



RSMP and UWSCF Payment Rate Structures – Summary of Proposed Changes

The City of Austin is in the process of updating the payment rate structures for the Regional Stormwater Management Program (RSMP) and Urban Watershed Structural Control Fund (UWSCF). The Watershed Protection Department (WPD) recently completed a study to provide recommendations for updates to the payment structures of these two programs, both of which provide payment in lieu of on-site control options for qualifying developments. The payment structures of these two programs were last evaluated and updated in 2002.

Participation in the Programs

The RSMP provides a method of alternative compliance to the code requirement for on-site detention. There are two general options for participating in RSMP: 1) payment in lieu of detention with drainage analysis to show no adverse flooding impact in order to justify participation or 2) construction of drainage improvements that provide a public benefit and do not cause adverse flooding impacts as credit towards the RSMP payment amount.

The UWSCF provides a payment in lieu option for on-site water quality improvement facilities. Participation in the UWSCF is currently restricted to watersheds designated as Urban whereas RSMP participation may be available in any watershed that is within City of Austin full purpose jurisdiction. However, simply being located in a participating watershed does not automatically make a site eligible to participate in either the RSMP or UWSCF.

There are various criteria used by WPD to determine eligibility for participation in these programs. For RSMP, a site must be located in a participating watershed and the proposed development must produce no additional adverse flooding impact to roadways, structures, or other properties. Section 1.2.2(G) of the Drainage Criteria Manual (DCM) For UWSCF, a site must be located in a participating watershed, be less than two acres in size for residential development or less than one acre for commercial development, and have less than 8,000 square feet of total proposed impervious cover (new or redeveloped) per Environmental Criteria Manual (ECM) requirements.

Payment Structure Update Study

The recently completed study evaluated the existing payment structures for both of these programs and provided recommendations for updating the payment methodologies to better keep pace with construction costs and land values in Austin. Each of the programs' payment structures has a construction cost-related component and a land cost-related component. The UWSCF payment also includes a Building Component that was not examined as part of the payment study, but that may ultimately be removed from the calculation. The intent of the payment structures for both is to calculate a comparable amount to what a developer would have to spend to design and construct a storm water control facility on their site.

The study showed that the Construction Cost Component (CCC) of the RSMP and the Site Area Component (SAC) of the UWSCF were lagging behind the actual cost of constructing on-site controls, despite applying an annual adjustment based on the Engineering News Record's (ENR) Construction Cost Index (CCI). The study examined multiple factors to determine whether

certain construction cost or site factors impacted the estimated construction cost for on-site controls more than others. Based on these evaluations a similar approach to that followed in the 2002 study was recommended. This approach fits a curve to the collected data for facility construction costs and associated areas of impervious cover and uses this curve to establish the per-acre payment amounts.

For both RSMP and UWSCF the study recommended the pooling of commercial and residential construction cost data for the development of a single cost curve and resultant set of construction cost rates.

Recommended Payment Structure – RSMP Construction Cost Component

WPD staff subsequently determined that, due to the scale of small residential subdivision construction, the proposed combined rate structure for the CCC resulted in a unreasonably large increase in cost for small single-family residential developments. In order to compensate for this, the rate for the first acre of impervious cover under the combined rate structure was adjusted down to provide a discount for single-family residential construction. This is reflected in the summary of construction cost rates in Table 1. Table 1 also compares the new cost per acre of impervious cover rates to the rates from the 2002 study (both the original rates and the rates adjusted based on the ENR CCI). While the adjustment of the rate for the first acre was implemented primarily to provide some relief in the participation payment amount for small SF residential subdivisions, it also provides a small discount to all sizes of SF residential developments.

Table 1: RSMP Construction Cost Component Rates Table

Impervious Acres			Cost per impervious acre					
	From	To	2002 Commercial	2002 Residential	Current Commercial (Adjusted)	Current Residential (Adjusted)	Proposed Commercial	Proposed Residential
A1	0	1	\$60,000	\$35,000	\$101,991	\$59,495	\$129,000	\$103,000
A2	1.01	2	\$18,000	\$15,000	\$30,597	\$25,498	\$70,000	\$70,000
A3	2.01	5	\$8,000	\$10,000	\$13,599	\$16,998	\$44,000	\$44,000
A4	5.01	10	\$6,000	\$7,000	\$10,199	\$11,899	\$29,000	\$29,000
A5	10.01	20	\$5,000	\$5,000	\$8,499	\$8,499	\$20,000	\$20,000
A6	20.01	50	\$4,000	\$3,000	\$6,799	\$5,100	\$12,000	\$12,000
A7	50.01	100	\$2,500	\$2,000	\$4,250	\$3,400	\$8,000	\$8,000
A8	100.01	>	\$2,500	\$1,500	\$4,250	\$2,550	\$4,000	\$4,000

Recommended Payment Structure – UWSCF Construction Cost Component

For the UWSCF, which already used a combined rate structure, the construction cost curve was updated based on the additional data available for the recently completed study. The updated rates are compared to the rates currently in use in Table 2. In order to be consistent with the area breakdown in the RSMP rate structure, an additional acreage range was created through the split of the previous range of 2.01 to 10 acres into two ranges (from 2.01 to 5 acres and from 5.01 to

10 acres). To compare current rates with the proposed rates, the new acreage ranges are used with the current numbers for 2.01 to 10 acres reflected for both of the ranges covered by these acreages (2.01 to 5 and 5.01 to 10).

