



**Chandler Arizona**  
Where Values Make The Difference



**MEMORANDUM**

**Management Services Memo No. 16-030**

**DATE:** OCTOBER 29, 2015

**TO:** MAYOR AND COUNCIL

**THRU:** MARSHA REED, ACTING CITY MANAGER *MR*  
DAWN LANG, MANAGEMENT SERVICES DIRECTOR *DL*

**FROM:** GREG WESTRUM, BUDGET MANAGER *GW*

**SUBJECT:** AVERAGE RESIDENTIAL HOUSEHOLD COST COMPARISON REPORT  
PREPARED BY THE CITY OF TEMPE

Attached is a copy of the City of Tempe's annual analysis of the estimated annual amount paid by the average residential household for eight cities and towns in the Phoenix area, including the City of Chandler. The report is compiled as of July 2015 using utility rates, sales tax rates, and property tax rates in effect at that point of time. Therefore, it is important to note that the comparisons do not include the changes to Chandler's water, wastewater, and solid waste rates that went into effect October 1, 2015.

The report shows that Chandler has the second lowest total annual cost for services (\$1,451), with Gilbert (\$1,399) being the only municipality lower than Chandler. For comparison, the municipality with the highest annual cost of service is Glendale (\$2,080). The analysis uses four factors (Solid Waste rates, Water/Wastewater rates, Local Sales Tax rates, and Property Tax rates) and various assumptions to determine the cost of municipal services for the average household. Each of the areas is briefly addressed below:

**Solid Waste**

This comparison shows that Chandler has the second lowest cost for solid waste service for the average household at \$181 per year. This was calculated based on Chandler's rate of \$15.07 in effect at that time. Even with the rate increase to \$15.97 effective October 1, 2015, Chandler's average household is at \$192 with Chandler remaining second lowest, but tied with Gilbert.

**Water/Wastewater**

The Tempe analysis combines the water and wastewater costs and assumes the average household uses 9,000 gallons of water per month (Chandler uses 12,000 gallons when comparing water costs with other cities). Chandler's wastewater cost is shown as \$290 per year (\$24.17 per month), which is the rate prior to the October 1, 2015 increase. With the new rate of \$26.35 per

month (\$317 per year), Chandler's revised total is \$600, and would move from lowest to second lowest in this water/wastewater comparison.

### **City Sales Tax**

This is the most complex section of the analysis and it includes several major assumptions about median household income and spending patterns. For simplicity, Tempe used a Phoenix metropolitan area median household income of \$62,983 for every city, rather than trying to determine a unique median income for each city. They also assume that 49% of the median income is spent on taxable purchases, and that all of the taxable purchases are made in the home city or town. This comparison shows that Chandler has the fourth lowest amount spent on local sales tax (\$528 per year). This is an average rate of 1.70% for Chandler, which incorporates the base rate of 1.5% for most retail purchases, but higher percentages for restaurants and bars (1.8%).

### **City Property Tax**

This analysis uses the median Limited Property Value for single family homes for the Fiscal Year 2015-16 tax year (Chandler's median home is \$147,032). The analysis then computes the expected property tax based on each city's primary and secondary tax rates. Chandler is also fourth lowest for this category. For Chandler, the \$173 annual property tax is calculated as:

Primary:	$\$147,032 \times 10\% \text{ assessment ratio} = \$14,703 \times .2992/\$100 = \$43.99$
Secondary:	$\$147,032 \times 10\% \text{ assessment ratio} = \$14,703 \times .8800/\$100 = \$129.38$
Total:	\$173.37

### **Summary of Utility Rate Increases**

The last section of the report provides information on dates of the last change in utility rates and fees and information on any planned rate changes. The report makes note of the fact that Chandler's rate increased effective October 1, 2015 and that the City will no longer use seasonal variations for water rates. Please note that research by the City of Chandler Utility Services Division also identified Scottsdale increases water rates in November 2015, which is not noted in the Tempe report.

While the various assumptions made in the City of Tempe analysis can be debated, we appreciate the fact that they publicly share this report to help us compare our operations with those of other municipalities in the area. It is also rewarding to see that Chandler reflects very favorable in these annual comparisons of the average cost for municipal services for an average residential household.

Should you have any questions regarding this information, please contact me at x2256 or Dawn Lang at x2255.

