

December 15, 2023

Environmental Variance Request Review
City of San Antonio
Development Services Department
1901 S. Alamo
San Antonio, Texas 78204

Re: Stonehill Off-site Water Extension – Capital Improvement Project
Environmental Variance
Request for UDC Section 35-523 (2010 Tree Ordinance – 80% Preservation Within Floodplain and Buffer)

Dear Development Services,

Kindly consider this letter as a formal request for an Environmental Variance from Section 35-523 “Tree Preservation” of the Unified Development Code. It is the intent of Section 35-523 of the Unified Development Code *“to allow the reasonable improvement of land within the city and the city’s ETJ, while maintaining to the greatest extent possible, existing trees within the city and the ETJ and to promote a high tree canopy goal”*. For the reasons herein described by the following letter, this project requests an Environmental Variance from the portion of the Unified Development Code that requires *“maintaining to the greatest extent possible, existing trees within the city and the ETJ”*.

The Stonehill Off-site Water Extension Project is a necessary improvement to the San Antonio Water System (SAWS) water system in the western area of San Antonio. The Stonehill Off-site Water Extension Project will construct approximately 0.9 miles (4,773 LF) of 16” water main and approximately 2.8 miles (15,139 LF) of 24” water main along and across US Hwy 90 between its intersection with Jungman Rd and TX-211. This project is part of SAWS’ efforts to accommodate future flows along the US Hwy 90 corridor.

The proposed water main project will include the construction of approximately 4,773 LF of PVC water main that begins south of US Hwy 90 in the right-of-way of Jungman Road and will connect to an existing 16” PVC water main (SAWS Job No. 22-1021). The remainder of the project will consist of approximately 15,139 LF of 24” PVC water main, connecting to an existing 24” water main (SAWS Job No. 16-1184) east of Masterson Rd, and providing service to the Medina Stonehill tract north of US Hwy 90. The project is primarily located on private tracts of land within a 16’ – 30’ wide permanent easement for SAWS future operation and maintenance of the water main. A 20’ wide temporary construction easement is also utilized to allow access and sufficient space for contractors to install the proposed water infrastructure. Significant trees have been preserved, to the extent possible, to meet the intent of Section 35-253 “Tree Preservation” of the Unified Development Code at all feasible locations throughout the project limits.

Many factors were considered to determine the most viable and cost-effective project alignment that would also promote the preservation of trees within the project limits. The majority of the easements utilized for this project were chosen to be placed in agricultural fields in order to preserve adjacent tree canopy. In trying to keep with the spirit and intent of the preservation ordinance, a diligent effort was made to comply with the minimum preservation requirements for the 2010 Tree Preservation Ordinance within the variable width permanent and temporary construction easements as indicated on the Stonehill Off-site Water Extension Tree Stand Delineation Plan.

Portions of the project site are located within the 100-year regulatory Federal Emergency Management Agency (FEMA) floodplain. Per Table 523-1B of the 2010 Tree Preservation Ordinance, the minimum preservation requirement is 80% of the total existing canopy area, and 100% of the heritage trees within the 100-year FEMA floodplain. As indicated on the Project’s Tree Preservation Plan, no heritage trees are located inside the 100-year FEMA floodplain within the limits of the project. Due to the size and location of the proposed water pipeline, the project does not satisfy the canopy preservation requirements inside the floodplain or ESA buffer area. A total of approximately 46,180 SF of canopy will be located within the floodplain work limits, and a total of approximately 5,362 SF of canopy will be located within the floodplain buffer work limits. This results in a required 18,186 SF for canopy mitigation in the overall project 100-year FEMA floodplain, and 1,999 SF for canopy mitigation in the overall project ESA buffer area as shown on the Tree Preservation Plan. This disturbed area will be revegetated by drill seeding with a native seed mix and ensuring 85% establishment, where practicable. A total of 722,808 SF (80,312 SY) of revegetation by drill seeding is proposed for this project, approximately 68,996 SF (7,666 SY) of which is located within the floodplain and ESA Buffer area. Although tree removal for the portion of the Stonehill Off-site Water Extension located north of US Hwy 90 will be mitigated by the tree permit associated with the Stonehill MDP, revegetation is still proposed for this portion of the project within the water and temporary construction easement limits. See Tables 1 and 2 below for a summary of the canopy area to be removed and preserved as part of the SAWS Stonehill Off-site Water Extension Project within the floodplain and ESA buffer area.

