



Ms. Sue Lamb and Ms. Carrie Brown  
City of Austin Cultural Arts Division  
Economic Growth and Redevelopment Services  
201 E. Second St., Austin, TX 78701

July 18, 2012

Re: City of Austin Urban Forestry Board Recommendations for Locating  
Art in Public Places (AIPP) and Related Structures near Trees

Dear Ms. Lamb and Ms. Brown:

Two recent cases of abuse of public trees have been brought to our attention, both being incidents involving heritage trees. One was the heritage live oak tree next to the O'Henry Museum at Brush Square, and the other a heritage pecan tree on the south lawn of Barton Springs Pool. While the Urban Forestry Board recognizes that artists are attracted to areas under the canopy of large trees providing ample shade and an aesthetic presence for locating their artwork, especially those of protected and heritage size; it is essential that the artwork and related structures not be installed in the critical root zone (CRZ) of any tree in order to avoid negatively impacting those trees. The installation of heavy and impervious structures within the root zone stresses trees significantly, and the risk of damaging these irreplaceable trees is too great to allow this practice.

The CRZ is defined as the circular area around a tree with a radius of 1 foot per caliper inch of tree diameter, measured at 4.5 ft. above ground level. The CRZ can be approximated by the drip line under the canopy of any tree.

The Brush Square heritage live oak was impacted by the installation of the AIPP Stone Courtyard built in 2010. In the attached tree permit the City Arborist described the general condition of the tree as good; now the tree is declining and needs remedial work to prevent the additional decline that is expected to occur if corrective measures are not implemented in the near future. Please refer to the attached Tree Assessment Report from certified arborist Vincent Debrock, Heritage Tree Care. Mr. Debrock explains that the 44-inch-diameter live oak shows pale leaves and a thin canopy (70% of original density), but no signs of problems caused by insects or other tree-related diseases. The stone courtyard (the AIPP artwork) extends over a large portion of the root zone of the tree, reducing water availability to the roots with the significant impervious cover from the concrete, stones, and grade changes.

The tree permit that was approved by the City Arborist (attached) for this work required that no cut or fill work be done within the inner one-half of the CRZ. It was intended that the root zone be protected from machinery and trucks to avoid soil compaction. The City Arborist and the Parks and Recreation Department (PARD) recall that the artist, as well as the AIPP-overseeing staff, agreed not to dig within that inside half of the CRZ and that no roots would be cut. However, photographs show that there was significant digging (more than 2 ft. deep) within that area. In addition, the grade was raised by several inches through a significant portion of the CRZ. A large amount of fill was added over the compacted soil, and a significant part of the root zone was covered with impermeable heavy stone; making it very difficult, if not impossible, for the roots to get water. The resulting 1/8-inch spacing between the stones is too small to allow the passage of sufficient water. The decline of this tree demonstrates that these roots

have been affected by all of this work. While the record breaking drought and heat of 2011 affected many trees, the adjacent live oaks are not showing signs of stress, which suggests that the impact of construction, which violated the terms of the tree permit and best practices in tree care, is the primary cause of the leaf yellowing and thinning canopy. Photographs are attached, and you will note that machinery and trucks are shown working within the root zone of the tree.

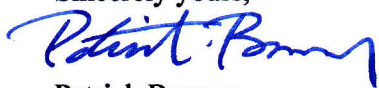
The second case brought to our attention is the heritage pecan on the south lawn of Barton Springs Pool. Artwork was to be installed within the CRZ of this tree in spite of PARD recommending numerous times over several months that it not be done. The installation of an overlook to serve as a base for the artwork required digging within the CRZ of this tree over a large area, but no certified arborists, landscape architects, or engineers were involved in the design. The artist submitted several sketches of the installation (attached). Acting PARD Forestry Manager Angela Hanson explained during a public review meeting that heritage trees are already stressed by drought and does not recommend having artwork installed within their CRZ if that artwork or its installation may cause a permanent impact to the CRZ and she recommends that AIPP projects conform to applicable tree protection rules. It was not until more than 40 concerned citizens protested against this artwork at a public meeting, that it was moved from underneath the tree canopy and located outside the pool fence.

One of the purposes of the AIPP program is to unite the stakeholder community, i.e., those who use the site, so that the community can provide feedback on the art project to be enjoyed by all. It is not acceptable that trees be impacted and damaged during this process. Heritage trees, especially, are invaluable and irreplaceable. The Brush Square tree is a heritage tree with a recognized and documented historical significance. It is unacceptable that this tree has been impacted by this artist's violation of his tree permit requirements, especially after the frequent inspections, guidance, and recommendations by the PARD staff.

