is summed and forced to equal the county total in all years.

6.2.2 Water Demand Projections

Following this methodology, projected 2010 and 2030 average day water demands for each of the planning areas were developed, which are presented in Table 6-1. The 2030 total potable water demand projection of 116,400 af is less than TMWA's *2030 Water Resource Plan* projection of 142,000 af. This Plan considers the area where municipal services are to be provided within the Truckee Meadows Services Area, which is a subset of the larger area of Washoe County evaluated in TMWA's *2030 Water Resource Plan*.

Table 6-1 Water Demand Summary

	2010 Water Demand (AFA)	2030 Water Demand (AFA)
Planning Area	Total Potable Water Demand ¹	Total Potable Water Demand ¹
Stead / Lemmon Valley	4,300	6,200
Cold Springs	1,400	2,400
Spanish Springs	2,800	4,200
Sparks	19,200	28,000
South Truckee Meadows	8,500	15,900
Sun Valley	1,500	2,000
Truckee Meadows	43,500	57,700
Total	81,200	116,400

¹ Demand numbers include an estimated 6 percent water loss factor.

6.2.2.1 Peak Day Requirements

The projection of future water facility requirements that may be needed by 2030, as presented in Chapter 9, is based largely upon the following estimate of the peak day water demand developed for each planning area. Peaking factors, the ratio between average day demands and maximum day demands, were obtained from the most current water facility plans from TMWA and WCDWR. The 2010 and 2030 average day and maximum day water demands are presented in Tables 6-2 and 6-3.

Table 6-2 2010 Average & Maximum Day Potable Water Consumption

Planning Area	Water Demand (GPD)		
	Total Potable Water Demand ¹	Maximum Day Demand (MDD) / Average Day Demand (ADD) Ratio	MDD Demand
Stead / Lemmon Valley	3,814,000	2.40	9,154,000 ²
Cold Springs	1,286,000	2.40	3,086,000 ³
Spanish Springs	2,470,000	2.75	6,793,000 ²
Sparks	17,114,000	1.90	32,517,000 ⁴
South Truckee Meadows	7,572,000	2.20	16,658,000 ²
Sun Valley	1,330,000	2.10	2,793,000 ⁴
Truckee Meadows	38,854,000	2.00	77,708,000 ⁵
Total	72,440,000		148,709,000

¹ Demand numbers include an estimated 6 percent water loss factor.

Ratio Sources are as follows:

² WCDWR 2009-2028 Draft Water Facility Plan for Lemmon Valley and Spanish Springs Valley

³ Estimated to be equal to Stead/Lemmon Valley

⁴ TMWA 2005-2025 Water Facility Plan Appendix B

⁵ TMWA 2005-2025 Water Facility Plan

Table 6-3 2030 Average & Maximum Day Potable Water Consumption

Planning Area	Water Demand (GPD)		
	Total Potable Water Demand ¹	Maximum Day Demand (MDD) / Average Day Demand (ADD) Ratio	MDD Demand
Stead / Lemmon Valley	5,558,000	2.40	13,339,000 ²
Cold Springs	2,133,000	2.40	5,119,000 ³
Spanish Springs	3,726,000	2.60	9,688,000 ²
Sparks	24,961,000	1.90	47,426,000 ⁴
South Truckee Meadows	14,236,000	2.12	30,180,000 ²
Sun Valley	1,814,000	2.10	3,809,000 ⁴
Truckee Meadows	51,538,000	2.00	103,076,000 ⁵
Total	103,966,000		212,637,000

¹ Demand numbers include an estimated 6 percent water loss factor.

Ratio Sources are as follows:

² WCDWR 2009-2028 Draft Water Facility Plan for Lemmon Valley and Spanish Springs Valley

³ Estimated to be equal to Stead/Lemmon Valley

⁴ TMWA 2005-2025 Water Facility Plan Appendix B

⁵ TMWA 2005-2025 Water Facility Plan

6.2.3 Wastewater Flow Projections

Similar to the previous section, a projection of future wastewater flows for each planning area was developed to estimate the wastewater treatment capacity that may be needed by 2030. The wastewater flow estimates are based on generally accepted equivalent dwelling unit (“EDU”) flow factors for each area, and an estimate of commercial/industrial flows per service account.

The commercial/industrial flow per service account is estimated to be 1,500 gallons per day (“gpd”). This estimate is based on an analysis of winter water usage for 178 active commercial / industrial accounts within seven sample areas throughout Reno and Sparks. WCDWR also performed a similar analysis for their service area in South Truckee Meadows. The 2010 and 2030 wastewater flow projections are presented in Tables 6-4 and 6-5.

Table 6-4 2010 Projected Water Demand and Wastewater Generation Summary

Planning Area	Water Demand & Wastewater Flow (GPD)			Estimated Flow to Each Wastewater Treatment Facility (MGD)			
	Potable Water Demand ¹	Wastewater Generation	Ratio	Cold Springs	Stead / Lemmon Valley	STMWRF	TMWRF
Stead / Lemmon Valley	3,814,000	1,702,000	0.45		1.70		
Cold Springs	1,286,000	586,000	0.46	0.59			
Spanish Springs	2,470,000	1,165,000	0.47				1.17
Sparks	17,114,000	7,610,000	0.44				7.61
South Truckee Meadows	7,572,000	3,618,000	0.48			3.62	
Sun Valley	1,330,000	533,000	0.40				0.53
Truckee Meadows	38,854,000	19,755,000	0.51				19.76
Total	72,440,000	34,969,000	0.48	0.59	1.70	3.62	29.07

¹ Demand numbers include an estimated 6 percent water loss factor.