Attachment – City of Tempe Average Residential Household Cost Comparison

c: Nachie Marquez, Assistant City Manager

# Average Residential Household Cost Comparison

Prepared by the City of Tempe Budget Office

## July 2015

Each year the Municipal Budget Office performs an analysis of the estimated annual amounts paid by the average residential Tempe household for direct services provided by the City of Tempe as well as the estimated total annual amount paid in City of Tempe property and transaction privilege (sales) taxes. These amounts are then compared to the estimated annual amounts paid by the average residential household in seven comparison cities in the Phoenix metropolitan area.

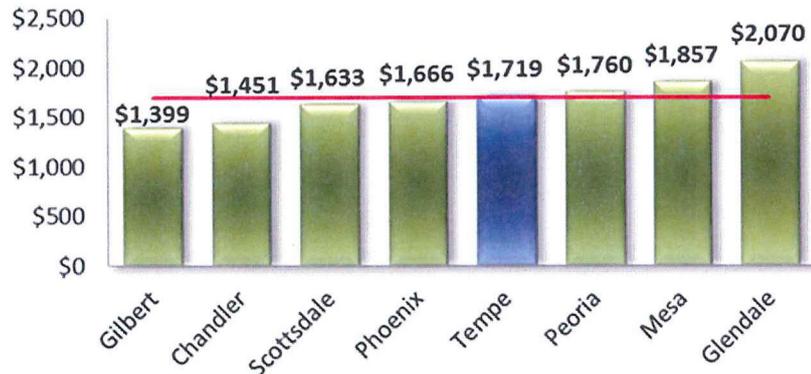
For purposes of this comparison, we utilized the property tax, sales tax and utility service rates as of July 2015. The analysis assumed the same household consumption averages for all cities/towns for both water and wastewater services. However, for property tax purposes, we utilized the median single family home value in each respective city/town in the analysis. The sales tax amounts are based on the Phoenix metropolitan area median household income. As such, this analysis is intended to reflect what the average residential household would pay for each of the services or pay in taxes in their respective city.

## Overview

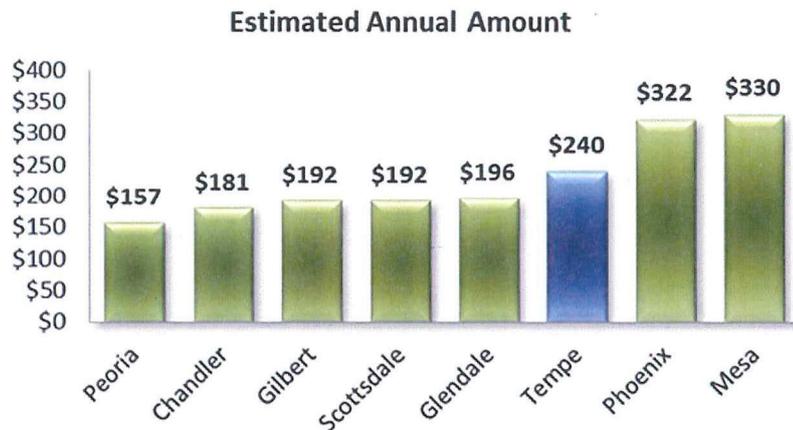
**Average \$1,695**

Average annual household cost for property tax, sales tax, water, wastewater and solid waste services

Estimated Annual Cost



## Solid Waste



The annual amount for single family residential solid waste services is estimated at \$240 for the City of Tempe. The amounts noted above are based on a residential customer with a once per week collection, based on the rates as of July 2015.

## Water and Wastewater



The annual total amount for water and wastewater services for a single family residential customer in the City of Tempe is estimated at \$610. The annual water charge is based on a median single family residential monthly water consumption of 9,000 gallons, consistent with the most recent water rate study. It is assumed that this water consumption amount is applicable to the other cities in the comparison. As such, this consumption amount was applied to each respective city's water rates as of July 2015 to derive the annual water costs.

The wastewater charges noted above are based on the median residential monthly billing amount of 6,000 gallons. It is assumed that this monthly billing amount is applicable to the other cities in the comparison and is then applied to each respective city's wastewater rates as of July 2015 to derive the annual wastewater costs. The billable gallons are derived from a median residential monthly water consumption of 8,570 gallons multiplied by a rate of return. For example, Tempe's rate of return is 70% or 6,000 gallons (8,570 gallons x 70%).

