

# **RIVERSIDE PUBLIC UTILITIES**

Board Memorandum

**BOARD OF PUBLIC UTILITIES** 

**DATE:** MAY 14, 2018

GENERAL MANAGER'S REPORT

**ITEM NO**: 18

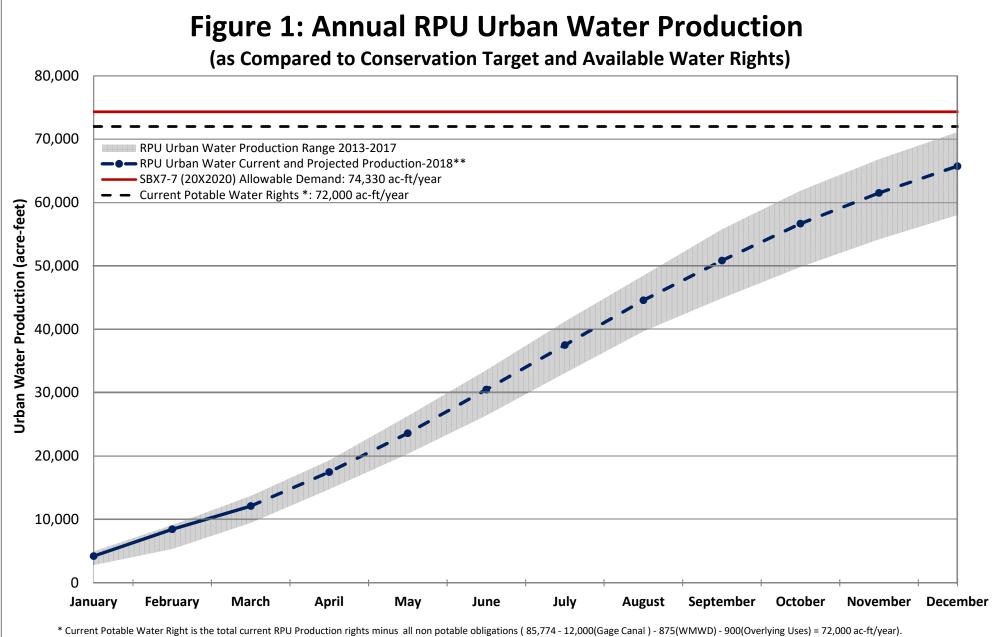
### Summary of Riverside Public Utilities Urban Water Production and Conservation Efforts / Groundwater Level Update As of March 2018

**Conservation Efforts** 

RPU's urban water production in March 2018 was 3,657 AF. This is a decrease from last March by 471 Acre-feet or about 11% in conservation. Weather conditions showed an increase in rainfall from 0.15 inches in March 2017 to 1.65 inches in March 2018. In addition, March 2017 was 7 degrees warmer compared to March 2018. RPU is still within the historical production range from 2013 to 2017 as shown in Figure 1. Figure 1 also shows that RPU's projected annual urban water production in 2018 is 65,800 AF which is below the compliance target specified in SB X7-7 (i.e. 20% reduction by 2020). The projections for the 2018 urban water production is based on current trends of increased consumption and can be affected by the upcoming permanent water prohibitions, the return of the drought, and the proposed rate increase. The projected annual urban water production is also below RPU's current potable rights, which potentially can maximize RPU's passive assets by 6,200 AF through wholesale to Western Municipal Water District.

#### **Basin Groundwater Levels**

Groundwater levels in the Bunker Hill, Rialto-Colton, and Riverside North basins are continuing to show a long-term declining trend, while groundwater levels in the Riverside South Basin remain relatively stable as shown in Figure 2. Groundwater levels in the Bunker Hill Basin are continuing to rebound from summer pumping; however, water levels remain approximately 3 feet lower as compared to March of last year. Water levels in the Rialto-Colton and Riverside North basins are 4 and 24 feet lower as compared to March of last year. Water levels in the Rialto-Colton and Riverside North basins are 4 and 24 feet lower as compared to March of last year, respectively. One of the likely reasons for the large March difference in the Riverside North basin is due to the lack of rainfall and replenishing storm flows. By this time last year, the Riverside area had received approximately 12.2 inches of rain, while this water year; the Riverside area has only received about 3.6 inches of rain. The Riverside South basin is approximately 3 feet lower as compared to March of last year.



\*\* Projections for 2018 are based on current trend of increased consumption. These projections can be affected by the upcoming permanent prohibitions, return of the drought episode, and proposed rate increase.



### Figure 2: Basin Groundwater Levels

Bunker Hill Basin Sierra High School (USGS)



0 0 Feb-Mar Change Mar 2017-18 Change Feb-Mar Change Mar 2017-18 Change in Level 7.3' in Level -3.2' Depth to Groundwater (ft) in Level 1.6 in Level -4.1 Depth to Groundwater (ft) 50 50 100 100 150 150 200 200 250 250 10/1/1997 10/1/1999 10/1/2000 10/1/2001 10/1/2005 10/1/2009 10/1/2010 10/1/2012 10/1/2015 10/1/2016 10/1/2017 10/1/1998 10/1/2002 10/1/2003 10/1/2004 10/1/2006 10/1/2007 10/1/2008 10/1/2011 10/1/2013 10/1/2014 10/1/2016 10/1/1998 10/1/2000 10/1/2005 10/1/2006 10/1/2008 10/1/2009 10/1/2010 10/1/2013 10/1/2015 10/1/1997 10/1/1999 10/1/2001 10/1/2002 10/1/2003 10/1/2004 10/1/2007 10/1/2011 10/1/2012 10/1/2014 10/1/2017 **Riverside North Basin Riverside South Basin** Cunningham Flume 5 0 0 Depth to Groundwater (ft) Depth to Groundwater (ft) 50 50 100 100 150 150 200 200 Feb-Mar Change Mar 2017-18 Change Feb-Mar Change Mar 2017-18 Change in Level 6.7 in Level -23.8 in Level 1.5' in Level -2.8' 250 250 10/1/2004 10/1/1998 10/1/199910/1/2000 10/1/2001 10/1/2003 10/1/2005 10/1/2006 10/1/2008 10/1/2009 10/1/2010 10/1/2013 10/1/2014 10/1/2015 10/1/2016 10/1/1998 10/1/199910/1/2000 10/1/2003 10/1/2005 10/1/2006 10/1/2008 10/1/2009 10/1/2010 10/1/2013 10/1/2014 10/1/2015 10/1/2016 10/1/2002 10/1/2011 10/1/2012 10/1/2017 10/1/2001 10/1/2002 10/1/2004 10/1/1997 10/1/2007 10/1/1997 10/1/2007 10/1/2011 10/1/2012 10/1/2017



## Figure 3: Basin Groundwater Levels