Table 6-5 2030 Projected Water Demand and Wastewater Generation Summary

Planning Area	Water Demand & Wastewater Flow (GPD)			Estimated Flow to Each Wastewater Treatment Facility (MGD)			
	Potable Water Demand ¹	Wastewater Generation	Ratio	Cold Springs	Stead / Lemmon Valley	STMWRF	TMWRF
Stead / Lemmon Valley	5,558,000	2,472,000	0.44		2.47		
Cold Springs	2,133,000	984,000	0.46	0.98			
Spanish Springs	3,726,000	1,788,000	0.48				1.79
Sparks	24,961,000	10,963,000	0.44				10.96
South Truckee Meadows	14,236,000	6,700,000	0.47			6.70	
Sun Valley	1,814,000	728,000	0.40				0.73
Truckee Meadows	51,538,000	25,386,000	0.49				25.39
Total	103,966,000	49,021,000	0.47	0.98	2.47	6.70	38.87

¹ Demand numbers include an estimated 6 percent water loss factor.

This methodology of using accepted EDU flow factors for new residential development and 1,500 gpd per new commercial /industrial account moderately over-estimates the 2010 wastewater flow to each treatment plant compared to 2009 historical flow records. This over-estimation of 2010 flows is reasonable given that the methodology does not account for the current local economic conditions, the “flat” construction trend and the observed reduction in residential and commercial building occupancy. These factors have led to both a decrease in potable water demand and wastewater flow throughout the region.

The 2030 wastewater flow projections are reasonable for the intended purpose of projecting future flows at each of the four regional wastewater reclamation facilities. The ratio of projected wastewater flow to water demand varies from 0.40 to 0.51, which approximates historical trends and supports this conclusion.

The 2030 wastewater flow projections represent the “average annual daily flow” that can be expected at the four regional wastewater reclamation facilities. Some variability should be anticipated in the actual capacity and process improvements that will be necessary in the future at each individual facility, as wastewater treatment is a complex combination of physical, biological and hydraulic processes. This is in addition to the inherent uncertainty of when and where future development will occur over the next 20 years.

Design of each process must take into account not only significant variations in flow, but variability in loading, or strength, of numerous constituents such as biological oxygen demand (“BOD”), suspended solids, dissolved solids and nutrients. When future improvements are required at the regional wastewater reclamation facilities, a detailed facility plan or engineering design report will be prepared that defines the specific process improvements and capacity requirements. This detailed information will take precedence over the “planning level” flow and capacity projections presented in this Plan.

6.3 Water Balance Model

A Regional Water Balance Flow Diagram has been developed, which is a graphical representation of the existing conditions and the projected 2030 future conditions for the water supply, wastewater treatment, reclaimed water and wastewater disposal requirements. The Regional Water Balance Flow Diagram is useful to answer the following questions:

- How much potable water is used today, and in what locations?
- From which sources does the potable water originate, and once used, where does it go for wastewater treatment?
- Following treatment, how much of the water is reused, and where is the balance disposed?
- Are there future imbalances in water supply, wastewater disposal or reclaimed water usage, and if so, in which planning areas?
- Are there planning areas with adequate capacity to address imbalances?

The existing condition Regional Water Balance relies on the historical water demands and wastewater flows from the *City of Reno and Washoe County TMSA/FSA Water Wastewater and Flood Management Facility Plan* (ECO:LOGIC, 2007) and the *City of Sparks TMSA/FSA Conceptual Facility Master Plan* (Stantec, 2008), and were used to reconcile the water balance

calculations. The future conditions Water Balance is based on the 2030 projections presented in Sections 6.1 and 6.2. Following is a general overview of the data presented in the Water Balance:

- All numbers are shown in acre feet annually (“afa”).
- The planning areas are consistent with the *City of Reno and Washoe County TMSA/FSA Water Wastewater and Flood Management Facility Plan* (ECO:LOGIC, 2007) and the *City of Sparks TMSA/FSA Conceptual Facility Master Plan* (Stantec, 2008) planning area boundaries as shown in Figure 6-1 (page 6-20). These areas are representative of the sewer service boundaries of the regional wastewater treatment facilities.
- The potential conversion of domestic wells to the municipal water system is shown as a water demand.
- The potential conversion of individual septic systems to the municipal sewer is shown as a wastewater flow.
- Local groundwater supplies are shown equal to the perennial yield of the respective basin, consistent with the Water Baseline Table presented in Chapter 2.
- Water supplies, wastewater treatment capacity and disposal constraints are identified for each planning area.
- Current groundwater recharge quantities are shown as a demand on the municipal water system.
- Undetermined Water Supply is called out if there are insufficient water resources identified in the planning area to meet the projected 2030 water demands.
- Undetermined Disposal is called out if there is insufficient disposal capacity, i.e. discharge to the Truckee River, rapid infiltration basins, and/or reclaimed water irrigation demands to meet the projected 2030 wastewater flows.
- Future reclaimed water demands are shown based on 2009 flow records. If new reclaimed water facilities and customers are added, this will decrease the quantity shown in Undetermined Disposal.

The Existing Regional Water Balance and the 2030 Regional Water Balance are presented in Figures 6-2 and 6-3, (pages 6-21 and 6-22) respectively. Table 6-6 presents the conclusions drawn from this evaluation.

Table 6-6 Regional Water Balance Key Findings

Planning Area	Water Balance	Wastewater Balance
Cold Springs	Existing municipal groundwater pumping (Utilities Inc.) of 1,417 af, 500 af identified perennial yield	Future septic tank conversion potential of 310 af
	Future domestic well conversion potential of 247 af	Future undetermined disposal capacity of 70 af
	Future 2030 water supply deficit of 2,147 af	
Reno Stead/Lemmon Valley	Existing municipal groundwater pumping of 2,028 af, 1,300 af identified perennial yield	Future septic tank conversion 560 af
	Existing 379 af well recharge	Future undetermined disposal capacity of 103 af, using maximum permitted disposal capacity to Swan Lake
	Future domestic well conversion potential of 2,177 af	
	8,000 af Fish Springs water supply available	
	Future 2030 surplus of 4,559 af, but 2,905 af of 8,000 is needed to meet deficit from perennial yield and domestic well conversion	
Sparks/Spanish Springs	Existing municipal groundwater pumping of 2,435 af, 1,000 af identified perennial yield	Future septic tank conversion 440 af
	Existing 229 af well recharge	Share of future undetermined TMWRF disposal capacity of 7,698 af
	Future domestic well conversion potential of 24 af	
	Future 2030 estimated <i>TROA</i> water supply surplus of 7,189 af, but 1,459 af is needed to meet deficit from perennial yield and domestic well conversion	