We seek to insure that heritage trees are valued and enjoyed for generations to come. We are therefore recommending that the management and staff charged with administering the AIPP Program take immediate steps to ensure that artwork and related structures not be allowed to be built again within the CRZ of any tree. The UFB requests a briefing from AIPP on any project that involves the CRZ of a protected size tree and larger.

Thank you for your attention to this matter. Please acknowledge receipt of this letter.

Sincerely yours,



Patrick Brewer  
Chair, Urban Forestry Board

Cc: Mayor Leffingwell and City Council members; Marc Ott, City Manager; Bert Lumbreras, Assistant City Manager; Sara Hensley, PARD Director; Michael Embesi, City Arborist; Kimberley Mc Neely, PARD Assistant Director; Tom Nelson, PARD Division Manager-Aquatics; Charles Vaclavik, PARD Division Manager-Central Parks; Pat Fueller, PARD Division Manager-Forestry; Angela Hanson, Acting PARD Forestry Manager

May 8, 2012



Austin Heritage Tree Foundation  
Zolla Vega  
Austin Tx

RE: Brush square Oak, by o Henry and suzanna Dickinson museum

The purpose of this report is to evaluate the health and vigor of the live oak and overall impact of the site changes 2 years prior over the critical root zone. These include the installation of 2 historic buildings infringing on the critical root zone and an art patio work infringing in half the critical root zone.

**Visual inspection and Background data:**

Site visit performed on Monday May 7<sup>th</sup>. *Quercus fusiformis*. DBH of 44". Half of critical root zone has a radius of 22 ft. Foliage is smaller and paler than nearby trees. Top half of the canopy is showing thinning estimated at 70% of its original density. No significant insect or disease impacts were observed.

8 photographs provided by the museum curator showing the construction process. Grade changes are larger than 8 inches through a significant area of the CRZ. The patio coverage is made up of thick limestone slabs tightly juxtaposed with marble slabs. Joints are approximately 1/8 ". No information has been provided regarding root zone impact and mitigation actions during the project other than these photos.

**Water availability:**

The site grade sloped down at an approximate 5 degrees from the west side. The placement of the building on the west side of the tree reduces the water availability and moves the drainage patterns previously feeding the tree.

The patio art work with its grade changes and significant impervious also reduces water availability.

The occasional use of this public park has the effect of compacting the remaining pervious cover by pedestrian traffic and hampers water infiltration. No soil bulk density testing has been performed at this time.

Extreme drought has repeatedly impacted the area in 2008, 2009, 2011. Other oaks on site and not impacted by site changes other than public use show no canopy thinning.

**Other Data:**

The google earth timeline shows a thinning of the canopy since 2009.

**Discussion:**

The extensive site changes since 2009 are impacting the overall health of the tree. We expect more gradual decline in the coming years if corrective measures are not implemented. These measures should strive to provide a healthier root system. These can include a combination of several elements:

- Root wells through the changed grade and stone patio area
- Soil improvement with compost and mulch
- Compaction remediation and prevention with airspade and incorporation of 1' layer of sand and 1" layer of compost through the available critical root zone.
- Catchment of water run-off with permanent landscape features to increase available water per average rainfall. Run off can be from the surrounding site itself as runoff flows from western edge through the root zone and can be collected by a rain garden feature. Run off can also be collected directly from the 2 historic buildings and redirected to infiltration basin included in a permanent landscape like the rain garden just mentioned. based and
- Enclosing of root zone area to prevent compaction
- Fertilizing of the CRZ with a high nitrogen low salt fertilizer: arborgreenPRO, Bartlett Boost, PHC tree fertilizer or similar low salt solution.
- Monitoring by a certified arborist once/year.

**Vincent Debrock**  
 Operations Manager  
 Certified Arborist #TX 1336-A  
 Commercial pesticide applicator license #035886  
 International Society of Arboriculture  
 Commercial Society of Arboriculture  
 Accredited by Service Magic  
 Accredited by BBB



Heritage Tree Care LLC, 100 W. Hillcrest Drive, San Marcos Tx 78666. Vincent @ 512-921-8452 & [vincent@txheritagetreecare.com](mailto:vincent@txheritagetreecare.com). Jeovanny @ 512-779-2502 & [Jeovanny@txheritagetreecare.com](mailto:Jeovanny@txheritagetreecare.com).  
[www.txheritagetreecare.com](http://www.txheritagetreecare.com).  
 All work performed according to ANSI 300 standards.