Table 1. Tree Canopy Preservation Inside Floodplain

Plan Phase	Total Existing Canopy (SF)	Canopy Required to Be Preserved (SF)		Canopy To Be Removed (SF)	Canopy To Be Preserved (SF)		Canopy Required to Be Mitigated (SF)
1	22,766	18,213	80%	12,685	10,081	44%	8,132
2	23,414	18,731	80%	14,736	8,678	37%	10,054
Total	46,180	36,944	80%	27,421	18,759	41%	18,186

Table 2. Tree Canopy Preservation Inside ESA Floodplain Buffer

Plan Phase	Total Existing Canopy (SF)	Canopy Required to Be Preserved (SF)		Canopy To Be Removed (SF)	Canopy To Be Preserved (SF)		Canopy Required to Be Mitigated (SF)
1	3,233	2,586	80%	1,693	1,540	48%	1,047
2	2,129	1,703	80%	1,377	752	35%	952
Total	5,362	4,289	80%	3,070	2,292	43%	1,999

Table 3 shown below provides a summary of the required canopy and heritage tree mitigation and anticipated fee amount required to mitigate the removed canopy tree inches, prior to consideration of revegetation efforts. There are no heritage trees located in the floodplain or the ESA buffer zone.

Table 4. Required Mitigation Fees

Plan Phase	Required Canopy Mitigation (SF) (Inside Floodplain + ESA Buffer Area)	Required Canopy Mitigation (IN) $IN = SF \div 875$ $SF/Tree \times 16.7 IN$	Required Heritage Tree Mitigation (IN) (To Be Mitigated 3:1) (Floodplain + ESA Buffer Area)	Total Mitigation Fee = \$200/IN
1	9,179	201	0	\$40,200
2	11,006	235	0	\$47,000
Total	20,185	436	0	\$87,200

Although SAWS will have the right for ingress and egress to access the permanent easements for operation and maintenance requirements, the hardship for complying totally with the minimum preservation requirements are:

- The construction of the Stonehill Off-site Water Extension Project is critical to SAWS and the City of San Antonio as it pertains to the health and welfare of the public. The diameter, depth of installation, and overall magnitude of the project require SAWS to procure necessary space for the construction contractor to successfully complete the project. The contractor will have to use the total easement area for the duration of the project, thus limiting the amount of easement area potentially available to preserve trees.
- SAWS requires removal of all vegetation within the permanent easement to facilitate construction of the proposed water project. Newly planted trees are not an option for this project as SAWS

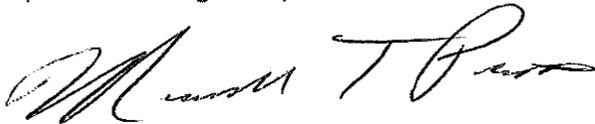
requires the easement area to be clear for future access to the water main for maintenance and operation of the water main.

- The granting of this variance will not be injurious to other property and will not prevent the orderly subdivision of other property in the area in accordance with these regulations.

It is our professional opinion that the proposed environmental variance remains in harmony with the spirit and the intent of the UDC as it will not adversely affect the health, safety, or welfare of the public, nor does it weaken the general purpose of the tree preservation regulation.

We respectfully request your consideration for this variance. The Environmental Variance Request Application is attached, as required. If you have any questions or require additional information, please do not hesitate to contact our office.

Sincerely,
Pape-Dawson Engineers, Inc.



Marshall Preas, P.E.
Senior Project Manager

For Office Use Only:	AEVR #:	_____	Date Received:	_____
DSD – Director Official Action:				
<input type="checkbox"/> APPROVED	<input type="checkbox"/> APPROVED W/ COMMENTS	<input type="checkbox"/> DENIED		
Signature:	_____			Date: _____
Printed Name:	_____	Title:	_____	
Comments:	_____ _____			