Central Truckee Meadows	<p>Existing 1,308 af well recharge</p> <p>Future domestic well conversion potential of 1,634 af</p> <p>Future 2030 estimated <i>TROA</i> water supply surplus of 12,905 af</p> <p>Support creek exchange water supply to South Truckee Meadows</p>	<p>Future septic tank conversion 960 af</p> <p>Share of future undetermined TMWRF disposal capacity of 7,698 af</p>
South Truckee Meadows	<p>No groundwater recharge at present, managed municipal groundwater pumping of 6,795 af</p> <p>Future domestic well conversion potential of 1,598 af</p> <p>Future 2030 estimated water supply surplus of 346 af, based on use of local groundwater, creek exchange and Truckee Meadows wholesale supplies</p> <p>Receives 5,958 af of creek exchange water supply from Central Truckee Meadows</p>	<p>Future septic tank conversion 850 af</p> <p>Future undetermined STMWRF disposal capacity of 5,690 af</p>

6.3.1 Water Supplies

Overall, the region has available water resources to meet the projected increase in demand. These water resources include the TROA water supplies, the Fish Springs Water Importation Project, local basin groundwater supplies, and local tributary creeks including Galena, Thomas, Whites, Brown's and Steamboat Creeks. In addition to these water resources, the region also has reclaimed water resources that are available for multiple uses from the TMWRF, STMWRF, RSWRF and CSWRF.

In several planning areas, however, there are water supply imbalances that will need to be addressed over the long term. In particular, the combined demand from domestic wells and permitted municipal groundwater pumping exceeds the perennial yield of the basins in Cold Springs, Lemmon Valley and Spanish Springs Valley. This is an issue that affects both existing and future water users, and exists under both current and projected 2030 conditions.

Water resource management options are available to help mitigate the potential negative impacts due to this imbalance. For instance, in Cold Springs, a portion of the supply from the Fish Springs Water Importation Project could be used to augment the available water resources. Other management options include conversion of domestic wells to the municipal water system, (municipal water systems are able to utilize and manage the groundwater resources more efficiently) and expanded groundwater recharge utilizing available water resources from basins with surplus water.

The Truckee Meadows, Sparks and South Truckee Meadows planning areas do not have a water supply imbalance. Water resource management practices by TMWA and WCDWR limit groundwater pumping and surface water resource utilization to sustainable levels. It should be noted that there will continue to be local area impacts within portions of these planning areas where mitigation of groundwater level declines and impacts to shallow domestic wells will continue to be necessary. The Mt. Rose fan area is an example of this situation. The available groundwater resource is not over-utilized; however, relatively shallow domestic wells that penetrate only the upper portion of the aquifer will continue to be affected by regional water level declines as a result of the combined pumping of both municipal and domestic wells.

The long term water supply imbalances that exist in the different planning areas are not a water resource availability issue, but rather an issue of how best to efficiently mitigate impacts resulting from use of the resource, and who shares in the cost of mitigation.

6.3.2 Wastewater Treatment and Disposal

Long-term disposal and reuse of treated effluent will be a challenge throughout the different planning areas. Cold Springs and Lemmon Valley generally have sufficient disposal capacity to meet the projected needs until 2030. However, future disposal options will need to be identified to accommodate planned development beyond the 2030 time horizon. Several options are available, such as disposal of a portion of the treated effluent to White Lake. This could create a wetland amenity similar to the Swan Lake Nature Study Area in Lemmon Valley. Other options include expanded use of reclaimed water for irrigation, and/or high level treatment of a portion of the effluent to help recharge the local groundwater basins.

In the Central Truckee Meadows, Sparks and Spanish Springs planning areas, discharge to the Truckee River through TMWRF may be limited in the future by several constraints, such as the total maximum daily load ("TMDL") wasteload allocations ("WLA") for nitrogen, phosphorus and

total dissolved solids (“TDS”) as presented in Chapter 4. Based on the 2030 flow projections, with approximately 33,600 af discharged annually to the river and 4,000 af of reclaimed water use for irrigation, roughly 7,700 af of additional disposal capacity will be required.

Management options to address the need for additional disposal capacity include:

- Work with state and federal regulatory authorities, in coordination with the Pyramid Lake Paiute Tribe (“PLPT”)’s water quality and quantity goals, to demonstrate that additional discharge to the Truckee River is an environmentally sound practice
- Connect additional reclaimed water users to the existing systems in Sparks and Reno. Reclaimed water irrigation use reduces the amount of water discharged to the Truckee River. However, this is a seasonal use and other options may be needed during limited irrigation periods, particularly during the months of May and October.
- Investigate the merits of supplying reclaimed water for year round industrial uses, such as the proposed Patrick technology park. Year-round use of reclaimed water improves TMWRF’s ability to meet the Total Nitrogen discharge limits to the Truckee River. As presented in Chapter 4, the Patrick project proponent is considering delivery of a minimum of 4,000 afa of TMWRF reclaimed water via a new pipeline to be developed to the project site.
- Continue to investigate the feasibility and public acceptance issues associated with implementing a groundwater recharge program using high quality reclaimed water. Groundwater recharge can provide an efficient and productive use of the reclaimed water resources, and can be one component to help mitigate the identified water supply imbalances in several planning areas.

In the South Truckee Meadows planning area, 100 percent of the reclaimed water is used for irrigation. Based on the 2030 flow projections, approximately 5,700 af of additional disposal capacity will be required. This represents an increase of over two times the current level of reclaimed water use. Management options available to Washoe County to address the need for additional disposal capacity are similar to TMWRF, with the exception of discharging to the Truckee River. WCDWR has ongoing efforts to continue to expand the reclaimed water system for irrigation; to pilot test the feasibility of using up to 1,000 af of reclaimed water annually for cooling Ormat’s Steamboat geothermal power plant; and to investigate the feasibility and public acceptance issues associated with implementing a groundwater recharge program using high quality reclaimed water.