## City Sales Tax



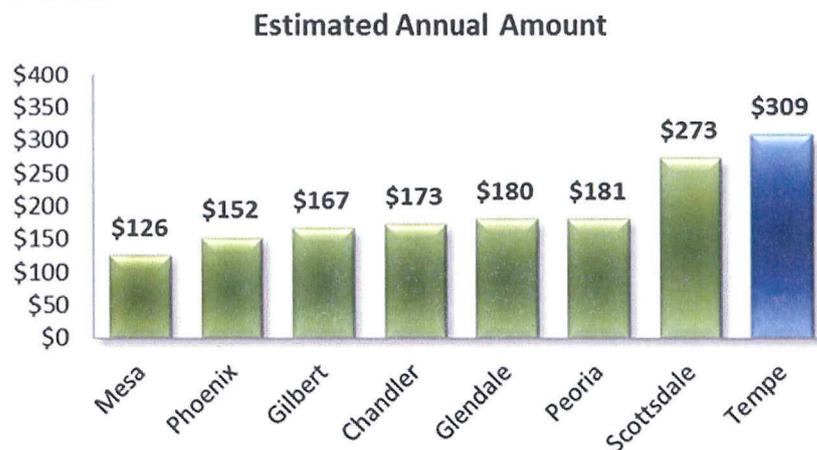
The annual amount that the average Tempe residential household will pay in City of Tempe sales tax is estimated to be \$560 for 2015.

For this analysis, we utilized the Phoenix metropolitan area median household income of \$62,983 per the U.S. Census Bureau, 2013 American Community Survey. As median incomes can vary between the cities, the Phoenix metropolitan area median household income was utilized so that a direct comparison could be made between cities.

The portion of this income that was spent on taxable purchases is estimated at 49% (\$31,114), as noted in the latest Consumer Expenditure Survey published by the U.S. Bureau of Labor Statistics (May 2015). We assumed that the portion of the median income spent on taxable purchases was spent within the household's city of residence and applied to each city's applicable sales tax rate.

Please note that many of the comparison cities in the analysis utilize different tax rates for various taxable activities. For example, the City of Glendale has an overall sales tax rate of 2.9%; however, sales at restaurants and bars are taxed at 3.9%. These variances were taken into account when calculating the annual amount of sales taxes paid.

## City Property Taxes



The annual estimated City of Tempe property tax amount is \$309. The property tax amounts shown above are based on each city's FY 2015-16 primary and secondary rates and each city's 2015 Limited Property Value (LPV) for the median single family home. Starting in FY 2015-16, Proposition 117 requires the use of the LPV in levying both primary and secondary property taxes. The median single family LPV for each city, per the Maricopa County Assessor, is as follows:

Glendale	\$82,121
Phoenix	\$83,265
Mesa	\$103,950
Tempe	\$122,622
Peoria	\$125,549
Chandler	\$147,032
Gilbert	\$157,889
Scottsdale	\$236,355

It should be noted that the City of Mesa and the Town of Gilbert only levy a Secondary Property Tax.

## Summary of Utility Rate Increases

Most cities and towns in the study review rates on an annual basis to determine if there is adequate cost recovery and whether a rate increase is required. Listed below is a summary of the utility rate adjustments as of July 2015 and information related to any planned future rate increases:

### Overview of Rate Adjustments

	Date of Last Change in Rates or Fees		
	Water	Wastewater	Solid Waste
Chandler	October 2013	October 2013	July 2007
	Wastewater rates will increase 9.0%, solid waste rates will increase 6.0% and water rates will no longer be seasonal as of October 2015.		
Gilbert	July 2009	July 2009	July 2012*
	No rate increases planned at this time. Solid waste rates for residential customers were reduced in July 2012.		
Glendale	July 2010	July 2010	July 2008
	No rate increases planned at this time.		
Mesa	July 2015	July 2015	July 2015
	Water, wastewater and solid waste rates were increased 5.0% as of July 2015. An annual rate increase is being proposed for each year through 2017.		
Peoria	July 2015	July 2015	July 2012*
	Rates were increased by 2.5% for water and wastewater in July 2015, and will be increased by another 2.6% in July 2016. Solid waste rates for residential customers were reduced in July 2012.		
Phoenix	July 2015	March 2010	March 2009
	Phoenix raised its water rates in July 2014, but the increases did not affect the average residential customer. However a new "City Services Tax" was introduced in late July 2014 that increases the annual water bill by \$18.00.		
Scottsdale	July 2013	July 2015	July 2009
	Scottsdale raised its water rates in July 2015, but the increases did not affect the		

average residential customer. The base meter fee for wastewater was increased by \$0.50 in July 2015.

Tempe

January 2014

January 2014

November 2009

Water rates were increased 2.2% in January 2014. Wastewater rate changes created a reduction for the typical residential customer. Rates are reviewed annually, and rate studies are conducted regularly to determine future rate increases or decreases.

\* Rates for residential customers were reduced.