Table 2: UWSCF Site Impervious Cover Component Rates Table

Impervious Acres			Cost per impervious acre		
	From	To	2002 Commercial/ Residential	Current Commercial/ Residential (Adjusted)	Proposed Commercial/ Residential
A1	0	1	\$32,000	\$52,614	\$114,000
A2	1.01	2	\$18,000	\$29,595	\$58,000
A3	2.01	5	\$11,000	\$18,086	\$34,000
A3/A4	5.01	10	\$11,000	\$18,086	\$21,000
A4/A5	10.01	20	\$8,000	\$13,153	\$14,000
A5/A6	20.01	>	\$6,000	\$9,865	\$8,000

Recommended Payment Structure – Land Cost Components

As part of the final implementation of the payment structures following the 2002 study, static \$/acre caps were placed on the land values used to calculate the RSMP Land Cost Component (LCC) and the UWSCF Site Impervious Cover Component (SICC). Because of these static caps on land values, the portions of the participation payments based on land costs have not kept pace with the significant increases in land values that we have experienced in the Austin area since 2002. Thus, the current payment structures produce payment amounts that are steeply discounted relative to the actual land and construction costs for storm water control facilities. As a result, the payment amounts collected are not sufficient for the WPD to construct or implement regional flood risk reduction or water quality solutions commensurate with the actual cost of on-site stormwater controls.

The most significant proposed change to the payment structures is the removal of the static cap on the land value used in the land cost-related components (LCC and SICC). The proposed structure modifies the calculation so that the appraised land value of a site is used rather than a static, capped value dependent only upon type of development. Using the appraised land value makes the calculation site-specific so that areas of town where land has a lower per acre value have a lower land cost-related component than a similar site in an area where the land is more highly valued. The appraised land value in the proposed calculation will be discounted to 80% as a “moving cap”. The 80% discount provides an incentive for developers participate over and above the benefit of not giving up a portion of a site for construction of stormwater controls. The UWSCF SICC will be updated similarly so that the site area and land value of a particular site are used rather than a static \$/acre rate depending on development type. The proposed SICC assumes that 3% of the site area would be used for an on-site control and the calculation is modified to reflect this instead of basing the calculation on a static \$/acre rate. The RSMP LCC assumes 5% of the site area for construction of an on-site detention pond. This assumption was verified through the examination of the additional construction information collected for the study.

Another modification made to the Land Cost Component of the RSMP payment calculation was the addition of an impervious cover adjustment factor (ICAF). This multiplier was adapted directly from the drainage utility charge and is based on the City-wide weighted average of impervious cover (approximately 52.3%). The equation to determine the ICAF uses the total proposed impervious coverage to adjust the Land Cost Component, providing a slight discount for developments with less than 52.3% proposed impervious coverage (which tend to be mostly single-family residential). For developments with greater than 52.3% proposed impervious coverage, the ICAF will be replaced by a value of one (1). This will ensure that developments with higher impervious coverage are not disincentivized to participate in the RSMP by ICAF adjustment factors greater than one.

A second change is to implement an overall cap on the calculated payment amount per acre based on the cost of an underground detention vault such as would be utilized on a small urban site with very high (95-100%) impervious cover (and typically a tall building with parking structure) is proposed. The proposed cap, of \$440,000/acre, would prevent extremely high land appraisal values from impacting the calculated payment amount of a site so that it is out of proportion with on-site detention. The general payment calculation has a construction cost component that is based on the cost of on-site detention with the assumption that the detention would be an above-ground pond. For urban sites, where the land cost could impact the overall payment amount, the typical on-site detention solution is more likely to be an underground vault given the limited site area and high impervious cover.

Additional Information

The proposed payment structure updates will be a significant change for both programs. If you would like additional information about the changes, a PDF of the stakeholder presentation given on December 19, 2019 along with the handout provided at that presentation are available on the RSMP website. The PowerPoint includes information on changes to the payment structures as well as current and proposed example calculations to illustrate the changes in payment amounts for different types of development and different site areas. The handout includes a list of acronyms and a short section that spells out the steps for each program's proposed payment calculation. The complete payment study report and accompanying technical memorandum can be found on the RSMP website at <http://www.austintexas.gov/RSMP>. Also available by emailed request is a locked Microsoft Excel spreadsheet with the proposed RSMP payment calculations for single family residential and commercial/multi-family/mixed-use developments so that specific site information can be entered for comparison with the current calculations. Calculation spreadsheets for the current RSMP payment structure can also be requested by emailing RSMP@ausintexas.gov.