INSERT

Figure 6-1 Regional Water Balance Planning Areas

Figure 6-2 Existing Regional Water Balance

Figure 6-3 2030 Regional Water Balance

References Cited

ECO:LOGIC, 2009, *Draft South Truckee Meadows Water Facility Plan Update*, prepared for Washoe County Department of Water Resources.

ECO:LOGIC, 2009, *2009-2028 Draft North Valleys Water Facility Plan*, prepared for WCDWR.

ECO:LOGIC Engineering, 2007, *City of Reno and Washoe County TMSA/FSA Water Wastewater and Flood Management Facility Plan*.

Stantec Consulting Engineers, 2008, *City of Sparks TMSA/FSA Conceptual Facility Master Plan*.

Truckee Meadows Regional Planning Agency, 2002, *Truckee Meadows Regional Plan*, as amended.

Truckee Meadows Water Authority, 2009, *2010 - 2030 Water Resource Plan*.

Truckee Meadows Water Authority, 2004, *2005 - 2025 Water Facility Plan*.

Truckee River Operating Agreement, 2008, http://www.usbr.gov/mp/troa/final/troa_final_09-08_full.pdf.

Washoe County, 2010, *Washoe County Consensus Forecast 2010-2030*, adopted by the Truckee Meadows Regional Planning Commission July 2010, revised November 2010.

Northern Nevada Water Planning Commission

STAFF REPORT

DATE: March 26, 2015
TO: Chairman and Members, Northern Nevada Water Planning Commission (“NNWPC”)
FROM: Jim Smitherman, NNWPC Water Resources Program Manager
SUBJECT: Presentation of comments received on the “Flood Management and Storm Water Drainage” chapter for the 2016 Regional Water Management Plan (“RWMP”) update; discussion and possible direction to staff

SUMMARY

Staff has not received additional comments on Chapter 5 (Flood Management and Storm Water Drainage) of the 2011 RWMP. Sections 5.7 and 5.8 have been shaded by staff to show text presently under review by Reno, Sparks and Washoe County staff.

The following is a brief overview of sections in Chapter 5 that either have been revised since the last NNWPC meeting, or that are awaiting review and comment by others:

- 5.6** *Truckee River Flood Project:* Redline edits to section 5.6.3 provided by the Truckee River Flood Management Authority and inadvertently omitted by staff in March are attached.
- 5.7** *Local Storm Water Drainage Programs:* Sections 5.7.1 through 5.7.4 have been provided to Reno, Sparks and Washoe County for review and comment.
- 5.8** *Flood Control and Drainage Overview by Hydrographic Basin:* Sections 5.8.1 through 5.8.12 have been provided to Reno, Sparks and Washoe County for review and comment.

RECOMMENDATION

Staff recommends that the NNWPC accept the review notes on Chapter 5 of the 2011 RWMP, with or without changes, and provide direction to staff as appropriate concerning this chapter as part of the development of the 2016 RWMP update.

JS:jd

Attachment: Revised Section 5.6.3

5.6.3 Cost and Funding

~~At an estimated cost of \$1.2 billion to \$1.6 billion, the Flood Project is the largest public works project ever undertaken in northern Nevada, combining ecosystem restoration, recreation and flood control together in one visionary, integrated effort. The ACOE is expected to contribute more than half of the project cost. The Flood Project is seeking funding in the President's Budget to complete the General Re-evaluation Report ("GRR") and the Environmental Impact Statement ("EIS"), and initiate design work for the project in FY 2011. The new Local Rate Plan is projected to cost approximately \$450 million dollars. The Federal Government may contribute up to \$163 million dollars towards construction.~~

Although the Flood Project is currently funded by a 1/8 cent sales tax, additional funds will be required to meet the local sponsor's required funding contribution. It is expected that a flood protection fee encompassing one or more "Flood Funding Areas" will be established over time to meet the funding need.

A Flood Funding Study is underway to address the need for additional revenues to meet the local sponsor's required funding contribution. ~~Alternatives developed as part of the study were presented to the Reno and Sparks City Councils and the Washoe County Board of Commissioners and each elected body agreed with a recommendation to have the Flood Project staff focus on the development of a Joint Powers Authority or a Regional Flood Control District.~~ The 2009 Nevada Legislature amended state statutes to enable the implementation of the selected governance model thereby allowing the TRFMA to collect the required flood fee. The TRFMA Board will be considering the adoption of a fee in 2015.

~~Local sponsors are also discussing which of the proposed flood project elements could be built with local funds only and what level of protection that would provide.~~

Northern Nevada Water Planning Commission

STAFF REPORT

DATE: March 24, 2015

TO: Chairman and Members, Northern Nevada Water Planning Commission (“NNWPC”)

FROM: Chris Wessel, NNWPC Water Management Planner
Jim Smitherman, NNWPC Water Resources Program Manager

SUBJECT: Presentation of comments received on the “Water Purveyors” chapter for the 2016 Regional Water Management Plan (“RWMP”) update; discussion and possible direction to staff.

SUMMARY

Since the March 4, 2015 NNWPC meeting, when Chapter 3 was last reviewed, the following updates have been received:

- Staff has received updated revisions from Edmund Quaglieri of the Nevada Public Utilities Commission (“PUC”) in response to requests by the NNWPC for additional information. Currently, Mr. Quaglieri has provided updates/corrections to *Section 3.3 Public Utilities Commission of Nevada*, *Section 3.3.1 Utilities Inc. of Nevada*, *Section 3.3.2 Sky Ranch Water Service Corp.*, *Section 3.3.3 Steamboat Springs Water Works, Inc.*, *Table 3-4 2014 Private Purveyor Capacities*, *Section 3.3.4 Other PUC Regulated Water Systems in the Reno/Sparks area* and *Table 3-5 Public Water Systems in Washoe County* (see attached).
- Previously, Kim Davis from the Nevada Division of Water Resources and Chris Anderson of the Washoe County Health District both submitted their databases of private water companies that they currently have on file. Staff has made a preliminary comparison of both databases with the information provided and has updated *Table 3-5 Public Water Systems in Washoe County* (attached). Staff anticipates some additional minor additions and/or subtractions to the final list.
- Staff still anticipates significant revisions by the Truckee Meadows Water Authority (“TMWA”) to elements of sections *3.1 Public Water Purveyors*, *3.2 Public Water Purveyor Consolidation Analysis* and *3.6 Water Rights Requirements*. These changes are not expected to be available until after the release of TMWA’s water resource plan

Staff will provide a verbal progress report at the NNWPC meeting.