# Tree Permit

Planning and Development Review Department  
One Texas Center, 505 Barton Springs Road, 4<sup>th</sup> floor  
Phone: (512) 974-1878 Fax: (512) 974-3010  
Email: [Michael.Cribbell@ci.austin.tx.us](mailto:Michael.Cribbell@ci.austin.tx.us) Website: [www.ci.austin.tx.us/tree](http://www.ci.austin.tx.us/tree)

ROW ID: 10392297

- Application request\* (specify all that apply): ☐ Single Family Home / Duplex or ☐ Other
- ☐ Removal of a protected-size tree;
- ☒ Development exceeding allowable standards for encroachment in the tree's critical root zone;
- ☐ Removal of more than 30% of a tree's crown.

\* Refer to Land Development Code 25-8 (BY1) and Environmental Criteria Manual (Section 3, App. F). Applicant understands that all impacts may threaten the health of the tree and that approval of this application does not guarantee favorable tree results.

Address of Property (including zip code): 409 E 5<sup>th</sup> St.

Name of Owner or Authorized Agent: Larry Houseborn Jr

Building Permit Number (if applicable): \_\_\_\_\_ ☐ Apply application fee to this permit (see row)

Telephone #: 512-203-1779 Fax #: 512-974-9487 E-mail: malcolm.houseborn@ci.austin.tx.us

Type of Tree: LIVE OAK Location on Lot: Back of House TRUS

Trunk size at 4 1/4 feet above ground: circumference (inches around) \_\_\_\_\_ or diameter 43.2

General Tree Condition: good

Reason for Request: landscape project

Larry Houseborn Jr 1-21-09  
Owner/Authorized Agent Signature Date

- Attach an aerial drawing that includes the location of the tree and the proposed development, including driveways, utility lines, irrigation systems, etc. This application is reviewed for tree impact only; not for zoning or other applicable regulations.
- The application may be emailed, faxed, or delivered to the above address. Payment (\$25 check to the City of Austin) must be made prior to City personnel completing this application. No fee is required for dead or diseased trees.

PERMIT DETERMINATION - To be completed by City Arborist Personnel			
<input type="checkbox"/> Approved	<input checked="" type="checkbox"/> <b>*Approved With Conditions</b>	<input type="checkbox"/> Denied	<input type="checkbox"/> Statutory Denial (more information required)
Comments: <u>THANK YOU FOR REMOVING THE INTERFERING CACTUS FROM THE AREA NEAR THE TREE AND FOR PROVIDING NUMEROUS PRE-CONSTRUCTION ASSISTANCE TO THE TREE'S ROOT SYSTEM.</u>			
*Conditions of Approval: <input type="checkbox"/> None; <input checked="" type="checkbox"/> As described within Arborist Comments (see above); and			
<input type="checkbox"/> Applicant agrees to plant _____ caliper inches, container grown, City of Austin Class 1 trees* (i.e. Live Oak, Cedar Elm, Mountain Laurel) on the lot prior to obtaining a Certificate of Occupancy (minimum 2-inch trunk diameter).			
<input checked="" type="checkbox"/> Prior to development, applicant agrees to supply an 8-inch root zone mulch layer and maintain tree protection fencing (chain-link, 5-6 feet in height) throughout the project duration.			
<input checked="" type="checkbox"/> Provide a receipt for remedial tree care and / or any required pruning as performed by a certified arborist. (P.D.B. - PLANTING)			
<input checked="" type="checkbox"/> No impacts are permitted within the tree's critical root zone (* ECM 3.5.2), including trenching for utilities.			
<u>Larry Houseborn Jr</u>	<u>4/2/10</u>	<u>[Signature]</u>	<u>25MAR10</u>
Owner/Authorized Agent Signature	Date	City Arborist Signature	Date

Post this permit on site while any proposed work is in progress.  
Conditions for approval of this application must be met within 1 year of the effective date.