RECOMMENDATION

Staff recommends that the NNWPC accept the report on comments received and proposed revisions to the “Water Purveyors” chapter for the 2016 RWMP update, and provide direction to staff as appropriate concerning this chapter as part of the development of the 2016 RWMP update.

CW:jd

Attachment: Chapter 3 proposed amendments

3.3 Other Non-Public Water Purveyors

Numerous privately owned and operated water utilities exist within the Planning Area. While the majority of these small water systems are owned and operated by individuals or businesses, and are regulated solely through the WCHD, several fall under the oversight of the Public Utilities Commission of Nevada ("PUC").

Public Utilities Commission of Nevada

PUC operates under portions of enabling legislation of the Nevada Revised Statutes ("NRS") and Nevada Administrative Code ("NAC"), Chapter 704 and is intended to provide a means of impartial regulation for both the utility and the customer. PUC regulates 27 water and wastewater utilities throughout the state, serving approximately 24,000 customers in Nevada and is responsible for ensuring that water utilities deliver clean, safe, and reliable water to their customers at reasonable rates. The PUC's role is: 1) To provide for fair and impartial regulation of public utilities; 2) To provide for the safe, economic, efficient, prudent and reliable operation and service of public utilities; and 3) To balance the interests of customers and shareholders of public utilities by providing customers with just and reasonable rates.

Regulation under PUC is required for all non-municipal utilities having systems which serve more than 25 customers and have sales in excess \$25,000 within any preceding 12-month period. The three largest PUC regulated systems within the Planning Area are listed in Table 3-4. The table shows the approximate number of services for each private purveyor, water sources, approximate 2014 calendar year~~09~~ water deliveries, water demands and facility capacities where available.

The PUC regulates two different types of water/wastewater companies, approximately 11 non-profit and 16 for profit companies. The non-profit companies have limited regulation. The PUC is involved with issuing the company's Certificate of Public Necessity and Convenience ("CPC"), any changes to their service territory, and the Utility Environmental Act Permits ("UEPA"). The for-profit companies are subjected to full regulation which includes all of the previous mentioned items as well as rate regulation, rules of service (tariffs), and monitoring their standards of service. Some of the larger for-profit companies are required to file for Commission approval mandatory three year rate cases as well as mandatory three year resource planning.

3.3.1 Utilities Inc. of Nevada

Utilities Inc. of Nevada operates the water system in the Cold Springs area of Reno and is a for-profit company. The system consists of five wells and four storage reservoirs having a total capacity of 2,260,000 gallons.

3.3.2 Sky Ranch Water Service Corp.

The ~~Sky Ranch Water Service Corp.~~Utilities Inc. operates the Sky Ranch water system in Spanish Springs Valley. The system is a for-profit company and consists of two wells and three storage tanks having a storage capacity of approximately 830,000 gallons.

3.3.3 Steamboat Springs Water Works, Inc.

Steamboat Springs Water Works, Inc. operates the water system in the Steamboat Hot Springs area south of Reno and is a for-profit company. The utility has potable water wells in close proximity to geothermal wells used to generate electrical energy and to supply a spa. The utility provides water to approximately 265 services with the potential to add 40 acres of undeveloped land to its service area.

Table 3-4 2014~~3~~ Private Purveyor Capacities

Water Purveyor	Year-End Active Connection*	Water Source	Water Rights* (afa)	2014 3 Deliveries * (afa)	Average Daily Demand* (MGD)	Peak Day Demand* (MGD)	Number of Tanks/Reservoirs	Total Storage Capacity (MG)
Utilities Inc. of Nevada	3,316 069	5 wells	2,414.86	1,272 1,400	1.25 3	2.69 8	4 Tanks	2.26
Sky Ranch Water Service Corp.	576	2 wells	718.61	608 535	0.5	1.5 4	3 Tanks	0.8
Steamboat Springs Water Works, Inc	265 9	3 wells	235.23	171 60	0.15	0.24 5	2 Tanks	0.42

* Indicates values are approximate; afa – Acre feet per Annum (year); MG – Million Gallons; MGD – Million Gallons per Day

~~**3.3.3 Steamboat Springs Water Works, Inc.**~~

~~**Steamboat Springs Water Works, Inc. operates the water system in the Steamboat Hot Springs area south of Reno. The utility has potable water wells in close proximity to geothermal wells used to generate electrical energy and to supply a spa. The utility provides water to approximately 290 services with the potential to add 40 acres of undeveloped land to its service area.**~~

3.3.4 Other PUC Regulated Water Systems in the Reno/Sparks area

- Verdi Meadows Utility Company, Inc. (“VMUC”) owns three wells, but only operates two wells and serves 175 customers in the Verdi area. VMUC currently has approximately 80 afa of water rights and is a for-profit utility.
- Silver Knolls Mutual Water Company (“SKM~~U~~WC”) operates two wells and serves 64 customers in Lemmon Valley. SKMUC currently holds 71.667 afa of water rights and is a non-profit company.
- Rosemount Water Company (“Rosemount”) provides spring water to 26 active connections in the Mount Rose area. Rosemount currently holds 84.31 afa of water rights and is a for-profit company.
- Verdi Mutual Water Company (“VMWC”) provides spring water to 8 active connections in the Verdi area. VMWC currently holds 480 afa of water rights and is a non-profit company.
- Reno Technology Park (“RTP”) operates two wells and serves one large industrial customer east of Reno near Lockwood, NV. RTP currently holds approximately 1,1125.6 afa of water rights and is a non-profit company.

~~Verdi Meadows Utility Company, Inc. operates three wells and serves 172 customers in the Verdi area. Silver Knolls Mutual Water Company operates two wells and serves 60 customers in Lemmon Valley. Rosemount Water Company provides spring water to 23 active connections in the Mount Rose area. Verdi Mutual Water Company provides spring water to several businesses and domestic parcels in the Verdi area.~~

Public Water Systems List

In addition to those described above, numerous small, privately-owned and operated, public water systems exist in Washoe County. These systems typically provide service to schools, parks, multi-residential properties (such as apartment complexes and mobile home parks), commercial businesses and special government facilities, for which municipal services were not available at the time of development. These systems fall under the oversight of the WCHD. A current list of water systems that are in operation within the Planning Area appears in Table 3-5.

Table 3-5 Public Water Systems in Washoe County

4 th Street Bistro	Mount Rose Bowl HOA
Ace Apartments	Mount Rose Water Company
Air Base Inn	Mount Rose Campground
Air Sailing Gliderport	Mount Rose Ski Area
Arrowhead Mobile Home Park	NDOT Wadsworth Rest Stop
Bar M Bar	New Washoe City County Park
Biglieri Water System	North Valley Business Facility
Boomtown Hotel and Casino	Old Forty West Motel
Bowers Mansion County Park	Old Washoe Station
Bristlecone Family Resources	Pleasant Valley School
Chuck's Circle C Market	Reno Sahara Trailer Park
Conestoga Mobile Home Park	Reno Technology Park Water Co.
Crosby's Lodge	River Bend Mobile Home Park
Crystal Peak County Park	Riverbelle Properties-Cedars
Crystal Trailer Park	Riverbelle Properties MHP
Davis Creek County Park	Rosemount Water Company
Dutch Wife Motel	Sage Trailer Park
Empire Water Company	Silver Knolls Mutual Water Co.
Foothill Trailer Park	Silver Spur Motel
Franktown Meadows	Sky Tavern (City of Reno)
Gold Ranch Casino	Slide Mountain Ski Area
Golden Valley County Park	Saint James
Grand View Terrace Water District	Sutcliffe Mobile Home Park
Granite Construction	The Lodge at Galena
Hawk's Nest Bar	Thomas Creek Estates Water Co.
Horizon Hills GID	Timberline Estates
J and K Hoffman	Truckee Canyon Water System
Jackson Food Store #23	Verdi Business Park Water Co-op ^[9]
Johnny's Little Italy Restaurant	Verdi School
Ke Ta Mobile Home Park	Wadsworth Mobile Home Park
Lemmon Valley Horseman's Park	Washoe Grill
Magic Carpet Golf	Washoe Lake State Park
Mel's Diner	Washoe Lake State Park, boat ramp
Merry Wink Motel	Washoe Regional Shooting Range
	Washoe Valley Meeting House Fac.
	Webb Mobile Home Park
	Westerner Motel

Northern Nevada Water Planning Commission

STAFF REPORT

DATE: March 26, 2015
TO: Chairman and Members, Northern Nevada Water Planning Commission (“NNWPC”)
FROM: Jim Smitherman, NNWPC Water Resources Program Manager
SUBJECT: Discussion and possible direction to staff regarding any chapters of the Regional Water Management Plan (“RWMP”) previously reviewed by the NNWPC in relation to the 2016 RWMP update.

SUMMARY

This agenda item is intended to be one in a series of standing items, ending upon the NNWPC’s final recommendation to the Western Regional Water Commission concerning the 2016 RWMP update. Under this item, NNWPC members may discuss, and the NNWPC may direct staff on the subjects of any of the RWMP chapters reviewed, since the December 2014 meeting, in relation to the 2016 update.

JS:jd

Northern Nevada Water Planning Commission

STAFF REPORT

DATE: March 26, 2015
TO: Northern Nevada Water Planning Commission
FROM: John Rhodes, Legal Counsel
SUBJECT: Report on legislative activities, including Bill Draft Requests ("BDR's") and Bills pending in the 2015 session of the Nevada Legislature, as March 23, 2015, that may affect or are of interest to the Western Regional Water Commission ("WRWC") / Northern Nevada Water Planning Commission ("NNWPC")

The following staff report lists BDR's and Bills pending in the 2015 Nevada Legislature that may affect or are of interest to the WRWC and NNWPC. No additional language is available for the BDR's at this time. Pending Bills are noted with an Assembly ("AB") or Senate ("SB") designation, and the complete language of each Bill is available by clicking on the corresponding link contained in the electronic version of this report. The dates following the BDR number in parentheses on all Bills indicate the date the Bill was introduced. WRWC staff and the WRWC Legislative Subcommittee will track these Bills, recommend positions to be taken, and provide periodic updates to the WRWC and NNWPC.

Bill Drafts Requested and Bills Introduced

Water Issues

**BDR / Requestor, or
Bill / Requestor**

<p>AB 347 Assemblyman Ohrenschall Revises provisions relating to water resources. (BDR 48-253, 3/16/15)</p>	<p>Subcommittee Position Neutral / Watch</p>
<p>SB 65 Water Resources, Division of Conservation and Natural Resources Makes various changes relating to the adjudication of vested water rights, appropriation of public waters, underground water and wells and planning and development of water resources. (BDR 48-366, 12/20/14)</p>	<p>Subcommittee Position Neutral / Watch</p>
<p>SB 81 Water Resources, Division of Conservation and Natural Resources Revises provisions governing groundwater management plans and critical management areas. (BDR 48-367, 12/20/14)</p>	<p>Subcommittee Position Neutral / Watch</p>
<p>AB 455 Legislative Committee on Public Lands (NRS 218E.510) Creates a statewide committee to study present and future supplies of water and allocation levels in Nevada. (BDR S-481, 3/23/15)</p>	<p>Subcommittee Position Neutral / Watch</p>
<p>SB 485 Senate Committee on Government Affairs Revises provisions relating to water.(BDR 48-708, 3/23/15)</p>	<p>Subcommittee Position Neutral / Watch</p>
<p>AB 169 Assembly Committee on Health and Human Services Provides for the collection and application of graywater for a single-family residence. (BDR 40-804, 2/17/15)</p>	<p>Subcommittee Position Neutral / Watch</p>
<p>AB 198 Assemblyman Oscarson Requires the Legislative Committee on Public Lands to conduct a study concerning water conservation and alternative sources of water for Nevada communities. (BDR S-805, 2/26/15)</p>	<p>Subcommittee Position Neutral / Watch</p>