1/12/10

Brush Square Heritage Live Oak Showing Thinning Canopy and Pale Leaves



Original Grade before Courtyard Installation



Grade Was Raised Significantly in 2010 over CRZ of Brush Square Tree



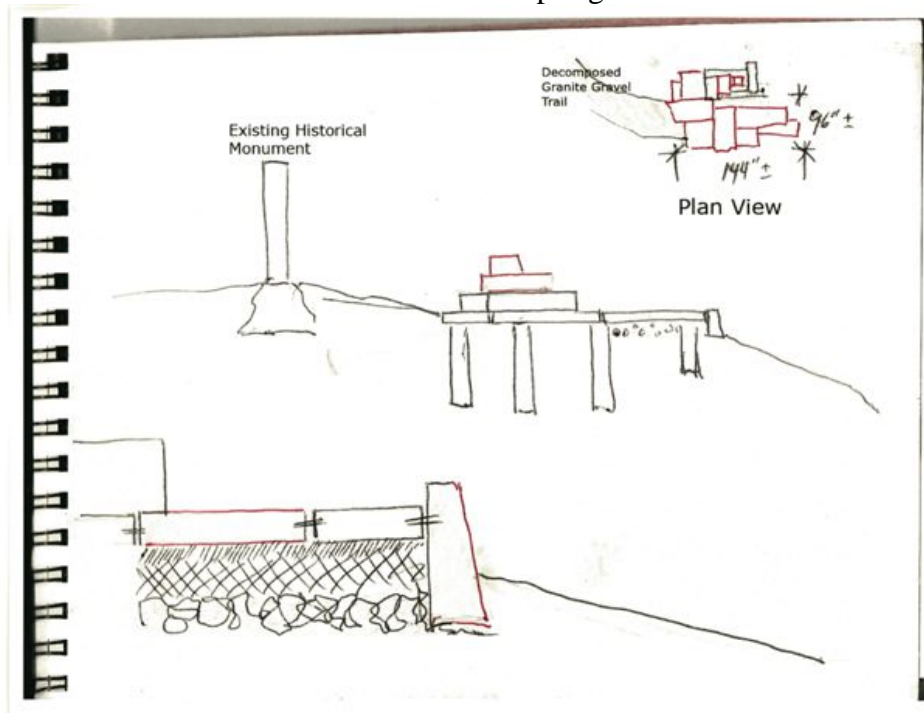
Large Deep Hole Dug within  $\frac{1}{2}$  CRZ of Brush Square Tree  
(7 ft. From The Trunk. Tree Is To The Right)



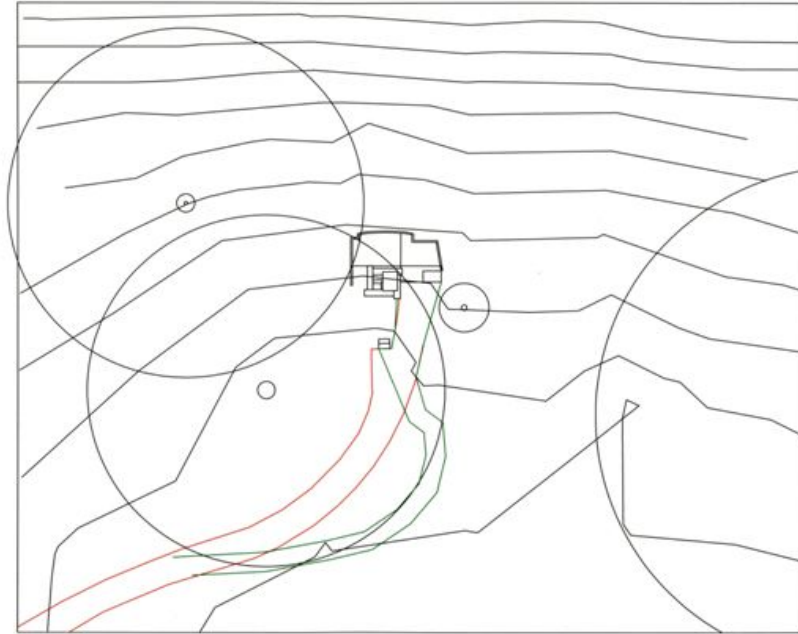
## Machine within CRZ of Tree Compacting Soil



Artist's Sketches for Overlook Construction within CRZ of Heritage Pecan Tree  
In South Lawn of Barton Springs Pool



Artist's Plans to Install Overlook, Artwork and Path within CRZ of BSP Tree



Another Version to Install Overlook, Artwork and Path within CRZ of BSP Tree