- | | |
|--|---|
| <p>AB 415 Assembly Committee on Natural Resources, Agriculture, and Mining
 Revises provisions governing the definition of "farm" for purposes of availability of water.
 (BDR 48-928, 3/20/15)</p> | <p>Subcommittee Position
 Neutral / Watch</p> |
| <p>SB 423 Legislative Committee on Public Lands (NRS 218E.510)
 Requests appropriation for a grant to support cloud seeding activities in Nevada.
 (BDR S-483, 3/23/15)</p> | <p>Subcommittee Position
 Support</p> |

Open Meeting Issues

- | | |
|--|---|
| <p>19-931 Assemblywoman Titus
 Makes various changes relating to the Open Meeting Law. (12/10/14)</p> | <p>Subcommittee Position
 Watch</p> |
| <p>SB 70 Attorney General
 Revises provisions governing meetings of public bodies. (BDR 19-155, 12/20/14)</p> | <p>Subcommittee Position
 Neutral / Watch</p> |

Ethics Issues

- | | |
|---|---|
| <p>SB 380 Senator Smith
 Revises provisions governing ethics in government. (BDR 23-19, 3/17/15)</p> | <p>Subcommittee Position
 Neutral / Watch</p> |
| <p>123 Assembly Committee on Legislative Operations and Elections
 Makes various changes regarding transparency and ethics in government.(6/24/14)</p> | <p>Subcommittee Position
 Watch</p> |
| <p>AB 60 Ethics, Commission on
 Revises provisions of the Nevada Ethics in Government Law. (BDR 23-309, 12/20/14)</p> | <p>Subcommittee Position
 Neutral / Watch</p> |

Public Records Issues

- | | |
|---|--|
| <p>19-157 Attorney General
Revises provisions governing public records. (7/7/14)</p> | <p>Subcommittee Position
Watch</p> |
| <p>SB 28 Nevada League of Cities and Municipalities
Clarifies provisions governing the fees that may be charged for providing copies of public records. (BDR 19-464, 12/20/14)</p> | <p>Subcommittee Position
Neutral / Watch</p> |
| <p>AB 135 Assembly Government Affairs
Revises provisions relating to schedules for the retention and disposal of official state records. (BDR 19-547, 2/09/15)</p> | <p>Subcommittee Position
Neutral / Watch</p> |

Other Issues of Interest

- | | |
|---|--|
| <p>SB 11 Senator Goicoechea
Grants power to local governments to perform certain acts or duties which are not prohibited or limited by statute. (BDR 20-284, 12/20/14)</p> | <p>Subcommittee Position
Neutral / Watch</p> |
| <p>AB 19 Nevada League of Cities and Municipalities
Revises provisions governing timing of adoption of tentative budgets by local governments. (BDR 31-456, 12/20/14)</p> | <p>Subcommittee Position
Neutral / Watch</p> |
| <p>SB 149 Senator Atkinson
Provides for a program of matching grants to local governments for the maintenance and repair of public works. (BDR 43-669, 2/12/15)</p> | <p>Subcommittee Position
Neutral / Watch</p> |
| <p>SB 157 Senate Committee on Government Affairs
Requires coordination between state and local government agencies. (BDR 22-706, 2/16/15)</p> | <p>Subcommittee Position
Neutral / Watch</p> |
| <p>AB 196 Assembly Government Affairs
Makes various changes relating to investments of public money. (BDR 31-857, 2/26/15)</p> | <p>Subcommittee Position
Neutral / Watch</p> |

S-730 Senator Hardy

Revises provisions relating to local governmental entities. (12/9/14)

Watch

21-810 Assemblywoman Woodbury

Makes various changes relating to local governments. (12/10/14)

Subcommittee Position
Watch

Northern Nevada Water Planning Commission

STAFF REPORT

DATE: March 26, 2015
TO: Chairman and Members, Northern Nevada Water Planning Commission
FROM: Jim Smitherman, Water Resources Program Manager
SUBJECT: Program Manager's Report

Attached are updated reports for items (a) and (b) for your review. A verbal report will be given for item (c).

- a) Report on the status of Projects and Work Plan supported by the Regional Water Management Fund;
- b) Financial Report on the Regional Water Management Fund; and
- c) Report on the TMRPA's parcel-based population and employment modeling project.

Status Report of Projects and Work Plan
Supported by the Regional Water Management Fund

Project Name	Contractor / Provider	Amount	Balance Remaining	Percent Complete	Target Completion Date	Notes
Certified Landscape Technician Program 2014-2015 FY	Nevada Landscape Association (NLA)	25,000	25,000	0%	6/30/15	New contract being developed
Cloud Seeding - Additional Precip Monitoring Equipment	(DRI) Desert Research Institute	25,000	5,233	79%	6/30/15	Work is in progress
Cloud Seeding Program for Water Year 2015	(DRI) Desert Research Institute	100,000	67,588	32%	6/30/15	Work is in progress
Effluent Management (Huffaker Reservoir Effluent Interconnection Pipeline Eval)	City of Reno / Stantec	20,000	20,000	0%	6/30/15	Work is in progress
Effluent Management Strategy	Stantec	25,000	25,000	0%	12/31/15	Contract is being developed
Envision Videographers of WRWC meetings	Envision	1,200	690	43%	9/30/15	Work is in progress
Fifth Amendment to Reimburse TMWA and DWR for consolidation	DWR, TMWA	300,000	300,000	0%	6/30/15	Work is in progress
Highland Canal Improvements	City of Reno	250,000	250,000	0%	1 yr from Effective Date	Awaiting signatures from Reno
Optimizing Investments in the Truckee River Watershed	The Nature Conservancy	57,787	57,787	0%	12/31/16	Work is in progress
Regional Data Development and	Truckee Meadows Regional Planning	486,000	322,167	34%	6/30/16	Work is in progress
Regional Storm Water Quality Management Program (Third	City of Reno	262,500	163,262	38%	6/30/15	Work is in progress
RWMP 2016 Cost & Finance Chapter Update	Hansford Economic Consultant	23,575	23,575	0%	12/31/15	Work is in progress

Status Report of Projects and Work Plan
Supported by the Regional Water Management Fund

Project Name	Contractor / Provider	Amount	Balance Remaining	Percent Complete	Target Completion Date	Notes
RWMP 2016 Update - Water Balance Update	Stantec	25,000	25,000	0%	6/30/15	Work is in progress
Septic - Phase II	County - CSD	150,000	141,552	6%	6/30/15	Work is in progress
Sosu TV Videographers of NNWPC meetings FY 2014-15	Sosu TV	3,500	2,520	28%	6/30/15	Work is in progress
TMDL Phase I Fifth Amendment	City of Reno (LimnoTech)	75,000	74,680	0%	6/30/15	Work is in progress
TRIG Website Support FY 2014-2015	City of Reno	7,500	7,063	6%	6/30/15	Work is in progress
Truckee River Corridor Management Plan	Keep Truckee Meadows Beautiful	22,000	22,000	0%	6/30/15	Contract is being developed
TROA - 6,700 AF water rights purchase	TMWA	2,700,000	609,186	77%	Open Ended	Work is in progress
Washoe ET Project Maintenance	DRI (Desert Research Institute)	10,000	4,241	58%	6/30/15	Work is in progress
Washoe ET weather station upgrades	(DRI) Desert Research Institute	29,050	25,777	11%	6/30/15	Work is in progress

3/26/2015
 Fund 766
 Report 400/ZF15
 Fiscal Year 2015; Period 1 through 9

**Financial Report on the
 Regional Water Management Fund**

Accounts	Plan Budget	Actual (Revenue & Expenses)	PO Commit (Remaining PO Balance)	Actual + PO	Available (Budget Minus Actual + PO)	Avail%	PreCommit (PO's Requested)	Available (Budget Minus PO Requisitions)	Avail%
481000 Interest-Pooled Inv.	27,760.00-	14,523.21-		14,523.21-	13,236.79-	48-		13,236.79-	48-
482100 RGL Pooled Inv.		907.55-		907.55-	907.55			907.55	
482200 URGL Pooled Inv.		1,135.07		1,135.07	1,135.07-			1,135.07-	
491060 Water Surcharge 1.5%	1,533,311.00-	1,198,427.31-		1,198,427.31-	334,883.69-	22-		334,883.69-	22-
** REVENUE	1,561,071.00-	1,212,723.00-		1,212,723.00-	348,348.00-	22-		348,348.00-	22-
710100 Professional Services	1,703,700.00	144,691.03	991,457.46	1,136,148.49	567,551.51	33		567,551.51	33
710110 Contracted/Temp Svcs	332,400.00	206,914.39		206,914.39	125,485.61	38		125,485.61	38
710120 Legal Fees	129,600.00	86,400.00	43,200.00	129,600.00					
710130 Overhead - Prf Serv		39,220.09		39,220.09	39,220.09-			39,220.09-	
710139 Fin Consult Services	10,000.00	8,500.00	8,500.00	17,000.00	7,000.00-	70-		7,000.00-	70-
710149 Invest Pool Alloc Ex		1,099.79		1,099.79	1,099.79-			1,099.79-	
710155 Lobbying Services	600.00	600.00		600.00					
710350 Office Supplies		577.45		577.45	577.45-			577.45-	
710400 Pmts to O Agencies	514,000.00	33,410.00	609,186.00	642,596.00	128,596.00-	25-		128,596.00-	25-
710508 Telephone Land Lines		63.21		63.21	63.21-			63.21-	
710509 Seminars and Meetings	1,000.00	295.69		295.69	704.31	70		704.31	70
710511 Support Service - Reim		243.62		243.62	243.62-			243.62-	
710546 Advertising	1,000.00	179.00		179.00	821.00	82		821.00	82
710585 Undesignated Budget	40,000.00	75.00		75.00	39,925.00	100		39,925.00	100
710594 Insurance Premium		3,269.00		3,269.00	3,269.00-			3,269.00-	
711210 Travel	1,000.00				1,000.00	100		1,000.00	100
711400 Overhead - General Fund	1,265.00	948.76		948.76	316.24	25		316.24	25
711410 Overhead - Admin	44,924.95	29,949.97		29,949.97	14,974.98	33		14,974.98	33
711420 Overhead - Supply	16,690.58	10,452.28		10,452.28	6,238.30	37		6,238.30	37
** EXPENDITURES	2,796,180.53	566,889.28	1,652,343.46	2,219,232.74	576,947.79	21		576,947.79	21
*** Total	1,235,109.53	645,833.72-	1,652,343.46	1,006,509.74	228,599.79	19-		228,599.79	19-

Northern Nevada Water Planning Commission

STAFF REPORT

DATE: March 26, 2015

TO: Chairman and Members, Northern Nevada Water Planning Commission

FROM: Jim Smitherman, Water Resources Program Manager

SUBJECT: Report on the Truckee Meadows Regional Planning Agency (“TMRPA”) parcel-based population and employment modeling project

Jim Smitherman, NNWPC Water Resources Program Manager, will provide a brief verbal report concerning the status of the TMRPA parcel-based population and employment modeling project.

JS:jd